TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

AGENDA ITEM REQUEST

for Rulemaking Adoption

AGENDA REQUESTED: February 12, 2014

DATE OF REQUEST: January 24, 2014

INDIVIDUAL TO CONTACT REGARDING CHANGES TO THIS REQUEST, IF NEEDED: Derek Baxter, (512) 239-2613

CAPTION: Docket No. 2012-2484-RUL. Consideration of the adoption of new Sections 298.400, 298.405, 298.410, 298.415, 298.425, 298.430, 298.435, 298.440, 298.450, 298.455, 298.460, 298.465, 298.470, 298.475, 298.480, 298.485, 298.490, 298.500, 298.505, 298.510, 298.515, 298.520, 298.525, 298.530, 298.535, and 298.540 of 30 TAC Chapter 298, Environmental Flow Standards for Surface Water.

The adoption would implement House Bill 3 and Senate Bill 3, 80th Legislature, 2007, Regular Session, relating to the establishment of environmental flow standards included in a permit or amended water right in the river and bay systems consisting of the Nueces River and Corpus Christi and Baffin Bays; the Rio Grande, Rio Grande estuary, and Lower Laguna Madre; and the Brazos River and its associated bay and estuary system. The proposed rules were published in the September 20, 2013, issue of the *Texas Register* (38 TexReg 6176). (Kathy Alexander, Robin Smith) (Rule Project No. 2013-009-298-OW)

L'Oreal Stepney, P.E.
Deputy Director

Ron Ellis *for* Kellye Rila
Division Director

Derek Baxter
Agenda Coordinator

Copy to CCC Secretary? NO YES X

Texas Commission on Environmental Quality
Interoffice Memorandum

To: Commissioners **Date:** January 24, 2014

Thru: Bridget C. Bohac, Chief Clerk
Richard A. Hyde, P.E., Executive Director

From: L'Oreal W. Stepney, P.E., Deputy Director
Office of Water

Docket No.: 2012-2484-RUL

Subject: Commission Approval for Rulemaking Adoption
Chapter 298, Environmental Flow Standards for Surface Water
Environmental Flow Standards 3: Brazos, Nueces, and Rio Grande Basins
Rule Project No. 2013-009-298-OW

Background and reason(s) for the rulemaking:
House Bill 3 and Senate Bill 3 (HB 3/SB 3), 80th Legislature, 2007, created the environmental flows process and established the Environmental Flows Advisory Group (Advisory Group) to oversee its implementation. HB 3/SB 3 also established the Environmental Flows Science Advisory Committee, local bay and basin area stakeholder committees (BBASC), and local bay and basin expert science teams (BBEST). A BBEST develops environmental flow analyses and recommends an environmental flow regime, based solely on the best science available, to their basin's BBASC. A BBASC, while considering the BBEST's recommendations and other factors, develops recommendations regarding environmental flow standards and strategies to meet the environmental flow standards and submits those recommendations to the Advisory Group and to the commission for rulemaking. The BBASCs also developed a work plan for adaptive management which includes a schedule for review and potential revision of the standards and strategies and submits the work plan to the Advisory Group for approval. HB 3 was authored by Representative Robert Puente and Representative Harvey Hilderbran. SB 3 was authored by Senator Kip Averitt.

Article 1, HB 3 and Article 1, SB 3 amended Texas Water Code (TWC), §§11.002, 11.023, 11.0235, 11.0841, 11.134, 11.147, 11.1471, 11.148, and 11.1491. HB 3/SB 3 added TWC, §§11.0236, 11.02361, 11.02362, 11.0237, and 15.4063. These HB 3/SB 3 amendments to the TWC codified the environmental flows process and its implementation. The amendment to TWC, §11.1471 specifically instructed the commission to adopt environmental flow standards by rule. The amendment to TWC, §11.1471 and §11.02362, provided for adaptive management and codified a process for revision to the standards if the BBASC's recommended a schedule other than every ten years.

This rulemaking implements TWC, §11.1471(a), through 30 Texas Administrative Code, Chapter 298, by adopting appropriate environmental flow standards for the Brazos, Nueces, and Rio Grande Basins.

Re: Docket No. 2012-2484-RUL

Scope of the rulemaking:
A.) Summary of what the rulemaking will do:
The scope of the adopted rulemaking is to implement the directive in TWC, §11.1471 for the river basin and bay systems consisting of the Nueces River and Corpus Christi and Baffin Bays; the Rio Grande, Rio Grande estuary, and Lower Laguna Madre; and the Brazos River and its associated bay and estuary system. The rulemaking will adopt appropriate environmental flow standards.

B.) Scope required by federal regulations or state statutes:
TWC, §11.1471(a), states that the commission by rule shall adopt appropriate environmental flow standards for each river basin in the state; establish an amount of unappropriated water, if available, to be set aside to satisfy environmental flow standards.

C.) Additional staff recommendations that are not required by federal rule or state statute:
None.

Statutory authority:
TWC, §§5.102, 5.103, 5.105 11.0235, 11.147, and 11.1471.

Effect on the:
A.) Regulated community:
Members of the regulated community who apply for a new appropriation of state water will be affected by the environmental flow standard recommended by this adopted rulemaking. An application for a new appropriation of state water will be recommended for issuance only if there is water available after the environmental flow standard has been met. The result will be that there could be less state water available for appropriation. However, because the adopted standards are expected to function similarly to current streamflow restrictions for applications, the adopted standards are not expected to have significant fiscal implications for the regulated community.

B.) Public:
The adopted rules may affect applicants for new appropriations and amendments that increase the amount of water to be taken, stored, or diverted which could result in an applicant having to secure an additional source of water. However, because stream flow restrictions are currently applied to new appropriations of water under existing practice and the adopted standards are expected to function similarly to current streamflow restrictions for applications, the proposed standards are not expected to have significant fiscal implications for the public.

C.) Agency programs:
The adopted rulemaking would have little impact on agency programs. The Water Availability Division will implement the rules when processing applications for new appropriations in the affected river basins. Currently, program staff uses a desktop

methodology to determine instream flow requirements. Assigning a flow requirement by rule will have little or no impact on processing times or workloads. The impact on the Office of Compliance and Enforcement will likewise be insignificant. Presently, enforceable instream flow requirements are placed in water use permits. After the adopted rulemaking is effective, those flow requirements will come from the adopted rule, but will not be enforced any differently by the Office of Compliance and Enforcement.

Stakeholder meetings:
A stakeholder meeting was held on December 6, 2012, in Austin, Texas. TCEQ staff presented general information about the proposed rulemaking and asked the stakeholders for feedback on the issue of balancing human and other competing needs for water. The meeting was attended by 18 stakeholders representing a broad spectrum of interests in the basins affected by this rulemaking and across the state. The commission received comment letters from stakeholders and their feedback has been considered in development of the proposed rules.

Additionally, the TCEQ held a public hearing on October 15, 2013.

Public comment:
Staff received over 2,000 comments on the proposed rule package. In the Brazos River Basin and its associated bay and estuary system, the commission requested comments on the proposed rule, the stakeholders' recommendations, and a minority report which was included in the stakeholders' recommendations. Some of the commenters requested specific changes requesting that the commission adopt the recommendations in the minority report. These commenters requested increased standards for pulse flows.

For the Nueces River and Corpus Christi and Baffin Bays, the commission requested comments on the proposed rule and the stakeholders' recommendations. The majority of the commenters did not provide specific changes; however, many expressed support for adopting the stakeholders' recommendations and more stringent standards for pulses and freshwater inflows. Many commenters stated that staff's proposed rule was not sufficiently protective of Nueces Bay and Delta, many expressed support for more stringent standards for the Nueces River and its tributaries.

For the Rio Grande, Rio Grande estuary, and Lower Laguna Madre many commenters requested that the commission adopt the recommendations of the science team which included additional measurement points and pulse flows. Some commenters requested that the commission adopt standards with strategy targets.

Significant changes from proposal:
There were no significant changes from the proposed rule.

Potential controversial concerns and legislative interest:
HB 3/SB 3 has legislative interest. Various members of the legislature have expressed an interest in this rule. The Advisory Group consists of nine members, appointed by the Governor, Lieutenant Governor, and Speaker of the House of Representatives. Six of those members are legislators, including the chairs of the Senate and House Natural Resource Committees.

Brazos River Basin
A potentially controversial concern in the adopted rulemaking related to the Brazos River Basin is that a minority group of stakeholders submitted a separate recommendation for three upper basin gages.

Nueces River Basin
The stakeholders submitted a consensus recommendation. TCEQ staff is unaware of any potential controversial concerns at this time, although staff notes that the science team found that a portion of the basin is not a sound ecological environment.

Rio Grande Basin
A potentially controversial concern in the adopted rulemaking related to the Rio Grande Basin is that the stakeholders did not submit a recommendation. TCEQ staff is proposing rules based on information in the science team reports and other information within the statutory scope of HB 3/SB 3.

Does this rulemaking affect any current policies or require development of new policies?
HB 3/SB 3 established a new policy for application of instream flow requirements in applications for new appropriations of state water. This rulemaking adopts that policy and replaces existing TCEQ practices for the affected river basins.

What are the consequences if this rulemaking does not go forward? Are there alternatives to rulemaking?
TWC, §11.1471, directs the commission to adopt a rule by September 1, 2012. In January 2013, the Environmental Flows Advisory Committee amended the timeline for the environmental flows rulemaking by changing the due date to March 1, 2014. This rulemaking complies with the statute and keeps the environmental flows process on schedule. Any alternative course of action would not be in compliance with the timetables established by HB 3/SB 3, as amended by the Advisory Group.

Key points in the adoption rulemaking schedule:
Texas Register proposal publication date: September 20, 2013
Anticipated Texas Register adoption publication date: February 28, 2014
Anticipated effective date: March 6, 2014
Six-month _Texas Register_ filing deadline: March 20, 2014

Re: Docket No. 2012-2484-RUL

Agency contacts:
Ron Ellis, Rule Project Manager, 239-1282, Water Availability Division
Robin Smith, Staff Attorney, 239-0463
Derek Baxter, Texas Register Coordinator, 239-2613

Attachments
SB 3, 80th Legislative Session
HB 3, 80th Legislative Session

cc: Chief Clerk, 2 copies
Executive Director's Office
Marshall Coover
Tucker Royall
John Bentley
Office of General Counsel
Ron Ellis
Derek Baxter

The Texas Commission on Environmental Quality (TCEQ, agency, or commission) adopts new §§298.400, 298.405, 298.410, 298.415, 298.425, 298.430, 298.435, 298.440, 298.450, 298.455, 298.460, 298.465, 298.470, 298.475, 298.480, 298.485, 298.490, 298.500, 298.505, 298.510, 298.515, 298.520, 298.525, 298.530, 298.535, and 298.540.

Sections 298.400, 298.405, 298.455, 298.460, 298.470, 298.475, 298.480, 298.510 and 298.530 are adopted *with changes* to the proposed text as published in the September 20, 2013, issue of the *Texas Register* (38 TexReg 6176). Sections 298.410, 298.415, 298.425, 298.430, 298.435, 298.440, 298.450, 298.465, 298.485, 298.490, 298.500, 298.505, 298.515, 298.520, 298.525, 298.535, and 298.540 are adopted *without changes* to the proposed text and will not be republished.

Background and Summary of the Factual Basis for the Adopted Rules

In 2007, the 80th Legislature passed House Bill 3 (HB 3), relating to the management of the water resources of the state, including the protection of instream flows and freshwater inflows; and Senate Bill 3 (SB 3), relating to the development, management, and preservation of the water resources of the state. Both of these bills amended Texas Water Code (TWC), §11.1471, which requires the commission to adopt rules related to environmental flow standards and set-asides. The commission is proposing to implement the environmental flow provisions of HB 3, Article 1, and SB 3, Article 1, and

adopts environmental flow standards for the Brazos River and its associated bay and estuary system, the Nueces River and Corpus Christi and Baffin Bays, and the river basin and bay system consisting of the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre.

Prior to HB 3/SB 3, the commission had authority to protect environmental interests as it permitted state surface water. The commission had authority to maintain: existing instream uses under TWC, §11.147(d); water quality under TWC, §11.147(d) and §11.150; fish and wildlife habitat under TWC, §11.147(e) and §11.152; and freshwater inflows to bay and estuary systems under TWC, §11.147(a) - (c). TWC, §11.147(b) - (e) and §11.152 required that these environmental considerations be included only to the extent practicable or reasonable and required that environmental considerations be considered along with other factors of public welfare. HB 3/SB 3 did not make major changes to this commission authority.

The commission also retains its ability, granted prior to HB 3/SB 3, to place special conditions in water right permits to protect environmental interests. Before HB 3/SB 3, TWC, §11.134(b)(3)(D), required consideration of environmental interests for new appropriations of water, including amendments that granted an increase in the amount of water that could be diverted, and TWC, §11.085, required consideration of environmental interests for interbasin transfers. Permits for water projects that call for

the re-diversion of wastewater or return flows to a watercourse, so called "indirect reuse" projects, were also subject to special conditions to protect environmental uses under TWC, §11.042 and §11.046. Amendments that were not new appropriations were required to be authorized if, among other criteria, the amendment would not cause adverse impact to the environment of greater magnitude than under the original permit under TWC, §11.122(b). As a practical matter, if any adverse impact to the environment was noted in an application for an amendment, then special conditions were crafted to remove the adverse impact so that the amendment might be granted.

HB 3/SB 3 changed the process by which the state would decide the flow that needed to be preserved in the watercourse for the environment and the balancing of environmental interests along with other public interests. HB 3/SB 3 created a statewide Environmental Flows Advisory Group (Advisory Group). The Advisory Group was given the responsibility to appoint Basin and Bay Area Stakeholder Committees (the stakeholder committee) for each of the state's river basin, bay, and estuary systems. The stakeholder committees, in turn, appointed a Basin and Bay Expert Science Team (the science team). The science teams were to develop a recommended environmental flow regime, or schedule of flow quantities adequate to support a sound ecological environment. The stakeholders were to take the science team's recommendations and consider those recommendations in conjunction with other factors, including the present and future needs for water for other uses. The stakeholders were also to report

their recommendations to the commission. Both the science teams and the stakeholder committees were to reach their recommendations on a consensus basis to the maximum extent possible. The commission, in turn, is to take the recommendations from the science team, the stakeholder committees, the Advisory Group, and a statewide Science Advisory Committee (SAC), and consider that information along with other information and by rule adopt environmental flow standards for each basin and bay system. At the same time the commission is to establish an amount of unappropriated water, if available, to be set aside to satisfy the environmental flow standards to the maximum extent reasonable when considering human water needs. Once the environmental flow standards are adopted, the commission's objective or goal will be to protect the standards, along with the interests of senior water right holders, in its water rights permitting process for new appropriations and amendments that increase the amount of water to be taken, stored, or diverted. Under HB 3/SB 3, the commission may use the set-aside or use its existing authority to place special conditions in permits to protect the environmental flow standards.

The commission received the Nueces River and Corpus Christi and Baffin Bays science team report on October 28, 2011, and the stakeholder committee report on August 22, 2012. The commission received the Brazos River and its associated bay and estuary system science team report on March 1, 2012, and the stakeholder committee report on August 31, 2012. The commission received the Rio Grande, the Rio Grande estuary, and

the Lower Laguna Madre science team reports on July 12, 2012 and July 25, 2012; however, the stakeholders for this basin and bay system did not submit a report.

Copies of the Nueces River and Corpus Christi and Baffin Bays reports are available on the following Web site: *http://www.tceq.texas.gov/permitting/water_rights/eflows/nueces-river-and-corpus-christi-and-baffin-bays-stakeholder-committee-and-expert-science-team*.

Copies of the Brazos River and its associated bay and estuary system reports are available on the following Web site: *http://www.tceq.texas.gov/permitting/water_rights/eflows/brazos-river-and-associated-bay-and-estuary-system-stakeholder-committee-and-expert-science-team*.

Copies of the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre science team reports are available on the following Web site: *http://www.tceq.texas.gov/permitting/water_rights/eflows/rio-grande-rio-grande-estuary-and-lower-laguna-madre*.

The commission adopts Subchapter F to cover the Nueces River and Corpus Christi and Baffin Bays. The commission adopts Subchapter G to cover the Brazos River and its associated bay and estuary system. The commission adopts Subchapter H to cover the

Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre.

Section by Section Discussion

Subchapter F: Nueces River and Corpus Christi and Baffin Bays

The commission adopts new Subchapter F to contain all of the environmental flow standards and rules specific to the basin and bay system composed of the Nueces River and Corpus Christi and Baffin Bays. The science team delivered its report to the commission on October 28, 2011. The stakeholder committee delivered its recommendations to the commission on August 22, 2012. As required under TWC, §11.02362(d), the commission must adopt environmental flow standards. This adopted new subchapter would implement the schedule established by the Advisory Group under TWC, §11.02362, and environmental flow standards required of the commission in TWC, §11.1471.

§298.400, Applicability and Purpose

The commission adopts new §298.400 to describe the purpose of Subchapter F and under what circumstances it applies. In response to comments, the commission added the sentence "This subchapter does not affect an appropriation of or an authorization to store, take, or divert water under a permit or amendment to a water right issued before September 1, 2007." to clarify that Subchapter F does not apply to new appropriations of water issued before September 1, 2007.

§298.405, Definitions

The commission adopts new §298.405. The adopted section has definitions of terms that will apply only to this subchapter. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the adopted standards. In §298.405(1), (6), (8), and (11) the commission adopts definitions for "Fall," "Spring," "Summer," and "Winter" because the adopted environmental flow standards for the Nueces River and its associated tributaries, and rivers and tributaries in the Nueces-Rio Grande Coastal Basin, vary by season. The definitions are the same as the definitions of the seasons in the recommendations of the science team, which were subsequently used by the stakeholders to develop their recommendations. In §298.405(2) the commission adopts a definition for "Inflow regime" because the adopted freshwater inflow standards for Nueces Bay and Delta vary by season and year. In §298.405(3), (9), and (10) the commission adopts definitions for "Modeled permitting frequency," "Target volume," and "Target frequency." These frequencies and quantities are used for water rights permitting and for the purpose of providing additional freshwater inflows to Nueces Bay and Delta through voluntary strategies. In response to comment the commission added the phrases "specified in §298.430(a)(3)" and "water rights permitting and to establish

targets for" and deleted the word "sole" to clarify the definition of "Target volume" and how it applies. In response to comment the commission added the phrase "at the time the first water right application subject to this subchapter is processed" to the definition of "Modeled permitting frequency" in §298.405(3) to clarify the point in time at which the baseline will be determined. In §298.405(4) and (5) the commission adopts definitions for "Nueces Bay," and "Nueces Delta" to set out the geographical extent of the area to be supported by the adopted freshwater inflow standards, and to specify areas of interest for §298.410. In response to comment, the commission clarified the definition for "Nueces Delta" in §298.405(5) by deleting the proposed definition and substituting the following definition "a complex array of channels, pools, marshes, and tidal flats in the upper end of Nueces Bay that lies generally to the north of the Nueces River and includes area receiving inflows from the Rincon Bayou and overflow channels from the river." Finally, in §298.405(7) the commission adopts a definition for "Sound ecological environment" for this basin and bay system. This adopted definition is based on the definition recommended by the stakeholders.

§298.410, Findings

The commission adopts new §298.410 regarding findings related to sound ecological environments. The adopted finding regarding the ecological environment is consistent with the stakeholder report. Information on the commission's reasoning for the adopted schedule of flow quantities and environmental flow standards can be found in

this preamble under the analyses for §298.425 and §298.430. This adopted new section would implement TWC, §11.1471.

§298.415, Set-Asides and Standards Priority Date

The commission adopts new §298.415 establishing the priority date for any set-asides and any modeling of the environmental flow standards in the commission's water availability models (WAMs) as the date the commission received the report from the science team for the basin and bay system, which was October 28, 2011. The commission protects high flow pulse standards from being permitted to smaller applicants for new appropriations because, under adopted §298.435(b), some of the high flow pulse standards would not be included in some water right permits for new appropriations. In addition, the commission needs to ensure that new appropriations, or amendments to add a new appropriation, will not affect downstream flow standards at measurement points that may not be applicable to those new appropriations or amendments. The commission also adds these changes to ensure consistency with adopted §298.20, which establishes the priority date for environmental flow standards and set-asides as the date the commission received the environmental flow regime recommendations from the science team.

§298.425, Schedule of Flow Quantities

The commission adopts new §298.425 regarding the schedule of flow quantities. The

commission adopts this section to explain the implementation of the environmental flow standards in the following section. The commission does not necessarily intend to use the exact wording of this section as the wording in water right permits issued after the adoption of these rules. However, this section describes how the commission intends to implement the adopted environmental flow standards in water right permit or amendment applications for new appropriations.

Subsistence flows are the minimum flows below which the commission will not allow diversions or storage of water. Therefore, the water right holder may not divert or store water if the flow at an applicable measurement point is below the subsistence flow standard. The adopted rule provides that if the flow at an applicable measurement point is above the subsistence flow standard but below the applicable base flow standard, the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass a measurement point, and any remaining flow may be diverted or stored. The commission's adopted rule provides that the subsistence flow standard can be variable depending on the season, and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season.

Once the flow at an applicable measurement point is above the base flow standard for the season, the water right holder may store or divert water according to its permit as

long as the flow at the measurement point does not fall below the applicable base flow standard for that season.

The commission's adopted rule provides that pulse flows be allowed to pass if streamflows are above the base or subsistence flow standard for the season, subject to the pulse flow exemption as described in §298.435(b), and if the pulse flow trigger level is reached at an applicable measurement point. Once the pulse flow trigger conditions are met, the water right holder may not store or divert water until either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred.

The adopted rule does not require that the water right holder produce a pulse flow, because pulses occur when there are high rainfall events. The commission's adopted rule does provide that during these high rainfall events, the applicable high flow pulse be allowed to pass downstream. The commission's adopted rule provides that a water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse. Under the adopted rule, a water right holder can divert water in excess of the applicable pulse requirement so long as those diversions do not prevent the occurrence of the pulse flow trigger level of the applicable pulse and as long as the duration or volume requirement is met for the applicable pulse.

If, in a particular season, only one of the small, medium, or large seasonal high flow pulses or annual pulses identified in the commission's adopted rule is generated, there would be no need to "catch up" or allow more than the applicable number of high flow pulses to pass in the following season. The adopted rule provides that pulse flows not be tied to a hydrologic condition. In addition, the adopted rule provides that if the pulse requirements for a medium or large seasonal high flow pulse event or an annual pulse event are satisfied and therefore this high flow pulse is allowed to pass, the requirements for one of each of the applicable smaller high flow pulse events during that season or year would be considered to be satisfied at the applicable measurement point.

The commission's adopted rule provides that if a water right owner stored water at a previous time and complied with the applicable environmental flow requirements at that time, the water right owner would not need to comply with any environmental flow requirements in effect when subsequent use of that stored water occurs.

§298.430, Environmental Flow Standards

The commission adopts new §298.430 to provide the environmental flow standards of TWC, §11.1471, for the basin and bay system composed of the Nueces River and Corpus Christi and Baffin Bays. The commission based its decision on consideration of the recommendations of stakeholders, sound science, and other public interests and

relevant factors.

The adopted freshwater inflow standards for Nueces Bay and Delta generally track the recommendations of the stakeholders. The commission recognizes that freshwater inflows to Nueces Bay and Delta are currently provided through a commission approved Agreed Order. The commission further recognizes the role of environmental flow standards in both water rights permitting and in establishing targets for purposes of providing additional freshwater inflows through voluntary strategies. Based on this, the commission adopts a dual set of recommendations for freshwater inflows to Nueces Bay and Delta. The commission does not adopt specific frequencies for use in water availability determinations in the adopted rule because WAMs change as new permits and amendments are added. The adopted rule provides that new permits or amendments to increase the amount of water stored, taken, or diverted shall not impair the frequency at which specific inflow regime levels occur by more than the values set out in §298.430(a)(3)(A) - (C), as compared to the baseline values in the commission's WAMs in effect at the time the first application for a water right permit or amendment subject to this subchapter is considered. The commission adopts new §298.430(a)(1) and (2) to set out how the allowable impairment will be calculated and applied in water availability determinations for new water rights or amendments subject to this subchapter. The commission adopts new §298.430(a)(3)(A) - (C) to set out how the allowable impairment will be calculated for each specific inflow regime. Finally, the

commission adopts new §298.430(a)(3)(D) to provide that the target volumes for each season and year are independent of the preceding and subsequent seasons and years.

The stakeholders proposed that the environmental flow standards for this basin and bay system include a provision allowing the Nueces Estuary Advisory Council (NEAC) the opportunity to review and provide recommendations to the commission on applications for new appropriations of water in excess of 500 acre-feet per year. The stakeholders stated purpose for this provision is so that the NEAC could recommend approval of an application violating specified attainment frequencies, but providing significant benefits to the bay and estuary through operations, permit conditions, or adaptive management.

The stakeholders' request is not allowable under TCEQs procedures for the public to become involved in water rights applications. If the NEAC wishes to be a party to any contested case matter on applications in the Nueces River Basin, the NEAC would have to follow the procedure in TWC, §5.115 and TCEQ's rules in 30 TAC Chapter 55. However, the NEAC, or its individual members, may be on the mailing list for any application and may file comments during the comment period. The stakeholders stated that NEAC needs to review and provide recommendations to the commission on applications for new appropriations of water so that the NEAC could recommend changes to the environmental flow standards adopted in the rules. The commission cannot change the environmental standards in the rules as part of a proceeding on a

water rights application. Under TWC, §11.1471(f), the commission may only change environmental flow standards through another rulemaking, after a stakeholder process, and no more often than every ten years (unless the stakeholder group recommends a more frequent basis). Therefore, the commission did not include provisions allowing the NEAC to participate in the water rights permitting process in the adopted rule because other rules and statutes govern the water rights permitting process and because changes to adopted standards can only occur via a rulemaking process.

The commission's adopted rule further provides that if strategies are implemented through a water right permit to provide additional freshwater inflows to Nueces Bay and Nueces Delta, any subsequent new permits or amendments for new appropriations of water not be allowed to reduce the frequency at which inflow regime levels occur below the levels that would occur in the commission's WAM with the permitted strategy or strategies in place.

The measurement points and the adopted base flow and subsistence flow standards for the Nueces River Basin and the Nueces-Rio Grande Coastal Basin are generally those recommended by the stakeholders. However, the stakeholders recommended an environmental flow standard at Leona Springs near Uvalde. The commission notes that, when it adopted this rule, daily discharge information for this location was not publically available. The lack of readily accessible daily data could create

implementation issues for specific water right holders who could be subject to an environmental flow standard at this location; therefore, the commission has not adopted environmental flow standards at this location.

The adopted high flow pulse standards are generally based on recommendations of the stakeholders. The commission did not include high flow pulses with trigger levels above the action stage level to ensure that application of the standards would not cause flooding. The action stage level is defined by the National Weather Service as the stage which, when reached by a rising stream, represents the level where the National Weather Service or a partner/user needs to take some type of mitigation action in preparation for possible significant hydrologic activity. At some locations, the stakeholders recommended pulse flows with durations in excess of one month. There was little site-specific information supporting specific high flow pulses, including pulses with long durations. Therefore, the commission did not include pulse flows with durations longer than 30 days in the adopted rule. The stakeholders also proposed pulse flow trigger levels that were either below or very close to the base flow values at some measurement points in some seasons. The commission did not include these pulses in the adopted rule because they would likely not represent high flows within the watercourse in the context of the environmental flow standards proposed by the stakeholders. The number of applicable high flow pulses was also adjusted based on the impacts of pulse flows on remaining unappropriated water as discussed further.

The stakeholders performed an analysis of the impacts of the adopted standards on future water supply needs and considered the results of these analyses in their recommendations. The executive director (ED) reviewed the information provided by the stakeholders. The ED also performed his own analysis to address the issue of balancing human and other competing needs for water in the basin and bay system. The ED's analysis is not intended as a finding that water is available for specific projects. When applications for projects are evaluated, water availability is based on specific facts in those applications.

The ED analyzed the impacts of the adopted standards on the remaining unappropriated water at representative measurement points in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin. The ED based his analysis on results from the WAM used for his water availability determinations for new permits or amendments that request a new appropriation of water. The ED calculated both the amount of unappropriated water at selected measurement points and the impact of the adopted standards on unappropriated water. The remaining unappropriated water in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, before application of the adopted standards, varied from less than 1% of the time to approximately 47% of the time, and averages 10% overall for these basins. Unappropriated water in these basins generally occurs during times of higher flow; therefore, increasing pulse volumes and frequencies

during wetter periods reduces the remaining unappropriated flow. The ED evaluated the freshwater inflow standards recommended by the stakeholders and found that application of the standards resulted in some water available for appropriation during higher flow events. Copies of the WAMs used in this analysis are available at: *http://www.tceq.texas.gov/goto/eflows/rulemaking.*

The ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify areas of concern that need to be addressed through this rulemaking process. The ED also reviewed the amount of unappropriated water at the adopted measurement points and considered whether reduction of the adopted standards would result in a significant increase in unappropriated water in these basins and found that it did not. Based on the results of the analysis of unappropriated flow and the water quality analysis, the ED determined that there would be no significant impact from implementation of the adopted standards.

The adopted rule does not set aside any unappropriated water to protect the adopted environmental flow standards. Any unappropriated water that is available in these river basins is available only during relatively wet conditions. The commission determines that the environmental flow standards may be adequately protected by special

conditions in water right permits or amendments for new appropriations of water in these basins. Special conditions are a more effective method to maximize the use of water by allowing water to be used for dual purposes. Special conditions to protect environmental flows may allow water permitted to downstream senior water rights, as well as return flows and permitted but unused water, to satisfy the special conditions. This adopted new section would implement TWC, §11.1471.

§298.435, Water Right Permit Conditions

The commission adopts new §298.435 relating to water right permit conditions. The adopted provision would require the commission to place special conditions in water right permits for new appropriations and amendments that would add additional appropriations to existing permits. The special conditions would be to protect the environmental flow standards established by the subchapter. Consistent with the recommendations of the stakeholders, the adopted rule provides that, for water right permit applications where the diversion rate is less than 20% of a pulse flow trigger requirement, the water right permit or amendment would not include special conditions relative to that high flow pulse. This adopted new section would implement TWC, §11.134(b)(3)(D) and §11.1471.

§298.440, Schedule for Revision of Standards

The commission adopts new §298.440 to provide the schedule for re-examination of the

environmental flow standards. The adopted rule requires that the commission take up a possible rulemaking to change the standards ten years from the effective date of the rules, unless the stakeholder committee submits a work plan approved by the Advisory Group that calls for a more frequent review. The commission notes that it is prohibited from providing that the rulemaking process occurs more frequently than once every ten years unless the stakeholders' work plan approved by the Advisory Group under TWC, §11.02362(p), calls for a more frequent schedule. The commission notes that, as of the time of proposal of these rules, it has not received an approved work plan from the stakeholder committee. Should the commission receive an approved work plan after final adoption of this rule package, the commission may consider an amendment to this section and change the schedule more often than once every ten years. The adopted new section would implement TWC, §11.1471(f).

Subchapter G: Brazos River and Its Associated Bay and Estuary System

The commission adopted new Subchapter G to contain all of the environmental flow standards and rules specific to the basin and bay system composed of the Brazos River and its associated tributaries, and its bay and estuary system, and the Brazos-Colorado Coastal Basin. The science team delivered its report to the commission on March 1, 2012. The stakeholder committee delivered its recommendations to the commission on August 31, 2012. The commission adopts environmental flow standards as required under TWC, §11.02362(d). This adopted new subchapter would implement the schedule

established by the Advisory Group under TWC, §11.02362, and environmental flow standards required of the commission in TWC, §11.1471.

§298.450, Applicability and Purpose

The commission adopts new §298.450 to describe the purpose of Subchapter G and under what circumstances it applies.

§298.455, Definitions

The commission adopts new §298.455. The adopted section has definitions of terms that will apply only to this subchapter. A definition for overbank flows is not included in this section. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the adopted standards. In §298.455(1), (3), and (12) the commission adopts definitions for "Average condition," "Dry condition," and "Wet condition" because the adopted environmental flow standards vary according to hydrologic condition. A range of flow conditions - average, dry, and wet - is defined as the stakeholders recommended. In §298.455(2), the commission adopts a definition of "Climatic division" to be used solely for the purpose of calculating the Palmer Hydrologic Drought Index (PHDI) value, as set out in §298.470. In §298.455(4), (5), and (11) the commission adopts definitions for

"Lower basin," "Middle basin," and "Upper basin," to describe geographic areas of the Brazos River Basin and the Brazos-Colorado Coastal Basin for purposes of calculating and applying the hydrologic conditions set out in §298.470. In §298.455(6) and (7), the commission adopts definitions for "PHDI" and "PHDI Index" which is a regionalized PHDI to set out the method for calculating those hydrologic conditions. In §298.455(8), (10), and (13) the commission adopts definitions for the seasons "Spring," "Summer," and "Winter" because the adopted environmental flow standards for this basin and bay system vary by season. The definitions are the same as the definitions of the seasons in the recommendations of the science team, which were subsequently used by the stakeholders to develop their recommendations. Finally, in §298.455(9) the commission adopts a definition for "Sound ecological environment" for this basin and bay system. This adopted definition is based on the definition recommended by the science team. In response to comments, the commission added the word "assemblages" to adopted §298.455(9) to correct a typographical error.

§298.460, Findings

The commission adopts new §298.460 regarding findings related to sound ecological environments. In response to comment the commission deleted the word "subsistence" from §298.460(b) to clarify that subsistence is not a hydrologic condition. The adopted finding regarding the ecological environment is consistent with the science team and stakeholder reports. The commission's reasoning for the adopted schedule of flow

quantities and environmental flow standards is described in this preamble under the discussion for §§298.470, 298.475, and 298.480. This adopted new section would implement TWC, §11.1471.

§298.465, Set-Asides and Standards Priority Date

The commission adopts new §298.465 establishing the priority date for any set-asides and any modeling of the environmental flow standards in the commission's WAMs as the date the commission received the report from the science team for the basin and bay system, which was March 1, 2012. The commission protects high flow pulse standards from being permitted to applicants for smaller new appropriations because under adopted §298.485(b) and (c), some of the high flow pulse standards would not be included in some water right permits for new appropriations. In addition, the commission needs to ensure that new appropriations, or amendments to add a new appropriation, will not affect downstream flow standards at measurement points that may not be applicable to those new appropriations or amendments. If all adopted standards downstream of a new appropriation are in the WAM for a river basin, water availability for the new appropriation would be limited by those downstream standards. The commission also adds these provisions to ensure consistency with adopted §298.20, which establishes the priority date for environmental flow standards and set-asides as the date the commission received the environmental flow regime recommendations from the science team.

§298.470, Calculation of Hydrologic Conditions

The commission adopts new §298.470 to explain the determination of hydrologic conditions for implementation and application of the standards to water right permits to which the adopted standards apply. The hydrologic conditions are based on the recommendations of the stakeholders. The commission adopts new §298.470(a) to describe how the hydrologic condition for a season will be determined for new water rights and amendments which are subject to the adopted standards.

The National Weather Service divides Texas into ten climatic divisions. The Brazos River Basin is included within eight of these divisions. The stakeholder report includes a calculation of the percentage of each climate division in each of the three basin geographic areas - Upper basin, Middle basin, and Lower basin, as these geographic areas are described in §298.455. The commission adopts new §298.470(b) to set out the percentage of each climate division within each geographic area.

The commission adopts new §298.470(c) to explain the calculation of hydrologic conditions for water rights permits or amendments to which hydrologic conditions apply. Consistent with the recommendation of the stakeholders, the commission adopts a PHDI Index that determines which base and pulse flow conditions would apply to a water right holder subject to the environmental flow standards in this subchapter. The

percentage of each climate division within each geographic area, as set out in §298.470(b), is used to calculate a PHDI value for each month of the historic record (1895 - 2010). The PHDI values were then ranked and used to create the PHDI Index where the 25th percentile value was used to describe the dry hydrologic condition and the 75th percentile value was used to describe the wet hydrologic condition. PHDI Index values between the 25th percentile value and the 75th percentile value were used to describe the average hydrologic condition. The commission also adopts new §298.470(d) to provide for ongoing, periodic revisions of the hydrologic conditions.

§298.475, Schedule of Flow Quantities

The commission adopts new §298.475 regarding the schedule of flow quantities. The commission adopts this section to explain the implementation of the environmental flow standards in the following section. The commission may not use the exact wording of this section as the wording in water right permits issued after the adoption of these rules. However, this section describes how the commission will implement the adopted environmental flow standards in water right permits or amendments for new appropriations.

Subsistence flows are the minimum flows below which the commission will not allow diversions or storage of water. Therefore, the water right holder may not divert or store water if the flow at an applicable measurement point is below the subsistence flow

standard. During dry hydrologic conditions, if the flow at an applicable measurement point is above the subsistence flow standard but below the applicable dry base flow standard, the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass its measurement points, and any remaining flow may be diverted or stored. The commission's adopted rules provide that the subsistence flow standard can be variable depending on the season, and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season.

During dry, average, or wet hydrologic conditions, a water right holder may not divert water when the flow is below the base flow standard for that season, except as discussed in the paragraph above. Once the flow at an applicable measurement point is above the base flow standard for the season, the water right holder may store or divert water according to its permit as long as the flow at the measurement point does not fall below the applicable base flow standard for that season and in accordance with the applicable hydrologic condition as set out in §298.470. In response to comments the phrase "except during dry conditions as described in subsection (b) of this section" was added to §298.475(c) to clarify that a water right holder subject to the adopted standards cannot divert water during average and wet conditions when streamflow at an applicable measurement point is below the base flow standard. In response to comments the phrase "for that season" was added to §298.475(d)(5) to clarify that if a

large pulse occurs, that pulse can satisfy the requirement for a smaller pulse within the same season.

The commission's adopted rules provide that pulse flows be allowed to pass if streamflows are above the base flow standard for the season and if the pulse flow trigger level is reached at a measurement point. The commission's adopted rules provide that once the pulse flow trigger conditions are met, the water right owner may not store or divert water unless the streamflow at an applicable measurement point is at or above the pulse flow trigger level and the applicable pulse duration has occurred. Once the pulse flow trigger conditions are met, the water right holder may not store or divert water until either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred.

The stakeholders recommended additional implementation requirements for high flow pulses based on the science team's recommendations. The stakeholders recommended that in addition to allowing a water right holder to store or divert water after either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred, a water rights holder could also store or divert water when the mean daily streamflow recedes to at or below a specific minimum pulse flow value, or, the mean daily streamflow recedes to at or below a specific maximum base flow value and decreases by 5% or less in a day. These additional requirements were based on the

science team's proposed pulse flow implementation scheme in which pulse flows were not tied to hydrologic condition. However, the stakeholders recommended a different implementation scheme that tied pulses to a hydrologic condition. The stakeholders' additional implementation recommendations are not consistent with their proposed implementation scheme. Therefore, the commission did not include the stakeholders' additional implementation requirements in either the proposed rule or the adopted rule.

The adopted rule does not require that a water right holder produce a high flow pulse because pulses occur when there are high rainfall events. The commission's adopted rule does provide that during these high rainfall events, the applicable high flow pulse be allowed to pass downstream. The commission's adopted rule provides that a water right holder can divert water in excess of the applicable pulse flow trigger requirement as long as those diversions do not prevent the occurrence of the pulse flow trigger level of the applicable pulse and as long as the duration or volume requirement is met for the applicable pulse.

If, in a particular season, fewer than the required number of seasonal high flow pulses identified in the commission's adopted rule is generated, there would be no need to "catch up" or allow more than the applicable number of high flow pulses to pass in the following season. Based on the recommendation of the stakeholders, pulses are tied to the hydrologic conditions set out in §298.470. For measurement points set out in

§298.480(7) and (8), the adopted rule provides that if streamflows are above the smaller high flow pulse trigger level, and subsequently rise to the larger high flow pulse trigger level, the pulse flow trigger level for the larger pulse event would govern diversions and storage by a water right holder. In addition, once the pulse requirements for the larger seasonal high flow pulse event are satisfied and therefore this high flow pulse is allowed to pass downstream, the requirements for the smaller seasonal high flow pulse event during that season would be considered to be satisfied at the applicable measurement point.

The commission's adopted rule provides that if a water right owner stored water at a previous time and complied with the applicable environmental flow requirements at that time, the water right owner would not need to comply with any environmental flow requirements in effect when subsequent use of that stored water occurs.

§298.480, Environmental Flow Standards

The commission adopts new §298.480 to provide the environmental flow standards of TWC, §11.1471, for the basin and bay system composed of the Brazos River and its associated tributaries and bay and estuary system and the Brazos-Colorado Coastal Basin. The commission based its decision on consideration of the recommendations from the stakeholders, sound science, and other public interests and relevant factors.

The measurement points and the adopted base flow and subsistence flow standards are generally based on the stakeholders' recommendation. The commission received additional scientific information for the Clear Fork Brazos River. Based on this information, which was not available at the time the science team and stakeholders considered their recommendations, the commission substituted environmental flow standards at United States Geological Survey (USGS) gage 08084200, Clear Fork Brazos River at Lueders, for the stakeholders' recommended USGS gage 08085500, Clear Fork Brazos River at Fort Griffin based on impacts on remaining unappropriated water. In response to comment, the Figure in §298.480(5) was modified to correct typographical errors.

The adopted high flow pulse standards are based on the recommendations of the majority of the stakeholders. The commission's adopted rule corrects a typographical error in the stakeholders' recommendation for the 4 per season pulses for the Brazos River at Glen Rose for the average and wet seasons.

The stakeholders performed an analysis of the impacts of the adopted standards on future water supply needs and considered the results of these analyses in their recommendations. The ED reviewed the information provided by the stakeholders, including information considered by the stakeholders for the Clear Fork Brazos River, and also performed his own analysis of the Double Mountain Fork Brazos River. The

ED's analysis is not intended as a finding that water is available for specific projects. When applications for projects are evaluated, water availability is based on specific facts in those applications.

The ED's selected scenario for the balancing analysis is based on a hypothetical diversion of a large amount of water from the Double Mountain Fork of the Brazos River. This amount of water, 10,000 acre-feet, is less than the amount identified in the Regional Water Plan as necessary for future human water needs. For this evaluation, the ED used the commission's WAM for the Brazos River Basin and modified it by adding the selected scenario. The ED performed analyses to estimate water availability under four conditions: 1) no environmental flow requirements; 2) application of the commission's current default methodology; 3) application of the minority recommendation; and, 4) application of the adopted environmental flow standards. This analysis is intended to address the impacts of different environmental flow conditions on diversions of water from the river and therefore does not include a storage component. The ED received comments regarding the WAMs and carefully considered those comments. Based on those comments, the ED revised the water availability analysis, which resulted in changes to the annual availabilities for the scenarios from those in the proposal. These minor changes did not result in changes to the adopted rule. Applying either no instream flow requirement or the default methodology produces an annual availability of 66%. Application of the recommendation of the

minority stakeholders produces an annual availability of 28%. Finally, application of the stakeholders' recommendation produces an annual availability of 33%. Annual availability is the percentage of time that the annual diversion requirement is met from river diversions.

Unappropriated water in the Brazos River Basin generally occurs during times of higher flow; therefore, as the ED's analysis indicates, increasing pulse volumes and frequencies reduces the remaining unappropriated flow that could be available for future human needs. Copies of the WAM used in this analysis are available at: *http://www.tceq.texas.gov/goto/eflows/rulemaking*.

The ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify any areas of concern that need to be addressed through this rulemaking process. The ED also considered whether reduction of the adopted standards would result in a significant increase in unappropriated water in the Brazos River Basin and found that it did not.

The adopted rule does not set aside any unappropriated water to protect the adopted environmental flow standards. Any unappropriated water that is available in these river basins is available only during relatively wet conditions. The commission determines

that the environmental flow standards may be adequately protected by special conditions in water right permits or amendments for new appropriations of water in these basins. Special conditions are a more effective method to maximize the use of water by allowing water to be used for dual purposes. Special conditions to protect environmental flows may allow water permitted to downstream senior water rights, as well as return flows and permitted but unused water, to satisfy the special conditions. This adopted new section would implement TWC, §11.1471.

§298.485, Water Right Permit Conditions

The commission adopted new §298.485, relating to water right permit conditions. The adopted provision would require the commission to place special conditions in water right permits for new appropriations and amendments that would add additional appropriations to existing permits. The special conditions would be to protect the environmental flow standards established by the subchapter. Consistent with the recommendations of the stakeholders, the adopted rule provides that, for water right permit applications where the diversion rate is less than 20% of a pulse flow trigger requirement, the water right permit or amendment would not include special conditions relative to that high flow pulse. The adopted rule also provides an exemption from pulse flow requirements for certain new water right applications in the Palo Pinto Creek watershed that increase the amount of authorized storage by less than 15%. This adopted new section would implement TWC, §11.134(b)(3)(D) and §11.1471.

§298.490, Schedule for Revision of Standards

The commission adopts new §298.490 to provide the schedule for re-examination of the environmental flow standards. The commission proposes to take up a possible rulemaking to change the standards ten years from the effective date of the rules, unless the stakeholder committee submits a work plan approved by the Advisory Group that calls for a more frequent review. The commission notes that it is prohibited from providing that the rulemaking process occurs more frequently than once every ten years unless the stakeholders' work plan approved by the Advisory Group under TWC, §11.02362(p), calls for a more frequent schedule. The commission notes that, as of the time of adoption of these rules, it has not received an approved work plan from the stakeholder committee. Should the commission receive an approved work plan after final adoption of this rule package, the commission may consider an amendment to this section and change the schedule more often than once every ten years. The adopted new section would implement TWC, §11.1471(f).

Subchapter H: Rio Grande, Rio Grande Estuary, and Lower Laguna Madre

The commission adopts new Subchapter H to contain all of the environmental flow standards and rules specific to the basin and bay system composed of the Rio Grande, Rio Grande estuary, and Lower Laguna Madre. There were two science teams for this basin and bay system, one for the lower portion of the basin and one for the upper

portion of the basin. The science teams delivered their reports to the commission on July 12, 2012 and July 25, 2012. The stakeholder committee did not submit a recommendation. As required under TWC, §11.02362(d), the commission must adopt environmental flow standards. This adopted new subchapter would implement the schedule established by the Advisory Group under TWC, §11.02362, and environmental flow standards required of the commission in TWC, §11.1471.

§298.500, Applicability and Purpose

The commission adopts new §298.500 to describe the purpose of Subchapter H and under what circumstances it applies.

§298.505, Definitions

The commission adopts new §298.505. The adopted section has definitions of terms that will apply only to this subchapter. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the adopted standards. In §298.505(1), (2), (6), and (7) the commission adopts definitions for "Average condition," "Dry condition," "Subsistence condition," and "Wet condition" because the adopted environmental flow standards vary according to hydrologic condition. A range of flow conditions - average,

dry, subsistence, and wet - is defined as the science team recommended. In §298.505(3), (4), and (7), the commission adopted definitions for "Fall," "Spring," and "Winter," because the adopted environmental flow standards for the Rio Grande and its associated tributaries vary by season. The definitions are the same as the definitions of the seasons in the recommendations of the science team. Finally, in §298.505(5) the commission adopts a definition for "Sound ecological environment" for the Rio Grande, and its associated tributaries in Texas. This adopted definition is based on the definition recommended by the science team.

§298.510, Findings

The commission adopts new §298.510 regarding findings related to sound ecological environments. The adopted finding regarding the ecological environment is consistent with the Upper Rio Grande science team report. In response to comments, the commission included a reference to hydrologic conditions in the finding and clarified that the finding applies to locations where there are adopted standards. Information on the commission's reasoning for the adopted schedule of flow quantities and environmental flow standards can be found in this preamble under the analyses for §298.525 and §298.530. This adopted new section would implement TWC, §11.1471.

§298.515, Set-Asides and Standards Priority Date

The commission adopts new §298.515 establishing the priority date for any set-asides

and any modeling of the environmental flow standards in the commission's WAMs as the latest date the commission received a report from the science teams for the basin and bay system, which was July 25, 2012. The commission protects high flow pulse standards from being permitted to smaller applicants for new appropriations. In addition, the commission needs to ensure that new appropriations, or amendments to add a new appropriation, will not affect downstream flow standards at measurement points that may not be applicable to those new appropriations or amendments. The commission also adds these changes to ensure consistency with adopted §298.20, which establishes the priority date for environmental flow standards and set-asides as the date the commission received the environmental flow regime recommendations from the science team.

§298.520, Calculation of Hydrologic Conditions

The commission adopts new §298.520 to explain the determination of hydrologic conditions for implementation and application of the standards to water right permits to which the adopted standards apply. The method for determining hydrologic conditions, for water right permits to which hydrologic conditions are applicable, for use as special conditions in those water right permits, is based on the recommendations of the Upper Rio Grande science team. Implementation of hydrologic conditions in the commission's WAMs, used in the availability determination for water rights permitting for the Rio Grande, and its associated tributaries in Texas, may result in different cumulative

streamflows than those derived for the purposes of developing special conditions for a water right permit to which those hydrologic conditions are applicable. To address this issue, the commission's adopted rule provides that, for purposes of water availability determinations, hydrologic conditions used in the commission's WAMs will be calculated based on the period of record for the applicable WAM and using the applicable frequencies for hydrologic conditions recommended by the Upper Rio Grande science team applied to the WAM simulated flows.

§298.525, Schedule of Flow Quantities

The commission adopts new §298.525 regarding the schedule of flow quantities. The commission adopts this section to explain the implementation of the environmental flow standards in the following section. The commission does not necessarily intend to use the exact wording of this section as the wording in water right permits issued after the adoption of these rules. However, this section describes how the commission intends to implement the adopted environmental flow standards in water right permit or amendment applications for new appropriations.

Subsistence flows are the minimum flows below which the commission will not allow diversions or storage of water. Therefore, the water right holder may not divert or store water if the flow at an applicable measurement point is below the subsistence flow standard. The commission's adopted rule provides that, during subsistence hydrologic

conditions, if the flow at an applicable measurement point is above the subsistence flow standard but below the applicable high flow pulse flow trigger level, the water right holder must allow the applicable subsistence flow to pass a measurement point, and any remaining flow may be diverted or stored. The commission's adopted rule also provides that the subsistence flow standard can be variable depending on the season, and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season.

Once the flow at an applicable measurement point is above the base flow standard for the season, the water right holder may store or divert water according to its permit as long as the flow at the measurement point does not fall below the applicable base flow standard for that season.

The commission's adopted rule provides that pulse flows be allowed to pass if streamflows are above the base or subsistence flow standard for the season, and if the pulse flow trigger level is reached at an applicable measurement point. Once the pulse flow trigger conditions are met, the water right holder may not store or divert water until either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred.

The adopted rule does not require that the water right holder produce a pulse flow,

because pulses occur when there are high rainfall events. The commission's adopted rule requires that during these high rainfall events, the applicable high flow pulse be allowed to pass downstream. Under the commission's adopted rule, a water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse. The commission's adopted rule also provides that a water right holder can divert water in excess of the applicable pulse requirement so long as those diversions do not prevent the occurrence of the pulse flow trigger level of the applicable pulse and as long as the duration or volume requirement is met for the applicable pulse.

If, in a particular season, only one of the seasonal high flow pulses or annual pulses identified in the commission's adopted rule is generated, there would be no need to "catch up" or allow more than the applicable number of high flow pulses to pass in the following season. Under the commission's adopted rule pulse flows are not tied to a hydrologic condition. In addition, the adopted rule provides that if the pulse requirements for an annual high flow pulse event are satisfied and therefore this high flow pulse is allowed to pass, the requirements for one of the applicable smaller high flow pulse event during that season would be considered to be satisfied at the applicable measurement point.

The commission's adopted rule provides that if a water right owner stored water at a

previous time and complied with the applicable environmental flow requirements at that time, the water right owner would not need to comply with any environmental flow requirements in effect when subsequent use of that stored water occurs.

§298.530, Environmental Flow Standards

The commission adopts new §298.530 to provide the environmental flow standards of TWC, §11.1471, for the basin and bay system composed of the Rio Grande, and its associated tributaries in Texas. The commission based its decision on consideration of the recommendations of the science teams, sound science, and other public interests and relevant factors.

TWC, §11.02362 recognizes that the Rio Grande is unique. Under TWC, §11.02362(m), the science team could not consider Mexico's water use. This section of the statute also requires the stakeholders to consider the water accounting requirements of any international water sharing treaty, minutes, and agreement applicable to the Rio Grande and effects on water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande. Under TWC, §11.02362(o) the science team could not make an environmental flow regime recommendation that violates a treaty or court decision. Although the commission received reports from the science teams, it did not receive a report from the stakeholders. Therefore, the commission considered the science team's recommendations, the water accounting requirements of international water sharing

treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande in developing the adopted rule.

The science team for the lower Rio Grande, Rio Grande estuary, and Lower Laguna Madre proposed freshwater inflow requirements for the Rio Grande estuary and the Lower Laguna Madre. For the Lower Laguna Madre, the science team recommended dry and wet season freshwater inflows that were not intended to support development of environmental flow standards that would provide more freshwater inflows to the Lower Laguna Madre. The science team stated that the recommendations were intended to be used by the stakeholders to develop strategies. Therefore, the commission did not include freshwater inflow recommendations for the Lower Laguna Madre in the adopted rule.

Regarding the Rio Grande estuary, the science team recommended freshwater inflow requirements. The United States' share of river water is administered by the Rio Grande Watermaster and is based in storage in the Amistad/Falcon reservoir system. In addition, as recognized by the science team, all of the United States' share of the water in the main stem of the Rio Grande is committed to existing users. Any water that is released from the storage and not diverted by existing users would flow to the estuary. Additional water may also be available to the estuary as a result of very large rainfall

events that occur below the reservoirs and is in excess of the amount of water needed by existing users under the treaty. After considering the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande, the commission did not include freshwater inflow standards for the Rio Grande estuary in the adopted rule.

For the Rio Grande above the Amistad/Falcon reservoir system, the commission adopts standards for four measurement points, two on the main stem of the Rio Grande and the remaining two on tributaries to the Rio Grande within Texas. For the tributary measurement points, the adopted base flow and subsistence flow standards are generally those recommended by the science team. The adopted high flow pulse standards are also generally based on recommendations of the science team. The science team also recommended pulse flow trigger levels that were either below or very close to the base flow values at some measurement points in some seasons. The commission did not include these pulses in the adopted rule because they would likely not represent high flows within the watercourse in the context of the suite of environmental flow standards proposed by the science team. The number of applicable high flow pulses was also adjusted where the values recommended by the science team were inconsistent with the flow regime, for example, where a higher tier pulse flow trigger level was lower than a lower tier pulse flow trigger level. In response to

comments, the winter subsistence flow value in the figure in §298.530(1) was changed to 15 cubic feet per record (cfs) and the 1 per season pulse was removed from the figure in §298.530(3) based on the errata sheet submitted by the science team.

The science team included overbank flows in its recommended flow regime. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the adopted standards.

For the adopted measurement points on the main stem of the Rio Grande, the commission considered the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande. The commission reduced the science team's flow regime to 38% of the recommended value so that the adopted standards would be based on the United States' estimated average share of the water flowing in the main stem of the Rio Grande.

The stakeholders did not submit a recommendation; therefore the ED performed his own analysis to address the issue of balancing human and other competing needs for water in the basin and bay system. The ED reviewed the remaining unappropriated

water at the measurement points in the adopted rule. The ED based his review on results from the WAM used for his water availability determinations for new permits or amendments that request a new appropriation of water. The ED determined that unappropriated water was available at these locations in five months out of a 732-month period of record and therefore it is unlikely that any new permits could be granted. Copies of the WAM used in this analysis are available at: *http://www.tceq.texas.gov /goto/eflows/rulemaking.*

The ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify areas of concern that need to be addressed through this rulemaking process. Based on the results of the ED's review of unappropriated flow and the water quality analysis, the ED determined that there would be no significant impact from implementation of the adopted standards.

The adopted rule does not set aside any unappropriated water to protect the adopted environmental flow standards. Unappropriated water is extremely limited in the Rio Grande. In addition, under 30 TAC §303.23(a) all waters that cannot be used by water right holders in the Upper Rio Grande shall be made available to the Lower and Middle Rio Grande system. The commission determines that the environmental flow standards may be adequately protected by special conditions in water right permits or

amendments for new appropriations of water in these basins. Special conditions are a more effective method to maximize the use of water by allowing water to be used for dual purposes. Special conditions to protect environmental flows may allow water permitted to downstream senior water rights, as well as return flows and permitted but unused water, to satisfy the special conditions. This adopted new section would implement TWC, §11.1471.

§298.535, Water Right Permit Conditions

The commission adopts new §298.535, relating to water right permit conditions. The adopted provision would require the commission to place special conditions in water right permits for new appropriations and amendments that would add additional appropriations to existing permits. The special conditions would be to protect the environmental flow standards established by the subchapter. This adopted new section would implement TWC, §11.134(b)(3)(D) and §11.1471.

§298.540, Schedule for Revision of Standards

The commission adopts new §298.540 to provide the schedule for re-examination of the environmental flow standards. The adopted rule requires that the commission take up a possible rulemaking to change the standards ten years from the effective date of the rules, unless the stakeholder committee submits a work plan approved by the Advisory Group that calls for a more frequent review, in which case the commission will consider

the schedule in the workplan. The commission notes that it is prohibited from providing that the rulemaking process occurs more frequently than once every ten years unless the stakeholders' work plan approved by the Advisory Group under TWC, §11.02362(p), calls for a more frequent schedule. The commission notes that, as of the time of adoption of these rules, it has not received an approved work plan from the stakeholder committee. Should the commission receive an approved work plan in the future, the commission may consider an amendment to this section and change the schedule more often than once every ten years. The adopted new section would implement TWC, §11.1471(f).

Final Regulatory Impact Determination

The commission evaluated these adopted rules and performed an analysis of whether these adopted rules require a regulatory impact analysis under Texas Government Code, §2001.0225. The purpose of these rules is to establish environmental flow standards, set-asides, and procedures for implementing an adjustment of these standards required in a permit or amendment for the Nueces River and Corpus Christi and Baffin Bays, the Rio Grande, the Rio Grande estuary, the Lower Laguna Madre, and the Brazos River and its associated bay and estuary system, under TWC, §11.1471(a).

These amendments are not a "major environmental rule" under Texas Government Code, §2001.0225 because although the specific intent of the rulemaking is to protect

the environment, these rules do not potentially adversely affect in a material way the economy, or a sector of the economy. New appropriations and other water rights that can potentially impact instream flows or bays and estuaries issued by the commission have been reviewed for environmental impact since 1985 and the water rights contain environmental conditions. This rule package will require that environmental impact will now be done by rule. This should not adversely impact the economy.

Also, the purpose of these rules is not to exceed a standard set by federal law, exceed an express requirement of state law, exceed a requirement of a delegation agreement or contract between the state and an agency of the federal government to implement a state and federal program, or to adopt rules solely under the general powers of the agency instead of specific state law. This rulemaking is specifically required by TWC, §11.1471. Therefore, no regulatory impact analysis is required under Texas Government Code, §2001.0225, for this rulemaking.

The commission invited public comment regarding the draft regulatory impact analysis determination during the public comment period. The commission did not receive any comments regarding the draft regulatory impact analysis determination.

Takings Impact Assessment

The commission evaluated these adopted rules and performed analysis of whether these

adopted rules constitute a takings under Texas Government Code, Chapter 2007. The specific purpose of these rules is to establish environmental flow standards, set-asides, and procedures for implementing an adjustment of these standards required in a permit or amendment for the Nueces River and Corpus Christi and Baffin Bays, the Rio Grande, the Rio Grande estuary, the Lower Laguna Madre, and the Brazos River and its associated bay and estuary system, as required by TWC, §11.1471(a).

Promulgation and enforcement of these adopted rules would be neither a statutory nor a constitutional taking of private real property. Specifically, because under TWC, §11.147(e-1), these rules cannot be retroactively applied to water rights issued before September 1, 2007, the subject adopted regulations do not affect those water right holder's rights in private real property. For those new water rights issued after September 1, 2007, but before these environmental standards were adopted, these water rights contain environmental conditions, if necessary, and a provision stating that the water right could be reopened to add the environmental standards. This amendment to the permit to add the rule may not increase the amount of pass-through or release for the environment in the existing water right by more than 12.5% of the annualized total of the existing requirement in the permit. Also, this amendment will not change the amount of water authorized for diversion in the permit, but only affects when the permittee can take the water. The provision was intended to protect the yield of water rights granted after 2007 and before the adoption of a standard.

Thus, this rulemaking does not burden (constitutionally); nor restrict or limit the owner's right to existing property and reduce its value by 25% or more beyond that which would otherwise exist in the absence of the regulations.

Consistency with the Coastal Management Program

The commission reviewed the adopted rulemaking and found that the proposal is subject to the Texas Coastal Management Program (CMP) in accordance with the Coastal Coordination Act, Texas Natural Resources Code, §§33.201 *et. seq*., and, therefore, must be consistent with all applicable CMP goals and policies. The commission conducted a consistency determination for the adopted rules in accordance with Coastal Coordination Act Implementation Rules, 31 TAC §505.22, and found the adopted rulemaking is consistent with the applicable CMP goals and policies.

CMP goals applicable to the adopted rules include: 1) to protect, preserve, restore, and enhance the diversity, quality, quantity, functions, and values of coastal natural resource areas; and, 2) to ensure sound management of all coastal resources by allowing for compatible economic development and multiple human uses of the coastal zone. CMP policies applicable to the adopted rules include those contained in 31 TAC §501.33. The adopted rules implement HB 3/SB 3, which established the environmental flows process to provide certainty in water management and development and to provide adequate

protection of the state's streams, rivers, bays, and estuaries. Since one of the purposes of the adopted rules is to protect coastal natural resources, the rules are consistent with CMP goals and policies.

Promulgation and enforcement of these rules will not violate or exceed any standards identified in the applicable CMP goals and policies, because the adopted rules are consistent with these CMP goals and policies, because these rules do not create or have a direct or significant adverse effect on any coastal natural resource areas, and because one of the purposes of the adopted rules is to protect coastal natural resources.

The commission invited public comment regarding the consistency with the coastal management program during the public comment period. The commission did not receive any comments regarding the coastal management program.

Public Comment

The commission held a public hearing on October 15, 2013, in Austin, Texas. The comment period closed on October 21, 2013. The commission received comments from the: Brazos River Authority (BRA), Celanese, Chisholm Trail Ventures (Chisholm Trail), City of Abilene (Abilene), City of Corpus Christi (Corpus Christi), City of Three Rivers (Three Rivers), Friends of the Brazos River Alliance (FBR), Lake Granbury Coalition (Lake Granbury), National Wildlife Federation (NWF), Nueces County Water Control

and Improvement District #3 (WCID #3), Nueces County Water Control and Improvement District #4 (WCID#4), Nueces River Authority (NRA), Palo Pinto County Municipal Water District (Palo Pinto), San Patricio Municipal Water District (San Patricio), Sierra Club (Sierra Club), South Texas Water Authority (STWA), Texas Chemical Council (TCC), Texas Parks and Wildlife Department (TPWD), West Central Texas Municipal Water District (WCTMWD), and two thousand and forty nine individuals.

Generally, Abilene, Palo Pinto, WCTMWD, TCC, Corpus Christi, NRA, San Patricio, STWA, WCID #3, WCID #4, Celanese, and Three Rivers supported the rule. Generally, TPWD and FBR supported portions of the rule. Generally, NWF, Sierra Club, and two thousand and forty nine individuals were against the rule. BRA, Chisholm Trail, and Lake Granbury provided limited comments related to the issue of including a transition rule in this rulemaking. Abilene, BRA, NWF, Sierra Club, Corpus Christi, NRA, San Patricio, STWA, WCID #3, WCID #4, Celanese, and Three Rivers suggested specific changes to the rulemaking as noted in the Response to Comment section of this preamble.

Response to Comments

General

One commenter thanked the commission for their attention to this matter. TPWD

comments that it recognizes the complexity of the science involved in determining environmental flow regimes adequate to support a sound ecological environment and the challenges posed in balancing environmental and human needs. TPWD comments that it appreciates the efforts of TCEQ in preparing the proposed rules and in meeting statutory deadlines. TCC comments that it greatly appreciates the continuous and vigorous work by TCEQ in evaluating the recommendations of the local stakeholder committees and science teams and in compiling rules that appropriately address both environmental and industry needs.

The commission acknowledges these comments. The rule was not changed in response to these comments.

Two thousand, forty-nine individuals commented that the commission should not adopt the proposed rules. Two thousand, forty-nine individuals commented that the TCEQ-proposed rules for flow standards in the Nueces, Brazos, and Rio Grande rivers basins and bays must not be adopted as written. Sixty individuals commented that our rivers and bays are the lifeblood of a healthy Texas and requested that the commission adopt stronger rules so these natural treasures might sustain us and wildlife populations for generations to come. One individual commented that the rules as written are inadequate for our environment. One individual commented that the rules need a lot of work. One individual urged the commission to strengthen the rules before they are

adopted and urged the commission to recommend standards that would be protective. One individual commented that correcting the rules before they are adopted is the only reasonable thing to do. One individual asked that TCEQ do it right the first time or allow others in the near future to redo all of the work properly. One individual is asking the commission to add an addendum to the proposal to include rivers, bays, and estuary protection. One individual asked that TCEQ change the standards presently proposed to reflect the needs of the Rio Grande, Nueces, and Brazos rivers for freshwater to remain within them to allow the estuaries and bays to thus receive the water they require. This individual also asked that TCEQ write standards that will address the present short fall of freshwater into not only Nueces Bay, but also our other Texas estuaries.

Three individuals commented on protection of natural resources. One individual commented that they are disappointed the state agency charged with protecting Texas's natural resources is not doing enough to put policies in place to accomplish that goal. One individual commented that the commission should stop sacrificing our future as a planet for money. One individual commented that they are tired of seeing the surrounding beauty destroyed for money.

The comments are very general in nature and do not provide any specific recommendations for the commission to consider. The commission does not agree that the proposed rules are inadequate to protect the

environment. The commission followed its instructions in TWC, §11.1471, to determine these flow standards. It considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, including commission staff's water availability analyses, when drafting the adopted rules. The commission believes that the adopted rules are sufficiently protective of the environment because they include a flow regime with subsistence, base, and pulse flows, and also include freshwater inflow standards for Nueces Bay and Delta. The numerical values for these flow regime components are based on the values in the stakeholder reports. Under SB3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. No change has been made in response to these comments.

Twenty three individuals requested that the commission protect rivers, bays, and estuaries. Three individuals urged the commission to ensure that enough water flows into the Nueces, Rio Grande, and Brazos rivers. One individual asked the commission to pay attention to this set of draft rules and protect the Nueces, Brazos, and Rio Grande river basin and bays, ensuring they survive for Texas future. One individual requested that the commission protect environmental flows. Seven individuals commented that our bays need to be protected and receive enough water to keep them viable for wildlife.

One individual urged the commission to protect Texas's wetlands. One individual commented that the bays fed by the rivers covered in the rules are already under stress from the Gulf side, and cannot afford to lose the freshwater from the land side, as well. One individual commented that water which should flow naturally should be allowed to. One individual commented that we cannot allow these important streams to dwindle to mere trickles.

The commission agrees that instream flows and inflows to bays and estuaries are important to the health of river and bay systems. Under TWC, §11.1471, the commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission believes that the adopted rules are sufficiently protective of the environment because they include an adequate flow regime with subsistence, base, and pulse flows, and also include freshwater inflow standards for Nueces Bay and Delta. SB 3 also added TWC, §11.02362(p), which recognized the importance of adaptive management and provided that after submitting its recommendations regarding environmental flow standards and strategies to meet the environmental flow standards to the commission, each stakeholder committee prepare and submit a work plan. Issues related to wetlands and

the connectedness of rivers and bays can be considered by the stakeholders in their development of a work plan. The rules were not changed in response to these comments.

Twenty individuals expressed concerns about fish and wildlife protection due to limited flow. Ten individuals expressed concern about the brown pelican. One individual expressed concern about the whooping crane. One individual commented that we need to protect Texas species and avoid federal intervention. One individual commented that wildlife and people need water. One individual commented that commercial fisheries and sports depend on the entire ecosystem.

The commission acknowledges the importance of Texas's natural resources, including fish and wildlife, and that healthy bay systems are important for ecological reasons. The commission believes that the adopted standards are sufficiently protective of the environment because they include a flow regime with subsistence, base, and pulse flows, and also include freshwater inflow standards for Nueces Bay and Delta. The rules were not changed in response to these comments.

One individual is concerned about a lack of clean freshwater.

The commission responds that the adopted rules are sufficiently protective of water quality because they include a flow regime with subsistence, base, and pulse flows. In addition, the ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify areas of concern that need to be addressed through this rulemaking process. The rules were not changed in response to this comment.

One individual is concerned about lack of flow contributing to more zebra mussels. One individual suggested that to ensure adequate flows, reporting of all water use by homeowners, ranchers, and businesses should be required. This individual also suggested that catchment systems could be used and that moving water into Texas from other parts of the United States should be made part of the Texas plan. Two individuals were concerned about the impact of global warming on flow. One individual asked that TCEQ take a proactive stance on reducing global warming which allows excess greenhouse gases to affect our climate and increase the drought conditions. One individual commented that our climate is changing and getting drier and that TCEQ needs to stop denying global warming and wake up or things that make Texas a wonderful place to live will be gone forever. Four individuals commented on water conservation. One of these individuals commented that other states have made the

mistake of adopting rules that fail to provide inflow protections and are still working to resolve the problems that resulted at a high cost in money and conservation. One individual is concerned about water the rice farmers get and letting them grow something sustainable. One individual is concerned about new housing permits being issued when there is a perpetual drought in Texas, and is concerned about where these new people will be getting their water from.

The commission responds that this rulemaking adopts environmental flow standards that will be used in water rights permitting for new appropriations of water to protect the environment, and does not address zebra mussels, water use by homeowners, ranchers and businesses, catchment systems, interbasin transfers, global warming, water conservation, rice farming, or new housing permits. While those may be considerations for water planning, the purpose of this rulemaking is to provide flows for environmental uses in water rights permitting. The rules were not changed in response to these comments.

Five individuals stated that we are called to be faithful stewards of this wonderful world God has provided us and that means protecting all life and admonished the commission to be a faithful steward. One individual wants the commission to act responsibly in caring for the gift of creation. One individual asked that we do the correct thing for

Texas and our environment. One individual asked that we protect the health of our rivers and bays for future wildlife and children.

The commission acknowledges the comments and responds that the adopted rulemaking applies to environmental flow standards for new water right applications to store, take, or divert surface water. The commission believes that the adopted standards are sufficiently protective of the environment because they include a flow regime with subsistence, base, and pulse flows, and also include freshwater inflow standards for Nueces Bay and Delta. The rules were not changed in response to these comments.

One individual commented that the proposed rules will allow additional water allocations on already inadequate water flows and cause irreparable harm to our human habitat and those local stakeholders (home and land owners).

These flow standards are for the purpose of protecting the environment. They do not allow additional water allocations. The commission followed its instructions in TWC, §11.1171, to determine these flow standards. The commission is required to balance needs for the environment with other needs, including human water needs. The adopted standards are sufficiently protective of the environment because they include a flow

regime consisting of subsistence flows, base flows, and pulse flows, but also allow for some future permitting. The rules were not changed in response to this comment.

TPWD comments that the proposed rules do not include overbank flow events. Overbank and high flow pulse events are important components of an environmental flow regime that serve to flush and transport sediments, maintain stream channels, and provide longitudinal connectivity for species migration along a river. TPWD acknowledges the potential for overbank events to cause damage to private property and threaten human safety in some instances; however, there are circumstances where these events can safely occur and provide significant environmental benefit. TPWD recommends that the rules address the ecological function of high flow events as part of an environmental flow regime and tailor the environmental flow standards to include these events where they can safely occur.

The commission acknowledges that overbank flows are a component of a flow regime for a sound ecological environment. However, the flows the commission is protecting in the adopted rules are not calculated to result in water flowing out of the banks of the river. The commission also notes that there was little scientific information tying specific overbank flow values to environmental water needs. To the extent that additional information

becomes available through monitoring and studies as part of adaptive management, the science team and stakeholders could consider that information in future deliberations and recommend different flow values for consideration during future rulemaking. The commission further responds that leaving some water available for new permits will not prevent these larger flood events from occurring because they will occur naturally. The rules were not changed in response to this comment.

TPWD comments that the proposed rules do not include set-asides of water to meet environmental flows. TPWD comments that while most of the water in the Brazos, Nueces, and Rio Grande bay basin areas is already appropriated, sufficient water may exist in some areas to provide an environmental flow set-aside. TPWD supports environmental flow set-asides as a means of providing ecologically important instream flows and freshwater inflows. TPWD recommends that the rule package include technical analyses of the availability of water as a set-aside and analyses of the impact of a set-aside on environmental flows and water availability.

The commission respectfully disagrees that set-asides are mandated if the commission finds that there is any amount of water available at any time. Even assuming that water is available for a set-aside, TWC, §11.1471(a)(2), qualifies the requirement for a set-aside as "to the maximum extent

reasonable when considering human water needs." In these basins the commission has determined that set-asides are not reasonable because of limited water availability. Because of water availability issues in these basins, special conditions placed in a permit are a more effective method to protect flows in the stream when new appropriations of water are granted while providing water for future human needs. This is because if special conditions are used there are other sources of water in a stream that could be used to meet environmental flow requirements in a permit; for example, water appropriated to downstream water right holders, water appropriated to another but not used, or return flows. The ability of special conditions to meet the environmental flow standard while at the same time allowing water to be available for appropriation makes the use of special conditions a more reasonable approach to protecting the environmental flow standards considering human water needs.

The results of the commission's water availability analyses can be found in the Section by Section Discussion Section for §§298.430, 298.480, and 298.530 in this preamble. The commission is only determining to not establish set- asides at this time for these basins. After gaining further experience with implementation of environmental flows standards, as part of the adaptive management process, the commission is willing to revisit

the issue. However, because of the necessity of leaving the ability to utilize some of the remaining unappropriated water in the basin for human water needs, the commission declines to establish any set-asides. No change was made in response to this comment.

BRA proposed a transitional rule to be included in §§298.400, 298.450, and 298.500. BRA's proposed transitional rule would provide that adopted SB 3 standards would not be applicable to permit applications pending before the effective date of the adopted standards and for which a draft permit has been prepared and noticed in accordance with TCEQ rules. FBR, Chisholm Trail, NWF, and Lake Granbury oppose the inclusion of a transitional rule in the adopted standards.

The commission is not adopting a transitional rule for the basin and bay systems covered in this rulemaking. The commission is concerned that such a rule would violate TWC, §11.147(e-3), which requires that adopted SB 3 rules be applied to new appropriations. Also, the commission has not included a transition rule for other applicants for new appropriations of water. Therefore, the rulemaking was not changed in response to these comments.

Subchapter F: Nueces River and Corpus Christi and Baffin Bays

General

Two thousand forty one individuals commented that the proposed rules fail to provide inflow protections that Nueces Bay clearly needs. Already deemed an "unsound environment," it would be unreasonable to adopt less than stakeholders recommended. NWF and Sierra Club comment that they support the recommendations of the Nueces stakeholders and urge TCEQ to implement these recommendations to the maximum extent possible. TPWD recommends adopting the stakeholder recommendations in their entirety and recommended that the stakeholders' strategies and options be acknowledged in the adopted rules.

The commission responds that it considered the science team recommendations, the SAC's review of those recommendations, and the stakeholder recommendations. However, the commission respectfully disagrees that it had to adopt the stakeholder recommendations in their entirety because SB 3 clearly provides that the commission perform its own review of the stakeholders' recommendations. As provided in TWC, §11.02362(o), the stakeholders develop recommendations, not final environmental flow standards, and send their recommendations to the commission. Under TWC, §11.1471, the commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering

other public interests and other relevant factors." The commission is required to perform its own review based on several factors, including human needs. The commission did not adopt all of the stakeholders' recommendations in an effort to achieve the appropriate balance between environmental interests and other public interests and relevant factors. An explanation of the commission's analysis regarding preserving some unappropriated flows for future human needs is set out in more detail elsewhere in this preamble. The commission did adopt many of the stakeholders' recommendations in this basin. The rules were not changed in response to these comments.

Two individuals expressed concerns about Nueces Bay and one individual expressed concern about the federal government stepping in to protect the bay. One individual commented that the rules are not stringent enough to protect the Nueces Bay because the bay is already at a tipping point in maintaining the ecosystems present. This individual further commented that in the rules as currently written, more water will be removed from the river than is currently done which will further decrease the freshwater inflow into the bay and further undermine the bay's ecosystem.

The commission included freshwater inflow standards in the adopted rules for the protection of bays and estuaries. Under TWC, §11.1471, the

commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors." The commission considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, when drafting the adopted rules. The commission believes that the adopted rules are sufficiently protective of the environment because they include a flow regime with subsistence, base, and pulse flows and also include freshwater inflow standards. The numerical values for these flow regime components are based on the values in the stakeholder reports. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission notes that it has adopted many of the stakeholders' recommendations for this basin and bay system. No change was made in response to this comment.

Corpus Christi supports the proposed rules and commends TCEQ for its efforts to incorporate the intent of SB 3 by attempting to develop a balanced standard that considers the needs of the environment along with the needs for surface water for other uses.

The commission acknowledges the comment. The rule was not changed in response to the comment.

§298.400, Applicability and Purpose

Corpus Christi, NRA, San Patricio, STWA, WCID #4, Celanese, WCID #3, and Three Rivers comment that SB 3 was not intended to alter existing water rights in a river basin (TWC, §11.147(e-1)). These commenters expressed concerns regarding the proposed rules and request that TCEQ add the following to §298.450 to expressly confirm the applicability of Subchapter F: "This subsection does not affect an appropriation of or an authorization to store, take, or divert water under a permit or amendment to a water right issued before September 1, 2007."

The commission agrees that SB 3 does not apply to water rights issued before September 1, 2007. Commission rules in §298.10 also state that Chapter 298 only applies to a new appropriation of water or an amendment to an existing permit for a new appropriation of water which was pending on September 1, 2007 or which was filed after that date. There is nothing in the adopted Subchapter F which would conflict with §298.10. However, for clarity, the commission modified §298.400 to address these comments.

§298.405, Definitions

NWF and Sierra Club comment that the proposed definition lacks specificity because it fails to set a particular point in time for determining the baseline for the modeled permitting frequency. NWF and Sierra Club request that the rule include additional language similar to "at the time the first water right application subject to this subchapter is processed."

The commission agrees and §298.405(3) was modified to include this change.

NWF and Sierra Club comment that the definition of Nueces Delta is unduly narrow and inaccurate because it fails to acknowledge the important portions of the delta that are located along Rincon Bayou and above the area where the Nueces River currently flows into the bay. NWF and Sierra Club request that the definition be expanded to include the following language: "Nueces Delta is a complex array of channels, pools, marshes, and tidal flats of approximately 20,000 acres in size in the upper end of Nueces Bay that lies generally to the north of the Nueces River and includes area receiving inflows from the Rincon Bayou and overflow channels from the river."

The commission agrees that the definition could be clarified. Therefore, in response to these comments the commission modified §298.405(5) to further specify the geographic location and define Nueces Delta.

NWF and Sierra Club comment that the proposed definition of sound ecological environment is so general that it is basically meaningless and that the proposed definition fails to comply with the statutory directive of TWC, §11.1471(a)(1). NWF and Sierra Club further comment that the proposed definition does not match the definition from the stakeholders and note that the stakeholders described a desire to return the Nueces Bay and Delta to ecological conditions existing prior to construction of Choke Canyon Reservoir. NWF and Sierra Club urges TCEQ to adopt the science team's definition "an acceptably sound ecological environment is where the flow regime maintains important physical, chemical, and biological characteristics of a water body as well as the native species dependent on these characteristics."

The commission responds that the adopted rules comply with the statute. TWC, §11.1471(a)(1) requires the commission to adopt rules for environmental flow standards that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors. The commission followed its instructions in TWC, §11.1471, to determine these flow standards. The rule was not changed in response to this comment.

NWF and Sierra Club comment that target volumes play a critical role in the

determination of changes to modeled permitting frequencies and unless they are used in that context they do not provide any inflow protection. NWF and Sierra Club request that the adopted rule be modified to state "volumes of freshwater inflows specified in §298.430(a)(3) which are used for the purpose of protecting inflows for the Nueces Bay and Delta and providing additional freshwater inflows to Nueces Bay and Delta through voluntary strategies."

The commission agrees that the definition applies to the target volumes in §298.430(a)(3) and that these volumes determine the modeled permitting frequencies. However, the adopted freshwater inflow standards in §298.430(a)(3) will be used in water rights permitting for new appropriations of water. The definition was modified to reference §298.430(a)(3) and to clarify that the target volumes would be used in water rights permitting.

§298.410, Findings

NWF and Sierra Club comment that the finding in §298.410(a) is unjustified and unsupported because the science team found, and the stakeholder committee generally acknowledged, that the Nueces Bay portion of the system is unsound. NWF and Sierra Club further comment that the proposed definitions establish that Nueces Bay and Delta are part of the Corpus Christi Bay system and the proposed finding is contradicted by

the findings of the science team and the goals of the stakeholders. NWF and Sierra Club request that the Nueces Bay and Delta be removed from §298.410(a). TPWD comments that §298.410 includes a finding that Nueces Bay is substantially sound. However, the science team and stakeholders determined that Nueces Bay is not a sound ecological environment.

The finding in §298.410(a) is that the basin and bay system as a whole are substantially sound ecological environments. The commission acknowledges that the science team found that a portion of that system, Nueces Bay and Delta, was not a sound environment. The science team based this determination, in part, on their view that hydrologic alterations caused salinities in Nueces Delta to be higher than those in Nueces Bay which results in a loss of salinity gradient that influences zonation found in an ecologically sound estuary. The Texas Environmental Flows SAC review of the science team recommendations notes that in addition to hydrologic changes such as precipitation, it is possible that factors other than altered inflow play a role in increased salinities. The stakeholders, with their broader mandate, adopted a statement that their goal was to return the Nueces Bay and Delta to ecological conditions prior to construction of Choke Canyon Reservoir to the extent possible (emphasis added) while preserving existing water rights and yield of the reservoir system. The

stakeholders' further stated that they would recommend freshwater inflow regimes that would improve but not diminish the existing ecological condition and would address strategies to enhance the ecological condition in its workplan. The commission believes that the finding is consistent with information from the SAC and the recommendations of the stakeholders. The rule was not changed in response to this comment.

NWF and Sierra Club comment that the finding in §298.410(c) is unjustified and unsupported because TCEQ has provided no basis for the finding. NWF and Sierra Club comment that the proposed standards are not adequate to support a sound ecological environment because they are arbitrary and fail to provide even close to the level of protection recommended by the science team or the reduced level of protection recommended by the stakeholders. NWF and Sierra Club further comment that although the stakeholders did recommend inflow regimes designed to avoid any diminishment of existing conditions, TCEQ's proposed rules explicitly allow substantial diminishment below existing conditions. NWF and Sierra Club state that the contention that the standards may improve and will not diminish existing ecological conditions is wholly without merit because the proposed standards expressly allow for additional reductions in freshwater inflows and in the frequency of meeting the inflow amounts identified as appropriate to support a sound ecological environment. TPWD comments that the proposed rules significantly reduce frequency attainment goals for freshwater

inflows so it is not clear how the proposed rules will maintain or improve conditions in the bay.

The commission considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, including commission staff's water availability analyses, when drafting the adopted rules. The science team considered the available science as of this date and there is no evidence that the adopted standards would not support a sound ecological environment. The commission believes that the adopted rules are sufficiently protective of the environment because they include a flow regime with subsistence, base, and pulse flows and also include freshwater inflow standards. The numerical values for these flow regime components are based on the values in the stakeholder reports, which took into account future human water needs. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. No change has been made in response to these comments.

§298.425, Schedule of Flow Quantities

TPWD comments that it is concerned about potential impacts to flows between base

flows and subsistence flows when multiple permits are granted within a stream segment with the provisions in §298.425(b). This could allow for an accelerated decline of flows between base and subsistence flows and it is not clear how this provision will be implemented. TPWD recommends that an implementation guidance document be developed to add clarity to this and other implementation issues affecting all basin and bay areas.

The commission responds that staff is working on implementation and this document will be made available to the public when completed. No change has been made in response to this comment.

NWF and Sierra Club comment that there is no justification for not including overbank pulses in the proposed rule and urge the TCEQ to include them in the adopted rule to the maximum extent possible. NWF and Sierra Club comment that overbank flows will only continue to occur in the absence of diversions or structures that are capable of impounding or drawing down these flows.

The commission acknowledges that overbank flows are a component of a flow regime for a sound ecological environment. However, these flows have the potential to inundate low-lying areas. The flows the commission is protecting in the adopted rule are not calculated to result in water flowing

out of the banks of the river. As noted elsewhere in this preamble, overbank flows are the result of naturally occurring large rainfall events which will likely continue to occur. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the language in §298.425(d)(5) should provide a more generally applicable description of how larger pulses can satisfy smaller pulses and be revised to state: "If a pulse requirement for a larger seasonal pulse or annual pulse is satisfied during a particular season or year, one of the applicable smaller pulse requirements for the same season is also considered to be satisfied."

The commission responds that under the adopted rules this provision would apply to pulses at measurement points in §298.430(c) which are greater than the small pulse; i.e. medium, large, and annual pulses. If a pulse requirement for a medium pulse is satisfied, one of the small pulse requirements is considered to be satisfied in that season. The rule was not changed in response to this comment.

§298.430, Environmental Flow Standards

NWF and Sierra Club comment that there are immense differences between the stakeholders' recommended attainment frequencies and the frequencies resulting from

application of §298.430(a)(1) - (3) and state that the proposed allowable reductions in attainment frequency below current permits are fundamentally inconsistent with the stakeholders' recommendations and are inconsistent with TCEQ's responsibilities under TWC, §11.147(a)(1) because they undermine the currently unsound ecological environment of Nueces Bay and Nueces Delta. The absolute minimum level of protection that could be justified would be for the rules to avoid any further reduction in attainment frequencies by not authorizing any reductions below the current modeled permitting frequencies. NWF and Sierra Club further comment that the TCEQ seems to be taking the position that it is unwilling to ever stop granting new water rights permits as long as there is any unappropriated water and regardless of the impacts to the environment and to the economic activities that are dependent on a sound ecological environment. NWF and Sierra Club request that §298.430(a) be revised to state: "For purposes of this subsection, impairment would occur if the granting of the application, when considered in combination with any authorizations subject to this subchapter, which were issued prior to the application under consideration, would impair the modeled permitting frequency of any inflow regime." NWF and Sierra Club also comment that §298.430(a)(2) should be deleted in its entirety.

Under TWC, §11.1471, the commission must adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering

other public interests and other relevant factors." Among the factors it considers are the impacts of the adopted standards on future permitting. Using the stakeholder recommendations would not leave a water availability window for future permitting as discussed elsewhere in this preamble. The commission believes that the adopted standards are sufficiently protective of the environment because they include a flow regime and freshwater inflow standards. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The rule was not changed in response to this comment.

TPWD comments that the proposed rule is not clear in specifying how the acceptable frequency deviations were selected. TPWD recommends that additional information be included regarding the studies, analyses, and reports relied upon in determining acceptable frequencies of freshwater inflows. TPWD also comments that the proposal did not include specific frequencies for use in water availability determinations because the WAMs change but also included specific frequencies in §298.430(a)(1) - (3). TPWD requests additional information and clarification on the role of WAMs, water right permitting, and future reductions in freshwater inflows. NWF and Sierra Club comment that the proposed rules do not include any rationale, explanation, or justification for the

allowable percentage declines in attainment frequencies nor do the proposed rules include an explanation or justification of the decision to allow all seasonal and annual values to decline by the same percentage. NWF and Sierra Club comment that the §298.430(a)(3)(A) - (C) be modified to state: "(A) The modeled permitting frequencies for the target volumes for Level 1, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased. (B) The modeled permitting frequencies for the target volumes for Level 2, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased. (C) The modeled permitting frequencies for the target volumes for Level 3, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased."

Under TWC, §11.1471, the commission must adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors." The commission considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, including balancing human and other competing needs for water, when drafting the adopted rules.

Among the factors the commission considers are the impacts of the adopted standards on future permitting. Using either the science team or the stakeholder recommendations would not leave a water availability window for future permitting. Therefore, the commission proposed up to either a 10%, 25%, or 50% change in attainment frequencies to be applied during the water availability determination for new appropriations to allow for some potential future permitting. The commission did not include specific frequencies for use in the water availability determination because WAMs could change prior to consideration of the first application for a new appropriation subject to these rules. In response to other comments, the commission modified §298.405(3) to clarify that the baseline frequencies would be determined using the WAM in effect at the time the first application subject to the subchapter is processed.

The balancing analysis performed by commission staff is detailed in the preamble to this adopted rule. The statute requires the commission to adopt rules that will apply to the evaluation of applications for new appropriations of water. When applying the adopted standards in determining availability for applications for new appropriations of water, staff will use its WAMs. Therefore, when performing its balancing analysis

to develop the allowable impairment, staff used these same WAMs.

The WAM used for staff's balancing analysis is available on the TCEQ's public Web site on the Environmental Flows Rulemaking Web page. The model and the discussion of the model application in the Section by Section Discussion section of this preamble for §298.430 provide the rational basis for staff's conclusions.

Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission believes that the adopted standards are sufficiently protective of the environment. The rule was not changed in response to these comments.

NWF and Sierra Club comment that clarification of the appropriate geographic point in §298.430(a)(1) is needed.

The commission responds that the adopted rule identifies the geographic point in the model as the point which represents inflows to Nueces Bay and Delta. This point is sufficiently specific and the rule was not changed in

response to these comments.

NWF and Sierra Club comment that they support and appreciate the inclusion of target frequencies for strategies in Figure: §298.430(a)(3). However, NWF and Sierra Club comment that the proposed target frequencies do not conform to the commission's practice in Subchapters D and E for using the science team's frequencies instead of the stakeholder frequencies. NWF and Sierra Club suggest that the commission use the target frequencies established by the science team in Figure: §298.430(a)(3).

The commission followed its instructions in TWC, §11.1471, to determine these flow standards. The commission considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, including balancing human and other competing needs for water, when drafting the adopted rules. The stakeholders modified the frequency goals in an effort to balance environmental and water supply needs so that water supply projects might be permitted. The commission deferred to the stakeholders on the issue of appropriate frequencies. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the stakeholders recommended an appropriate balance between environmental protection and competing human uses and other

factors.

The commission acknowledges these comments. The rule was not changed in response to the comment.

NWF and Sierra Club comment that §298.430(b) should be modified to avoid any limitation on the method for implementing voluntary strategies because if the strategy has been implemented through any means, a water right application should not be allowed to impair it. NWF and Sierra Club recommend revising §298.430(b) to state: "To the extent that strategies are implemented to help meet the freshwater inflow standards for Nueces Bay and Delta, a water right application in the Nueces River Basin, which increases the amount of water authorized to be stored, taken or diverted as described in §298.10 of this title, shall not reduce the modeled permitting frequency for any inflow regime level, listed in the figure located in subsection (a)(3) of this section, below the level that would occur with the permitted strategy or strategies in place."

The commission responds that adopted §298.430(b) provides protections for voluntary strategies to meet the standards that are included in water rights permits. This is because evaluation of whether or not a new permit would impair the adopted standards and whether or not a new permit impaired a voluntary permitted strategy would be based on impairment of

the modeled permitting frequency as set out in §298.430(a) and calculated using the WAM. The WAM only includes water rights permits. The rule was not changed in response to these comments.

TPWD comments that although the proposed standards are based on the stakeholder recommendations, the proposed standards do not include all of the high flow pulses recommended by the stakeholders. TPWD is concerned about potential adverse impacts to instream and riparian resources due to the lack of larger annual pulses known to provide critical ecological functions, as stated in the science team report. TPWD further comments that the proposed rules note that there was little site-specific information supporting specific high flow pulse recommendations, including pulses with long durations, but do not provide or identify the evidence relied upon to alter the stakeholder recommendations.

The commission responds that it did not include many of these higher pulses in the adopted rule. In some instances, the commission did not include these high flow pulses because the trigger levels were above the action stage level. This should ensure that application of the standards would not cause flooding. The action stage level is defined by the National Weather Service as the stage which, when reached by a rising stream, represents the level where the National Weather Service or a partner/user

needs to take some type of mitigation action in preparation for possible significant hydrologic activity. While this was not specified in the proposal preamble, the commission has clarified this in the adoption preamble. In addition to modifications to the stakeholder recommendations to address potential flooding concerns, the commission also calculated both the amount of unappropriated water at selected measurement points and the impact of the adopted standards on unappropriated water as discussed in the preamble. Unappropriated water generally occurs during times of higher flow; therefore, increasing pulse volumes and frequencies during wetter periods reduces the remaining unappropriated flow.

The commission followed its instructions in TWC, §11.1471, to determine these flow standards. The commission believes that the adopted rules are sufficiently protective of the environment because they include an adequate flow regime with subsistence, base, and pulse flows and also include freshwater inflow standards. The commission further responds that it does not have to adopt the stakeholders' recommendations in their entirety because SB 3 clearly provides that the commission perform its own review of the stakeholders' recommendations. As provided in TWC, §11.02362(o), the stakeholders develop recommendations, not final environmental flow standards, and send their recommendations to the commission. The

commission considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, including balancing human and other competing needs for water, when drafting the adopted rules.

Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission notes that it has adopted many of the stakeholders' recommendations for this basin and bay system. No change was made in response to this comment.

NWF and Sierra Club comment that pulse flows with durations in excess of 30 days should not be excluded. NWF and Sierra Club recognize that these pulses present a modeling challenge when working with WAMs with a one-month time step and may limit diversions for extended periods. However, NWF and Sierra Club comment that the commission must provide for the protection of key aspects of the ecological functions of these large pulses. NWF and Sierra Club comment that the commission should revise the proposed rule to include these longer duration pulses by reducing the stakeholders' duration time to 30 days in those instances where it exceeds 30 days.

The commission reviewed information from the science team, including the hydrographic separation which formed the basis for the science team's recommendations. The commission also reviewed actual gage flow records. In many instances, these large pulses with long durations appear to be comprised of one or more pulses connected by intervening periods of high base flows. This creates uncertainty regarding the calculation of these pulses because the identified pulses likely represent more than one pulse flow event. The commission did not base this decision on whether or not it would be a challenge to model these pulses, although the fact that diversions would be limited for long periods of time would reduce water availability. Further analyses and studies may need to be performed in the future to determine appropriate magnitudes, volumes and durations of these larger pulse events.

SB 3 contemplates that these types of studies can be considered through adaptive management via the work plan for this basin and bay system. To the extent that additional information becomes available through monitoring and studies undertaken under the work plan, the science team could consider that information in future deliberations. The rule was not modified in response to these comments.

TPWD comments that it is concerned because the proposed rules do not include small seasonal high flow pulses. TPWD recommends that the interpretation of the stakeholders' proposed standards regarding small seasonal pulse events be clarified. NWF and Sierra Club comment that the standards should include protection for smaller-sized high flow pulses that are close in value to the base flow values. NWF and Sierra Club comment that the difference in flow levels between those omitted pulses and base flows is highly variable and the commission's proposed rule also omits pulses with peak flow values significantly larger than base flow levels. NWF and Sierra Club comment that these pulses provide an ecological benefit and the commission failed to provide a reasoned justification for excluding these pulses.

The commission responds that it did not adopt pulses with trigger levels very close to the base flow values for the reasons discussed elsewhere in this preamble. The science team for this basin and bay system developed a recommended environmental flow regime, or schedule of flow quantities adequate to support a sound ecological environment. The stakeholders for this basin took the science team's recommendations and considered those recommendations in conjunction with other factors, including the present and future needs for water for other uses. The commission considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, including commission staff's water

availability analyses, when drafting the adopted rules. Therefore, the adopted standards are not based solely on scientific information. The commission followed its instructions in TWC, §11.1471, by balancing human and other competing needs for water with the scientific recommendations.

The commission takes very seriously its charge from the legislature to provide to the extent practicable for instream flows necessary to maintain the viability of the state's streams and rivers. The legislature has recognized that these environmental interests must be balanced by the commission with "all other public interests." It is not possible or practicable to catalog a precise weighing of countervailing interests that went into the commission's decision, nor is this required by statute. However, as discussed elsewhere in this preamble, one of the important factors for the commission was to preserve the ability to permit at least some future surface water projects for human needs. The commission has provided a more complete explanation of its decision in this preamble. In addition, the information used by the ED in performing his balancing analysis is available on the commission's Environmental Flows Rulemaking Web site. The rule was not changed in response to these comments.

NWF and Sierra Club comment that §298.430(c) should be modified to: include the

stakeholders' recommended 1 per year and the 1 per 2-year high flow pulse in §298.430(c)(1)(3), (6) - (8), (10), and (11) but reduce the duration time to 30 days if the recommended duration time was over 30 days. NWF and Sierra Club also comment that §298.430(c)(10) and (13) - (17), should be modified to include the stakeholders' recommended 3 and/or 4 per season pulses. NWF and Sierra Club further comment that §298.430(c)(18) - (20), should be modified to include the stakeholders' recommended 2 per season pulses.

The commission responds that it did not include these additional pulses in the adopted rule for the reasons discussed elsewhere in this preamble. See response to comment above. The rule was not changed in response to these comments.

§298.435, Water Right Permit Conditions

TPWD comments that it is concerned about potential adverse ecological impacts related to high flow pule protection in proposed §298.435(b). TPWD acknowledges that the provision is consistent with the stakeholder recommendations but is concerned about the cumulative effect of the exemption on high flow pulse events. TPWD recommends that limits on simultaneous diversions or accumulations of diversion rates in excess of the 20% limit, or other strategies to protect high flow pulses be identified and highlighted in an implementation document.

The commission believes that the adopted rules are sufficiently protective of the environment because they include an adequate flow regime with subsistence, base, and pulse flows and also include freshwater inflow standards. Staff is working on implementation and this document will be made available to the public when completed. The rule was not changed in response to this comment.

Subchapter G: Brazos River and Its Associated Bay and Estuary System

General

Abilene comments that it appreciates the significant time and effort that has been invested by TCEQ staff in developing the proposed rules and appreciates the work of TCEQ staff to incorporate key aspects of the reports of the Brazos stakeholders in the proposed rules.

The commission acknowledges the comment. The rule was not changed in response to the comment.

FBR commented that they support the proposed rules as they affect segments of the Brazos River downstream of Lake Possum Kingdom. TPWD comments that overall, it supports the stakeholders' recommendations for those locations where the stakeholders

reached consensus.

The commission acknowledges these comments. The rule was not changed in response to these comments.

NWF and Sierra Club and an individual commented that the proposed rules do not include specific inflow standards for the Brazos and San Bernard estuaries. The commenters expressed concerns that failing to include freshwater inflow standards would allow diversions below the Richmond and Boling gages. These commenters further states that the science team based their recommendations on the fact that inflows to the estuary would equal the science team recommendation at Richmond. NWF and Sierra Club also comment that the adopted standards should expressly provide that, in the reach from below the Rosharon gage to the confluence of the Brazos River and the Gulf of Mexico, no storage or diversion can occur except to the extent that flows at the relevant location equal or exceed levels at which they could have been diverted at the Richmond gage. A comparable protection of flows all the way to the Gulf of Mexico should be provided for the San Bernard estuary based on the standards at the Boling gage. NWF and Sierra Club also comment that the adopted rules should include voluntary strategy targets for the Brazos and San Bernard estuaries consistent with the science team recommendations for the downstream gage locations in those estuaries. Attainment frequencies for the science team's recommended subsistence, base, and

pulse flows should be used, with compliance assessed as a long-term average below the most downstream diversion point. The individual requests TCEQ to include a narrative in the adopted rules stating that the standards at the Richmond and Boling gages would be used in lieu of specific inflow recommendations for the Brazos and San Bernard estuaries.

The commission did not include freshwater inflow standards for the Brazos and San Bernard estuaries because the stakeholders did not recommend freshwater inflow standards for these estuaries. In their report, the stakeholders note that unless additional reservoir storage is developed on the main stem of the Brazos River or its major tributaries, some pulses will continue to occur and sufficient sediment and nutrient delivery will be available into the foreseeable future. The commission gave deference to the stakeholders' recommendations. Further analyses and studies can be performed in the future to evaluate these estuaries and the stakeholders recommend that a long-term study for these estuaries be performed. SB 3 contemplates that these types of studies can be considered through adaptive management via the work plan for this basin and bay system. To the extent that additional information becomes available through monitoring and studies undertaken under the work plan, the science team and stakeholders could consider that information in future deliberations. The rules were not

modified in response to this comment.

Palo Pinto comments that TCEQ has appropriately incorporated key aspects of the stakeholders' work in its proposed standards.

The commission acknowledges the comment. The rule was not changed in response to the comment.

TCC comments that it supports the proposed rules for the Brazos River Basin and its associated bay and estuary system in new Chapter 298, Subchapter G. TCC comments that it supports protections of high flow pulses through set-asides, the schedule of flow quantities, and hydrologic conditions.

The commission acknowledges the comment. The rule was not changed in response to the comment.

TCC comments that it supports the use of special permit conditions rather than set-asides of unappropriated water to protect the adopted standards and agrees that water is only available during relatively wet conditions. TCC further comments that setting aside additional water to meet the standards would limit the amount of water available for future human use and that use of permit special conditions would allow TCEQ to

maintain control over the amount of water necessary for environmental flows as well as allow additional users to obtain permits.

The commission acknowledges the comment. The rule was not changed in response to the comment.

NWF and Sierra Club comment that they acknowledge the complexity of the challenge involved in some aspects of establishing set-asides of unappropriated flows, but they do not believe that the commission's failure to set-aside water for environmental flow protection purposes has been adequately justified. In the absence of a demonstration that special conditions can reliably satisfy applicable environmental flow standards, environmental flow set asides are needed. NWF and Sierra Club comment that they disagree with the flexibility argument because it ignores the legislative directive to set aside unappropriated flows and because the claimed flexibility is illusory. NWF and Sierra Club acknowledge that not all aspects of needed environmental flows would be met through set-asides and regulated flows can help meet those needs; however, for key components of flow protections, the claimed flexibility masks a failure to implement statutory directives to protect needed flows. One value of environmental flow set-asides is that they establish a priority date that would allow the TPWD to act in the role of a water right holder to enforce the right and to make a priority call for that water. If the commission does not establish environmental flow set-asides at this time, it will be

critical for the commission to acknowledge and respect the availability determinations noted in the proposed rules in future water rights permitting decisions in order to retain and protect its ability to meaningfully revisit the issue of establishing environmental flow set-asides during the first revision process for these standards.

The commission respectfully disagrees that set-asides are required if the commission finds that there is any amount of water available at any time. Even assuming that water is available for a set-aside, TWC, §11.1471(a)(2), qualifies the requirement for a set-aside as "to the maximum extent reasonable when considering human water needs." In the Brazos River Basin and the Brazos-Colorado Coastal Basin, the commission has determined that set-asides are not reasonable because of limited water availability. Because of water availability issues in these basins, special conditions placed in a permit are a more effective method to protect flows in the stream when new appropriations of water are granted while providing water for future human needs. This is because if special conditions are used there are other sources of water in a stream that could be used to meet environmental flow requirements in a permit; for example, water appropriated to downstream water right holders, water appropriated to another but not used, or return flows. Water appropriated to downstream water right holder, water appropriated to another but not

used, and return flows would not be considered in the availability determination for a set-aside. The ability of special conditions to meet the environmental flow standard while at the same time allowing water to be available for appropriation makes the use of special conditions a more reasonable approach to protecting the environmental flow standards considering human water needs.

The results of the commission's water availability analyses can be found in the Section by Section Discussion section of this preamble for §298.480. The commission is only determining in this rulemaking to not establish set-asides at this time for these basins. After the implementation of environmental flows standards, and the adaptive management process, the commission is willing to revisit the issue. However, because of the necessity of leaving the ability to utilize some of the remaining unappropriated water in the basin for human water needs, the commission declines to establish any set-asides. No change was made in response to these comments.

§298.455, Definitions

NWF and Sierra Club comment that the PHDI is based on a period of record from 1895 to present and that a new index is to be calculated on the last day of the month before

the start of a new season based on updated monthly PHDI values.

The commission responds that the PHDI Index is based on the long-term record. The PHDI value on the last day of the month of the preceding season for the geographic area as determined by the percentage of each climate division within the geographic area, as those areas are described in §298.470(b) will be compared to the PHDI Index to determine hydrologic condition for that season. Under §298.470(d), the PHDI Index will be recalculated no less frequently than once every ten years. No change was made in response to these comments.

NWF and Sierra Club comments that the stakeholder report incorrectly identifies the time period for this season as April through June and the proposed rule correctly includes a time period of March through June.

The commission acknowledges these comments. The rule was not changed in response to the comment.

NWF and Sierra Club comments that the proposed definition is very incomplete and imprecise and misses critical aspects of the SAC definition adopted by the science team. NWF and Sierra Club request that the definition be modified to state: "(9) Sound

ecological environment-an environment that is characterized by fish, macroinvertebrate, and riparian vegetation species that remain relatively intact compared to historical records; that sustains key habitat features required by those species; that retains key features of the natural flow regime required by these species to complete their life cycles; and sustains key ecosystem processes and services, such as elemental cycling and the productivity of important plant and animal populations."

The science team adopted the SAC's basic definition to develop its environmental flow regime recommendations. The science team also states that it determined that a sound ecological environment within stream and river reaches of the Brazos Basin would be characterized by fish, macroinvertebrate, and riparian vegetation species assemblages that remain relatively intact compared to historical records. This is the definition used by the commission. The commission added the word "assemblages" to the definition in §298.455(9) to correct a typographical error.

§298.460, Findings

NWF and Sierra Club comment that §298.460(b) refers to subsistence conditions, which suggests there is a subsistence hydrologic condition. Subsistence flows are a flow level that is only applicable during dry hydrologic conditions, but they are not properly

referred to as a flow condition.

The commission agrees and the rule was modified in response to this comment to clarify that subsistence is not a hydrologic condition.

§298.465, Set-Asides and Standards Priority Date

FBR commented that they support the proposal to limit new permits based on water being available to meet all downstream flow requirements.

The commission acknowledges the comment and notes that the limitation in this subsection is a consideration during the water availability determination for a new appropriation of water. The rule was not changed in response to the comment.

NWF and Sierra Club comment that statements in the preamble relating to how the commission would include the standards in its WAMs in order to protect those standards are unclear.

The commission responds that, as stated in the Section by Section discussion section of this preamble for adopted §298.465, the standards will be in the WAM with the priority date being the date the commission

received the environmental flow regime recommendations from the science team. If all adopted standards downstream of a new appropriation are in the WAM for a river basin, water availability for the new appropriation would be limited by those downstream standards.

§298.470, Calculation of Hydrologic Conditions

Abilene, Palo Pinto, and TCC support the inclusion of hydrologic conditions in the proposed rule. Abilene and Palo Pinto comment that use of the structure recommended by the stakeholders to include hydrologic conditions for base flows and high flow pulses is a key aspect of achieving balance between the needs of the environment and the provision of water supply. The inclusion of hydrologic conditions in the adopted standards allows for protection of water supply when flows are depleted by drought and is critical for future water supply in the Brazos Basin. Reducing base and high flow pulse passage requirements during drier times can significantly improve the yield of water supply projects while still providing flows that are adequate to support a sound ecological environment. TCC comments that tying pulse standards to hydrologic conditions rather than using the additional standard recommended by the stakeholders provides assurance of a single measurable standard that will provide certainty to water users.

The commission acknowledges these comments. The rule was not changed

in response to these comments.

NWF and Sierra Club comment that the words "and pulse" be added to the third paragraph of the preamble discussion because hydrologic conditions also apply to pulse flows.

The commission agrees and these words were added to the Section by Section discussion for §298.470.

NWF and Sierra Club comment that the sentence: "PHDI Index values between the 25th and 75th percentile were used to describe the average hydrologic condition," should be added to the preamble discussion to describe the average hydrologic condition.

The commission agrees and this sentence was added to the Section by Section discussion for §298.470.

§298.475, Schedule of Flow Quantities

NWF and Sierra Club comment that overbank flows should be protected because they can be diminished by new projects. NWF and Sierra Club comment that they disagree with the commission's use of the National Oceanic and Atmospheric Administration's Action Stage for constraining the upper limit of high flow pulse events because it unduly

limits protection of bankfull flows. NWF and Sierra Club urge the commission to include and protect these large pulses.

The commission acknowledges that overbank flows are a component of a flow regime for a sound ecological environment. However, flows at or above the Action Stage level have the potential to inundate low-lying areas. The flows the commission is protecting in the adopted rule are not calculated to result in water flowing out of the banks of the river at or near the applicable measurement point. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the phrase "and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season" from the last sentence of the second paragraph in the preamble be deleted because the phrase seems incorrect. NWF and Sierra Club comment that base flows and pulse flows would also limit diversions by a water right subject to the standards.

The commission agrees that base flows and pulse flows could also limit diversions by a water right subject to the standard. However, the reference in this comment is to a discussion of subsistence flows. Subsequent paragraphs in the Section by Section discussion for §298.475 discuss base

flows and pulse flows. No changes were made in response to these comments.

NWF and Sierra Club comment that the third paragraph of the preamble should be revised to read: "During average or wet hydrologic conditions, a water right holder may not divert water when the flow is below the base flow standard for that season. During dry hydrologic conditions, diversions when flows are below the base flow standard may occur as described in the previous paragraph."

The commission clarified the Section by Section discussion for §298.475 in response to this comment by adding a reference to the third paragraph in the preamble referencing the discussion of diversions during dry hydrologic conditions in the preceding paragraph.

NWF and Sierra Club comment that they agree with the commission's decision not to include the complex procedures for determining pulse compliance because these procedures were developed for a more comprehensive set of pulse flows that would be implemented without regard to hydrologic condition and the would be unduly difficult to apply and enforce.

The commission acknowledges these comments. The rule was not changed

in response to these comments.

NWF and Sierra Club comment that either §298.475(b) or (c) should be revised to reflect that diversions cannot occur below the base flow values during average and wet conditions.

The commission agrees and §298.475(c) was modified in response to these comments.

NWF and Sierra Club comment that the phrase "for that season" should be added to §298.475(d)(5).

The commission agrees and §298.475(d)(5) was modified in response to these comments.

§298.480, Environmental Flow Standards

Two thousand and thirty nine individuals commented that the Brazos River flow protections are too weak. Pulse flows must be set to protect the flow needs of two fish - the sharpnose shiner and smalleye shiner - both proposed for the Endangered Species List by United States Fish and Wildlife. Adopting standards that don't protect these species invites federal intervention on an issue that could be addressed right here in

Texas. One individual is concerned the Brazos River flow protections are too weak and fail to protect the flow needs of two types of fish proposed for the endangered species list. Changes made now can help these fish rebound.

The commission responds that under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The commission notes that in its standards for the Brazos River Basin, it is adopting environmental flow standards for the Brazos River and its tributaries that include a subsistence flow, multiple levels of base flows and high flow pulses. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission declines to make any specific changes as a result of these comments.

Abilene supports the decision to not include the Clear Fork Brazos River near Fort Griffin because the proposed standards for the Clear Fork Brazos River near Lueders provide adequate protection for the environment.

The commission acknowledges the comment. The rule was not changed in response to the comment.

WCTMWD congratulates the commission for adopting the stakeholders' recommendations for target flows and for not adding additional large flow requirements above the stakeholders' recommendations such as annual pulses.

The commission acknowledges the comment. The rule was not changed in response to this comment.

An individual comments that TCEQ's decision to substitute the stakeholders' consensus gage, Clear Fork Brazos River at Fort Griffin with the Clear Fork Brazos River at Lueders is unjustified and unsubstantiated. The commenter expressed concerns regarding the scientific information TCEQ used to develop the proposed rule. The commenter specifically notes inconsistencies in the information transmitting the report and the report, the high flow pulse event studied in 2012 had a higher peak value than the recommendation, and that it is unclear why the observed pulse is recommended as a Wet season spring pulse when it occurred during dry conditions in the fall. TPWD comments that it appears that the additional data was gathered during dry conditions and that high flow pulse recommendations based on limited data would not be

sufficient.

The commission responds that, as discussed in the preamble, it received additional scientific information for the Clear Fork Brazos River. This information was based on a site specific study, which was not available at the time the science team and stakeholders considered their recommendations. The commission made this information available to the public on the Environmental Flows Rulemaking Web site. High flow pulses are intended to provide connectivity and support the maintenance of water quality. Based on the information in the site specific study, this pulse performed those functions. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The rule was not changed in response to these comments; however, in response to other comments, the commission modified the Figure in §298.480(5) to correct typographical errors.

An individual comments that the proposed flow standards for the three gages in the upper Brazos Basin are not adequate to protect the sharpnose and smalleye shiners because they do not include an adequate number of high flow pulses.

The commission responds that under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The commission notes that in its standards for these three gages, it is adopting environmental flow standards for the Brazos River and its tributaries that include a subsistence flow, multiple levels of base flows and high flow pulses. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission declines to make any specific changes as a result of this comment.

An individual commented that the stakeholder recommendations for the upper three gages are based on flawed assumptions because the analysis assumed water would be passed downstream for existing water rights. The commenter states that if projects are developed in this area they would involve subordination agreements where water does not have to be passed to honor downstream water rights. NWF and Sierra Club comment that the analysis used to develop the majority recommendations assumed that water would be passed downstream to honor all existing rights, even in the absence of

protective flow standards. However, if projects are developed, they will very likely involve subordination agreements, whereby water does not have to be passed to fully meet downstream water rights. Such agreements are commonplace in the upper reaches of the Brazos. Accordingly, assuming that water will be passed downstream to honor all downstream water rights is not an appropriate starting point for evaluating the importance of protective flow standards. NWF and Sierra Club comment that TCEQ staff indicated that the minority report incorrectly assumes water rights with subordination agreements would only have to pass water to meet environmental flows, rather than other senior water rights. NWF and Sierra Club acknowledge the clarification that some amount of water may have to be passed to honor downstream water rights that are not included in the subordination agreement, which means that an assumption that no flows will be passed to honor existing rights also is not appropriate. NWF and Sierra Club comment that they are not aware of any standard approach for accurately characterizing an appropriate assumption about the volume of water that might have to be passed to honor some downstream rights under a specific subordination scenario. The amount of water that needed to be passed would be less than the amount assumed in developing the majority recommendations and likely more than the amount assumed in the minority report analysis. To the extent that flows would have to be passed downstream to protect existing water rights, having a protective environmental flow standard that also would independently require the flows to be passed would not have an adverse effect on water availability. Conversely, not

having a protective environmental flow standard would result in additional adverse environmental impacts if the amount required to be passed downstream for senior rights is not as great as assumed in the majority analyses.

The commission responds that a subordination agreement between two water right holders does not relieve a junior water right holder from the requirements to pass water downstream to other water rights senior to it. In evaluating an application for a new appropriation of water which includes a subordination agreement, the commission will evaluate that application in accordance with TWC, §11.134, and commission rules which state that an application cannot impair existing water rights. The volume of water that might need to be passed to downstream water rights would be based on that analysis and the specific facts in the application. This analysis would also take into account any environmental flow requirements. The rule was not changed in response to these comments.

TCC comments that it agrees with the ED's water availability analysis and its use as a basis in proposing adoption of the stakeholders' recommendation. The stakeholder recommendation provides for a proper balancing of interests between the environmental and industry stakeholders, thus attaining the goal of the environmental flows process.

The commission acknowledges the comment. The rule was not changed in response to the comment.

NWF and Sierra Club comment that the additional scientific information the commission received for the Lueders gage was a comment letter with a recommended flow regime that was selectively based on a December 2012 scientific report prepared by Bio-West, Inc entitled, "*Aquatic Habitat Modeling Relating to the Cedar Ridge Reservoir Project*." NWF and Sierra Club comment that there are inconsistencies in the application of findings and disregard for specific caveats regarding the use of the data. The proposed flow regime ignores the site-specific information available for base flows, and rather, relies on Hydrology-Based Environmental Flow Regime generated flows. A high-flow pulse event on September 30th of last year is referenced as the source of the recommendation for a Wet season spring pulse of 355 cfs for the Lueders gage. However, this pulse occurred during fall and during dry conditions, so a defensible rationale for equating it to a spring pulse during wet hydrologic conditions is lacking. For example, the pulse was only observed on the descending limb. It was characterized as exhibiting a daily mean discharge of 373 cfs and a peak flow of about 500 cfs. The proposed rules recommend a wet condition spring pulse trigger level of 355 cfs, apparently based on this single, only partially-observed, pulse event. However, the basis for assuming that essential functions, such as connecting to major side channels and

inundation of most islands and gravel bars, would be achieved by a peak flow of 355 cfs rather than the actual 500 cfs peak flow for the specific event is far from obvious. NWF and Sierra Club support the use of site-specific information when it is available and accurately characterized. However, the proposed use of site-specific information here is not supported by, or consistent with, the underlying information. The subsistence flow provisions in the proposed rules for Lueders appear to match the Bio-West study results, but neither the base flow values nor the pulse flow values in the proposed standards are supported by that study.

In developing the adopted standards for this gage, the commission considered the stakeholders' consensus recommendations for base and subsistence flows for gages on the Clear Fork of the Brazos River as well as the pulse flow information provided in the study. The adopted standards include a drainage area ratio adjustment to the stakeholders' recommended values for base flows. The study was not performed at the Lueders gage so the pulse flow values for the study area were translated to the Lueders gage, resulting in a pulse flow recommendation of 355 cfs. High flow pulses are intended to provide connectivity and support the maintenance of water quality. Based on the information in the site specific study, this pulse performed those functions. The adopted standards are protective of the environment and allow for some future permitting. Under SB 3's adaptive

management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission declines to make any specific changes as a result of these comments.

TPWD comments that the Lueders gage does not provide an adequate substitution for the Nugent gage and that the Lueders gage should also not replace the Fort Griffin gage. NWF and Sierra Club comment that the decision to substitute USGS gage 08085500, Clear Fork Brazos River at Fort Griffin with USGS gage 08084200, Clear Fork Brazos River near Lueders is unjustified and unsubstantiated and there is no obvious basis for this decision. HDR Engineering, Inc. sent an informal comment letter that only recommended the substitution of flow standards at the Lueders gage for flow standards at the Nugent gage. NWF and Sierra Club comment that that substitution appears logical because the Lueders and Nugent gages are quite close to one another. The Fort Griffin gage is about 83 river miles downstream from the Lueders gage, resulting in a very large downstream reach without a measurement point. In addition, the Fort Griffin gage has a contributing watershed of 3,988 square miles compared to 2,546 square miles for the Lueders gage. Flow regimes suitable for the study site may not be appropriately transferrable downstream to reaches around Fort Griffin which are underlain by different geology and are located in a different ecoregion. NWF and Sierra Club comment that since 2008, which has been a very dry period, numerous pulse flows

have occurred that exceed the highest pulse flow recommendation of the stakeholder group (1,230 cfs) for this gage. The stakeholders' pulse recommendations have greatly reduced pulse magnitudes and frequencies from the levels that the science team recommended as being adequate to support a sound ecological environment. Those unanimous stakeholder committee recommendations were based on much discussion of a balance between flow protection and water availability for new projects and already reflect major concessions to enhance water availability. NWF and Sierra Club comment that the flow standards unanimously recommended by the stakeholder committee for the Fort Griffin gage should be included in the adopted rule.

The commission responds that it considered the stakeholder recommendations and in most instances gave deference to those recommendations. However, the commission respectfully disagrees that it had to adopt the stakeholder recommendations in their entirety because SB 3 clearly provides that the commission perform its own review of the stakeholders' recommendations. As provided in TWC, §11.02362(o), the stakeholders develop recommendations, not final environmental flow standards, and send their recommendations to the commission. Under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent

reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The balancing process in areas with demonstrated future human needs, such as on the Clear Fork of the Brazos River, can result in more consideration being given to those needs. However, the commission further responds that the adopted standards are protective of the Clear Fork of the Brazos River and allow for some future permitting.

The commission notes that in its standards for the Brazos River Basin, it is adopting protective environmental flow standards for the Brazos River and its tributaries, including the Clear Fork of the Brazos River, that include a subsistence flow, multiple levels of base flows and high flow pulses. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission declines to make any changes to the rule as a result of these comments; however, the Section by Section discussion for §298.480 of the ED's water availability analysis was modified to clarify that information considered by the stakeholders was reviewed as part of the ED's analysis.

Abilene supports establishing environmental flow standards at USGS gage 08084200,

Clear Fork Brazos River near Lueders because the proposed standards at this location are based on eight years of site-specific environmental studies performed on the Clear Fork downstream of the gage and provide a more biologically-based standards for this reach. Abilene further comments that the proposed standard is adequate to provide for the needs of the aquatic species within this reach of the Clear Fork and for the flow requirements of juvenile Brazos River Water Snakes in late summer and early fall.

The commission acknowledges the comment. The rule was not changed in response to the comment.

Abilene comments that the environmental flow standards at the Clear Fork Brazos River at Lueders appear to be transposed.

The commission agrees and the Figure in §298.480(5) was modified in response to this comment.

FBR commented that they support the recommendations of NWF for the rivers and tributaries upstream of Lake Possum Kingdom.

The commission acknowledges the comment. The rule was not changed in response to the comment.

An individual commented that the proposed rules do not mention the minority report, except in the analysis of a hypothetical water supply project and that TCEQ fails to provide reasons for rejecting the report. The commenter requests that TCEQ propose and adopt rules consistent with the minority report so that the adopted standards include key components of a healthy ecosystem rather than adopting standards which increase the likelihood of federal intervention. NWF and Sierra Club comment that, with the exception of the Balancing Analysis referencing impacts on annual availability for a hypothetical project, the preamble to the proposed rules fails even to mention the minority report and recommendations. NWF and Sierra Club comment that the commission must provide a rationale for rejecting those recommendations beyond a simple conclusion that protecting more flow for the environment would reduce water availability. That will, of course, be true, but provides no reasoned basis for striking a particular balance. The environmental flow regime presented in the minority report provides a reasonable approach for improving environmental protections, lessening the likelihood of the Federal Endangered Species Act complications for future water supply development, and doing so with a minimal impact on potential project cost.

The commission responds that it specifically invited comments on the minority report at the time the rules were proposed and received several comments on this report which are addressed in this response to comment.

In addition, the commission considered the recommendations of the minority report in its water availability analysis. The results of the water availability analysis indicate that less water is available for new projects under the minority report recommendations. Under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The balancing process in areas with demonstrated future human needs can result in more consideration being given to those needs. However, the commission further responds that the adopted standards are protective of the environment because they include a flow regime consisting of subsistence flows, base flows, and high flow pulses, and allow for some future permitting. The rules were not changed in response to these comments.

FBR comments that the use of an unrealistic hypothetical direct diversion and errors in the evaluation of the impacts of such a diversion do not justify rejection of the minority report and the healthier environmental flow recommendations for the upper portion of the river.

The commission responds that the amount of water considered in its water availability analysis, 10,000 acre-feet, is less than the amount identified in the Regional Water Plan as necessary for future human water needs. The commission did not intend for its balancing analysis to be a finding that water was available for a specific project. The commission notes that it adopted the recommendations of the majority of the stakeholders for gages on the Salt Fork Brazos River, the Double Mountain Fork Brazos River and the main stem Brazos River above Lake Possum Kingdom. The commission believes that the adopted rules are sufficiently protective of the environment because they include a flow regime consisting of adequate subsistence flows, base flows, and high flow pulses. The rule was not changed in response to this comment. In response to other comments, the commission revised the Section by Section Discussion section of this preamble for §298.480 to reflect modified annual availabilities for the modeling scenarios.

NWF and Sierra Club comment that, after reviewing the proposal WAMs, the reliabilities are different than those stated in the proposal. The new annual reliability for the minority recommendation is 28%, the same value stated in the proposed rule for the majority recommendation. The majority recommendation has an annual reliability

of 33% and the Lyons scenario and the "no environmental flows" scenario have annual reliabilities of 66%.

The commission agrees and the Section by Section Discussion section of this preamble for §298.480 was revised to reflect modified annual availabilities for the modeling scenarios.

NWF and Sierra Club comment that, based on their modeling, the relative difference between the annual availabilities based on the minority and majority recommendations are less than assumed in the rule proposal.

The commission agrees that the relative difference is less. However, the results of the water availability analysis indicate that less water is available for new projects under the minority report recommendations. This smaller difference represents 15% less water, on average, for future permitting. Under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The balancing process in areas with demonstrated

future human needs can result in more consideration being given to those needs. However, the commission further responds that the adopted standards are protective of the environment and allow for some future permitting. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the commission's evaluated scenario is just a hypothetical scenario employed to assist in balancing competing benefits and only evaluates potential impacts on water supply rather than providing an evaluation of impacts to environmental flow protection between the competing recommendations. NWF and Sierra Club further comment that because the hypothetical scenario is not a firm-yield project or a project with any assumed storage, the evaluation provides very limited insight on potential impacts to realistic water supply projects. The project was assumed to be able to divert up to the full yearly amount in a single month, which often occurred in the modeling exercise. A project without storage would have no capacity to store or make use of such a large amount of water taken in such a brief period. NWF and Sierra Club believe this approach is quite unrealistic and unlike actual projects included in regional water plans or that might be pursued. A more realistic approach is to have off-channel reservoir storage facilities to handle large diversions when available. Storage then provides the capacity to use the diverted water on a metered basis through more modestly-sized, long-distance transport facilities.

The commission did not intend for its balancing analysis to be a finding that water was available for a specific project. The ED did not include a storage component in the modeling to support the balancing analysis because simply adding storage does not increase the amount of water a water right could divert from the river or the reliability of that diversion. Permitting decisions for an off-channel project would be based on the amount of water an applicant could divert from the river and there would need to be a reasonable amount of water available in the river that meets the criteria in the commission's statutes and rules. If the reliability of the river diversion is low, it could be difficult to recommend granting a permit. The commission believes that the adopted rules are sufficiently protective of the environment because they include a flow regime consisting of subsistence flows, base flows, and high flow pulses. The rule was not changed in response to these comments.

NWF and Sierra Club comment that they evaluated a project with off-channel storage and developed yield sensitivity and cost analyses to examine tradeoffs of the two recommendations of the stakeholders. NWF and Sierra Club comment that they used the standard template utilized in regional water planning for developing costs for infrastructure components such as off-channel reservoirs. NWF and Sierra Club comment that under their evaluation, the off-channel reservoir storage size had to be

increased above that needed under the Lyons scenario or the "no environmental flow" scenario to get the same project firm yield with either the majority or minority stakeholder recommendations. The reservoir sizes were 39,500 acre-feet and 43,000 acre-feet, for the majority and minority recommendations, respectively. NWF and Sierra Club commented that their analysis showed that under the base case of no environmental flow condition the water supply cost is $4.69 per thousand gallons, under the majority recommendations, the unit cost increases to $5.32, and under the minority recommendations, the unit cost increases to $5.51.

The commission acknowledges the comments. The commission did not intend for its balancing analysis to be a finding that water was available for a specific project. The ED did not include a storage component in the modeling to support the balancing analysis because simply adding storage does not increase the amount of water a water right could divert from the river or the reliability of that diversion. The water available to a new permit would be based on the amount of water that can be diverted from the river. The commission responds that the results of its water availability analysis indicate that 15% less water is available for appropriation for new projects under the minority report recommendations. Under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a

sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The balancing process in areas with demonstrated future human needs can result in more consideration being given to those needs. However, the commission further responds that the adopted standards are protective of the environment and allow for some future permitting. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the minority recommendations represent a compromise level of protection greatly below the levels recommended by the science team, but with more pulse flow protection than was included in the majority stakeholder recommendation. NWF and Sierra Club comment that a primary concern underlying the minority stakeholder recommendation is the presence in this reach, characterized by three gage locations (USGS gage 08080500, Double Mountain Fork Brazos River near Aspermont; USGS gage 08082000, Salt Fork Brazos River near Aspermont; USGS gage 08082500, Brazos River at Seymour), of two fish species that have recently been proposed for listing under the Federal Endangered Species Act. One of the key threats to the continued existence of the species, which have already been extirpated from other portions of the Brazos Basin and are currently found only in this reach, is reduced flows. The majority stakeholder recommendations and the commission's proposed standards

fail to protect adequate high flow pulses to support reproductive success for these species. NWF and Sierra Club comment that increasing the likelihood and extent of federal involvement in water management decisions because of a failure to provide reasonable levels of protection under state law is not in the best interest of Texas.

The commission responds that under the state environmental flow process, as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The commission notes that in its standards for these three gages, it is adopting environmental flow standards for the Brazos River and its tributaries that include a subsistence flow, multiple levels of base flows and high flow pulses. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission declines to make any specific changes as a result of these comments.

NWF and Sierra Club comment that the commission must give full consideration to the flow regimes recommended in the minority report and, if it chooses not to accept them,

must justify that decision. The failure to adopt full protections at least as protective of a sound ecological environment as those recommended in the minority report is not justified by competing considerations. Water users in the Brazos basin will have *greater certainty* and predictability if the state's flow standards for these three gages include key components of what is needed to maintain a healthy ecosystem.

The commission responds that it specifically invited comments on the minority report and considered the recommendations in the minority report in its water availability analysis. The commission followed the process created by the legislature in TWC, §11.1471, to determine these flow standards. It considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, when drafting the adopted rules. Under TWC, §11.1471, the commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors." The commission is required to perform its own review based on several factors, including human needs. The commission's water availability analysis demonstrates that less water would be available for future permitting under the minority recommendations than would be available under the recommendation of the majority of the stakeholders. The

commission's adopted standards are protective of the environment and allow for some future permitting. The rule was not changed in response to these comments.

TPWD comments that the Brazos River reaches where the stakeholders were unable to develop a consensus essentially describe the current range of two Texas endemic fish species, the sharpnose shiner and the smalleye shiner. Both species have been proposed for listing as endangered species by the United States Fish and Wildlife Service whom also proposed critical habitat for those species which includes much of the Brazos River Basin upstream of Lake Possum Kingdom. TPWD comments that mean summer discharge levels of at least 228 cfs at the Brazos River at Seymour are necessary to ensure long-term persistence of the smalleye shiner and that seasonal pulses are an essential addition to stream volumes in order to achieve the 228 cfs. TPWD comments that the science team recommended more and higher pulses. TPWD further comments that the proposed standards for the Salt Fork Brazos River, Double Mountain Fork Brazos River, and the main stem Brazos River above Lake Possum Kingdom may not ensure adequate protection for fish and wildlife resources, including endemic prairie fishes in the Salt Fork Brazos River. One individual commented that adopting standards that do not protect the sharpnose shiner and the smalleye shiner is wrong.

The commission responds that under the state environmental flow process,

as set out in TWC, §11.1471, the commission must adopt environmental flow standards that are "adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors." The commission is adopting standards with the appropriate balance between those interests. The commission notes that in its standards for the Brazos River Basin, it is adopting environmental flow standards for the Salt Fork Brazos River, the Double Mountain Fork Brazos River, and the main stem Brazos River above Lake Possum Kingdom that include a subsistence flow, multiple levels of base flows, and high flow pulses. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. The commission declines to make any specific changes as a result of these comments.

TPWD comments that TCEQ's modeling approach for the balancing analysis may be unrealistically conservative given that situations where annual totals of large diversion rights were diverted in a single month are not practical without some form of storage. TPWD recommends an alternative approach to compare the maximum amount that could be permitted under the four balancing scenarios and include a fifth scenario using the science team's recommendations.

The commission responds that it did not intend for its balancing analysis to be a finding that water was available for a specific project. The ED did not include a storage component in the modeling to support the balancing analysis because simply adding storage does not increase the amount of water a water right could divert from the river or the reliability of that diversion. Permitting decisions for an off-channel project would be based on the amount of water an applicant could divert from the river and there would need to be a reasonable amount of water available in the river that meets the criteria in the commission's statutes and rules. If the reliability of the river diversion is low, it could be difficult to recommend granting a permit. The commission notes that the science team's recommendations include additional pulse flows throughout the Brazos River Basin. As stated in the preamble, unappropriated water in the Brazos River Basin generally occurs during times of higher flow; therefore, as the ED's analysis indicates, increasing pulse volumes and frequencies reduces the remaining unappropriated flow that could be available for future human needs. Modeling the science team's recommendations is also not necessary because those recommendations were modified by the stakeholders. The commission believes that the adopted rules are sufficiently protective of the environment because they include a flow regime consisting of subsistence

flows, base flows, high flow pulses, and a freshwater inflow standard and allow for some future permitting. The rule was not changed in response to this comment.

§298.485, Water Right Permit Conditions

Palo Pinto comments that TCEQ has appropriately incorporated §298.485(c) exempting permits that increase storage by up to 15% in the Palo Pinto Creek watershed from high flow pulse requirements based on site-specific environmental studies.

The commission acknowledges the comment. The rule was not changed in response to this comment.

WCTMWD comments that the geometry of most existing and new dams would preclude the discharge of large flow rates below the crest of the service spillway. WCTMWD comments that, in the western part of the Brazos Basin, reservoirs stay below that threshold a good bit of the time and discharges through the dam are limited to the service outlet below the service spillway crest. WCTMWD comments that the proposed standards are problematic for both new reservoirs where enlarged outlets are tremendously expensive and for existing reservoirs that were not designed to accommodate the environmental flow standards. WCTMWD comments that TCEQ should add an additional provision to §298.485 stating that "Reservoirs are exempted

from Seasonal Pulse Flow Trigger releases any time the actual storage volume of the reservoir is less than 50% of the permitted capacity."

SB 3 does not apply to water rights issued before September 1, 2007. Commission rules in §298.10 also state that Chapter 298 only applies to a new appropriation of water or an amendment to an existing permit for a new appropriation of water which was pending on September 1, 2007 or which was filed after that date. The commission followed the process created by the legislature in TWC, §11.1471, to determine these flow standards. It considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, when drafting the adopted rules. Under TWC, §11.1471, the commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors." The commission is required to perform its own review based on several factors, including human needs. The commission's adopted standards are protective of the environment and allow for some future permitting. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. Additionally,

under these adaptive management provisions, the stakeholders will have future opportunities to re-evaluate the issue of balancing human and other competing needs for water in the bay and basin systems. The rule was not changed in response to this comment.

WCTMWD comments that the decrease in reliability under the proposed rules means that the benefit of any proposed project would be cut in half doubling the unit cost of the diverted water and could impact a proposed reservoir to the point where it is no longer a viable option. WCTMWD comments that TCEQ should limit the potential impact of the standards on a proposed reservoir by adding an additional provision to §298.485 stating "TCEQ shall not establish a special condition which diminishes the time a diversion quantity is available, or the yield of a proposed reservoir, by 50% or greater."

The commission responds that it followed the process created by the legislature in TWC, §11.1471, to determine these flow standards. It considered all of the recommendations provided by the science team and the stakeholder groups and other relevant factors, when drafting the adopted rules. Under TWC, §11.1471, the commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors." The

commission is required to perform its own review based on several factors, including human needs. The commission's adopted standards are protective of the environment and allow for some future permitting. Under SB 3's adaptive management provisions, further analyses and studies will be performed in the future to determine whether the adopted standards, once implemented, continue to protect the environment. Additionally, under these adaptive management provisions, the stakeholders will have future opportunities to re-evaluate the issue of balancing human and other competing needs for water in the bay and basin systems. The rule was not changed in response to this comment.

Subchapter H: Rio Grande, Rio Grande Estuary, and Lower Laguna Madre

General

Two thousand and forty individuals commented that the Rio Grande flow standards need improvement. As the rules note, the Rio Grande is already over-appropriated, so no new permits to withdraw water will be granted. Therefore, the standards should be set as a target, or goal, to work towards - the flows that the rivers and estuary need. One individual is concerned the Rio Grande is currently over-appropriated for water withdrawal. The standards of water flow for the Rio Grande should be the goal and adjustments to the rules must be made to meet the flow standard.

The commission responds that it considered the science team's recommendations, the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande in developing the adopted rules. All of the United States' share of the water in the main stem of the Rio Grande, and on tributaries to the Rio Grande within Texas, is committed to existing users. Therefore, water availability for new permits in the Rio Grande is extremely limited as noted in the Section by Section Discussion section of this preamble for §298.530, in the preamble. This rulemaking adopts environmental flow standards that will be used in water rights permitting for new appropriations of water. The commission believes that the adopted standards are sufficiently protective of the environment because they include a flow regime with subsistence, base, and pulse flows. The rules were not changed in response to these comments.

TPWD comments that it agrees with TCEQ's decision to use the science team recommendations as guidance, and overall, believes that the Rio Grande science teams met their charge and provided a suite of environmental flow regime recommendations adequate to support a sound ecological environment.

The commission acknowledges the comment. The rule was not changed in response to this comment.

NWF and Sierra Club comment that SB 3 contemplates adoption of flow standards whether or not there are stakeholder recommendations and that it is appropriate to propose and adopt flow standards.

The commission agrees and acknowledges the comment. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the Statutory Authority section of the proposed Subchapter H preamble refers to amendments to the rulemaking rather than to new sections.

The commission agrees and the preamble was changed in response to these comments.

§298.510, Findings

NWF and Sierra Club comment that the findings should be revised to acknowledge that implementation of voluntary strategies will be needed in many locations in the basin to achieve a sound ecological environment, even with the highly qualified definition of

sound ecological environment. There is not an adequate basis for a finding that a sound ecological environment will be protected, to the maximum extent reasonable, by the standards as currently proposed or that a sound ecological environment actually exists at all locations. NWF and Sierra Club comment that the science teams expressly found the absence of a sound ecological environment at a number of locations, including the Rio Grande in the Big Bend area (upstream of La Linda), the Arroyo Colorado, and the upper portions of the Pecos. Furthermore, neither the science team recommendations nor the standards address large portions of the basin so no finding about the adequacy of the standards to support a sound ecological environment is appropriate, or supportable, for those portions. The text should also acknowledge the incorporation of hydrologic condition into the flow standards. The finding is justified only if the flow standards are revised consistent with the changes recommended here. NWF and Sierra Club comment that §298.510 should be revised to state: "For the Rio Grande, and its associated tributaries located within Texas, the commission finds that the environmental flow standards in this subchapter, which acknowledge the need for implementation of voluntary strategies to help restore flows, are appropriate environmental flow standards that, based on currently available information, are adequate to support a sound ecological environment in the portions of the basin addressed by the flow standards to the maximum extent reasonable considering other public interests and other relevant factors. The commission finds that a sound ecological environment, at the locations where it currently exists, can best be

maintained by a set of flow standards consisting of a schedule of flow quantities that contain subsistence flow, base flows, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in subsistence or base flow conditions and whether a system is in subsistence, dry, average, or wet hydrologic condition, will vary from year to year and within a year from season to season, and the number of pulses will also vary with the amount of precipitation."

The commission agrees in part and §298.510 was modified to clarify that the finding applies to the locations specified in the adopted rule and to include a reference to hydrologic condition. The adopted rule does not include voluntary strategies or strategy targets. The commission has not received a stakeholder report with recommendations for environmental flow standards and strategies to meet the environmental flow standards; however, as discussed elsewhere in this preamble, the commission did receive recommendations from the science teams. SB 3 also added TWC, §11.02362(p), which recognized the importance of adaptive management and provided that after submitting its recommendations regarding environmental flow standards and strategies to meet the environmental flow standards to the commission, each stakeholder committee prepare and submit a work plan. The work plan is to establish, among other things, a

periodic review of the environmental flow standards and strategies. Should the stakeholders develop strategies in the future, the commission could consider those strategies in future rulemaking. Therefore, the commission did not include this acknowledgement in §298.510.

Under TWC, §11.1471, the commission is to adopt appropriate environmental flow standards "that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors." In the Rio Grande those relevant factors include the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande.

§298.525, Schedule of Flow Quantities

NWF and Sierra Club comment that §298.525(d)(1) should be modified to incorporate annual pulses and to add language to address pulses for the Rio Grande estuary, which are characterized by a 24-hour average flow, as follows: "One or two pulses per season and an annual pulse are to be passed (i.e., no storage or diversion by an applicable water right holder), if applicable, and as described in §298.530 of this title, if the flows are above the applicable subsistence or base flow standard, and if the applicable high flow

pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level and until either the applicable volume amount has passed the measurement point or the applicable duration time has passed since the high flow pulse trigger level occurred. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse. For high flow pulses that are characterized by a 24-hour average flow, a water right holder shall not divert or store water after flows initially reach, on an instantaneous basis, the level of the applicable 24-hour average flow until either 24 hours have passed since the flow level was reached or compliance with the applicable 24-hour average flow level has been assured."

The commission did not include annual pulses or pulses characterized by a 24-hour average flow in the adopted rule, as discussed in its responses to comments for §298.530. The rule was not changed in response to these comments.

NWF and Sierra Club comment that §298.525(d)(5) should be modified to account for two levels of pulse flows at some locations and to clarify how satisfaction of larger season pulses relates to satisfaction of smaller season pulse requirements, as follows:

"(d)(5) If a pulse flow requirement for an annual pulse is satisfied during a particular season, one of each of the applicable smaller pulse requirements is also considered to be satisfied in that season. Similarly, when there is more than one applicable level of seasonal pulse requirement, if a larger seasonal pulse requirement is satisfied during a season one of any smaller pulse requirement is also considered to be satisfied in that season."

As discussed in its Response to Comments section of this preamble for §298.530, the commission did not include additional levels of pulse flows or annual pulses. The rule was not changed in response to these comments.

§298.530, Environmental Flow Standards

TPWD comments that it supports the recommendations of the lower Rio Grande science team regarding freshwater inflow standards as well as the development of strategies to reduce inflows and associated nutrient loadings for the Lower Laguna Madre. TPWD comments that identifying and implementing strategies to meet environmental flow standards is an essential part of SB 3, and the science team's recommendations for the Laguna Madre and lower Rio Grande estuary and recommends that these strategies and recommendations be incorporated into the final environmental flow rules.

The commission has not received a stakeholder report with

recommendations for environmental flow standards and strategies to meet the environmental flow standards. However, SB 3 also added TWC, §11.02362(p), which recognized the importance of adaptive management and provided that after submitting its recommendations regarding environmental flow standards and strategies to meet the environmental flow standards to the commission, each stakeholder committee prepare and submit a work plan. The work plan is to establish, among other things, a periodic review of the environmental flow standards and strategies. Should the stakeholders develop strategies in the future, the commission could consider those strategies in future rulemaking. The rule was not changed in response to this comment.

TPWD comments that the Upper Rio Grande science team proposed nine additional locations for environmental flow standards which were not included in the proposed rule. TPWD comments that these streams are geographically, and sometimes hydrologically distinct from each other. TPWD comments that additional information would assist in understanding the basis for the deviation from the science team's recommendations for measurement points and high flow pulses.

The commission responds that it considered the science team's recommendations, the water accounting requirements of international

water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande in developing the adopted rule. All of the United States' share of the water in the main stem of the Rio Grande, and on tributaries to the Rio Grande within Texas, is committed to existing users. The adopted environmental flow standards apply to new appropriations and amendments issued after September 1, 2007. Based on water availability, there would be few, if any, new permits issued in the Rio Grande to which the standards would apply. Based on limited water availability and consideration of the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande as required by statute, the measurement points in the adopted rule are reasonably representative of the geographical extent of the basin.

As stated in the Section by Section Discussion for section of this preamble §298.530, there were also technical issues with many of the science team's pulse flow recommendations. In addition, as the Texas Environmental Flows SAC notes in its review of the Upper Rio Grande science team report "...few, if any, scientific investigations or monitoring efforts to date have

been designed to relate physical or biological processes to flow in the Upper Rio Grande." Regarding multiple levels of high flow pulses, the SAC also notes that the science team report did not demonstrate that all components of the flow regime, including multiple levels of high flow pulses, are necessary to protect a sound ecological environment. Based on water availability, technical issues, and a lack of sufficient scientific data tying multiple levels of high flow pulses to a sound ecological environment, the commission did not include additional measurement points or high flow pulses in its adopted rule.

NWF and Sierra Club comment that §298.530(a)(1) and should be modified to remove the 38% reduction, or a strategy flows target table should be added to the adopted rule because there are no significant competing considerations that would justify failing to establish a standard adequate to protect a sound ecological environment. These commenters state that because there is an almost complete lack of unappropriated water in the Rio Grande, flow standards will function as targets for voluntary strategies rather than limits on new appropriations. If the standards were actually going to be used in a regulatory setting, consideration of water accounting requirements and treaty obligations would be relevant factors as acknowledged in TWC, §11.02362(m), dealing with expert science team recommendations, and TWC, §11.02362 (o), dealing with stakeholder recommendations. However, because strategy targets will only inform

voluntary measures or strategies, it is important to have targets that, if met, would actually be expected to support a sound ecological environment. Voluntary measures may involve water belonging to the United States and/or water belonging to Mexico. Because the standards should establish appropriate strategy targets that, if met, would be likely to support a sound ecological environment they should reflect the expert science team recommendations. The strategy targets could be expressly designated as serving only for the purpose of guiding voluntary strategies. When adopting standards to be voluntarily implemented in a strategy context, there is no potential to run afoul of water accounting requirements for any international water sharing treaty, minutes, and agreement applicable to the Rio Grande. Nor will any United States or Texas water right holder be unfairly burdened.

The commission respectfully disagrees that the only time it must consider water accounting requirements and treaty obligations is if the standards would be used in a regulatory setting. Under TWC, §11.02362(m), the science team could not consider Mexico's water use. TWC, §11.02362(o), requires the stakeholders to consider the water accounting requirements of any international water sharing treaty, minutes, and agreement applicable to the Rio Grande and effects on water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande when adopting standards. In addition, the science team could not make an environmental

flow regime recommendation that violates a treaty or court decision. These sections would apply regardless of whether the standards were regulatory or functioned as strategy targets.

In previous a rulemaking the commission did include strategy targets in the adopted rule. However, these targets were used to provide a benchmark for future permits and amendments as well as for voluntary permitted strategies. Because of water availability, it is unlikely that new permits would be granted in this basin.

Regarding use of the science team's recommendations, these recommendations were modified based on water availability, technical issues, a lack of sufficient scientific data tying multiple levels of high flow pulses to a sound ecological environment, and the requirements of TWC, §11.02362. The commission has not received a stakeholder report with recommendations for environmental flow standards and strategies to meet the environmental flow standards. However, SB 3 also added TWC, §11.02362(p), which recognized the importance of adaptive management. Should the stakeholder committee develop recommendations for strategies to meet the standards in the future, the commission could consider those strategies in future rulemaking. The rule was not changed in response to

these comments.

NWF and Sierra Club comment that the winter subsistence flow value in §298.530(a)(1) should be 40 cfs based on information in the science team report.

The commission agrees and the rule was modified in response to this comment. However, the 40 cfs value for winter subsistence flow in §298.530(a)(1) was adjusted by 38%, consistent with the adjustment to other flow values in this reach.

NWF and Sierra Club comment that §298.530(a)(2) should be modified to include an annual pulse as recommended by the science team with the typographical correction to the volume proposed by these commenters.

The commission responds that the Texas Environmental Flows SAC noted in its review of the Upper Rio Grande science team report "... few, if any, scientific investigations or monitoring efforts to date have been designed to relate physical or biological processes to flow in the Upper Rio Grande." Regarding multiple levels of high flow pulses, the SAC also notes that the science team report did not demonstrate that all components of the flow regime, including multiple levels of high flow pulses, are necessary to

protect a sound ecological environment. Based on water availability, technical issues, and a lack of sufficient scientific data tying multiple levels of high flow pulses to a sound ecological environment, the commission did not include additional measurement points or high flow pulses in its adopted rule.

NWF and Sierra Club comment that the adopted rule should include a measurement point and environmental flow standards for the Rio Grande below Rio Conchos near Presidio that would include a subsistence flow, base flow, and annual pulse. These commenters state that their proposed standard at this location should be adopted for all purposes, or, at a minimum, for the purpose of guiding implementation of voluntary strategies.

The commission responds that it considered the science team's recommendations, the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande in developing the adopted rule. All of the United States' share of the water in the main stem of the Rio Grande is committed to existing users. The adopted environmental flow standards apply to new appropriations and amendments issued after September 1,

2007. Based on water availability, there would be few, if any, new permits issued in the Rio Grande to which the standards would apply. The commission has not received a stakeholder report with recommendations for environmental flow standards and strategies to meet the environmental flow standards. However, SB 3 also added TWC, §11.02362(p), which recognized the importance of adaptive management. Should the stakeholder committee develop recommendations for strategies to meet the standards in the future, the commission could consider those strategies in future rulemaking. The rule was not changed in response to these comments.

NWF and Sierra Club comment that the proposed standards for the Pecos River near Girvin should be modified to include the science team's 1 per 2 season pulse value for the winter seasonal pulse and adding an annual pulse, consistent with the science team's report as modified by the errata sheet.

The commission modified the Figure in §298.530(3) to reflect the values in the errata sheet for the 1 per 2 season pulse. Regarding multiple levels of high flow pulses, the SAC noted that the science team report did not demonstrate that all components of the flow regime, including multiple levels of high flow pulses, are necessary to protect a sound ecological

environment. Based on water availability, technical issues with the science team recommendations, and a lack of sufficient scientific data tying multiple levels of high flow pulses to a sound ecological environment, the commission did not include additional high flow pulses in its adopted rule.

NWF and Sierra Club comment that the adopted rules should include a measurement point and environmental flows standards for the Pecos River near Langtry which would include a subsistence flow, base flow, 2 per season pulse, 1 per season pulse, and an annual pulse. The science team found that a sound ecological environment existed in this area and the river exhibits changed characteristics between Girvin and Langtry. These commenters also request that the adopted rules include a measurement point and environmental flows standards for Independence Creek near Sheffield, which would include a subsistence flow, base flow, and a 1 per season pulse. Independence Creek is a key ecological stream system that merits strong recognition of the key role its springflow-based flow contributions play in helping to sustain a sound ecological environment in the Lower Pecos River.

The commission responds that it considered the science team's recommendations, the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the

Middle and Lower Rio Grande in developing the adopted rule. All of the United States' share of the water in the main stem of the Rio Grande, and on tributaries to the Rio Grande within Texas, is committed to existing users. The adopted environmental flow standards apply to new appropriations and amendments issued after September 1, 2007. Based on water availability, there would be few, if any, new permits issued on the Pecos River or Independence Creek to which the standards would apply. SB 3 also added TWC, §11.02362(p), which recognized the importance of adaptive management and provided that after submitting its recommendations regarding environmental flow standards and strategies to meet the environmental flow standards to the commission, each stakeholder committee prepare and submit a work plan. The work plan is to establish a periodic review of the basin and bay environmental flow analyses and environmental flow regime recommendations, environmental flow standards, and strategies, prescribe specific monitoring, studies, and activities; and, establish a schedule for continuing the validation or refinement of the basin and bay environmental flow analyses and environmental flow regime recommendations, the environmental flow standards adopted by the commission, and the strategies to achieve those standards. The commission acknowledges that further analyses and studies may need to be performed in the future to determine whether the adopted

standards, once implemented, are protective. SB 3 contemplates that data and new studies can be considered through adaptive management via the work plan. To the extent that additional information becomes available through monitoring and studies undertaken under the work plan, the science team and stakeholders could consider that information in future deliberations. The rule was not changed in response to these comments.

NWF and Sierra Club comment that a flow regime is needed for the estuarine, or tidal, portion of the Rio Grande. As reflected in the expert science team report, such a flow regime is designed to help maintain reasonable salinity conditions in the tidal segment and to maintain an opening between the Gulf of Mexico and the Rio Grande. Maintaining an open connection between the Rio Grande and the Gulf of Mexico is essential for allowing organisms to move between the estuary and the Gulf of Mexico. In recent times, low flow levels caused by a combination of drought and high levels of diversions resulted in the mouth of the Rio Grande silting up for an extended period of time. Certainly the recommended flow regime, even if fully implemented through voluntary strategies, would not restore natural hydrology to this highly modified system, a point the expert science team acknowledged. However, it would give the ecosystem a fighting chance of maintaining some reasonable level of productivity. NWF and Sierra Club also recommend that the flow standard be adopted for all purposes, but, at a minimum, as a target for voluntary strategies that acknowledges the importance of

maintaining a functional estuary. These commenters propose that the adopted standards include the following: "The flow regime for the Rio Grande Tidal segment, as measured at the Brownsville gage and maintained down to the confluence with the Gulf of Mexico, consists of a subsistence flow of 60 cfs to be met at all times regardless of hydrological condition; a bi-monthly seasonal pulse flow, to be met once every 60 days, characterized by a 24-hour average flow of at least 175 cfs; and an annual pulse flow characterized by a 24-hour average flow of at least 880 cfs."

The commission responds that the United States' share of river water is administered by the Rio Grande Watermaster and is based in storage in the Amistad/Falcon reservoir system. In addition, as recognized by the science team, all of the United States' share of the water in the main stem of the Rio Grande is committed to existing users. Any water that is released from storage and not diverted by existing users would flow to the estuary. Additional water may also be available to the estuary as a result of very large rainfall events that occur below the reservoirs and is in excess of the amount of water needed by existing users under the treaty. After considering the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande, the commission did not include freshwater inflow

standards for the Rio Grande estuary in the adopted rule. The rule was not changed in response to these comments.

SUBCHAPTER F: NUECES RIVER AND CORPUS CHRISTI AND BAFFIN BAYS

§§298.400, 298.405, 298.410, 298.425, 298.430, 298.435, 298.440

Statutory Authority

The new sections are adopted under Texas Water Code (TWC), §5.102, concerning General Powers; TWC, §5.103, concerning Rules; and TWC, §5.105 concerning General Policy, which authorize the commission to adopt rules as necessary to carry out its power and duties under the TWC. The new sections are also adopted under TWC, §11.0235, concerning Policy Regarding Waters of the State; TWC, §11.147, concerning Effects of Permit on Bays and Estuaries and Instream Uses; and TWC, §11.1471, concerning Environmental Flow Standards and Set-Asides.

The adopted new sections implement TWC, §§11.0235, 11.147, and 11.1471.

§298.400. Applicability and Purpose.

This subchapter contains the environmental flow standards for the Nueces River, its associated tributaries, the Nueces-Rio Grande Coastal Basin, and Corpus Christi and Baffin Bays. This subchapter does not affect an appropriation of or an authorization to store, take, or divert water under a permit or amendment to a water right issued before

September 1, 2007. The provisions of this subchapter will prevail over any provisions of Subchapter A of this chapter (relating to General Provisions) that are inconsistent with this subchapter relating to environmental flow standards and regulation in the Nueces River, its associated tributaries, the Nueces-Rio Grande Coastal Basin, and Corpus Christi and Baffin Bays.

§298.405. Definitions.

The following words or phrases have the following meanings in this subchapter unless the context clearly indicates otherwise:

(1) Fall--for the measurement points listed in §298.430(c)(3) - (5), (9), and (12) - (19) of this title (relating to Environmental Flow Standards), the period of time September through October, inclusive and for all other measurement points, the period of time October through November, inclusive.

(2) Inflow regime--a freshwater inflow pattern, at the most downstream point on the Nueces River where the river enters the Nueces Bay and Delta, that includes quantities and frequencies that vary throughout the year.

(3) Modeled permitting frequency--the frequencies at which specific

volumes of freshwater inflows occur in the commission's water availability models for the Nueces river basin at the time the first water right application subject to this subchapter is processed.

(4) Nueces Bay--a secondary bay of Corpus Christi Bay.

(5) Nueces Delta-- a complex array of channels, pools, marshes, and tidal flats in the upper end of Nueces Bay that lies generally to the north of the Nueces River and includes area receiving inflows from the Rincon Bayou and overflow channels from the river ~~an area of vegetated marshes, mud flats, and open water formed where the Nueces River flows into Nueces Bay.~~

(6) Spring--the period of time April through June, inclusive.

(7) Sound ecological environment--maintains, to some reasonable level, the physical, chemical, and biological attributes and processes of the natural system.

(8) Summer-- for the measurement points listed in §298.430(c)(3) - (5), (9), and (12) - (19) of this title (relating to Environmental Flow Standards), the period of time July through August, inclusive and for all other measurement points, the period of time July through September, inclusive.

(9) Target frequency--the frequency at which specific target volumes of freshwater inflows occur, and which are used for the sole purpose of providing additional freshwater inflows to Nueces Bay and Nueces Delta through voluntary strategies.

(10) Target Volume--volumes of freshwater inflows specified in §298.430(a)(3) of this title (relating to Environmental Flow Standards which are used for water rights permitting and to establish targets for the ~~sole~~ purpose of providing additional freshwater inflows to Nueces Bay and Delta through voluntary strategies.

(11) Winter--for the measurement points listed in §298.430(c)(3) - (5), (9), and (12) - (19) of this title (relating to Environmental Flow Standards), the period of time November through March, inclusive and for all other measurement points, the period of time December through March, inclusive.

§298.410. Findings.

(a) The Nueces River and its associated tributaries, tributaries in the Nueces Rio Grande Coastal Basin, and Corpus Christi and Baffin Bays are substantially sound ecological environments.

(b) For the Nueces River and its associated tributaries, and tributaries in the Nueces-Rio Grande Coastal Basin, the commission finds that these sound ecological environments can best be maintained by a set of flow standards that implement a schedule of flow quantities that contain subsistence flow, base flow, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in subsistence or base flow conditions, will vary from year to year and within a year from season to season, and the number of pulses protected will also vary with the amount of precipitation.

(c) For Nueces Bay and Nueces Delta, the commission finds that the freshwater inflow standards in this subchapter are appropriate environmental flow standards that are adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors. The existing ecological condition of Nueces Bay and Nueces Delta may be improved, but will not be diminished, by the freshwater inflow standards in this subchapter.

§298.415. Set-Asides and Standards Priority Date.

The priority date for the environmental flow standards and set-asides established

by this subchapter is October 28, 2011. The priority date for the environmental flow standards will be used in the water availability determination for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted and has no other purpose.

§298.425. Schedule of Flow Quantities.

(a) Schedule of flow quantities. The environmental flow standards proposed in this subchapter constitute a schedule of flow quantities made up of subsistence flow, base flow, and high flow pulses. Environmental flow standards are established for 19 measurement points in §298.430 of this title (relating to Environmental Flow Standards) and this section.

(b) Subsistence flow. The applicable subsistence flow standard varies depending on the seasons as described in §298.405 of this title (relating to Definitions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder may not store or divert water, unless the flow at the measurement point is above the applicable subsistence flow standard for that point. If the flow at the applicable measurement point is above the subsistence flow standard but below the base flow standard, then the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass its measurement

point and any remaining flow may be diverted or stored, according to its permit, subject to senior and superior water rights, as long as the flow at the measurement point does not fall below the applicable subsistence flow standard.

(c) Base flow. The applicable base flow level varies depending on the seasons as described in §298.405 of this title. For a water right holder, to which an environmental flow standard applies, at a measurement point that applies to a water right, the water right holder is subject to a base flow standard. For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, when the flow at the applicable measurement point is above the applicable base flow standard, but below any applicable high flow pulse trigger levels, the water right holder may store or divert water according to its permit, subject to senior and superior water rights, as long as the flow at the applicable measurement point does not fall below the applicable base flow standard.

(d) High flow pulses. High flow pulses are relatively short-duration, high flows within the watercourse that occur during or immediately following a storm event.

(1) Two or three pulses per season are to be passed (i.e., no storage or diversion by an applicable water right holder), if applicable, and as described in §298.430 of this title, if the flows are above the applicable subsistence or base flow

standard, and if the applicable high flow pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level and until either the applicable volume amount has passed the measurement point or the applicable duration time has passed since the high flow pulse trigger level occurred. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse.

(2) If the applicable high flow pulse flow trigger level does not occur in a season, then the water right holder need not stop storing or diverting water to produce a high flow pulse. The water right holder is not required to release water lawfully stored to produce a high flow pulse.

(3) Each season is independent of the preceding and subsequent seasons with respect to high flow pulse frequency.

(4) High flow pulses are applicable under both subsistence and base flow conditions.

(5) If a pulse flow requirement for a medium or large seasonal pulse or an

annual pulse is satisfied for a particular season or year, one of each of the applicable smaller pulse requirements is also considered to be satisfied.

(e) Stored water. A water right owner that has stored water in accordance with the terms and conditions of its water right, including any applicable environmental flow requirement in effect at the time the water was stored, may divert, release, or use this water, even if the applicable environmental flow requirement is not met at the time of the subsequent diversion, release, or use of that stored water.

§298.430. Environmental Flow Standards.

(a) A water right application in the Nueces River Basin, which increases the amount of water authorized to be stored, taken, or diverted as described in §298.10 of this title (relating to Applicability), shall not cause or contribute to an impairment of the inflow regimes as described in the figure in this subsection. Impairment of the inflow regime shall be evaluated as part of the water availability determination for a new water right or amendment that is subject to this subchapter. For purposes of this subsection, impairment would occur if the application, when considered in combination with any authorizations subject to this subchapter, which were issued prior to this application, would impair the modeled permitting frequency of any inflow regime by more than the values set out in paragraph (3)(A) - (C) of this subsection.

(1) Impairment to the modeled permitting frequency shall be calculated individually for each inflow regime level in the figure located in paragraph (3) of this subsection for which a specific frequency is identified, at the point in the water availability model which represents inflows to Nueces Bay and Nueces Delta.

(2) Impairment is calculated by subtraction of the values set out in paragraph (3)(A) - (C) of this subsection.

(3) Bay and Estuary Freshwater Inflow Standards for Nueces Bay and Nueces Delta.

Figure: 30 TAC §298.430(a)(3)

Bay and Estuary Freshwater Inflow Standards for Nueces Bay and Delta

Inflow Regime	**Target Volume November - February (Target Frequency)**	**Target Volume March - June (Target Frequency)**	**Target Volume July - October (Target Frequency)**	**Target Volume Annual Inflow Target (Target Frequency)**
Level 1	125,000 af (11%)	250,000 af (11%)	375,000 af (12%)	750,000 af (16%)
Level 2	22,000 af (23%)	88,000 af (30%)	56,000 af (40%)	166,000 af (47%)
Level 3	5,000 af (69%)	10,000 af (88%)	15,000 af (74%)	30,000 af (95%)

af = acre-feet

(A) The modeled permitting frequencies for the target volumes for Level 1, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased by more than 50%.

(B) The modeled permitting frequencies for the target volumes for Level 2, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased by more than 25%.

(C) The modeled permitting frequencies for the target volumes for Level 3, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased by more than 10%.

(D) Each season and year is independent of the preceding and subsequent seasons and years with respect to the calculation of the Target Volume, as described in the figure located in paragraph (3) of this subsection.

(b) To the extent that strategies are implemented through a water rights permit

or amendment to help meet the freshwater inflow standards for Nueces Bay and Delta, a water right application in the Nueces River Basin, which increases the amount of water authorized to be stored, taken or diverted as described in §298.10 of this title, shall not reduce the modeled permitting frequency for any inflow regime level, listed in the figure located in subsection (a)(3) of this section, below the level that would occur with the permitted strategy or strategies in place.

(c) The following environmental flow standards are established for the following described measurement points:

(1) Nueces River at Laguna, Texas, generally described as United States Geological Survey (USGS) gage 08190000, and more particularly described as Latitude 29 degrees, 25 minutes, 42 seconds; Longitude 99 degrees, 59 minutes, 49 seconds.

Figure: 30 TAC §298.430(c)(1)

United States Geological Survey Gage 08190000, Nueces River at Laguna

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	14 cfs	18 cfs	16 cfs	14 cfs
Base Flow	65 cfs	65 cfs	48 cfs	65 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 99 cfs Volume: 1,560 af Duration: 9 days	N/A	N/A
Large Seasonal Pulse (1 per season)	N/A	Trigger: 390 cfs Volume: 6,070 af Duration: 17 days	Trigger: 170 cfs Volume: 3,100 af Duration: 14 days	N/A

Annual Pulse (2 per year)	Trigger: 590 cfs Volume: 11,300 af Duration: 26 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(2) West Nueces River near Bracketville, Texas, generally described as USGS gage 08190500, and more particularly described as Latitude 29 degrees, 28 minutes, 51.9 seconds; Longitude 100 degrees, 14 minutes, 21 seconds.

Figure: 30 TAC §298.430(c)(2)

United States Geological Survey Gage 08190500, West Nueces River near Bracketville

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	1 cfs	1 cfs	1 cfs	1 cfs
Large Seasonal Pulse (1 per season)	N/A	Trigger: 5 cfs Volume: 76 af Duration: 10 days	Trigger: 5 cfs Volume: 84 af Duration: 13 days	N/A
Annual Pulse (2 per year)	Trigger: 25 cfs Volume: 360 af Duration: 16 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(3) Nueces River below Uvalde, Texas, generally described as USGS gage 08192000, and more particularly described as Latitude 29 degrees, 7 minutes, 25 seconds; Longitude 99 degrees, 53 minutes, 40 seconds.

Figure: 30 TAC §298.430(c)(3)

United States Geological Survey Gage 08192000, Nueces River below Uvalde

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	21 cfs	21 cfs	17 cfs	19 cfs
Large Seasonal Pulse (1 per season)	N/A	Trigger: 110 cfs Volume: 1,280 af Duration: 11 days	N/A	Trigger: 50 cfs Volume: 690 af Duration: 11 days
Annual Pulse (2 per year)	Trigger: 510 cfs Volume: 8,240 af Duration: 26 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(4) Nueces River at Cotulla, Texas, generally described as USGS gage 08194000, and more particularly described as Latitude 28 degrees, 25 minutes, 34 seconds; Longitude 99 degrees, 14 minutes, 23 seconds.

Figure: 30 TAC §298.430(c)(4)

United States Geological Survey Gage 08194000, Nueces River at Cotulla

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	6 cfs	10 cfs	7 cfs	15 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 190 cfs Volume: 2,370 af Duration: 17 days	N/A	Trigger: 35 cfs Volume: 360 af Duration: 14 days

Large Seasonal Pulse (1 per season)	Trigger: 96 cfs Volume: 1,570 af Duration: 20 days	N/A	Trigger: 100 cfs Volume: 1,030 af Duration: 16 days	N/A

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(5) Nueces River near Tilden, Texas generally described as USGS gage 08194500, and more particularly described as Latitude 28 degrees, 18 minutes, 31 seconds; Longitude 98 degrees, 33 minutes, 25 seconds.

Figure: 30 TAC §298.430(c)(5)

United States Geological Survey Gage 08194500, Nueces River near Tilden

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	1 cfs	3 cfs	1 cfs	12 cfs
Small Seasonal Pulse (3 per season)	N/A	Trigger: 89 cfs Volume: 930 af Duration: 14 days	N/A	Trigger: 29 cfs Volume: 250 af Duration: 10 days
Medium Seasonal Pulse (2 Per season)	Trigger: 87 cfs Volume: 1,260 af Duration: 18 days	Trigger: 280 cfs Volume: 3,360 af Duration: 18 days	Trigger: 11 cfs Volume: 96 af Duration: 10 days	Trigger: 220 cfs Volume: 2,390 af Duration: 16 days
Large Seasonal Pulse (1 per season)	Trigger: 300 cfs Volume: 4,610 af Duration: 22 days	Trigger: 880 cfs Volume: 12,200 af Duration: 22 days	Trigger: 320 cfs Volume: 4,390 af Duration: 21 days	Trigger: 840 cfs Volume: 10,900 af Duration: 23 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(6) Frio River at Concan, Texas, generally described as USGS gage 08195000, and more particularly described as Latitude 29 degrees, 29 minutes, 18 seconds; Longitude 99 degrees, 42 minutes, 16 seconds.

Figure: 30 TAC §298.430(c)(6)

United States Geological Survey Gage 08195000, Frio River at Concan

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	11 cfs	10 cfs	10 cfs	10 cfs
Base Flow	61 cfs	61 cfs	47 cfs	55 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 120 cfs Volume: 1,320 af Duration: 8 days	N/A	N/A
Large Seasonal Pulse (1 per season)	Trigger: 89 cfs Volume: 2,100 af Duration: 12 days	Trigger: 300 cfs Volume: 3,550 af Duration: 12 days	Trigger: 240 cfs Volume: 2,990 af Duration: 13 days	Trigger: 79 cfs Volume: 900 af Duration: 5 days
Annual Pulse (2 per year)	Trigger: 540 cfs Volume: 9,430 af Duration: 24 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(7) Dry Frio River near Reagan Wells, Texas, generally described as USGS gage 08196000, and more particularly described as Latitude 29 degrees, 30 minutes, 16 seconds; Longitude 99 degrees, 46 minutes, 52 seconds.

Figure: 30 TAC §298.430(c)(7)

United States Geological Survey Gage 08196000, Dry Frio River near Reagan Wells

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	12 cfs	9 cfs	8 cfs	12 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 30 cfs Volume: 370 af Duration: 9 days	N/A	N/A
Large Seasonal Pulse (1 per season)	Trigger: 32 cfs Volume: 650 af Duration: 13 days	Trigger: 120 cfs Volume: 1,470 af Duration: 16 days	Trigger: 81 cfs Volume: 1,100 af Duration: 15 days	Trigger: 35 cfs Volume: 620 af Duration: 13 days
Annual Pulse (2 per year)	Trigger: 210 cfs Volume: 3,500 af Duration: 26 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(8) Sabinal River near Sabinal, Texas, generally described as USGS gage 08198000, and more particularly described as Latitude 29 degrees, 29 minutes, 27 seconds; Longitude 99 degrees, 29 minutes, 33 seconds.

Figure: 30 TAC §298.430(c)(8)

United States Geological Survey Gage 08198000, Sabinal River near Sabinal

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	21 cfs	21 cfs	13 cfs	21 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 64 cfs Volume: 750 af Duration: 10 days	N/A	N/A

Large Seasonal Pulse (1 per season)	Trigger: 62 cfs Volume: 1,530 af Duration: 17 days	Trigger: 180 cfs Volume: 2,210 af Duration: 15 days	Trigger: 100 cfs Volume: 1,180 af Duration: 12 days	Trigger: 53 cfs Volume: 840 af Duration: 12 days
Annual Pulse (2 per year)	Trigger: 330 cfs Volume: 5,420 af Duration: 24 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(9) Sabinal River at Sabinal, Texas, generally described as USGS gage 08198500, and more particularly described as Latitude 29 degrees, 18 minutes, 51.5 seconds; Longitude 99 degrees, 28 minutes, 49.7 seconds.

Figure: 30 TAC §298.430(c)(9)

United States Geological Survey Gage 08198500, Sabinal River at Sabinal

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	1 cfs	1 cfs	2 cfs
Large Seasonal Pulse (1 Per season)	Trigger: 21cfs Volume: 310 af Duration: 11 days	Trigger: 56 cfs Volume: 430 af Duration: 9 days	N/A	Trigger: 20 cfs Volume: 150 af Duration: 6 days
Annual Pulse (2 per year)	Trigger: 230 cfs Volume: 2,680 af Duration: 17 days			
Annual Pulse (1 per year)	Trigger: 1,070 cfs Volume: 6,690 af Duration: 29 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(10) Hondo Creek near Tarpley, Texas, generally described as USGS gage

08200000, and more particularly described as Latitude 29 degrees, 34 minutes, 12.11 seconds; Longitude 99 degrees, 14 minutes, 51.68 seconds.

Figure: 30 TAC §298.430(c)(10)

United States Geological Survey Gage 08200000, Hondo Creek near Tarpley

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	6 cfs	5 cfs	9 cfs	8 cfs
Small Seasonal Pulse (2 per season)	Trigger: 16 cfs Volume: 200 af Duration: 8 days	Trigger: 91 cfs Volume: 950 af Duration: 12 days	Trigger: 24 cfs Volume: 220 af Duration: 7 days	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 61 cfs Volume: 1,020 af Duration: 15 days	Trigger: 290 cfs Volume: 3,360 af Duration: 18 days	Trigger: 90 cfs Volume: 890 af Duration: 12 days	Trigger: 50 cfs Volume: 580 af Duration: 11 days
Annual Pulse (2 per year)	Trigger: 330 cfs Volume: 4,530 af Duration: 22 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(11) Seco Creek at Miller Ranch near Utopia, Texas, generally described as USGS gage 08201500, and more particularly described as Latitude 29 degrees, 34 minutes, 23 seconds; Longitude 99 degrees, 24 minutes, 10 seconds.

Figure: 30 TAC §298.430(c)(11)

United States Geological Survey Gage 08201500, Seco Creek at Miller Ranch near Utopia

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	4 cfs	3 cfs	3 cfs	4 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 33 cfs Volume: 360 af Duration: 12 days	N/A	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 21 cfs Volume: 290 af Duration: 12 days	Trigger: 91 cfs Volume: 1,140 af Duration: 17 days	Trigger: 38 cfs Volume: 360 af Duration: 11 days	Trigger: 23 cfs Volume: 270 af Duration: 11 days
Annual Pulse (2 per year)	Trigger: 120 cfs Volume: 1,710 af Duration: 21 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(12) Frio River near Derby, Texas, generally described as USGS gage 08205500, and more particularly described as Latitude 28 degrees, 44 minutes, 11 seconds; Longitude 99 degrees, 08 minutes, 40 seconds.

Figure: 30 TAC §298.430(c)(12)

United States Geological Survey Gage 08205500, Frio River near Derby

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	17 cfs	11 cfs	7 cfs	12 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 210 cfs Volume: 1,810 af Duration: 14 days	N/A	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 87 cfs Volume: 1,450 af Duration: 20 days	Trigger: 900 cfs Volume: 7,940 af Duration: 17 days	Trigger: 58 cfs Volume: 510 af Duration: 13 days	Trigger: 350 cfs Volume: 4,340 af Duration: 24 days

Annual Pulse (2 per year)	Trigger: 1,670 cfs Volume: 18,800 af Duration: 25 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(13) Frio River at Tilden, Texas, generally described as USGS gage 08206600, and more particularly described as Latitude 28 degrees, 28 minutes, 02 seconds; Longitude 98 degrees, 32 minutes, 50 seconds.

Figure: 30 TAC §298.430(c)(13)

United States Geological Survey Gage 08206600, Frio River at Tilden

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	12 cfs	7 cfs	2 cfs	3 cfs
Small Seasonal Pulse (2 per season)	Trigger: 86 cfs Volume: 1,070 af Duration: 13 days	Trigger: 460 cfs Volume: 4,470 af Duration: 14 days	Trigger: 36 cfs Volume: 280 af Duration: 9 days	Trigger: 120 cfs Volume: 1,080 af Duration: 12 days
Large Seasonal Pulse (1 per season)	Trigger: 390 cfs Volume: 5,320 af Duration: 20 days	N/A	Trigger: 270 cfs Volume: 2,440 af Duration: 14 days	Trigger: 960 cfs Volume: 10,400 af Duration: 20 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(14) San Miguel Creek near Tilden, Texas, generally described as USGS gage 08206700, and more particularly described as Latitude 28 degrees, 35 minutes, 14 seconds; Longitude 98 degrees, 32 minutes, 44 seconds.

Figure: 30 TAC §298.430(c)(14)

United States Geological Survey Gage 08206700, San Miguel Creek near Tilden

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	2 cfs	1 cfs	2 cfs
Small Seasonal Pulse (2 per season)	Trigger: 45 cfs Volume: 470 af Duration: 16 days	Trigger: 220 cfs Volume: 1,560 af Duration: 14 days	Trigger: 16 cfs Volume: 110 af Duration: 10 days	Trigger: 44 cfs Volume: 310 af Duration: 12 days
Large Seasonal Pulse (1 per season)	Trigger: 160 cfs Volume: 1,580 af Duration: 19 days	Trigger: 690 cfs Volume: 4,940 af Duration: 16 days	Trigger: 160 cfs Volume: 1,040 af Duration: 13 days	Trigger: 300 cfs Volume: 2,010 af Duration: 15 days
Annual Pulse (2 per year)	Trigger: 990 cfs Volume: 7,310 af Duration: 18 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(15) Atascosa River at Whitsett, Texas, generally described as USGS gage 08208000, and more particularly described as Latitude 28 degrees, 37 minutes, 19 seconds; Longitude 98 degrees, 16 minutes, 52 seconds.

Figure: 30 TAC §298.430(c)(15)

United States Geological Survey Gage 08208000, Atascosa River at Whitsett

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	9 cfs	5 cfs	4 cfs	4 cfs
Small Seasonal Pulse (2 per season)	Trigger: 230 cfs Volume: 1,960 af Duration: 14 days	Trigger: 600 cfs Volume: 4,280 af Duration: 13 days	Trigger: 37 cfs Volume: 280 af Duration: 7 days	Trigger: 100 cfs Volume: 720 af Duration: 9 days

Large Seasonal Pulse (1 per season)	Trigger: 730 cfs Volume: 5,720 af Duration: 18 days	Trigger: 1,770 cfs Volume: 12,500 af Duration: 16 days	Trigger: 250 cfs Volume: 1,960 af Duration: 12 days	Trigger: 620 cfs Volume: 4,320 af Duration: 14 days
Annual Pulse (2 per year)	Trigger: 1,990 cfs Volume: 14,800 af Duration: 19 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(16) Nueces River near Three Rivers, Texas, generally described as USGS gage 08210000, and more particularly described as Latitude 28 degrees, 25 minutes, 38 seconds; Longitude 98 degrees, 10 minutes, 40 seconds.

Figure: 30 TAC §298.430(c)(16)

United States Geological Survey Gage 08210000, Nueces River near Three Rivers

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	37 cfs	37 cfs	30 cfs	37 cfs
Small Seasonal Pulse (2 per season)	Trigger: 720 cfs Volume: 8,460 af Duration: 13 days	Trigger: 1,660 cfs Volume: 22,200 af Duration: 16 days	Trigger: 280 cfs Volume: 2,520 af Duration: 9 days	Trigger: 710 cfs Volume: 7,920 af Duration: 13 days
Large Seasonal Pulse (1 per season)	Trigger: 2,050 cfs Volume: 26,800 af Duration: 18 days	Trigger: 4,090 cfs Volume: 64,600 af Duration: 22 days	Trigger: 1,100 cfs Volume: 13,600 af Duration: 15 days	Trigger: 2,420 cfs Volume: 34,200 af Duration: 19 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(17) Nueces River near Mathis, Texas, generally described as USGS gage 08211000, and more particularly described as Latitude 28 degrees, 02 minutes, 17 seconds; Longitude 97 degrees, 51 minutes, 36 seconds.

Figure: 30 TAC §298.430(c)(17)

United States Geological Survey Gage 08211000, Nueces River near Mathis

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	37 cfs	37 cfs	37 cfs	37 cfs
Base Flow	96 cfs	120 cfs	140 cfs	110 cfs
Small Seasonal Pulse (2 per season)	Trigger: 590 cfs Volume: 6,270 af Duration: 9 days	Trigger: 420 cfs Volume: 5,090 af Duration: 9 days	N/A	Trigger: 240 cfs Volume: 2,670 af Duration: 7 days
Large Seasonal Pulse (1 per season)	Trigger: 1,120 cfs Volume: 14,200 af Duration: 12 days	Trigger: 2,540 cfs Volume: 49,400 af Duration: 19 days	Trigger: 370 cfs Volume: 4,970 af Duration: 10 days	Trigger: 1,550 cfs Volume: 24,700 af Duration: 15 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(18) Oso Creek at Corpus Christi, Texas, generally described as USGS gage 08211520, and more particularly described as Latitude 28 degrees, 42 minutes, 40 seconds; Longitude 97 degrees, 30 minutes, 06 seconds.

Figure: 30 TAC §298.430(c)(18)

United States Geological Survey Gage 08211520, Oso Creek at Corpus Christi

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	2 cfs	2 cfs	2 cfs
Small Seasonal Pulse (2 per season)	Trigger: 59 cfs Volume: 450 af Duration: 13 days	Trigger: 48 cfs Volume: 330 af Duration: 9 days	N/A	Trigger: 64 cfs Volume: 450 af Duration: 11 days

Large Seasonal Pulse (1 Per season)	N/A	N/A	Trigger: 21 cfs Volume: 160 af Duration: 8 days	N/A

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(19) San Fernando Creek at Alice, Texas, generally described as USGS gage 08211900, and more particularly described as Latitude 27 degrees, 46 minutes, 20 seconds; Longitude 98 degrees, 02 minutes, 00 seconds.

Figure: 30 TAC §298.430(c)(19)

United States Geological Survey Gage 08211900, San Fernando Creek at Alice

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	2 cfs	1 cfs	1 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 14 cfs Volume: 100 af Duration: 7 days	N/A	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 14 cfs Volume: 170 af Duration: 12 days	Trigger: 65 cfs Volume: 470 af Duration: 11 days	Trigger: 17 cfs Volume: 140 af Duration: 9 days	Trigger: 28 cfs Volume: 240 af Duration: 10 days
Annual Pulse (2 per year)	Trigger: 170 cfs Volume: 1,490 af Duration: 17 days			

cfs = cubic feet per second
af = acre-fee
N/A = not applicable

§298.435. Water Right Permit Conditions.

(a) For water right permits with an authorization to store or divert water in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter.

(b) For water right permits with an authorization to divert water in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin at a rate less than 20% of the pulse trigger level requirements of an applicable high flow pulse at a measurement point, as described in §298.430(c) of this title (relating to Environmental Flow Standards), and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter; however, no special conditions are necessary to preserve or pass that applicable high flow pulse.

§298.440. Schedule for Revision of Standards.

The environmental flow standards or environmental flow set-asides adopted in this subchapter for the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, their associated tributaries, Corpus Christi and Baffin Bays may be revised by the commission through the rulemaking process. The final revised rules shall be effective no sooner than ten years from the effective date of this rule, unless the Nueces River and Corpus Christi and Baffin Bay Area Stakeholder Committee submits a work plan approved by the advisory group under Texas Water Code, §11.02362(p), that provides for a periodic review to occur more frequently. The rulemaking process shall include participation by a balanced representation of stakeholders having interests in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, their associated tributaries, Corpus Christi and Baffin Bays.

SUBCHAPTER G: BRAZOS RIVER AND ITS ASSOCIATED BAY AND ESTUARY SYSTEM

§§298.450, 298.455, 298.460, 298.465, 298.470, 298.475, 298.480, 298.485, 298.490

Statutory Authority

The new sections are adopted under Texas Water Code (TWC), §5.102, concerning General Powers; TWC, §5.103, concerning Rules; and TWC, §5.105 concerning General Policy, which authorize the commission to adopt rules as necessary to carry out its power and duties under the TWC. The new sections are also adopted under TWC, §11.0235, concerning Policy Regarding Waters of the State; TWC, §11.147, concerning Effects of Permit on Bays and Estuaries and Instream Uses; and TWC, §11.1471, concerning Environmental Flow Standards and Set-Asides.

The adopted new sections implement TWC, §§11.0235, 11.147, and 11.1471.

§298.450. Applicability and Purpose.

This subchapter contains the environmental flow standards for the Brazos River and its associated bay and estuary system. The provisions of this subchapter will prevail over any provisions of Subchapter A of this chapter (relating to General Provisions) that

are inconsistent with this subchapter relating to environmental flow standards and regulation in the Brazos River Basin and the Brazos-Colorado Coastal Basin.

§298.455. Definitions.

The following words or phrases have the following meanings in this subchapter unless the context clearly indicates otherwise:

(1) Average condition--for all measurement points, the hydrologic condition that would occur approximately 50% of the time.

(2) Climatic division--a geographic area defined by the National Weather Service.

(3) Dry condition--for all measurement points, the hydrologic condition that would occur approximately 25% of the time and that is intended to represent the driest periods.

(4) Lower Basin--the geographic area of the Brazos River Basin which includes all watersheds below Lake Whitney Dam, and the San Bernard River and coastal watersheds, and which is defined for the purpose of calculating hydrologic

conditions as described in §298.470 of this section (relating to Calculation of Hydrologic Conditions).

(5) Middle Basin--the geographic area of the Brazos River Basin which includes all watersheds draining into the Brazos River and its tributaries downstream of Possum Kingdom Dam and upstream of Lake Whitney Dam, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this section (relating to Calculation of Hydrologic Conditions).

(6) PHDI--the Palmer Hydrological Drought Index, based on a scale from -6.0 to 6.0, and representing the severity of moisture conditions from extremely dry to extremely wet.

(7) PHDI Index--a regional PHDI, calculated for the Lower Basin, Middle Basin, and Upper Basin, based on ranked values for a period of record from 1895 through 2010, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this title (relating to Calculation of Hydrologic Conditions).

(8) Spring--the period of time March through June, inclusive.

(9) Sound ecological environment--characterized by fish, macroinvertebrate, and riparian vegetation species assemblages that remain relatively intact compared to historical records.

(10) Summer--the period of time July through October, inclusive.

(11) Upper Basin--the geographic area of the Brazos River Basin which includes all watersheds upstream of and draining into Possum Kingdom Lake, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this title (relating to Calculation of Hydrologic Conditions).

(12) Wet condition--for all measurement points, the hydrologic condition that would occur approximately 25% of the time and that is intended to represent the wettest conditions.

(13) Winter--for all measurement points, the period of time November through February, inclusive.

§298.460. Findings.

(a) The Brazos River and its associated tributaries and bay and estuary system

and the San Bernard River and its associated tributaries are healthy and sound ecological environments.

(b) The commission finds that these sound ecological environments can best be maintained by a set of flow standards that implement a schedule of flow quantities that contain subsistence flow, base flow, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in ~~subsistence,~~ dry, average, or wet base flow conditions, will vary from year to year and within a year from season to season, and the number of pulses protected will also vary with the amount of precipitation and hydrologic conditions.

§298.465. Set-Asides and Standards Priority Date.

The priority date for the environmental flow standards and set-asides established by this subchapter is March 1, 2012. The priority date for the environmental flow standards will be used in the water availability determination for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted, and has no other purpose.

§298.470. Calculation of Hydrologic Conditions.

(a) For new water right authorizations which increase the amount of water authorized to be stored, taken, or diverted as described in §298.10 of this title (relating to Applicability), the determination of the hydrologic condition for a particular season shall be determined once per season. The Palmer Hydrologic Drought Index (PHDI) value present on the last day of the month of the preceding season, as reported by the National Weather Service, and calculated for the geographic area as described in subsection (b) of this section, will determine the hydrologic condition for the following season. For each measurement point specified in this section, the PHDI Index will determine the hydrologic condition, as described in subsection (c) of this section.

(b) The percentage of each climatic division within each geographic area, as defined in §298.455 of this title (relating to Definitions), are:

Figure: 30 TAC §298.470(b)

Percentage of Climatic Division Within Each Geographic Area

CLIMATIC DIVISION	PERCENTAGE LOCATED IN UPPER BASIN	PERCENTAGE LOCATED IN MIDDLE BASIN	PERCENTAGE LOCATED IN LOWER BASIN
High Plains	2.7%	N/A	N/A
Low Rolling Plains	64.7%	N/A	N/A
North Central	32.6%	100%	61.9%

East Texas	N/A	N/A	14.7%
Trans Pecos	N/A	N/A	N/A
Edwards Plateau	N/A	N/A	5.7%
South Central	N/A	N/A	13.2%
Upper Coast	N/A	N/A	4.5%

N/A = not applicable

(c) For all measurement points, based on the geographic area in which the measurement point is located, as defined in §298.455 of this title, the PHDI Index and the corresponding hydrologic conditions are:

Figure: 30 TAC §298.470(c)

PHDI Index for Calculating Hydrologic Conditions for all Measurement Points on the Brazos River and its associated tributaries and the San Bernard River and its associated tributaries

GEOGRAPHIC AREA	DRY	AVERAGE	WET
UPPPER BASIN	less than -1.78	-1.78 - 2.18	greater than 2.18
MIDDLE BASIN	less than -1.95	-1.95 - 2.39	greater than 2.39
LOWER BASIN	less than -1.73	-1.73 - 2.13	greater than 2.13

(d) The PHDI Index for the hydrologic conditions, as set out in subsection (b) of

this section govern the operations of permits subject to this subchapter during the initial period, not longer than ten years, until the environmental flow standards in this subchapter are reevaluated. The PHDI Index was calculated to achieve compliance with the percentages of time for dry, average, and wet conditions of 25%, 50%, and 25%, respectively. The PHDI Index set out in subsection (c) of this section will be recalculated, no less frequently than once every ten years, in order to achieve, to the greatest extent possible, compliance with the percentages of time for dry, average, and wet conditions of 25%, 50%, and 25%, respectively.

§298.475. Schedule of Flow Quantities.

(a) Schedule of flow quantities. The environmental flow standards adopted by this subchapter constitute a schedule of flow quantities made up of subsistence flow, base flow, and high flow pulses. Environmental flow standards are established at 20 separate measurement locations in §298.480 of this title (relating to Environmental Flow Standards).

(b) Subsistence flow. The applicable subsistence flow standard varies depending on the seasons as described in §298.455 of this title (relating to Definitions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder may not store or divert water

unless the flow at the measurement point is above the applicable subsistence flow standard for that point. If the flow at the applicable measurement point is above the subsistence flow standard but below the applicable dry condition base flow standard, then the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass its measurement point and any remaining flow may be diverted or stored, according to its permit, subject to senior and superior water rights, as long as the flow at the measurement point does not fall below the applicable subsistence flow standard.

(c) Base flow. The applicable base flow level varies depending on the seasons as described in §298.455 of this title and the hydrologic condition described in §298.470 of this title (relating to Calculation of Hydrologic Conditions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder is subject to the base flow standard for the hydrologic condition prevailing at that time. For all measurement points, the water right will be subject to one of the following: a dry, an average, or a wet base flow standard. For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, when the flow at the applicable measurement point is above the applicable base flow standard, but below any applicable high flow pulse levels, the water right holder may store or divert water according to its permit, subject to senior and superior water rights, as long as the flow at the applicable

measurement point does not fall below the applicable base flow standard for that hydrologic condition except during dry conditions as described in subsection (b) of this section.

(d) High flow pulses. High flow pulses are relatively short-duration, high flows within the watercourse that occur during or immediately following a storm event.

(1) For all measurement points, one, two, three, or four pulses per season are to be passed (i.e., no storage or diversion by an applicable water right holder), if applicable, and as described in §298.480 of this title, if streamflows are above the applicable subsistence or base flow standard, and if the applicable high flow pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water until either the applicable volume amount has passed the applicable measurement point or the duration time has passed since the high flow pulse trigger level occurred except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse.

(2) If the applicable high flow pulse trigger level does not occur in a season, then the water right holder need not stop storing or diverting water to produce a high flow pulse. The water right holder is not required to release water lawfully stored to produce a high flow pulse.

(3) Each season is independent of the preceding and subsequent seasons with respect to high flow pulse frequency.

(4) High flow pulses at the applicable measurement point are dependent on the hydrologic conditions set out in §298.470 of this title.

(5) For measurement points in the Brazos River Basin described in §298.480(7) - (8) of this title**,** if a pulse flow requirement for the large seasonal pulse is satisfied for a particular season, one of the smaller pulse requirements is also considered to be satisfied for that season.

(e) Stored water. A water right owner that has stored water in accordance with the terms and conditions of its water right, including any applicable environmental flow requirement in effect at the time the water was stored, may divert, release, or use this water, even if the applicable environmental flow requirement is not met at the time of the subsequent diversion, release, or use of that stored water.

§298.480. Environmental Flow Standards.

The following environmental flow standards are established for the following described measurement points:

(1) Double Mountain Fork Brazos River near Aspermont, Texas, generally described as United States Geological Survey (USGS) gage 08080500, and more specifically described as Latitude 33 degrees, 00 minutes, 29 seconds; Longitude 100 degrees, 10 minutes, 49 seconds.

Figure: 30 TAC §298.480(1)

United States Geological Survey Gage 08080500, Double Mountain Fork Brazos River near Aspermont

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	1 cfs	N/A	N/A	N/A
		Average	4 cfs			
		Wet	15 cfs			
Spring	1 cfs	Dry	1 cfs	1 per season Trigger: 280 cfs Volume: 1,270	2 per season Trigger: 280 cfs Volume:	1 per season Trigger: 570 cfs Volume:
		Average	3 cfs			

		Wet	8 cfs	af Duration: 10 days	1,270 af Duration: 10 days	2,600 af Duration: 12 days
Summer	1 cfs	Dry	1 cfs	1 per season Trigger: 230 cfs Volume: 990 af Duration: 9 days	2 per season Trigger: 230 cfs Volume: 990 af Duration: 9 days	1 per season Trigger: 480 cfs Volume: 2,160 af Duration: 12 days
		Average	2 cfs			
		Wet	7 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(2) Salt Fork Brazos River near Aspermont, Texas, generally described as USGS gage 08082000, and more specifically described as Latitude 33 degrees, 20 minutes, 2 seconds; Longitude 100 degrees, 14 minutes, 16 seconds.

Figure: 30 TAC §298.480(2)

United States Geological Survey Gage 08082000, Salt Fork Brazos River near Aspermont

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	1 cfs	N/A	N/A	N/A
		Average	4 cfs			
		Wet	9 cfs			
Spring	1 cfs	Dry	1 cfs	1 per season Trigger: 160 cfs Volume: 720	2 per season Trigger: 160 cfs Volume: 720	1 per season Trigger: 300 cfs Volume:
		Average	2 cfs			

		Wet	5 cfs	af Duration: 10 days	af Duration: 10 days	1,350 af Duration: 11 days
Summer	1 cfs	Dry	1 cfs	1 per season Trigger: 140 cfs Volume: 560 af Duration: 8 days	2 per season Trigger: 140 cfs Volume: 560 af Duration: 8 days	1 per season Trigger: 260 cfs Volume: 1,090 af Duration: 10 days
		Average	1 cfs			
		Wet	3 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(3) Brazos River at Seymour, Texas, generally described as USGS gage 08082500, and more specifically described as Latitude 33 degrees, 34 minutes, 51 seconds; Longitude 99 degrees, 16 minutes, 02 seconds.

Figure: 30 TAC §298.480(3)

United States Geological Survey Gage 08082500, Brazos River at Seymour

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	10 cfs	N/A	N/A	N/A
		Average	25 cfs			
		Wet	46 cfs			
Spring	1 cfs	Dry	7 cfs	1 per season Trigger: 560 cfs Volume: 2,960 af Duration: 10 days	2 per season Trigger: 560 cfs Volume: 2,960 af Duration: 10 days	1 per season Trigger: 1,040 cfs Volume: 5,870 af Duration: 12 days
		Average	19 cfs			
		Wet	35 cfs			

Summer	1 cfs	Dry	4 cfs	1 per season Trigger: 370 cfs Volume: 1,870 af Duration: 8 days	2 per season Trigger: 370 cfs Volume: 1,870 af Duration: 8 days	1 per season Trigger: 800 cfs Volume: 4,290 af Duration: 11 days
		Average	13 cfs			
		Wet	32 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(4) Clear Fork Brazos River at Nugent, Texas, generally described as USGS gage 08084000, and more specifically described as Latitude 32 degrees, 41 minutes, 24 seconds; Longitude 99 degrees, 40 minutes, 09 seconds.

Figure: 30 TAC §298.480(4)

United States Geological Survey Gage 08084000, Clear Fork Brazos River at Nugent

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	5 cfs	N/A	N/A	1 per season Trigger: 26 cfs Volume:160 af Duration: 9 days
		Average	8 cfs			
		Wet	13 cfs			
Spring	1 cfs	Dry	3 cfs	1 per season Trigger: 180 cfs Volume: 860 af Duration: 9 days	2 per season Trigger: 180 cfs Volume: 860 af Duration: 9 days	1 per season Trigger: 590 cfs Volume: 2,800 af Duration: 12 days
		Average	6 cfs			
		Wet	12 cfs			

Summer	1 cfs	Dry	1 cfs	1 per season Trigger: 100 cfs Volume: 460 af Duration: 8 days	2 per season Trigger: 100 cfs Volume: 460 af Duration: 8 days	1 per season Trigger: 390 cfs Volume: 1,890 af Duration: 12 days
		Average	4 cfs			
		Wet	9 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(5) Clear Fork Brazos River at Lueders, Texas, generally described as USGS gage 08084200, and more specifically described as Latitude 32 degrees, 47 minutes, 33.9 seconds; Longitude 99 degrees, 36 minutes, 43.30 seconds.

Figure: 30 TAC §298.480(5)

United States Geological Survey Gage 08084200, Clear Fork Brazos River at Lueders

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	7 ~~1~~ cfs	N/A	N/A	1 per season Trigger: 26 cfs Volume:158 af Duration: 9 days
		Average	10 ~~4~~ cfs			
		Wet	16 ~~7~~ cfs			
Spring	1 cfs	Dry	4 ~~5~~ cfs	1 per season Trigger: 18 cfs Volume: 74 af Duration: 2 days	2 per season Trigger: 37 cfs Volume: 148 af Duration: 2 days	1 per season Trigger: 355 cfs Volume: 2,054 af Duration: 9 days
		Average	7 cfs			
		Wet	15 ~~10~~ cfs			

Summer	1 cfs	Dry	1 ~~11~~ cfs	1 per season Trigger: 18 cfs Volume: 74 af Duration: 2 days	2 per season Trigger: 37 cfs Volume: 148 af Duration: 2 days	1 per season Trigger: 170 cfs Volume: 779 af Duration: 5 Days
		Average	~~15~~ cfs			
		Wet	1~~16~~ cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(6) Brazos River near South Bend, Texas, generally described as USGS gage 08088000, and more specifically described as Latitude 33 degrees, 01 minutes, 27 seconds; Longitude 98 degrees, 38 minutes, 37 seconds.

Figure: 30 TAC §298.480(6)

United States Geological Survey Gage 08088000, Brazos River near South Bend

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	36 cfs	N/A	N/A	N/A
		Average	73 cfs			
		Wet	120 cfs			
Spring	1 cfs	Dry	29 cfs	1 per season Trigger: 1,260 cfs Volume: 7,280 af Duration: 10 days	2 per season Trigger: 1,260 cfs Volume: 7,280 af Duration: 10 days	1 per season Trigger: 2,480 cfs Volume: 15,700 af Duration: 13 days
		Average	60 cfs			
		Wet	100 cfs			
Summer	1 cfs	Dry	16 cfs	1 per season Trigger:	2 per season Trigger:	1 per season Trigger:

		Average	46 cfs	580 cfs Volume: 3,140 af Duration: 8 days	580 cfs Volume: 3,140 af Duration: 8 days	1,180 cfs Volume: 7,050 af Duration: 11 days
		Wet	95 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(7) Brazos River near Palo Pinto, Texas, generally described as USGS gage 08089000, and more specifically described as Latitude 32 degrees, 51 minutes, 45 seconds; Longitude 98 degrees, 18 minutes, 08 seconds.

Figure: 30 TAC §298.480(7)

United States Geological Survey Gage 08089000, Brazos River near Palo Pinto

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	17 cfs	Dry	40 cfs	2 per season Trigger: 850 cfs Volume: 3,690 af Duration: 5 days	4 per season Trigger: 850 cfs Volume: 3,690 af Duration: 5 days 2 per season Trigger: 1,390 cfs Volume: 7,180 af Duration: 7 days	4 per season Trigger: 850 cfs Volume: 3,690 af Duration: 5 days 3 per season Trigger: 1,390 cfs Volume: 7,180 af Duration: 7 days
		Average	61 cfs			
		Wet	100 cfs			

Spring	17 cfs	Dry	39 cfs	2 per season Trigger: 1,400 cfs Volume: 6,600 af Duration: 6 days	4 per season Trigger: 1,400 cfs Volume: 6,600 af Duration: 6 days 2 per season Trigger: 3,370 cfs Volume: 20,200 af Duration: 10 days	4 per season Trigger: 1,400 cfs Volume: 6,600 af Duration: 6 days 3 per season Trigger: 3,370 cfs Volume: 20,200 af Duration: 10 days
		Average	75 cfs			
		Wet	120 cfs			
Summer	17 cfs	Dry	40 cfs	2 per season Trigger: 1,230 cfs Volume: 5,920 af Duration: 6 days	4 per season Trigger: 1,230 cfs Volume: 5,920 af Duration: 6 days 2 per season Trigger: 2,260 cfs Volume: 13,000 af Duration: 9 days	4 per season Trigger: 1,230 cfs Volume: 5,920 af Duration: 6 days 3 per season Trigger: 2,260 cfs Volume: 13,000 af Duration: 9 days
		Average	72 cfs			
		Wet	120 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(8) Brazos River near Glen Rose, Texas, generally described as USGS gage 080891000, and more specifically described as Latitude 32 degrees, 15 minutes, 32 seconds; Longitude 97 degrees, 42 minutes, 08 seconds.

Figure: 30 TAC §298.480(8)

United States Geological Survey Gage 080891000, Brazos River near Glen Rose

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	16 cfs	Dry	42 cfs	2 per season Trigger: 930 cfs Volume: 5,400 af Duration: 8 days	4 per season Trigger: 930 cfs Volume: 5,400 af Duration: 8 days 2 per season Trigger: 1,700 cfs Volume: 10,800 af Duration: 10 days	4 per season Trigger: 930 cfs Volume: 5,400 af Duration: 8 days 3 per season Trigger: 1,700 cfs Volume: 10,800 af Duration: 10 days
		Average	77 cfs			
		Wet	160 cfs			
Spring	16 cfs	Dry	47 cfs	2 per season Trigger: 2,350 cfs Volume: 14,300 af Duration: 10 days	4 per season Trigger: 2,350 cfs Volume: 14,300 af Duration: 10 days 2 per season Trigger: 6,480 cfs Volume: 46,700 af Duration: 14 days	4 per season Trigger: 2,350 cfs Volume: 14,300 af Duration: 10 days 3 per season Trigger: 6,480 cfs Volume: 46,700 af Duration: 14 days
		Average	92 cfs			
		Wet	170 cfs			
Summer	16 cfs	Dry	37 cfs	2 per season Trigger: 1,320 cfs Volume: 7,830 af Duration: 8 days	4 per season Trigger: 1,320 cfs Volume: 7,830 af Duration: 8 days 2 per season Trigger:	4 per season Trigger: 1,320 cfs Volume: 7,830 af Duration: 8 days 3 per season Trigger:
		Average	70 cfs			

		Wet	160 cfs		3,090 cfs Volume: 21,200 af Duration: 12 days	3,090 cfs Volume: 21,200 af Duration: 12 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(9) North Bosque River near Clifton, Texas, generally described as USGS gage 08095000, and more specifically described as Latitude 31 degrees, 47 minutes, 09 seconds; Longitude 97 degrees, 34 minutes, 04 seconds.

Figure: 30 TAC §298.480(9)

United States Geological Survey Gage 08095000, North Bosque River near Clifton

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	5 cfs	N/A	N/A	2 per season Trigger: 120 cfs Volume: 750 af Duration: 10 days
		Average	12 cfs			
		Wet	25 cfs			
Spring	1 cfs	Dry	7 cfs	1 per season Trigger: 710 cfs Volume: 3,490 af Duration: 12 days	3 per season Trigger: 710 cfs Volume: 3,490 af Duration: 12 days	3 per season Trigger: 710 cfs Volume: 3,490 af Duration: 12 days
		Average	16 cfs			
		Wet	33 cfs			
Summer	1 cfs	Dry	3 cfs	N/A	N/A	2 per season Trigger:

		Average	8 cfs			130 cfs Volume: 500 af Duration: 6 days
		Wet	17 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(10) Brazos River at Waco, Texas, generally described as USGS gage 08096500, and more specifically described as Latitude 31 degrees, 32 minutes, 09 seconds; Longitude 97 degrees, 04 minutes, 23 seconds.

Figure: 30 TAC §298.480(10)

United States Geological Survey Gage 08096500, Brazos River at Waco

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	56 cfs	Dry	120 cfs	1 per season Trigger: 2,320 cfs Volume: 12,400 af Duration: 7 days	3 per season Trigger: 2,320 cfs Volume: 12,400 af Duration: 7 days	2 per season Trigger: 4,180 cfs Volume: 25,700 af Duration: 9 days
		Average	210 cfs			
		Wet	480 cfs			
Spring	56 cfs	Dry	150 cfs	1 per season Trigger: 5,330 cfs Volume: 32,700 af Duration: 10 days	3 per season Trigger: 5,330 cfs Volume: 32,700 af Duration: 10 days	2 per season Trigger: 13,600 cfs Volume: 102,000 af Duration: 14 days
		Average	270 cfs			
		Wet	690 cfs			
Summer	56 cfs	Dry	140 cfs	1 per season Trigger: 1,980 cfs Volume:	3 per season Trigger: 1,980 cfs Volume:	2 per season Trigger: 4,160 cfs Volume:
		Average	250 cfs			

		Wet	590 cfs	10,500 af Duration: 7 days	10,500 af Duration: 7 days	26,400 af Duration: 10 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(11) Leon River at Gatesville, Texas, generally described as USGS gage 08100500, and more specifically described as Latitude 31 degrees, 26 minutes, 05 seconds; Longitude 97 degrees, 45 minutes, 30 seconds.

Figure: 30 TAC §298.480(11)

United States Geological Survey Gage 08100500, Leon River at Gatesville

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	9 cfs	N/A	N/A	2 per season Trigger: 100 cfs Volume: 540 af Duration: 6 days
		Average	20 cfs			
		Wet	52 cfs			
Spring	1 cfs	Dry	10 cfs	1 per season Trigger: 340 cfs Volume: 1,910 af Duration: 10 days	3 per season Trigger: 340 cfs Volume: 1,910 af Duration: 10 days	2 per season Trigger: 630 cfs Volume: 4,050 af Duration: 13 days
		Average	24 cfs			
		Wet	54 cfs			
Summer	1 cfs	Dry	4 cfs	1 per season Trigger: 58 cfs Volume: 220 af Duration: 4	3 per season Trigger: 58 cfs Volume: 220 af Duration: 4	2 per season Trigger: 140 cfs Volume: 600 af Duration: 6
		Average	12 cfs			
		Wet	27 cfs			

				days	days	days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(12) Lampasas River near Kempner, Texas, generally described as USGS gage 08103800, and more specifically described as Latitude 31 degrees, 04 minutes, 45 seconds; Longitude 98 degrees, 00 minutes, 59 seconds.

Figure: 30 TAC §298.480(12)

United States Geological Survey Gage 08103800, Lampasas River near Kempner

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	10 cfs	Dry	18 cfs	1 per season Trigger: 78 cfs Volume: 430 af Duration: 8 days	3 per season Trigger: 78 cfs Volume: 430 af Duration: 8 days	2 per season Trigger: 190 cfs Volume: 1,150 af Duration: 11 days
		Average	27 cfs			
		Wet	39 cfs			
Spring	10 cfs	Dry	21 cfs	1 per season Trigger: 780 cfs Volume: 4,020 af Duration: 13 days	3 per season Trigger: 780 cfs Volume: 4,020 af Duration: 13 days	2 per season Trigger: 1,310 cfs Volume: 6,860 af Duration: 16 days
		Average	29 cfs			
		Wet	43 cfs			
Summer	10 cfs	Dry	16 cfs	1 per season Trigger: 77 cfs Volume: 270 af Duration: 4 days	3 per season Trigger: 77 cfs Volume: 270 af Duration: 4 days	2 per season Trigger: 190 cfs Volume: 680 af Duration: 6 days
		Average	23 cfs			
		Wet	32 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(13) Little River near Little River, Texas, generally described as USGS gage 08104500, and more specifically described as Latitude 30 degrees, 57 minutes, 59 seconds; Longitude 97 degrees, 20 minutes, 45 seconds.

Figure: 30 TAC §298.480(13)

United States Geological Survey Gage 08104500, Little River near Little River

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	55 cfs	Dry	82 cfs	1 per season Trigger: 520 cfs Volume: 2,350 af Duration: 5 days	3 per season Trigger: 520 cfs Volume: 2,350 af Duration: 5 days	2 per season Trigger: 1,600 cfs Volume: 11,800 af Duration: 11 days
		Average	110 cfs			
		Wet	190 cfs			
Spring	55 cfs	Dry	95 cfs	1 per season Trigger: 1,420 cfs Volume: 9,760 af Duration: 10 days	3 per season Trigger: 1,420 cfs Volume: 9,760 af Duration: 10 days	2 per season Trigger: 3,290 cfs Volume: 32,200 af Duration: 17 days
		Average	150 cfs			
		Wet	340 cfs			
Summer	55 cfs	Dry	84 cfs	1 per season Trigger: 430 cfs Volume: 1,560 af Duration: 4 days	3 per season Trigger: 430 cfs Volume: 1,560 af Duration: 4 days	2 per season Trigger: 1,060 cfs Volume: 5,890 af Duration: 8 days
		Average	120 cfs			
		Wet	200 cfs			

cfs = cubic feet per second

af = acre-feet
N/A = not applicable

(14) Little River near Cameron, Texas, generally described as USGS gage 08106500, and more specifically described as Latitude 30 degrees, 50 minutes, 06 seconds; Longitude 96 degrees, 56 minutes, 47 seconds.

Figure: 30 TAC §298.480(14)

United States Geological Survey Gage 08106500, Little River near Cameron

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	32 cfs	Dry	110 cfs	1 per season Trigger: 1,080 cfs Volume: 6,680 af Duration: 8 days	3 per season Trigger: 1,080 cfs Volume: 6,680 af Duration: 8 days	2 per season Trigger: 2,140 cfs Volume: 14,900 af Duration: 10 days
		Average	190 cfs			
		Wet	460 cfs			
Spring	32 cfs	Dry	140 cfs	1 per season Trigger: 3,200 cfs Volume: 23,900 af Duration: 12 days	3 per season Trigger: 3,200 cfs Volume: 23,900 af Duration: 12 days	2 per season Trigger: 4,790 cfs Volume: 38,400 af Duration: 14 days
		Average	310 cfs			
		Wet	760 cfs			
Summer	32 cfs	Dry	97 cfs	1 per season Trigger: 560 cfs Volume: 2,860 af Duration: 6 days	3 per season Trigger: 560 cfs Volume: 2,860 af Duration: 6 days	2 per season Trigger: 990 cfs Volume: 5,550 af Duration: 8 days
		Average	160 cfs			
		Wet	330 cfs			

cfs = cubic feet per second
af = acre-feet

N/A = not applicable

(15) Brazos River at SH 21 near Bryan, Texas, generally described as USGS gage 08108700, and more specifically described as Latitude 30 degrees, 37 minutes, 36 seconds; Longitude 96 degrees, 32 minutes, 38 seconds.

Figure: 30 TAC §298.480(15)

United States Geological Survey Gage 08108700, Brazos River at SH 21 near Bryan

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	300 cfs	Dry	540 cfs	1 per season Trigger: 3,230 cfs Volume: 21,100 af Duration: 7 days	3 per season Trigger: 3,320 cfs Volume: 21,100 af Duration: 7 days	2 per season Trigger: 5,570 cfs Volume: 41,900 af Duration: 10 days
		Average	860 cfs			
		Wet	1,760 cfs			
Spring	300 cfs	Dry	710 cfs	1 per season Trigger: 6,050 cfs Volume: 49,000 af Duration: 11 days	3 per season Trigger: 6,050 cfs Volume: 49,000 af Duration: 11 days	2 per season Trigger: 10,400 cfs Volume: 97,000 af Duration: 14 days
		Average	1,260 cfs			
		Wet	2,460 cfs			
Summer	300 cfs	Dry	630 cfs	1 per season Trigger: 2,060 cfs Volume: 12,700 af Duration:7 days	3 per season Trigger: 2,060 cfs Volume: 12,700 af Duration: 7 days	2 per season Trigger: 2,990 cfs Volume: 20,100 af Duration: 8 days
		Average	920 cfs			
		Wet	1,470 cfs			

cfs = cubic feet per second
af = acre-feet

N/A = not applicable

(16) Navasota River near Easterly, Texas, generally described as USGS gage 08110500, and more specifically described as Latitude 31 degrees, 10 minutes, 12 seconds; Longitude 96 degrees, 17 minutes, 51 seconds.

Figure: 30 TAC §298.480(16)

United States Geological Survey Gage 08110500, Navasota River near Easterly

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	1 cfs	Dry	9 cfs	1 per season Trigger: 260 cfs Volume: 1,610 af Duration: 9 days	3 per season Trigger: 260 cfs Volume: 1,610 af Duration: 9 days	2 per season Trigger: 800 cfs Volume: 5,440 af Duration: 12 days
		Average	14 cfs			
		Wet	23 cfs			
Spring	1 cfs	Dry	10 cfs	1 per season Trigger: 720 cfs Volume: 4,590 af Duration: 11 days	3 per season Trigger: 720 cfs Volume: 4,590 af Duration: 11 days	2 per season Trigger: 1,340 cfs Volume: 8,990 af Duration: 13 days
		Average	19 cfs			
		Wet	29 cfs			
Summer	1 cfs	Dry	3 cfs	N/A	N/A	2 per season Trigger: 49 cfs Volume: 220 af Duration: 5 days
		Average	8 cfs			
		Wet	16 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(17) Brazos River near Hempstead, Texas, generally described as USGS gage 08111500, and more specifically described as Latitude 30 degrees, 07 minutes, 44 seconds; Longitude 96 degrees, 11 minutes, 15 seconds.

Figure: 30 TAC §298.480(17)

United States Geological Survey Gage 08111500, Brazos River near Hempstead

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	510 cfs	Dry	920 cfs	1 per season Trigger: 5,720 cfs Volume: 49,800 af Duration: 10 days	3 per season Trigger: 5,720 cfs Volume: 49,800 af Duration: 10 days	2 per season Trigger: 11,200 cfs Volume: 125,000 af Duration: 15 days
		Average	1,440 cfs			
		Wet	2,890 cfs			
Spring	510 cfs	Dry	1,130 cfs	1 per season Trigger: 8,530 cfs Volume: 85,000 af Duration: 13 days	3 per season Trigger: 8,530 cfs Volume: 85,000 af Duration: 13 days	2 per season Trigger: 16,800 cfs Volume: 219,000 af Duration: 19 days
		Average	1,900 cfs			
		Wet	3,440 cfs			
Summer	510 cfs	Dry	950 cfs	1 per season Trigger: 2,620 cfs Volume: 17,000 af Duration: 7 days	3 per season Trigger: 2,620 cfs Volume: 17,000 af Duration: 7 days	2 per season Trigger: 5,090 cfs Volume: 40,900 af Duration: 9 days
		Average	1,330 cfs			
		Wet	2,050 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(18) Brazos River at Richmond, Texas, generally described as USGS gage 08114000, and more specifically described as Latitude 29 degrees, 34 minutes, 56 seconds; Longitude 95 degrees, 45 minutes, 27 seconds.

Figure: 30 TAC §298.480(18)

United States Geological Survey Gage 08114000, Brazos River at Richmond

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	550 cfs	Dry	990 cfs	1 per season Trigger: 6,410 cfs Volume: 60,600 af Duration: 11 days	3 per season Trigger: 6,410 cfs Volume: 60,600 af Duration: 11 days	2 per season Trigger: 12,400 cfs Volume: 150,000 af Duration: 16 days
		Average	1,650 cfs			
		Wet	3,310 cfs			
Spring	550 cfs	Dry	1,190 cfs	1 per season Trigger: 8,930 cfs Volume: 94,000 af Duration: 13 days	3 per season Trigger: 8,930 cfs Volume: 94,000 af Duration: 13 days	2 per season Trigger: 16,300 cfs Volume: 215,000 af Duration: 19 days
		Average	2,140 cfs			
		Wet	3,980 cfs			
Summer	550 cfs	Dry	930 cfs	1 per season Trigger: 2,460 cfs Volume: 16,400 af Duration: 6 days	3 per season Trigger: 2,460 cfs Volume: 16,400 af Duration: 6 days	2 per season Trigger: 5,430 cfs Volume: 46,300 af Duration: 10 days
		Average	1,330 cfs			
		Wet	2,190 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(19) Brazos River near Rosharon, Texas, generally described as USGS gage 08116650, and more specifically described as Latitude 29 degrees, 20 minutes, 58 seconds; Longitude 95 degrees, 34 minutes, 56 seconds.

Figure: 30 TAC §298.480(19)

United States Geological Survey Gage 08116650, Brazos River near Rosharon

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	430 cfs	Dry	1,140 cfs	1 per season Trigger: 9,090 cfs Volume: 94,700 af Duration: 12 days	3 per season Trigger: 9,090 cfs Volume: 94,700 af Duration: 12 days	2 per season Trigger: 13,600 cfs Volume: 168,000 af Duration: 16 days
		Average	2,090 cfs			
		Wet	4,700 cfs			
Spring	430 cfs	Dry	1,250 cfs	1 per season Trigger: 6,580 cfs Volume: 58,500 af Duration: 10 days	3 per season Trigger: 6,580 cfs Volume: 58,500 af Duration: 10 days	2 per season Trigger: 14,200 cfs Volume: 184,000 af Duration: 18 days
		Average	2,570 cfs			
		Wet	4,740 cfs			
Summer	430 cfs	Dry	930 cfs	1 per season Trigger: 2,490 cfs Volume: 14,900 af Duration: 6 days	3 per season Trigger: 2,490 cfs Volume: 14,900 af Duration: 6 days	2 per season Trigger: 4,980 cfs Volume: 39,100 af Duration: 9 days
		Average	1,420 cfs			
		Wet	2,630 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(20) San Bernard River near Boling, Texas, generally described as USGS gage 08117500, and more specifically described as Latitude 29 degrees, 18 minutes, 48 seconds; Longitude 95 degrees, 53 minutes, 37 seconds.

Figure: 30 TAC §298.480(20)

United States Geological Survey Gage 08117500, San Bernard River near Boling

Season	**Subsistence**	**Hydrologic Condition**	**Base**	**Dry Condition Seasonal Pulse**	**Average Condition Seasonal Pulse**	**Wet Condition Seasonal Pulse**
Winter	11 cfs	Dry	23 cfs	1 per season Trigger: 510 cfs Volume: 3,710 af Duration: 8 days	3 per season Trigger: 510 cfs Volume: 3,710 af Duration: 8 days	2 per season Trigger: 1,060 cfs Volume: 9,370 af Duration: 12 days
		Average	43 cfs			
		Wet	73 cfs			
Spring	11 cfs	Dry	32 cfs	1 per season Trigger: 350 cfs Volume: 2,360 af Duration: 7 days	3 per season Trigger: 350 cfs Volume: 2,360 af Duration: 7 days	2 per season Trigger: 680 cfs Volume: 5,300 af Duration: 10 days
		Average	53 cfs			
		Wet	85 cfs			
Summer	11 cfs	Dry	64 cfs	1 per season Trigger: 300 cfs Volume: 2,480 af Duration: 9 days	3 per season Trigger: 300 cfs Volume: 2,480 af Duration: 9 days	2 per season Trigger: 470 cfs Volume: 4,050 af Duration: 10 days
		Average	98 cfs			
		Wet	140 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

§298.485. Water Right Permit Conditions.

(a) For water right permits with an authorization to store or divert water from the Brazos River and its associated tributaries, and from the Brazos-Colorado Coastal Basin, and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter.

(b) For water right permits with an authorization to divert water in the Brazos River Basin and the Brazos-Colorado Coastal Basin at a rate less than 20% of the pulse trigger level requirements of an applicable high flow pulse at a measurement point, as described in §298.480 of this title (relating to Environmental Flow Standards), and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter; however, no special conditions are necessary to preserve or pass that applicable high flow pulse.

(c) For water right permit applications that request only to increase authorized storage by up to 15%, in the Palo Pinto Creek watershed, and to which the

environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter; however, no special conditions are necessary to preserve or pass any otherwise applicable high flow pulses.

§298.490. Schedule for Revision of Standards.

The environmental flow standards or environmental flow set-asides adopted in this subchapter for the Brazos River and its associated tributaries and its associated bay and estuary system and the Brazos-Colorado Coastal Basin may be revised by the commission through the rulemaking process. The final revised rules shall be effective no sooner than ten years from the effective date of this rule, unless the Brazos River and Associated Bay and Estuary System Stakeholder Committee submits a work plan approved by the Environmental Flows Advisory Group under Texas Water Code, §11.02362(p), that provides for a periodic review to occur more frequently. The rulemaking process shall include participation by a balanced representation of stakeholders having interests in the Brazos River and its associated tributaries and its associated bay and estuary system and the Brazos-Colorado Coastal Basin.

SUBCHAPTER H: RIO GRANDE, RIO GRANDE ESTUARY, AND LOWER LAGUNA MADRE

§§298.500, 298.505, 298.510, 298.515, 298.520, 298.525, 298.530, 298.535, 298.540

Statutory Authority

These new sections are adopted under Texas Water Code (TWC), §§5.102, concerning General Powers; TWC, 5.103, concerning Rules; and TWC, 5.105 concerning General Policy, which authorize the commission to adopt rules as necessary to carry out its power and duties under the TWC. These new sections are also adopted under TWC, §11.0235, concerning Policy Regarding Waters of the State; TWC, §11.147, concerning Effects of Permit on Bays and Estuaries and Instream Uses; and TWC, §11.1471, concerning Environmental Flow Standards and Set-Asides.

The adopted new sections implement TWC, §§11.0235, 11.147, and 11.1471.

§298.500. Applicability and Purpose.

This subchapter contains the environmental flow standards for the Rio Grande and its associated tributaries. The provisions of this subchapter will prevail over any provisions of Subchapter A of this chapter (relating to General Provisions) that are

inconsistent with this subchapter relating to environmental flow standards and regulation in the Rio Grande basin.

§298.505. Definitions.

The following words or phrases have the following meanings in this subchapter unless the context clearly indicates otherwise:

(1) Average condition--the hydrologic condition that would occur approximately 50% of the time and that is intended to represent periods that are neither dry nor wet.

(2) Dry condition--the hydrologic condition that would occur approximately 15% of the time and that is intended to represent conditions that are dry but are above the subsistence condition.

(3) Fall--the period of time July through October, inclusive.

(4) Spring--the period of time March through June, inclusive.

(5) Sound ecological environment--an environment that sustains the full complement of the current suite of native species in perpetuity, or at least supports the

introduction of extirpated species, sustains key habitat features required by these species, retains key features of the natural flow regime required by these species to complete their life cycles, and sustains key ecosystem processes and services, such as elemental cycling and the productivity of important plant and animal populations.

(6) Subsistence condition--the hydrologic condition that would occur approximately 10% of the time and that is intended to represent the driest periods.

(7) Wet condition--the hydrologic condition that would occur approximately 25% of the time and that is intended to represent the wettest conditions.

(8) Winter--the period of time November through February, inclusive.

§298.510. Findings.

For the Rio Grande, and its associated tributaries located within Texas, the commission finds that the environmental flow standards in this subchapter are appropriate environmental flow standards that are adequate to support a sound ecological environment at the locations specified in this subchapter to the maximum extent reasonable considering other public interests and other relevant factors. The commission finds that the sound ecological environment can best be maintained by a set

of flow standards consisting of a schedule of flow quantities that contain subsistence flow, base flows, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in subsistence, dry, average, or wet hydrologic conditions, ~~or base flow conditions,~~ will vary from year to year and within a year from season to season, and the number of pulses will also vary with the amount of precipitation.

§298.515. Set-Asides and Standards Priority Date.

The priority date for the environmental flow standards and set-asides established by this subchapter is July 25, 2012. The priority date for the environmental flow standards will be used in the water availability determination for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted, and has no other purpose.

§298.520. Calculation of Hydrologic Conditions.

(a) For new water right authorizations in the Rio Grande Basin which increase the amount of water authorized to be stored, taken, or diverted as described in §298.10 of this title (relating to Applicability), the determination of the hydrologic condition for

a particular season shall be determined once per season. The conditions present on the last day of the month of the preceding season will determine the hydrologic condition for the following season for the applicable measurement point. For each measurement point, cumulative streamflow for the previous 12 months will determine the hydrologic condition.

(b) For purposes of permit special conditions related to hydrologic conditions, for water right applications in the Rio Grande Basin, which increase the amount of water to be stored, taken, or diverted, the hydrologic condition shall be calculated using the full period of record for the United States Geological Survey (USGS) gage or the International Boundary and Water Commission (IBWC) gage, as applicable, at each measurement point such that subsistence conditions occur approximately 10% of the time, dry conditions occur approximately 15% of the time, average conditions occur approximately 50% of the time, and wet conditions occur approximately 25% of the time.

(c) For purposes of water availability determinations, for water right permit applications in the Rio Grande Basin, which increase the amount of water to be stored, taken, or diverted, hydrologic conditions used in the commission's water availability model shall be calculated such that subsistence conditions occur approximately 10% of the time, dry conditions occur approximately 15% of the time, average conditions occur

approximately 50% of the time, and wet conditions occur approximately 25% of the time, based on the period of record and simulated flows of the water availability model.

§298.525. Schedule of Flow Quantities.

(a) Schedule of flow quantities. The environmental flow standards proposed in this subchapter constitute a schedule of flow quantities made up of subsistence flow, base flows, and high flow pulses. Environmental flow standards are established for five measurement points in §298.530 of this title (relating to Environmental Flow Standards) and this section.

(b) Subsistence flow. The applicable subsistence flow standard varies depending on the seasons as described in §298.505 of this title (relating to Definitions) and hydrologic conditions, as described in §298.520 of this title (relating to Calculation of Hydrologic Conditions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder may not store or divert water under subsistence hydrologic conditions, unless the flow at the measurement point is above the applicable subsistence flow standard for that point. During subsistence hydrologic conditions, if the flow at the measurement point is above the subsistence flow standard but below the applicable dry condition base flow standard, then the water right holder may divert or store water according to its permit,

subject to senior and superior water rights, as long as the flow at the measurement point does not fall below the applicable subsistence flow standard.

(c) Base flow. The applicable base flow standard varies depending on the seasons, as described in §298.505 of this title, and the hydrologic conditions, as described in §298.520 of this title. For a water right holder, to which an environmental flow standard applies, at a measurement point that applies to a water right, the water right holder is subject to a base flow standard for the hydrologic conditions prevailing at the time, i.e., the water right holder will be subject to one of the following: a subsistence, a dry, an average, or a wet base flow standard. For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, when the flow at the applicable measurement point is above the applicable base flow standard, but below any applicable high flow pulse trigger levels, the water right holder may store or divert water according to its permit, subject to senior and superior water rights, as long as the flow at the applicable measurement point does not fall below the applicable base flow standard.

(d) High flow pulses. High flow pulses are relatively short-duration, high flows within the watercourse that occur during or immediately following a storm event.

(1) One or two pulses per season are to be passed (i.e., no storage or

diversion by an applicable water right holder), if applicable, and as described in §298.530 of this title, if the flows are above the applicable subsistence or base flow standard, and if the applicable high flow pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level and until either the applicable volume amount has passed the measurement point or the applicable duration time has passed since the high flow pulse trigger level occurred. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse.

(2) If the applicable high flow pulse flow trigger level does not occur in a season, then the water right holder need not stop storing or diverting water to produce a high flow pulse. The water right holder is not required to release water lawfully stored to produce a high flow pulse.

(3) Each season is independent of the preceding and subsequent seasons with respect to high flow pulse frequency.

(4) High flow pulses are independent of the hydrologic conditions set out in §298.520 of this title.

(5) If a pulse flow requirement for an annual pulse is satisfied for a particular season or year, one of the applicable smaller pulse requirements is also considered to be satisfied in that season.

(e) Stored water. A water right owner that has stored water in accordance with the terms and conditions of its water right, including any applicable environmental flow requirement in effect at the time the water was stored, may divert, release, or use this water, even if the applicable environmental flow requirement is not met at the time of the subsequent diversion, release, or use of that stored water.

§298.530. Environmental Flow Standards.

The following environmental flow standards are established for the following described measurement points:

(1) Rio Grande at Johnson Ranch near Castolon, Texas and Santa Elena, Chihuahua, Mexico generally described as International Boundary and Water Commission (IBWC) gage 08-3750.00, and more particularly described as Latitude 29 degrees, 02 minutes, 05 seconds; Longitude 103 degrees, 23 minutes, 25 seconds.

Figure: 30 TAC §298.530(1)

International Boundary and Water Commission Gage 08-3750.00, Rio Grande at Johnson

Ranch

Season	Hydrologic Condition	Subsistence	Base	Annual Pulse (1 per year)
Winter	Subsistence	15 ~~1~~ cfs	129 cfs	Trigger: 3,990 cfs Volume: 103,891 af Duration: 5 days
Winter	Dry	N/A	129 cfs	
Winter	Average	N/A	193 cfs	
Winter	Wet	N/A	299 cfs	
Spring	Subsistence	15 cfs	64 cfs	
Spring	Dry	N/A	64 cfs	
Spring	Average	N/A	98 cfs	
Spring	Wet	N/A	178 cfs	
Fall	Subsistence	15 cfs	87 cfs	
Fall	Dry	N/A	87 cfs	
Fall	Average	N/A	154 cfs	
Fall	Wet	N/A	244 cfs	

cfs = cubic feet per second
af = acre-feet
N/A = Not Applicable

(2) Rio Grande at Foster Ranch near Langtry, Texas and Rancho Santa Rosa, Coahuila, Mexico generally described as IBWC gage 08-3772.00, and more particularly described as Latitude 29 degrees, 46 minutes, 50 seconds; Longitude 101 degrees, 45 minutes, 30 seconds.

Figure: 30 TAC §298.530(2)

International Boundary and Water Commission Gage 08-3772.00, Rio Grande at Foster Ranch

Season	Hydrologic Condition	Subsistence	Base	Seasonal Pulse

				(1 per season)
Winter	Subsistence	126 cfs	205 cfs	N/A
Winter	Dry	N/A	205 cfs	
Winter	Average	N/A	259 cfs	
Winter	Wet	N/A	336 cfs	
Spring	Subsistence	114 cfs	171 cfs	Trigger: 2,335 cfs Volume: 38,146 af Duration: 9 days
Spring	Dry	N/A	171 cfs	
Spring	Average	N/A	228 cfs	
Spring	Wet	N/A	313 cfs	
Fall	Subsistence	110 cfs	201 cfs	Trigger: 4,427 cfs Volume: 98,150 af Duration: 16 days
Fall	Dry	N/A	201 cfs	
Fall	Average	N/A	279 cfs	
Fall	Wet	N/A	371 cfs	

(3) Pecos River near Girvin, Texas, generally described as USGS gage 08446500, and more particularly described as Latitude 31 degrees, 06 minutes, 47 seconds; Longitude 102 degrees, 25 minutes, 02 seconds.

Figure: 30 TAC §298.530(3)

United States Geological Survey Gage 08446500, Pecos River near Girvin

Season	**Hydrologic Condition**	**Subsistence**	**Base**	**Seasonal Pulse (1 per season)**
Winter	Subsistence	8.7 cfs	22 cfs	N/A

Winter	Dry	N/A	22 cfs	~~Trigger: 231 cfs Volume: 1,581 af Duration: 6 days~~
Winter	Average	N/A	27 cfs	
Winter	Wet	N/A	32 cfs	
Spring	Subsistence	6.8 cfs	14 cfs	Trigger: 72 cfs Volume: 1,199 af Duration: 6 days
Spring	Dry	N/A	14 cfs	
Spring	Average	N/A	19 cfs	
Spring	Wet	N/A	25 cfs	
Fall	Subsistence	6.3 cfs	13 cfs	Trigger: 100 cfs Volume: 1,419 af Duration: 7 days
Fall	Dry	N/A	13 cfs	
Fall	Average	N/A	18 cfs	
Fall	Wet	N/A	27 cfs	

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

(4) Devils River at Pafford Crossing near Comstock, Texas, generally described as IBWC gage 08-4494.00, and more particularly described as Latitude 29 degrees, 40 minutes, 35 seconds; Longitude 101 degrees, 00 minutes, 00 seconds.

Figure: 30 TAC §298.530(4)

International Boundary and Water Commission Gage 08-4494.00, Devils River at Pafford Crossing near Comstock

Season	**Hydrologic Condition**	**Subsistence**	**Base**	**Seasonal Pulse (1 per season)**	**Annual Pulse (1 per year)**
Winter	Subsistence	84 cfs	175 cfs	N/A	

Winter	Dry	N/A	175 cfs		
Winter	Average	N/A	200 cfs		
Winter	Wet	N/A	243 cfs		
Spring	Subsistence	91 cfs	160 cfs	Trigger: 558 cfs Volume: 17,374 af Duration: 7 days	Trigger: 3,673 cfs Volume: 34,752 af Duration: 13 days
Spring	Dry	N/A	160 cfs		
Spring	Average	N/A	207 cfs		
Spring	Wet	N/A	253 cfs		
Fall	Subsistence	87 cfs	166 cfs	Trigger: 1,872 cfs Volume: 27,781 af Duration: 9 days	
Fall	Dry	N/A	166 cfs		
Fall	Average	N/A	206 cfs		
Fall	Wet	N/A	238 cfs		

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

§298.535. Water Right Permit Conditions.

For water right permits with an authorization to store or divert water in the Rio Grande Basin, to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter.

§298.540. Schedule for Revision of Standards.

The environmental flow standards adopted in this subchapter for the Rio Grande, and its associated tributaries in Texas, may be revised by the commission through the rulemaking process. The final revised rules shall be effective no sooner than ten years from the effective date of this rule, unless the Rio Grande Basin, Rio Grande estuary, and Lower Laguna Madre Stakeholder Committee submits a work plan approved by the advisory group under Texas Water Code, §11.02362(p), that provides for a periodic review to occur more frequently. The rulemaking process shall include participation by a balanced representation of stakeholders having interests in the Rio Grande, its associated tributaries, Rio Grande estuary and Lower Laguna Madre.

vme.state.tx.us. Comments will be accepted for 30 days following publication in the *Texas Register.*

The amendment is proposed under the authority of the Veterinary Licensing Act, Occupations Code, §801.151(a), which states that the Board may adopt rules necessary to administer the chapter; and §801.154(a), which states that the board by rule shall set fees in amounts that are reasonable and necessary so that the fees, in the aggregate, cover the costs of administering this chapter.

No other statutes, articles or codes are affected by the proposal.

§577.15. Fee Schedule.

The Texas Board of Veterinary Medical Examiners has established the following fixed fees as reasonable and necessary for the administration of its functions. Other variable fees exist, including but not limited to costs as described in §575.10 of this title (relating to Costs of Administrative Hearings), and are not included in this schedule.
Figure: 22 TAC §577.15

This agency hereby certifies that the proposal has been reviewed by legal counsel and found to be within the agency's legal authority to adopt.

Filed with the Office of the Secretary of State on September 9, 2013.

TRD-201303788
Loris Jones
Executive Assistant
Texas Board of Veterinary Medical Examiners
Earliest possible date of adoption: October 20, 2013
For further information, please call: (512) 305-7563

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TITLE 30. ENVIRONMENTAL QUALITY

PART 1. TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

CHAPTER 298. ENVIRONMENTAL FLOW STANDARDS FOR SURFACE WATER

The Texas Commission on Environmental Quality (TCEQ or commission) proposes new §§298.400, 298.405, 298.410, 298.415, 298.425, 298.430, 298.435, 298.440, 298.450, 298.455, 298.460, 298.465, 298.470, 298.475, 298.480, 298.485, 298.490, 298.500, 298.505, 298.510, 298.515, 298.520, 298.525, 298.530, 298.535, and 298.540.

Background and Summary of the Factual Basis for the Proposed Rules

In 2007, the 80th Legislature passed House Bill 3 (HB 3), relating to the management of the water resources of the state, including the protection of instream flows and freshwater inflows; and Senate Bill 3 (SB 3), relating to the development, management, and preservation of the water resources of the state. Both of these bills amended Texas Water Code (TWC), §11.1471, which requires the commission to adopt rules related to environmental flow standards and set-asides. The commission is proposing to implement the environmental flow provisions of HB 3, Article 1, and SB 3, Article 1, and proposes environmental flow standards for the Brazos River and its associated bay and estuary system, the Nueces River and Corpus Christi and Baffin Bays, and the river basin and bay system consisting of the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre.

Prior to HB 3/SB 3, the commission had authority to protect environmental interests as it permitted state surface water. The commission had authority to maintain: existing instream uses under TWC, §11.147(d); water quality under TWC, §11.147(d) and §11.150; fish and wildlife habitat under TWC, §11.147(e) and §11.152; and freshwater inflows to bay and estuary systems under TWC, §11.147(a) - (c). TWC, §11.147(b) - (e) and §11.152 required that these environmental considerations be included only to the extent practicable or reasonable and required that environmental considerations be considered along with other factors of public welfare. HB 3/SB 3 did not make major changes to this commission authority.

The commission also retains its ability, granted prior to HB 3/SB 3, to place special conditions in water right permits to protect environmental interests. Before HB 3/SB 3, TWC, §11.134(b)(3)(D), required consideration of environmental interests for new appropriations of water, including amendments that granted an increase in the amount of water that could be diverted, and TWC, §11.085, required consideration of environmental interests for interbasin transfers. Permits for water projects that call for the re-diversion of wastewater or return flows to a watercourse, so called "indirect reuse" projects, were also subject to special conditions to protect environmental uses under TWC, §11.042 and §11.046. Amendments that were not new appropriations were required to be authorized if, among other criteria, the amendment would not cause adverse impact to the environment of greater magnitude than under the original permit under TWC, §11.122(b). As a practical matter, if any adverse impact to the environment was noted in an application for an amendment, then special conditions were crafted to remove the adverse impact so that the amendment might be granted.

HB 3/SB 3 changed the process by which the state would decide the flow that needed to be preserved in the watercourse for the environment and the balancing of environmental interests along with other public interests. HB 3/SB 3 created a statewide Environmental Flows Advisory Group (Advisory Group). The Advisory Group was given the responsibility to appoint Basin and Bay Area Stakeholder Committees (the stakeholder committee) for each of the state's river basin, bay, and estuary systems. The stakeholder committees, in turn, appointed a Basin and Bay Expert Science Team (the science team). The science teams were to develop a recommended environmental flow regime, or schedule of flow quantities adequate to support a sound ecological environment. The stakeholders were to take the science team's recommendations and consider those recommendations in conjunction with other factors, including the present and future needs for water for other uses. The stakeholders were also to report their recommendations to the commission. Both the science teams and the stakeholder committees were to reach their recommendations on a consensus basis to the maximum extent possible. The commission, in turn, is to take the recommendations from the science team, the stakeholder committees, the Advisory Group, and a statewide Science Advisory Committee (SAC), and consider that information along with other information and by rule adopt environmental flow standards for each basin and bay system. At the same time the commission is to establish an amount of unappropriated water, if available, to be set aside to satisfy the environmental flow standards to the maximum extent reasonable when considering human water needs. Once the environmental flow standards are adopted, the commission's objective or goal will be to protect the standards, along

with the interests of senior water right holders, in its water rights permitting process for new appropriations and amendments that increase the amount of water to be taken, stored, or diverted. Under HB 3/SB 3, the commission may use the set-aside or use its existing authority to place special conditions in permits to protect the environmental flow standards.

The commission received the Nueces River and Corpus Christi and Baffin Bays science team report on October 28, 2011, and the stakeholder committee report on August 22, 2012. The commission received the Brazos River and its associated bay and estuary system science team report on March 1, 2012, and the stakeholder committee report on August 31, 2012. The commission received the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre science team reports on July 12, 2012 and July 25, 2012; however, the stakeholders for this basin and bay system did not submit a report.

Copies of the Nueces River and Corpus Christi and Baffin Bays reports are available on the following Web site: *http://www.tceq.texas.gov/permitting/water_rights/eflows/nueces-river-and-corpus-christi-and-baffin-bays-stakeholder-committee-and-expert-science-team.*

Copies of the Brazos River and its associated bay and estuary system reports are available on the following Web site: *http://www.tceq.texas.gov/permitting/water_rights/eflows/brazos-river-and-associated-bay-and-estuary-system-stakeholder-committee-and-expert-science-team.*

Copies of the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre science team reports are available on the following Web site: *http://www.tceq.texas.gov/permitting/water_rights/eflows/rio-grande-rio-grande-estuary-and-lower-laguna-madre.*

The commission proposes Subchapter F to cover the Nueces River and Corpus Christi and Baffin Bays. The commission proposes Subchapter G to cover the Brazos River and its associated bay and estuary system. The commission proposes Subchapter H to cover the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre.

Section by Section Discussion

Subchapter F: Nueces River and Corpus Christi and Baffin Bays

The commission proposes new Subchapter F to contain all of the environmental flow standards and rules specific to the basin and bay system composed of the Nueces River and Corpus Christi and Baffin Bays. The science team delivered its report to the commission on October 28, 2011. The stakeholder committee delivered its recommendations to the commission on August 22, 2012. The commission must now adopt environmental flow standards as required under TWC, §11.02362(d). This proposed new subchapter would implement the schedule established by the Advisory Group under TWC, §11.02362, and environmental flow standards required of the commission in TWC, §11.1471. The commission specifically invites commenters to provide any relevant information that may differ from its proposed standards, which in the commenter's opinion would assist the commission in deciding on final environmental flow standards. The final environmental flow standards may either be higher or lower than the environmental flow standards in this proposed rule and may include additional components consistent with the recommendations of the stakeholder committee report. The commission invites comments on all aspects of the stakeholder committee report.

§298.400, Applicability and Purpose

The commission proposes new §298.400 to describe the purpose of Subchapter F and under what circumstances it applies.

§298.405, Definitions

The commission proposes new §298.405. The proposed section has definitions of terms that will apply only to this subchapter. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the proposed standards. In §298.405(1), (6), (8), and (11) the commission proposes definitions for "Fall," "Spring," "Summer," and "Winter" because the proposed environmental flow standards for the Nueces River and its associated tributaries, and rivers and tributaries in the Nueces-Rio Grande Coastal Basin, vary by season. The definitions are the same as the definitions of the seasons in the recommendations of the science team, which were subsequently used by the stakeholders to develop their recommendations. In §298.405(2) the commission proposes a definition for "Inflow regime" because the proposed freshwater inflow standards for Nueces Bay and Delta vary by season and year. In §298.405(3), (9), and (10) the commission proposes definitions for "Modeled permitting frequency," "Target volume," and "Target frequency." These frequencies and quantities are used for the sole purpose of providing additional freshwater inflows to Nueces Bay and Delta through voluntary strategies. In §298.405(4) and (5) the commission proposes definitions for "Nueces Bay," and "Nueces Delta" to set out the geographical extent of the area to be supported by the proposed freshwater inflow standards, and to specify areas of interest for §298.410, Findings. Finally, in §298.405(7) the commission proposes a definition for "Sound ecological environment" for this basin and bay system. This proposed definition is based on the definition recommended by the stakeholders.

§298.410, Findings

The commission proposes new §298.410 regarding findings related to sound ecological environments. The proposed finding regarding the ecological environment is consistent with the stakeholder report. Information on the commission's reasoning for the proposed schedule of flow quantities and environmental flow standards can be found in this preamble under the analyses for §298.425 and §298.430. This proposed new section would implement TWC, §11.1471.

§298.415, Set-Asides and Standards Priority Date

The commission proposes new §298.415 establishing the priority date for any set-asides and any modeling of the environmental flow standards in the commission's water availability models (WAMs) as the date the commission received the report from the science team for the basin and bay system, which was October 28, 2011. The commission protects high flow pulse standards from being permitted to smaller applicants for new appropriations because, under proposed §298.435(b), some of the high flow pulse standards would not be included in some water right permits for new appropriations. In addition, the commission needs to ensure that new appropriations, or amendments to add a new appropriation, will not affect downstream flow standards at measurement points that may not be applicable to those new appropriations or amendments. The commission also adds these changes to ensure consistency with adopted §298.20, which establishes the priority date for environmental flow standards and

set asides as the date the commission received the environmental flow regime recommendations from the science team.

§298.425, Schedule of Flow Quantities

The commission proposes new §298.425 regarding the schedule of flow quantities. The commission proposes this section to explain the implementation of the environmental flow standards in the following section. The commission does not necessarily intend to use the exact wording of this section as the wording in water right permits issued after the adoption of these rules. However, this section describes how the commission intends to implement the proposed environmental flow standards in water right permit or amendment applications for new appropriations.

Subsistence flows are the minimum flows below which the commission will not allow diversions or storage of water. Therefore, the water right holder may not divert or store water if the flow at an applicable measurement point is below the subsistence flow standard. The commission proposes that if the flow at an applicable measurement point is above the subsistence flow standard but below the applicable base flow standard, the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass a measurement point, and any remaining flow may be diverted or stored. The commission's proposed rule provides that the subsistence flow standard can be variable depending on the season, and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season.

Once the flow at an applicable measurement point is above the base flow standard for the season, the water right holder may store or divert water according to its permit as long as the flow at the measurement point does not fall below the applicable base flow standard for that season.

The commission's proposed rule provides that pulse flows be allowed to pass if streamflows are above the base or subsistence flow standard for the season, subject to the pulse flow exemption as described in §298.435(b), and if the pulse flow trigger level is reached at an applicable measurement point. Once the pulse flow trigger conditions are met, the water right holder may not store or divert water until either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred.

The proposed rule does not require that the water right holder produce a pulse flow, because pulses occur when there are high rainfall events. The commission does propose that during these high rainfall events, the applicable high flow pulse be allowed to pass downstream. The commission's proposed rule provides that a water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse. The commission also proposes that a water right holder can divert water in excess of the applicable pulse requirement so long as those diversions do not prevent the occurrence of the pulse flow trigger level of the applicable pulse and as long as the duration or volume requirement is met for the applicable pulse.

If, in a particular season, only one of the small, medium, or large seasonal high flow pulses or annual pulses identified in the commission's proposed rule is generated, there would be no need to "catch up" or allow more than the applicable number of high flow pulses to pass in the following season. The commission proposes that pulse flows not be tied to a hydrologic condition. In addition, the proposed rule provides that if the pulse requirements for a medium or large seasonal high flow pulse event or an annual pulse event are satisfied and therefore this high flow pulse is allowed to pass, the requirements for one of each of the applicable smaller high flow pulse events during that season or year would be considered to be satisfied at the applicable measurement point.

The commission's proposed rule provides that if a water right owner stored water at a previous time and complied with the applicable environmental flow requirements at that time, the water right owner would not need to comply with any environmental flow requirements in effect when subsequent use of that stored water occurs.

§298.430, Environmental Flow Standards

The commission proposes new §298.430 to provide the environmental flow standards of TWC, §11.1471, for the basin and bay system composed of the Nueces River and Corpus Christi and Baffin Bays. The commission based its decision on consideration of the recommendations of stakeholders, sound science, and other public interests and relevant factors.

The proposed freshwater inflow standards for Nueces Bay and Delta generally track the recommendations of the stakeholders. The commission recognizes that freshwater inflows to Nueces Bay and Delta are currently provided through a commission approved Agreed Order. The commission further recognizes the role of environmental flow standards in both water rights permitting and in establishing targets for purposes of providing additional freshwater inflows through voluntary strategies. Based on this, the commission proposes a dual set of recommendations for freshwater inflows to Nueces Bay and Delta. The commission does not propose specific frequencies for use in water availability determinations in the proposed rule because WAMs change as new permits and amendments are added. The proposed rule provides that new permits or amendments to increase the amount of water stored, taken, or diverted shall not impair the frequency at which specific inflow regime levels occur by more than the values set out in §298.430(a)(3)(A) - (C), as compared to the baseline values in the commission's WAMs in effect at the time the first application for a water right permit or amendment subject to this subchapter is considered. The commission proposes new §298.430(a)(1) and (2) to set out how the allowable impairment will be calculated and applied in water availability determinations for new water rights or amendments subject to this subchapter. The commission proposes new §298.430(a)(3)(A) - (C) to set out how the allowable impairment will be calculated for each specific inflow regime. Finally, the commission proposes new §298.430(a)(3)(D) to provide that the Target volumes for each season and year are independent of the preceding and subsequent seasons and years.

The stakeholders proposed that the environmental flow standards for this basin and bay system include a provision allowing the Nueces Estuary Advisory Council (NEAC) the opportunity to review and provide recommendations to the commission on applications for new appropriations of water in excess of 500 acre-feet per year. The stakeholders stated purpose for this provision is so that the NEAC could recommend approval of an application violating specified attainment frequencies, but providing significant benefits to the bay and estuary through operations, permit conditions, or adaptive management.

The stakeholders' request is not allowable under TCEQs procedures for the public to become involved in water rights applica-

tions. If the NEAC wishes to be a party to any contested case matter on applications in the Nueces River Basin, the NEAC would have to follow the procedure in TWC, §5.115 and TCEQ's rules in 30 TAC Chapter 55. However, the NEAC, or its individual members, may be on the mailing list for any application and may file comments during the comment period. The stakeholders stated that NEAC needs to review and provide recommendations to the commission on applications for new appropriations of water so that the NEAC could recommend changes to the environmental flow standards adopted in the rules. The commission cannot change the environmental standards in the rules as part of a proceeding on a water rights application. Under TWC, §11.1471(f), the commission may only change environmental flow standards through another rulemaking, after a stakeholder process, and no more often than every ten years (unless the stakeholder group recommends a more frequent basis). Therefore, the commission did not include provisions allowing the NEAC to participate in the water rights permitting process in the proposed rule because other rules and statutes govern the water rights permitting process and because changes to adopted standards can only occur via a rulemaking process.

The commission's proposed rule further provides that if strategies are implemented through a water right permit to provide additional freshwater inflows to Nueces Bay and Nueces Delta, any subsequent new permits or amendments for new appropriations of water not be allowed to reduce the frequency at which inflow regime levels occur below the levels that would occur in the commission's WAM with the permitted strategy or strategies in place.

The measurement points and the proposed base flow and subsistence flow standards for the Nueces River Basin and the Nueces-Rio Grande Coastal Basin are generally those recommended by the stakeholders. However, the stakeholders recommended an environmental flow standard at Leona Springs near Uvalde. The commission notes that, when it proposed this rule, daily discharge information was not publically available. The lack of readily accessible daily data could create implementation issues for specific water right holders who could be subject to an environmental flow standard at this location; therefore, the commission has not proposed environmental flow standards at this location.

The proposed high flow pulse standards are generally based on recommendations of the stakeholders. At some locations, the stakeholders recommended pulse flows with durations in excess of one month. There was little site-specific information supporting specific high flow pulses, including pulses with long durations. Therefore, the commission did not include pulse flows with durations longer than 30 days in the proposed rule. The stakeholders also proposed pulse flow trigger levels that were either below or very close to the base flow values at some measurement points in some seasons. The commission did not include these pulses in the proposed rule because they would likely not represent high flows within the watercourse in the context of the environmental flow standards proposed by the stakeholders. The number of applicable high flow pulses was also adjusted based on the impacts of pulse flows on remaining unappropriated water as discussed further.

The stakeholders performed an analysis of the impacts of the proposed standards on future water supply needs and considered the results of these analyses in their recommendations. The executive director (ED) reviewed the information provided by the stakeholders. The ED also performed his own analysis to address the issue of balancing human and other competing needs for water in the basin and bay system. The ED's analysis is not intended as a finding that water is available for specific projects. When applications for projects are evaluated, water availability is based on specific facts in those applications.

The ED analyzed the impacts of the proposed standards on the remaining unappropriated water at representative measurement points in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin. The ED based his analysis on results from the WAM used for his water availability determinations for new permits or amendments that request a new appropriation of water. The ED calculated both the amount of unappropriated water at selected measurement points and the impact of the proposed standards on unappropriated water. The remaining unappropriated water in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, before application of the proposed standards, varied from less than 1% of the time to approximately 47% of the time, and averages 10% overall for these basins. Unappropriated water in these basins generally occurs during times of higher flow; therefore, increasing pulse volumes and frequencies during wetter periods reduces the remaining unappropriated flow. The ED evaluated the freshwater inflow standards recommended by the stakeholders and found that application of the standards resulted in some water available for appropriation during higher flow events. Copies of the WAMs used in this analysis are available at: *http://www.tceq.texas.gov /goto/eflows/rulemaking.*

The ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify areas of concern that need to be addressed through this rulemaking process. The ED also considered whether reduction of the proposed standards would result in a significant increase in unappropriated water in these basins and found that it did not. Based on the results of the analysis of unappropriated flow and the water quality analysis, the ED determined that there would be no significant impact from implementation of the proposed standards.

The proposed rule does not set aside any unappropriated water to protect the proposed environmental flow standards. Any unappropriated water that is available in these river basins is available only during relatively wet conditions. The commission determines that the environmental flow standards may be adequately protected by special conditions in water right permits or amendments for new appropriations of water in these basins. Special conditions are a more effective method to maximize the use of water by allowing water to be used for dual purposes. Special conditions to protect environmental flows may allow water permitted to downstream senior water rights, as well as return flows and permitted but unused water, to satisfy the special conditions. This proposed new section would implement TWC, §11.1471.

§298.435, Water Right Permit Conditions

The commission proposes new §298.435 relating to water right permit conditions. The proposed provision would require the commission to place special conditions in water right permits for new appropriations and amendments that would add additional appropriations to existing permits. The special conditions would be to protect the environmental flow standards established by the subchapter. Consistent with the recommendations of the stakeholders, the proposed rule provides that, for water right permit applications where the diversion rate is less than 20% of a

pulse flow trigger requirement, the water right permit or amendment would not include special conditions relative to that high flow pulse. This proposed new section would implement TWC, §11.134(b)(3)(D) and §11.1471.

§298.440, Schedule for Revision of Standards

The commission proposes new §298.440 to provide the schedule for re-examination of the environmental flow standards. The proposed rule requires that the commission take up a possible rulemaking to change the standards ten years from the effective date of the rules, unless the stakeholder committee submits a work plan approved by the Advisory Group that calls for a more frequent review. The commission notes that it is prohibited from providing that the rulemaking process occurs more frequently than once every ten years unless the stakeholders' work plan approved by the Advisory Group under TWC, §11.02362(p), calls for a more frequent schedule. The commission notes that, as of the time of proposal of these rules, it has not received an approved work plan from the stakeholder committee. Should the commission receive an approved work plan before final adoption of this rule package, the commission may consider an amendment to this section and change the schedule more often than once every ten years. The proposed new section would implement TWC, §11.1471(f).

Subchapter G: Brazos River and Associated Bay and Estuary System

The commission proposed new Subchapter G to contain all of the environmental flow standards and rules specific to the basin and bay system composed of the Brazos River and its associated tributaries, and its bay and estuary system, and the Brazos-Colorado Coastal Basin. The science team delivered its report to the commission on March 1, 2012. The stakeholder committee delivered its recommendations to the commission on August 31, 2012. The commission proposes environmental flow standards as required under TWC, §11.02362(d). This proposed new subchapter would implement the schedule established by the Advisory Group under TWC, §11.02362, and environmental flow standards required of the commission in TWC, §11.1471. The commission specifically invites commenters to provide any relevant information that may differ from its proposed standards, which in the commenter's opinion would assist the commission in deciding on final environmental flow standards. The final environmental flow standards may either be higher or lower than the environmental flow standards in this proposed rule and may include additional components consistent with either the recommendations of the full stakeholder committee or the recommendations included in the minority report. The commission invites comments on all aspects of the full stakeholder committee report, which includes the minority report.

§298.450, Applicability and Purpose

The commission proposes new §298.450 to describe the purpose of Subchapter G and under what circumstances it applies.

§298.455, Definitions

The commission proposes new §298.455. The proposed section has definitions of terms that will apply only to this subchapter. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the adopted standards. In §298.455(1), (3), and (12) the commission proposes definitions for "Average condition," "Dry condition," and "Wet condition" because the proposed environmental flow standards vary according to hydrologic condition. A range of flow conditions - average, dry, and wet - is proposed to be defined as the stakeholders recommended. In §298.455(2), the commission proposes a definition of "Climatic division" to be used solely for the purpose of calculating the PHDI value, as set out in §298.470. In §298.455(4), (5), and (11) the commission proposes definitions for "Lower basin," "Middle basin," and "Upper basin," to describe geographic areas of the Brazos River Basin and the Brazos-Colorado Coastal Basin for purposes of calculating and applying the hydrologic conditions set out in §298.470. In §298.455(6) and (7), the commission proposes definitions for "PHDI" or Palmer Hydrologic Drought Index and "PHDI Index" which is a regionalized PHDI to set out the method for calculating those hydrologic conditions. In §298.455(8), (10), and (13) the commission proposes definitions for the seasons "Spring," "Summer," and "Winter" because the proposed environmental flow standards for this basin and bay system vary by season. The definitions are the same as the definitions of the seasons in the recommendations of the science team, which were subsequently used by the stakeholders to develop their recommendations. Finally, in §298.455(9) the commission adopts a definition for "Sound ecological environment" for this basin and bay system. This adopted definition is based on the definition recommended by the science team.

§298.460, Findings

The commission proposes new §298.460 regarding findings related to sound ecological environments. The proposed finding regarding the ecological environment is consistent with the science team and stakeholder reports. The commission's reasoning for the proposed schedule of flow quantities and environmental flow standards is described in this preamble under the discussion for §§298.470, 298.475, and 298.480. This proposed new section would implement TWC, §11.1471.

§298.465, Set-Asides and Standards Priority Date

The commission proposes new §298.465 establishing the priority date for any set-asides and any modeling of the environmental flow standards in the commission's WAMs as the date the commission received the report from the science team for the basin and bay system, which was March 1, 2012. The commission protects high flow pulse standards from being permitted to smaller applicants for new appropriations because under proposed §298.485(b) and (c), some of the high flow pulse standards would not be included in some water right permits for new appropriations. In addition, the commission needs to ensure that new appropriations, or amendments to add a new appropriation, will not affect downstream flow standards at measurement points that may not be applicable to those new appropriations or amendments. The commission also adds these changes to ensure consistency with adopted §298.20, which establishes the priority date for environmental flow standards and set asides as the date the commission received the environmental flow regime recommendations from the science team.

§298.470, Calculation of Hydrologic Conditions

The commission proposes new §298.470 to explain the determination of hydrologic conditions for implementation and application of the standards to water right permits to which the proposed standards apply. The hydrologic conditions are based on the recommendations of the stakeholders. The commission proposes new §298.470(a) to describe how the hydrologic condition for a

season will be determined for new water rights and amendments which are subject to the proposed standards.

The National Weather Service divides Texas into ten climatic divisions. The Brazos River Basin is included within eight of these divisions. The stakeholder report includes a calculation of the percentage of each climate division in each of the three basin geographic areas - Upper basin, Middle basin, and Lower basin, as these geographic areas are described in §298.455, Definitions. The commission proposes new §298.470(b) to set out the percentage of each climate division within each geographic area.

The commission proposes new §298.470(c) to explain the calculation of hydrologic conditions for water rights permits or amendments to which hydrologic conditions apply. Consistent with the recommendation of the stakeholders, the commission proposes a PHDI Index that determines which base flow conditions would apply to a water right holder subject to the environmental flow standards in this subchapter. The percentage of each climate division within each geographic area, as set out in §298.470(b), is used to calculate a PHDI value for each month of the historic record (1895 - 2010). The PHDI values were then ranked and used to create the PHDI Index where the 25th percentile value was used to describe the dry hydrologic condition and the 75th percentile value was used to describe the wet hydrologic condition. The commission also proposes new §298.470(d) to provide for ongoing, periodic revisions of the hydrologic conditions.

§298.475, Schedule of Flow Quantities

The commission proposes new §298.475 regarding the schedule of flow quantities. The commission proposes this section to explain the implementation of the environmental flow standards in the following section. The commission may not use the exact wording of this section as the wording in water right permits issued after the adoption of these rules. However, this section describes how the commission will implement the proposed environmental flow standards in water right permits or amendments for new appropriations.

Subsistence flows are the minimum flows below which the commission will not allow diversions or storage of water. Therefore, the water right holder may not divert or store water if the flow at an applicable measurement point is below the subsistence flow standard. During dry hydrologic conditions, if the flow at an applicable measurement point is above the subsistence flow standard but below the applicable dry base flow standard, the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass its measurement points, and any remaining flow may be diverted or stored. The commission's proposed rules provide that the subsistence flow standard can be variable depending on the season, and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season.

During dry, average, or wet hydrologic conditions, a water right holder may not divert water when the flow is below the base flow standard for that season. Once the flow at an applicable measurement point is above the base flow standard for the season, the water right holder may store or divert water according to its permit as long as the flow at the measurement point does not fall below the applicable base flow standard for that season and in accordance with the applicable hydrologic condition as set out in §298.470.

The commission's proposed rules provide that pulse flows be allowed to pass if streamflows are above the base flow standard for the season and if the pulse flow trigger level is reached at a measurement point. The commission's proposed rules provide that once the pulse flow trigger conditions are met, the water right owner may not store or divert water unless the streamflow at an applicable measurement point is at or above the pulse flow trigger level and the applicable pulse duration has occurred. Once the pulse flow trigger conditions are met, the water right holder may not store or divert water until either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred.

The stakeholders also recommended additional implementation requirements for high flow pulses based on the science team's recommendations. The stakeholders recommended that in addition to allowing a water right holder to store or divert water after either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred, a water rights holder could also store or divert water when the mean daily streamflow recedes to at or below a specific minimum pulse flow value, or, the mean daily streamflow recedes to at or below a specific maximum base flow value and decreases by 5% or less in a day. These additional requirements were based on the science team's proposed pulse flow implementation scheme in which pulse flows were not tied to hydrologic condition. However, the stakeholders recommended a different implementation scheme that tied pulses to a hydrologic condition. The stakeholders' additional implementation recommendations are not consistent with their proposed implementation scheme. Therefore, the commission did not include the stakeholders' additional implementation requirements in the proposed rule.

The proposed rule does not require that a water right holder produce a high flow pulse because pulses occur when there are high rainfall events. The commission's proposed rule does provide that during these high rainfall events, the applicable high flow pulse be allowed to pass downstream. The commission's proposed rule provides that a water right holder can divert water in excess of the applicable pulse flow trigger requirement as long as those diversions do not prevent the occurrence of the pulse flow trigger level of the applicable pulse and as long as the duration or volume requirement is met for the applicable pulse.

If, in a particular season, fewer than the required number of seasonal high flow pulses identified in the commission's proposed rule is generated, there would be no need to "catch up" or allow more than the applicable number of high flow pulses to pass in the following season. Based on the recommendation of the stakeholders, pulses are tied to the hydrologic conditions set out in §298.470. For measurement points set out in §298.480(7) and (8), the proposed rule provides that if streamflows are above the smaller high flow pulse trigger level, and subsequently rise to the larger high flow pulse trigger level, the pulse flow trigger level for the larger pulse event would govern diversions and storage by a water right holder. In addition, once the pulse requirements for the larger seasonal high flow pulse event are satisfied and therefore this high flow pulse is allowed to pass downstream, the requirements for the smaller seasonal high flow pulse event during that season would be considered to be satisfied at the applicable measurement point.

The commission's proposed rule provides that if a water right owner stored water at a previous time and complied with the applicable environmental flow requirements at that time, the water right owner would not need to comply with any environmental flow requirements in effect when subsequent use of that stored water occurs.

§298.480, Environmental Flow Standards

The commission adopts new §298.480 to provide the environmental flow standards of TWC, §11.1471, for the basin and bay system composed of the Brazos River and its associated tributaries and bay and estuary system and the Brazos-Colorado Coastal Basin. The commission based its decision on consideration of the recommendations from the stakeholders, sound science, and other public interests and relevant factors.

The measurement points and the proposed base flow and subsistence flow standards are generally based on the stakeholders' recommendation. The commission received additional scientific information for the Clear Fork Brazos River. Based on this information, which was not available at the time the science team and stakeholders considered their recommendations, the commission proposes to substitute environmental flow standards at United States Geological Survey (USGS) gage 08084200, Clear Fork Brazos River at Lueders, for the stakeholders' recommended USGS gage 08085500, Clear Fork Brazos River at Fort Griffin. The proposed high flow pulse standards are based on the recommendations of the majority of the stakeholders. The commission's proposed rule corrects a typographical error in the stakeholders' recommendation for the four per season pulses for the Brazos River at Glen Rose for the average and wet seasons.

The stakeholders performed an analysis of the impacts of the proposed standards on future water supply needs and considered the results of these analyses in their recommendations. The ED reviewed the information provided by the stakeholders and also performed his own analysis. The ED's analysis is not intended as a finding that water is available for specific projects. When applications for projects are evaluated, water availability is based on specific facts in those applications.

The ED's selected scenario for the balancing analysis is based on a hypothetical diversion of a large amount of water from the North Fork Double Mountain Fork of the Brazos River. This amount of water, 10,000 acre-feet, is less than the amount identified in the Regional Water Plan as necessary for future human water needs. For this evaluation, the ED used the commission's WAM for the Brazos river basin and modified it by adding the selected scenario. The ED performed analyses to estimate water availability under four conditions: 1) no environmental flow requirements; 2) application of the commission's current default methodology; 3) application of the minority recommendation; and, 4) application of the proposed environmental flow standards. This analysis is intended to address the impacts of different environmental flow conditions on diversions of water from the river and therefore does not include a storage component. Applying either no instream flow requirement or the default methodology produces an annual availability of 54%. Application of the recommendation of the minority stakeholders produces an annual availability of 19%. Finally, application of the stakeholders' recommendation produces an annual availability of 28%. Annual availability is the percentage of time that the annual diversion requirement is met from river diversions.

Unappropriated water in the Brazos River Basin generally occurs during times of higher flow; therefore, as the ED's analysis indicates, increasing pulse volumes and frequencies reduces the remaining unappropriated flow that could be available for future human needs. Copies of the WAM used in this analysis are available at: *http://www.tceq.texas.gov /goto/eflows/rulemaking.*

The ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify any areas of concern that need to be addressed through this rulemaking process. The ED also considered whether reduction of the proposed standards would result in a significant increase in unappropriated water in the Brazos River Basin and found that it did not.

The proposed rule does not set aside any unappropriated water to protect the proposed environmental flow standards. Any unappropriated water that is available in these river basins is available only during relatively wet conditions. The commission determines that the environmental flow standards may be adequately protected by special conditions in water right permits or amendments for new appropriations of water in these basins. Special conditions are a more effective method to maximize the use of water by allowing water to be used for dual purposes. Special conditions to protect environmental flows may allow water permitted to downstream senior water rights, as well as return flows and permitted but unused water, to satisfy the special conditions. This adopted new section would implement TWC, §11.1471.

§298.485, Water Right Permit Conditions

The commission proposed new §298.485 relating to water right permit conditions. The proposed provision would require the commission to place special conditions in water right permits for new appropriations and amendments that would add additional appropriations to existing permits. The special conditions would be to protect the environmental flow standards established by the subchapter. Consistent with the recommendations of the stakeholders, the adopted rule provides that, for water right permit applications where the diversion rate is less than 20% of a pulse flow trigger requirement, the water right permit or amendment would not include special conditions relative to that high flow pulse. The proposed rule also provides an exemption from pulse flow requirements for certain new water right applications in the Palo Pinto Creek watershed that increase the amount of authorized storage by less than 15%. This proposed new section would implement TWC, §11.134(b)(3)(D) and §11.1471.

§298.490, Schedule for Revision of Standards

The commission proposes new §298.490 to provide the schedule for re-examination of the environmental flow standards. The commission proposes to take up a possible rulemaking to change the standards ten years from the effective date of the rules, unless the stakeholder committee submits a work plan approved by the Advisory Group that calls for a more frequent review. The commission notes that it is prohibited from providing that the rulemaking process occurs more frequently than once every ten years unless the stakeholders' work plan approved by the Advisory Group under TWC, §11.02362(p), calls for a more frequent schedule. The commission notes that, as of the time of proposal of these rules, it has not received an approved work plan from the stakeholder committee. Should the commission receive an approved work plan after final adoption of this rule package, the commission may consider an amendment to this section and change the schedule more often than once every ten years. The proposed new section would implement TWC, §11.1471(f).

Subchapter H: Rio Grande, Rio Grande Estuary, and Lower Laguna Madres

The commission proposes new Subchapter H to contain all of the environmental flow standards and rules specific to the basin and bay system composed of the Rio Grande, Rio Grande estuary, and Lower Laguna Madre. There were two science teams for this basin and bay system, one for the lower portion of the basin and one for the upper portion of the basin. The science teams delivered their reports to the commission on July 12, 2012 and July 25, 2012. The stakeholder committee did not submit a recommendation. The commission must now adopt environmental flow standards as required under TWC, §11.02362(d). This proposed new subchapter would implement the schedule established by the Advisory Group under TWC, §11.02362, and environmental flow standards required of the commission in TWC, §11.1471. The commission specifically invites commenters to provide any relevant information that may differ from its proposed standards, which in the commenter's opinion would assist the commission in deciding on final environmental flow standards. The final environmental flow standards may either be higher or lower than the environmental flow standards in this proposed rule and may include additional components consistent with the recommendations of the science team reports or any stakeholder recommendations that may be submitted. The commission invites comments on all aspects of the science team reports or any stakeholder report that may be submitted.

§298.500, Applicability and Purpose

The commission proposes new §298.500 to describe the purpose of Subchapter H and under what circumstances it applies.

§298.505, Definitions

The commission proposes new §298.505. The proposed section has definitions of terms that will apply only to this subchapter. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the proposed standards. In §298.505(1), (2), (6), and (7) the commission proposes definitions for "Average condition," "Dry condition," "Subsistence condition," and "Wet condition" because the proposed environmental flow standards vary according to hydrologic condition. A range of flow conditions - average, dry, subsistence, and wet - is proposed to be defined as the science team recommended. In §298.505(3), (4), and (7), the commission proposed definitions for "Fall," "Spring," and "Winter," because the proposed environmental flow standards for the Rio Grande and its associated tributaries vary by season. The definitions are the same as the definitions of the seasons in the recommendations of the science team. Finally, in §298.505(5) the commission proposes a definition for "Sound ecological environment" for the Rio Grande, and its associated tributaries in Texas. This proposed definition is based on the definition recommended by the science team.

§298.510, Findings

The commission proposes new §298.510 regarding findings related to sound ecological environments. The proposed finding regarding the ecological environment is consistent with the Upper Rio Grande science team report. Information on the commission's reasoning for the proposed schedule of flow quantities and environmental flow standards can be found in this preamble under the analyses for §298.525 and §298.530. This proposed new section would implement TWC, §11.1471.

§298.515, Set-Asides and Standards Priority Date

The commission proposes new §298.515 establishing the priority date for any set-asides and any modeling of the environmental flow standards in the commission's WAMs as the latest date the commission received a report from the science teams for the basin and bay system, which was July 25, 2012. The commission protects high flow pulse standards from being permitted to smaller applicants for new appropriations. In addition, the commission needs to ensure that new appropriations, or amendments to add a new appropriation, will not affect downstream flow standards at measurement points that may not be applicable to those new appropriations or amendments. The commission also adds these changes to ensure consistency with adopted §298.20, which establishes the priority date for environmental flow standards and set asides as the date the commission received the environmental flow regime recommendations from the science team.

§298.520, Calculation of Hydrologic Conditions

The commission proposes new §298.520 to explain the determination of hydrologic conditions for implementation and application of the standards to water right permits to which the proposed standards apply. The method for determining hydrologic conditions, for water right permits to which hydrologic conditions are applicable, for use as special conditions in those water right permits, is based on the recommendations of the Upper Rio Grande science team. Implementation of hydrologic conditions in the commission's WAMs, used in the availability determination for water rights permitting for the Rio Grande, and its associated tributaries in Texas, may result in different cumulative streamflows than those derived for the purposes of developing special conditions for a water right permit to which those hydrologic conditions are applicable. The commission's proposed rule provides that, for purposes of water availability determinations, hydrologic conditions used in the commission's WAMs will be calculated based on the period of record for the applicable WAM and using the applicable frequencies for hydrologic conditions recommended by the Upper Rio Grande science team applied to the WAM simulated flows.

§298.525, Schedule of Flow Quantities

The commission proposes new §298.525 regarding the schedule of flow quantities. The commission proposes this section to explain the implementation of the environmental flow standards in the following section. The commission does not necessarily intend to use the exact wording of this section as the wording in water right permits issued after the adoption of these rules. However, this section describes how the commission intends to implement the proposed environmental flow standards in water right permit or amendment applications for new appropriations.

Subsistence flows are the minimum flows below which the commission will not allow diversions or storage of water. Therefore, the water right holder may not divert or store water if the flow at an applicable measurement point is below the subsistence flow standard. The commission proposes that, during subsistence hydrologic conditions, if the flow at an applicable measurement point is above the subsistence flow standard but below the applicable high flow pulse flow trigger level, the water right holder must allow the applicable subsistence flow to pass a measurement point, and any remaining flow may be diverted or stored. The commission's proposed rule provides that the subsistence flow standard can be variable depending on the season, and that only the subsistence flow for a particular season limits diversions by a water right subject to the standards, in that season.

Once the flow at an applicable measurement point is above the base flow standard for the season, the water right holder may store or divert water according to its permit as long as the flow at the measurement point does not fall below the applicable base flow standard for that season.

The commission's proposed rule provides that pulse flows be allowed to pass if streamflows are above the base or subsistence flow standard for the season, and if the pulse flow trigger level is reached at an applicable measurement point. Once the pulse flow trigger conditions are met, the water right holder may not store or divert water until either the applicable pulse volume passes the applicable measurement point or the applicable pulse duration has occurred.

The proposed rule does not require that the water right holder produce a pulse flow, because pulses occur when there are high rainfall events. The commission does propose that during these high rainfall events, the applicable high flow pulse be allowed to pass downstream. Under the commission's proposed rule, a water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse. The commission also proposes that a water right holder can divert water in excess of the applicable pulse requirement so long as those diversions do not prevent the occurrence of the pulse flow trigger level of the applicable pulse and as long as the duration or volume requirement is met for the applicable pulse.

If, in a particular season, only one of the seasonal high flow pulses or annual pulses identified in the commission's proposed rule is generated, there would be no need to "catch up" or allow more than the applicable number of high flow pulses to pass in the following season. The commission proposes that pulse flows not be tied to a hydrologic condition. In addition, the proposed rule provides that if the pulse requirements for an annual high flow pulse event are satisfied and therefore this high flow pulse is allowed to pass, the requirements for one of the applicable smaller high flow pulse event during that season would be considered to be satisfied at the applicable measurement point.

The commission's proposed rule provides that if a water right owner stored water at a previous time and complied with the applicable environmental flow requirements at that time, the water right owner would not need to comply with any environmental flow requirements in effect when subsequent use of that stored water occurs.

§298.530, Environmental Flow Standards

The commission proposes new §298.530 to provide the environmental flow standards of TWC, §11.1471, for the basin and bay system composed of the Rio Grande, and its associated tributaries in Texas. The commission based its decision on consideration of the recommendations of the science teams, sound science, and other public interests and relevant factors.

TWC, §11.02362 recognizes that the Rio Grande is unique. Under TWC, §11.02362(m), the science team could not consider Mexico's water use. This section of the statute also requires the stakeholders to consider the water accounting requirements of any international water sharing treaty, minutes, and agreement applicable to the Rio Grande and effects on water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande. Under TWC, §11.02362(o) the science team could not make an environmental flow regime recommendation that violates a treaty or court decision. Although the commission received reports from the science teams, it did not receive a report from the stakeholders. Therefore, the commission considered the science team's recommendations, the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande in developing the proposed rule.

The science team for the lower Rio Grande, Rio Grande estuary, and Lower Laguna Madre proposed freshwater inflow requirements for the Rio Grande estuary and the Lower Laguna Madre. For the Lower Laguna Madre, the science team recommended dry and wet season freshwater inflows that were not intended to support development of environmental flow standards that would provide more freshwater inflows to the Lower Laguna Madre. The science team stated that the recommendations were intended to be used by the stakeholders to develop strategies. Therefore, the commission did not include freshwater inflow recommendations for the Lower Laguna Madre in the proposed rule.

Regarding the Rio Grande estuary, the science team recommended freshwater inflow requirements. The United States' share of river water is administered by the Rio Grande Watermaster and is based in storage in the Amistad/Falcon reservoir system. In addition, as recognized by the science team, all of the United States' share of the water in the main stem of the Rio Grande is committed to existing users. Any water that is released from the storage and not diverted by existing users would flow to the estuary. Additional water may also be available to the estuary as a result of very large rainfall events that occur below the reservoirs and is in excess of the amount of water needed by existing users under the treaty. After considering the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande, as well as water allocation by the Rio Grande Watermaster in the Middle and Lower Rio Grande, the commission did not include freshwater inflow standards for the Rio Grande estuary in the proposed rule.

For the Rio Grande above the Amistad/Falcon reservoir system, the commission proposes standards for four measurement points, two on the main stem of the Rio Grande and the remaining two on tributaries to the Rio Grande within Texas. For the tributary measurement points, the proposed base flow and subsistence flow standards are generally those recommended by the science team. The proposed high flow pulse standards are also generally based on recommendations of the science team. The science team also recommended pulse flow trigger levels that were either below or very close to the base flow values at some measurement points in some seasons. The commission did not include these pulses in the proposed rule because they would likely not represent high flows within the watercourse in the context of the suite of environmental flow standards proposed by the science team. The number of applicable high flow pulses was also adjusted where the values recommended by the science team were inconsistent with the flow regime, for example, where a higher tier pulse flow trigger level was lower than a lower tier pulse flow trigger level.

The science team included overbank flows in its recommended flow regime. The commission acknowledges that overbank flows are considered to be a component of a flow regime for a sound ecological environment. However, these flows result from naturally occurring large rainfall events, which will likely continue to occur. Therefore, the commission is not including overbank flows as a component of the proposed standards.

For the proposed measurement points on the main stem of the Rio Grande, the commission considered the water accounting requirements of international water sharing treaties, minutes, and agreements applicable to the Rio Grande. The commission reduced the science team's flow regime to 38% of the recommended value so that the proposed standards would be based on the United States' estimated average share of the water flowing in the main stem of the Rio Grande.

The stakeholders did not submit a recommendation; therefore the ED performed his own analysis to address the issue of balancing human and other competing needs for water in the basin and bay system. The ED reviewed the remaining unappropriated water at the measurement points in the proposed rule. The ED based his review on results from the WAM used for his water availability determinations for new permits or amendments that request a new appropriation of water. The ED determined that unappropriated water was available at these locations in five months out of a 732-month period of record and therefore it is unlikely that any new permits could be granted. Copies of the WAM used in this analysis are available at: *http://www.tceq.texas.gov /goto/eflows/rulemaking.*

The ED performed water quality analyses to evaluate relationships between streamflow and the water quality parameters identified by the science team and to look for trends and criteria excursions. These analyses did not identify areas of concern that need to be addressed through this rulemaking process. Based on the results of the ED's review of unappropriated flow and the water quality analysis, the ED determined that there would be no significant impact from implementation of the proposed standards.

The proposed rule does not set aside any unappropriated water to protect the proposed environmental flow standards. Unappropriated water is extremely limited in the Rio Grande. In addition, under 30 TAC §303.23(a) all waters that cannot be used by water right holders in the Upper Rio Grande shall be made available to the Lower and Middle Rio Grande system. The commission determines that the environmental flow standards may be adequately protected by special conditions in water right permits or amendments for new appropriations of water in these basins. Special conditions are a more effective method to maximize the use of water by allowing water to be used for dual purposes. Special conditions to protect environmental flows may allow water permitted to downstream senior water rights, as well as return flows and permitted but unused water, to satisfy the special conditions. This proposed new section would implement TWC, §11.1471.

§298.535, Water Right Permit Conditions

The commission proposes new §298.535 relating to water right permit conditions. The proposed provision would require the commission to place special conditions in water right permits for new appropriations and amendments that would add additional appropriations to existing permits. The special conditions would be to protect the environmental flow standards established by the subchapter. This proposed new section would implement TWC, §11.134(b)(3)(D) and §11.1471.

§298.540, Schedule for Revision of Standards

The commission proposes new §298.540 to provide the schedule for re-examination of the environmental flow standards. The proposed rule requires that the commission take up a possible rulemaking to change the standards ten years from the effective date of the rules, unless the stakeholder committee submits a work plan approved by the Advisory Group that calls for a more frequent review. The commission notes that it is prohibited from providing that the rulemaking process occurs more frequently than once every ten years unless the stakeholders' work plan approved by the Advisory Group under TWC, §11.02362(p), calls for a more frequent schedule. The commission notes that, as of the time of proposal of these rules, it has not received an approved work plan from the stakeholder committee. Should the commission receive an approved work plan before final adoption of this rule package, the commission may consider an amendment to this section and change the schedule more often than once every ten years. The proposed new section would implement TWC, §11.1471(f).

Fiscal Note: Costs to State and Local Government

Nina Chamness, Strategic Planning and Assessment Section Analyst, has determined that for the first five-year period the proposed rules are in effect, no significant fiscal implications are anticipated for the agency or for other units of state or local government as a result of administration or enforcement of the proposed rules.

The proposed rulemaking implements SB 3 and HB 3 from the 80th Legislative Session by adopting appropriate environmental flow standards for the Brazos and Nueces River and for the Rio Grande Basin. Any governmental entity that applies for a new appropriation of water could potentially be affected by the environmental flow standards, including river authorities, cities, and water districts.

The rulemaking does not propose any new fees nor does it change existing ones. The proposed rulemaking does propose specific standards that will be applied by TCEQ staff during the technical review of applications for new appropriations of water. These proposed standards are the result of stakeholder recommendations and will replace the methodology currently used to determine streamflow requirements. Once the environmental flow standards are adopted, the standards will be a part of the commission's water rights permitting process.

The proposed standards may reduce the number of new appropriations and permit amendments that would increase the amount of water to be taken, stored, or diverted, and therefore could result in an applicant having to secure an additional source of water. However, under existing practice streamflow restrictions are currently applied to new appropriations of water. The environmental flow standards as proposed in the rules are expected to function similarly to current streamflow restrictions. Any effect of the proposed rules on an application for new appropriations would depend upon the type of application, the location of the application in the river basin, bay and estuary inflow requirements, and the overall water availability in that basin. In the Brazos and Nueces River Basins, staff's preliminary analysis indicates that the impacts may be greater for applications for direct diversions than for applications that include storage. In addition, for applications for new water in the Nueces River Basin, bay and estuary inflow requirements would be considered in availability determinations. No impacts are expected for the Rio Grande Basin since all available water has been appropriated and none is available for new permits.

Because the proposed standards are expected to function similarly to current streamflow restrictions for applications, the proposed standards are not expected to have significant fiscal implications for units of state or local government including river authorities, cities, or water districts.

Public Benefits and Costs

Ms. Chamness has also determined that for each year of the first five years the proposed new rules are in effect, the public benefit anticipated from the changes seen in the proposed rules will be to provide certainty for the state's water management and development as well as adequate protection of the state's streams, rivers, bays, and estuaries.

The proposed rules are not anticipated to have significant fiscal implications for businesses or individuals. The proposed rules will provide appropriate environmental flow standards for the river and bay systems of the Brazos and Nueces River Basins, and the Rio Grande River Basin. However, any business or individual who applies for a new appropriation of water could potentially be affected by the proposed environmental flow standards. The effect of the proposed rules on an applicant would depend on the type of application, the location in the river basin, bay and estuary inflow requirements, and the overall water availability in that basin.

In the Brazos and Nueces River Basins, staff's preliminary analysis indicates that the impacts may be greater for applications for direct diversions than for applications that include storage. In addition, for applications for new water in the Nueces River Basin, bay and estuary inflow requirements would be considered in availability determinations. No impacts are expected for the Rio Grande Basin since all available water has been appropriated and none is available for new permits.

Because the proposed rules may affect new appropriations and amendments that increase the amount of water to be taken, stored, or diverted, an applicant may have to secure an additional source of water. If a business is a water supplier and applies for a new appropriation of water and the availability for the appropriation is reduced, then individual water customers may see an increase in costs for water. However, streamflow restrictions are currently applied to new appropriations of water and the proposed standards are expected to function similarly to current streamflow restrictions for applications. Therefore, the proposed standards are not expected to have significant fiscal implications for businesses and individuals.

Small Business and Micro-Business Assessment

No adverse fiscal implications are anticipated for small or micro-businesses as a result of the administration or implementation of the proposed rules. The proposed rules will provide appropriate environmental flow standards for the river and bay systems of the Brazos and Nueces River Basins as well as the Rio Grande River Basin. The proposed rules may affect new appropriations and amendments that increase the amount of water to be taken, stored, or diverted, which could result in an applicant having to secure an additional source of water. However, because streamflow restrictions are currently applied to new appropriations of water under existing practice and the proposed environmental flow standards would function similarly to current streamflow restrictions, no adverse fiscal implications are anticipated for small or micro-businesses.

Small Business Regulatory Flexibility Analysis

The commission has reviewed this proposed rulemaking and determined that a small business regulatory flexibility analysis is not required because the proposed rules are not expected to adversely affect small or micro-businesses for the first five years that they are in effect. In addition, the proposed rules are required in order to implement state law and are necessary to protect public health, safety, and the environment.

Local Employment Impact Statement

The commission has reviewed this proposed rulemaking and determined that a local employment impact statement is not required because the proposed rules do not adversely affect a local economy in a material way for the first five years that the proposed rules are in effect.

Draft Regulatory Impact Analysis Determination

The commission evaluated these proposed rules and performed an analysis of whether these proposed rules require a regulatory impact analysis under Texas Government Code, §2001.0225. The purpose of these rules is to establish environmental flow standards, set asides, and procedures for implementing an adjustment of these standards required in a permit or amendment for the Nueces River and Corpus Christi and Baffin Bays, the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre, and the Brazos River and its associated bay and estuary system, under TWC, §11.1471(a).

These amendments are not a "major environmental rule" under Texas Government Code, §2001.0225 because although the specific intent of the rulemaking is to protect the environment, these rules do not potentially adversely affect in a material way the economy, or a sector of the economy. New appropriations and other water rights that can potentially impact instream flows or bays and estuaries issued by the agency have been reviewed for environmental impact since 1985 and the water rights contain environmental conditions. This rule package will require that environmental impact will now be done by rule. This should not adversely impact the economy.

Also, the purpose of these rules is not to exceed a standard set by federal law, exceed an express requirement of state law, exceed a requirement of a delegation agreement or contract between the state and an agency of the federal government to implement a state and federal program, or to adopt a rules solely under the general powers of the agency instead of specific state law. This rulemaking is specifically required by TWC, §11.1471. Therefore, no regulatory impact analysis is required under Texas Government Code, §2001.0225, for this rulemaking.

Written comments on the draft regulatory impact analysis determination may be submitted to the contact person at the address listed under the Submittal of Comments section of this preamble.

Takings Impact Assessment

The commission evaluated these proposed rules and performed analysis of whether these proposed rules constitute a takings under Texas Government Code, Chapter 2007. The specific purpose of these rules is to establish environmental flow standards, set asides, and procedures for implementing an adjustment of these standards required in a permit or amendment for the Nueces River and Corpus Christi and Baffin Bays, the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre, and the Brazos River and its associated bay and estuary system, as required by TWC, §11.1471(a).

Promulgation and enforcement of these proposed rules would be neither a statutory nor a constitutional taking of private real property. Specifically, because under TWC, §11.147(e-1), these rules cannot be retroactively applied to water rights issued before September 1, 2007, the subject proposed regulations do not affect those water right holder's rights in private real property. For

those new water rights issued after September 1, 2007, but before these environmental standards were adopted, these water rights contain environmental conditions, if necessary, and a provision stating that the water right could be reopened to add the environmental standards. This amendment to the permit to add the rule may not increase the amount of pass-through or release for the environmental in the existing water right by more than 12.5% of the annualized total of the existing requirement in the permit. Also, this amendment will not change the amount of water authorized for diversion in the permit, but only affects when the permittee can take the water. The provision was intended to protect the yield of water rights granted after 2007 and before the adoption of a standard.

Thus, this rulemaking does not burden (constitutionally); nor restrict or limit the owner's right to existing property and reduce its value by 25% or more beyond that which would otherwise exist in the absence of the regulations.

Consistency with the Coastal Management Program

The commission reviewed the adopted rulemaking and found that the proposal is subject to the Texas Coastal Management Program (CMP) in accordance with the Coastal Coordination Act, Texas Natural Resources Code, §§33.201 *et seq.,* and, therefore, must be consistent with all applicable CMP goals and policies. The commission conducted a consistency determination for the proposed rules in accordance with Coastal Coordination Act Implementation Rules, 31 TAC §505.22, and found the proposed rulemaking is consistent with the applicable CMP goals and policies.

CMP goals applicable to the proposed rules include: 1) to protect, preserve, restore, and enhance the diversity, quality, quantity, functions, and values of coastal natural resource areas; and, 2) to ensure sound management of all coastal resources by allowing for compatible economic development and multiple human uses of the coastal zone. CMP policies applicable to the proposed rules include those contained in 31 TAC §501.33. The proposed rules implement HB 3/SB 3, which established the environmental flows process to provide certainty in water management and development and to provide adequate protection of the state's streams, rivers, bays, and estuaries. Since one of the purposes of the proposed rules is to protect coastal natural resources, the rules are consistent with CMP goals and policies.

Promulgation and enforcement of these rules will not violate or exceed any standards identified in the applicable CMP goals and policies, because the proposed rules are consistent with these CMP goals and policies, because these rules do not create or have a direct or significant adverse effect on any coastal natural resource areas, and because one of the purposes of the proposed rules is to protect coastal natural resources.

Written comments on the consistency of this rulemaking may be submitted to the contact person at the address listed under the Submittal of Comments section of this preamble.

Announcement of Hearing

The commission will hold a public hearing on this proposal in Austin on October 15, 2013, at 10:00 a.m. in Building E, Room 201S, at the commission's central office located at 12100 Park 35 Circle. The hearing is structured for the receipt of oral or written comments by interested persons. Individuals may present oral statements when called upon in order of registration. Open discussion will not be permitted during the hearing; however, commission staff members will be available to discuss the proposal 30 minutes prior to the hearing.

Persons who have special communication or other accommodation needs who are planning to attend the hearing should contact Sandy Wong, Office of Legal Services, at (512) 239-1802. Requests should be made as far in advance as possible.

Submittal of Comments

Written comments may be submitted to Charlotte Horn, MC 205, Office of Legal Services, Texas Commission on Environmental Quality, P.O. Box 13087, Austin, Texas 78711-3087 or faxed to (512) 239-4808. Electronic comments may be submitted at: *http://www5.tceq.texas.gov/rules/ecomments/.* File size restrictions may apply to comments being submitted via the eComments system. All comments should reference Rule Project Number 2013-009-298-OW. The comment period closes October 21, 2013. Copies of the proposed rulemaking can be obtained from the commission's Web site at *http://www.tceq.texas.gov/nav/rules/propose_adopt.html.* For further information, please contact Ron Ellis, Water Rights Permitting and Availability Section, at (512) 239-1282.

SUBCHAPTER F. NUECES RIVER AND CORPUS CHRISTI AND BAFFIN BAYS

30 TAC §§298.400, 298.405, 298.410, 298.415, 298.425, 298.430, 298.435, 298.440

Statutory Authority

The new sections are proposed under Texas Water Code (TWC), §5.102, concerning General Powers; TWC, §5.103, concerning Rules; and TWC, §5.105, concerning General Policy, which authorize the commission to adopt rules as necessary to carry out its power and duties under the TWC. The new sections are also proposed under TWC, §11.0235, concerning Policy Regarding Waters of the State; TWC, §11.147, concerning Effects of Permit on Bays and Estuaries and Instream Uses; and TWC, §11.1471, concerning Environmental Flow Standards and Set-Asides.

The proposed new sections implement TWC, §§11.0235, 11.147, and 11.1471.

§298.400. Applicability and Purpose.

This subchapter contains the environmental flow standards for the Nueces River, its associated tributaries, the Nueces-Rio Grande Coastal Basin, and Corpus Christi and Baffin Bays. The provisions of this subchapter will prevail over any provisions of Subchapter A of this chapter (relating to General Provisions) that are inconsistent with this subchapter relating to environmental flow standards and regulation in the Nueces River, its associated tributaries, the Nueces-Rio Grande Coastal Basin, and Corpus Christi and Baffin Bays.

§298.405. Definitions.

The following words or phrases have the following meanings in this subchapter unless the context clearly indicates otherwise:

(1) Fall--for the measurement points listed in §298.430(c)(3) - (5), (9), and (12) - (19) of this title (relating to Environmental Flow Standards), the period of time September through October, inclusive and for all other measurement points, the period of time October through November, inclusive.

(2) Inflow regime--a freshwater inflow pattern, at the most downstream point on the Nueces River where the river enters the Nueces Bay and Delta, that includes quantities and frequencies that vary throughout the year.

(3) Modeled permitting frequency--the frequencies at which specific volumes of freshwater inflows occur in the commission's water availability models for the Nueces river basin.

(4) Nueces Bay--a secondary bay of Corpus Christi Bay.

(5) Nueces Delta--an area of vegetated marshes, mud flats, and open water formed where the Nueces River flows into Nueces Bay.

(6) Spring--the period of time April through June, inclusive.

(7) Sound ecological environment--maintains, to some reasonable level, the physical, chemical, and biological attributes and processes of the natural system.

(8) Summer--for the measurement points listed in §298.430(c)(3) - (5), (9), and (12) - (19) of this title (relating to Environmental Flow Standards), the period of time July through August, inclusive and for all other measurement points, the period of time July through September, inclusive.

(9) Target frequency--the frequency at which specific target volumes of freshwater inflows occur, and which are used for the sole purpose of providing additional freshwater inflows to Nueces Bay and Nueces Delta through voluntary strategies.

(10) Target Volume--volumes of freshwater inflows which are used for the sole purpose of providing additional freshwater inflows to Nueces Bay and Delta through voluntary strategies.

(11) Winter--for the measurement points listed in §298.430(c)(3) - (5), (9), and (12) - (19) of this title (relating to Environmental Flow Standards), the period of time November through March, inclusive and for all other measurement points, the period of time December through March, inclusive.

§298.410. Findings.

(a) The Nueces River and its associated tributaries, tributaries in the Nueces Rio Grande Coastal Basin, and Corpus Christi and Baffin Bays are substantially sound ecological environments.

(b) For the Nueces River and its associated tributaries, and tributaries in the Nueces-Rio Grande Coastal Basin, the commission finds that these sound ecological environments can best be maintained by a set of flow standards that implement a schedule of flow quantities that contain subsistence flow, base flow, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in subsistence or base flow conditions, will vary from year to year and within a year from season to season, and the number of pulses protected will also vary with the amount of precipitation.

(c) For Nueces Bay and Nueces Delta, the commission finds that the freshwater inflow standards in this subchapter are appropriate environmental flow standards that are adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors. The existing ecological condition of Nueces Bay and Nueces Delta may be improved, but will not be diminished, by the freshwater inflow standards in this subchapter.

§298.415. Set-Asides and Standards Priority Date.

The priority date for the environmental flow standards and set-asides established by this subchapter is October 28, 2011. The priority date for the environmental flow standards will be used in the water availability determination for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted and has no other purpose.

§298.425. Schedule of Flow Quantities.

(a) Schedule of flow quantities. The environmental flow standards proposed in this subchapter constitute a schedule of flow quantities made up of subsistence flow, base flow, and high flow pulses. Environmental flow standards are established for 19 measurement points in §298.430 of this title (relating to Environmental Flow Standards) and this section.

(b) Subsistence flow. The applicable subsistence flow standard varies depending on the seasons as described in §298.405 of this title (relating to Definitions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder may not store or divert water, unless the flow at the measurement point is above the applicable subsistence flow standard for that point. If the flow at the applicable measurement point is above the subsistence flow standard but below the base flow standard, then the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass its measurement point and any remaining flow may be diverted or stored, according to its permit, subject to senior and superior water rights, as long as the flow at the measurement point does not fall below the applicable subsistence flow standard.

(c) Base flow. The applicable base flow level varies depending on the seasons as described in §298.405 of this title. For a water right holder, to which an environmental flow standard applies, at a measurement point that applies to a water right, the water right holder is subject to a base flow standard. For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, when the flow at the applicable measurement point is above the applicable base flow standard, but below any applicable high flow pulse trigger levels, the water right holder may store or divert water according to its permit, subject to senior and superior water rights, as long as the flow at the applicable measurement point does not fall below the applicable base flow standard.

(d) High flow pulses. High flow pulses are relatively short-duration, high flows within the watercourse that occur during or immediately following a storm event.

(1) Two or three pulses per season are to be passed (i.e., no storage or diversion by an applicable water right holder), if applicable, and as described in §298.430 of this title, if the flows are above the applicable subsistence or base flow standard, and if the applicable high flow pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level and until either the applicable volume amount has passed the measurement point or the applicable duration time has passed since the high flow pulse trigger level occurred. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse.

(2) If the applicable high flow pulse flow trigger level does not occur in a season, then the water right holder need not stop storing or diverting water to produce a high flow pulse. The water right holder is not required to release water lawfully stored to produce a high flow pulse.

(3) Each season is independent of the preceding and subsequent seasons with respect to high flow pulse frequency.

(4) High flow pulses are applicable under both subsistence and base flow conditions.

(5) If a pulse flow requirement for a medium or large seasonal pulse or an annual pulse is satisfied for a particular season or year, one of each of the applicable smaller pulse requirements is also considered to be satisfied.

(e) Stored water. A water right owner that has stored water in accordance with the terms and conditions of its water right, including any applicable environmental flow requirement in effect at the time the water was stored, may divert, release, or use this water, even if the applicable environmental flow requirement is not met at the time of the subsequent diversion, release, or use of that stored water.

§298.430. Environmental Flow Standards.

(a) A water right application in the Nueces River Basin, which increases the amount of water authorized to be stored, taken, or diverted as described in §298.10 of this title (relating to Applicability), shall not cause or contribute to an impairment of the inflow regimes as described in the figure in this subsection. Impairment of the inflow regime shall be evaluated as part of the water availability determination for a new water right or amendment that is subject to this subchapter. For purposes of this subsection, impairment would occur if the application, when considered in combination with any authorizations subject to this subchapter, which were issued prior to this application, would impair the modeled permitting frequency of any inflow regime by more than the values set out in paragraph (3)(A) - (C) of this subsection.

(1) Impairment to the modeled permitting frequency shall be calculated individually for each inflow regime level in the figure located in paragraph (3) of this subsection for which a specific frequency is identified, at the point in the water availability model which represents inflows to Nueces Bay and Nueces Delta.

(2) Impairment is calculated by subtraction of the values set out in paragraph (3)(A) - (C) of this subsection.

(3) Bay and Estuary Freshwater Inflow Standards for Nueces Bay and Nueces Delta.
Figure: 30 TAC §298.430(a)(3)

(A) The modeled permitting frequencies for the target volumes for Level 1, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased by more than 50%.

(B) The modeled permitting frequencies for the target volumes for Level 2, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased by more than 25%.

(C) The modeled permitting frequencies for the target volumes for Level 3, as described in the figure located in paragraph (3) of this subsection, and calculated as a percentage of total months or years, as applicable, shall not be decreased by more than 10%.

(D) Each season and year is independent of the preceding and subsequent seasons and years with respect to the calculation of the Target Volume, as described in the figure located in paragraph (3) of this subsection.

(b) To the extent that strategies are implemented through a water rights permit or amendment to help meet the freshwater inflow standards for Nueces Bay and Delta, a water right application in the Nueces River Basin, which increases the amount of water authorized to be stored, taken or diverted as described in §298.10 of this title, shall not reduce the modeled permitting frequency for any inflow regime level, listed in the figure located in subsection (a)(3) of this section, below the level that would occur with the permitted strategy or strategies in place.

(c) The following environmental flow standards are established for the following described measurement points:

(1) Nueces River at Laguna, Texas, generally described as United States Geological Survey (USGS) gage 08190000, and more particularly described as Latitude 29 degrees, 25 minutes, 42 seconds; Longitude 99 degrees, 59 minutes, 49 seconds.
Figure: 30 TAC §298.430(c)(1)

(2) West Nueces River near Bracketville, Texas, generally described as USGS gage 08190500, and more particularly described as Latitude 29 degrees, 28 minutes, 51.9 seconds; Longitude 100 degrees, 14 minutes, 21 seconds.
Figure: 30 TAC §298.430(c)(2)

(3) Nueces River below Uvalde, Texas, generally described as USGS gage 08192000, and more particularly described as Latitude 29 degrees, 7 minutes, 25 seconds; Longitude 99 degrees, 53 minutes, 40 seconds.
Figure: 30 TAC §298.430(c)(3)

(4) Nueces River at Cotulla, Texas, generally described as USGS gage 08194000, and more particularly described as Latitude 28 degrees, 25 minutes, 34 seconds; Longitude 99 degrees, 14 minutes, 23 seconds.
Figure: 30 TAC §298.430(c)(4)

(5) Nueces River near Tilden, Texas generally described as USGS gage 08194500, and more particularly described as Latitude 28 degrees, 18 minutes, 31 seconds; Longitude 98 degrees, 33 minutes, 25 seconds.
Figure: 30 TAC §298.430(c)(5)

(6) Frio River at Concan, Texas, generally described as USGS gage 08195000, and more particularly described as Latitude 29 degrees, 29 minutes, 18 seconds; Longitude 99 degrees, 42 minutes, 16 seconds.
Figure: 30 TAC §298.430(c)(6)

(7) Dry Frio River near Reagan Wells, Texas, generally described as USGS gage 08196000, and more particularly described as Latitude 29 degrees, 30 minutes, 16 seconds; Longitude 99 degrees, 46 minutes, 52 seconds.
Figure: 30 TAC §298.430(c)(7)

(8) Sabinal River near Sabinal, Texas, generally described as USGS gage 08198000, and more particularly described as Latitude 29 degrees, 29 minutes, 27 seconds; Longitude 99 degrees, 29 minutes, 33 seconds.
Figure: 30 TAC §298.430(c)(8)

(9) Sabinal River at Sabinal, Texas, generally described as USGS gage 08198500, and more particularly described as Latitude 29 degrees, 18 minutes, 51.5 seconds; Longitude 99 degrees, 28 minutes, 49.7 seconds.
Figure: 30 TAC §298.430(c)(9)

(10) Hondo Creek near Tarpley, Texas, generally described as USGS gage 08200000, and more particularly described as Latitude 29 degrees, 34 minutes, 12.11 seconds; Longitude 99 degrees, 14 minutes, 51.68 seconds.
Figure: 30 TAC §298.430(c)(10)

(11) Seco Creek at Miller Ranch near Utopia, Texas, generally described as USGS gage 08201500, and more particularly described as Latitude 29 degrees, 34 minutes, 23 seconds; Longitude 99 degrees, 24 minutes, 10 seconds.
Figure: 30 TAC §298.430(c)(11)

(12) Frio River near Derby, Texas, generally described as USGS gage 08205500, and more particularly described as Latitude 28 degrees, 44 minutes, 11 seconds; Longitude 99 degrees, 08 minutes, 40 seconds.
Figure: 30 TAC §298.430(c)(12)

(13) Frio River at Tilden, Texas, generally described as USGS gage 08206600, and more particularly described as Latitude 28 degrees, 28 minutes, 02 seconds; Longitude 98 degrees, 32 minutes, 50 seconds.
Figure: 30 TAC §298.430(c)(13)

(14) San Miguel Creek near Tilden, Texas, generally described as USGS gage 08206700, and more particularly described as Latitude 28 degrees, 35 minutes, 14 seconds; Longitude 98 degrees, 32 minutes, 44 seconds.
Figure: 30 TAC §298.430(c)(14)

(15) Atascosa River at Whitsett, Texas, generally described as USGS gage 08208000, and more particularly described as Latitude 28 degrees, 37 minutes, 19 seconds; Longitude 98 degrees, 16 minutes, 52 seconds.
Figure: 30 TAC §298.430(c)(15)

(16) Nueces River near Three Rivers, Texas, generally described as USGS gage 08210000, and more particularly described as Latitude 28 degrees, 25 minutes, 38 seconds; Longitude 98 degrees, 10 minutes, 40 seconds.
Figure: 30 TAC §298.430(c)(16)

(17) Nueces River near Mathis, Texas, generally described as USGS gage 08211000, and more particularly described as Latitude 28 degrees, 02 minutes, 17 seconds; Longitude 97 degrees, 51 minutes, 36 seconds.
Figure: 30 TAC §298.430(c)(17)

(18) Oso Creek at Corpus Christi, Texas, generally described as USGS gage 08211520, and more particularly described as Latitude 28 degrees, 42 minutes, 40 seconds; Longitude 97 degrees, 30 minutes, 06 seconds.
Figure: 30 TAC §298.430(c)(18)

(19) San Fernando Creek at Alice, Texas, generally described as USGS gage 08211900, and more particularly described as Latitude 27 degrees, 46 minutes, 20 seconds; Longitude 98 degrees, 02 minutes, 00 seconds.
Figure: 30 TAC §298.430(c)(19)

§298.435. Water Right Permit Conditions.

(a) For water right permits with an authorization to store or divert water in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter.

(b) For water right permits with an authorization to divert water in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin at a rate less than 20% of the pulse trigger level requirements of an applicable high flow pulse at a measurement point, as described in §298.430(c) of this title (relating to Environmental Flow Standards), and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter; however, no special conditions are necessary to preserve or pass that applicable high flow pulse.

§298.440. Schedule for Revision of Standards.

The environmental flow standards or environmental flow set-asides adopted in this subchapter for the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, their associated tributaries, Corpus Christi and Baffin Bays may be revised by the commission through the rulemaking process. The final revised rules shall be effective no sooner than ten years from the effective date of this rule, unless the Nueces River and Corpus Christi and Baffin Bay Area Stakeholder Committee submits a work plan approved by the advisory group under Texas Water Code, §11.02362(p), that provides for a periodic review to occur more frequently. The rulemaking process shall include participation by a balanced representation of stakeholders having interests in the Nueces River Basin and the Nueces-Rio Grande Coastal Basin, their associated tributaries, Corpus Christi and Baffin Bays.

This agency hereby certifies that the proposal has been reviewed by legal counsel and found to be within the agency's legal authority to adopt.

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Robert Martinez
Director, Environmental Law Division
Texas Commission on Environmental Quality
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SUBCHAPTER G. BRAZOS RIVER AND ITS ASSOCIATED BAY AND ESTUARY SYSTEM

30 TAC §§298.450, 298.455, 298.460, 298.465, 298.470, 298.475, 298.480, 298.485, 298.490

Statutory Authority

The new sections are proposed under Texas Water Code (TWC), §5.102, concerning General Powers; TWC, §5.103, concerning Rules; and TWC, §5.105, concerning General Policy, which authorize the commission to adopt rules as necessary to carry out its power and duties under the TWC. The new sections are also proposed under TWC, §11.0235, concerning Policy Regarding Waters of the State; TWC, §11.147, concerning Effects of Permit on Bays and Estuaries and Instream Uses; and TWC, §11.1471, concerning Environmental Flow Standards and Set-Asides.

The proposed new sections implement TWC, §§11.0235, 11.147, and 11.1471.

§298.450. Applicability and Purpose.

This subchapter contains the environmental flow standards for the Brazos River and its associated bay and estuary system. The provisions of this subchapter will prevail over any provisions of Subchapter A of this chapter (relating to General Provisions) that are inconsistent with this subchapter relating to environmental flow standards and regulation in the Brazos River Basin and the Brazos-Colorado Coastal Basin.

§298.455. Definitions.

The following words or phrases have the following meanings in this subchapter unless the context clearly indicates otherwise:

(1) Average condition--for all measurement points, the hydrologic condition that would occur approximately 50% of the time.

(2) Climatic division--a geographic area defined by the National Weather Service.

(3) Dry condition--for all measurement points, the hydrologic condition that would occur approximately 25% of the time and that is intended to represent the driest periods.

(4) Lower Basin--the geographic area of the Brazos River Basin which includes all watersheds below Lake Whitney Dam, and the San Bernard River and coastal watersheds, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this section (relating to Calculation of Hydrologic Conditions).

(5) Middle Basin--the geographic area of the Brazos River Basin which includes all watersheds draining into the Brazos River and its tributaries downstream of Possum Kingdom Dam and upstream of Lake Whitney Dam, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this section (relating to Calculation of Hydrologic Conditions).

(6) PHDI--the Palmer Hydrological Drought Index, based on a scale from -6.0 to 6.0, and representing the severity of moisture conditions from extremely dry to extremely wet.

(7) PHDI Index--a regional PHDI, calculated for the Lower Basin, Middle Basin, and Upper Basin, based on ranked values for a period of record from 1895 through 2010, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this title (relating to Calculation of Hydrologic Conditions).

(8) Spring--the period of time March through June, inclusive.

(9) Sound ecological environment--characterized by fish, macroinvertebrate, and riparian vegetation species that remain relatively intact compared to historical records.

(10) Summer--the period of time July through October, inclusive.

(11) Upper Basin--the geographic area of the Brazos River Basin which includes all watersheds upstream of and draining into Possum Kingdom Lake, and which is defined for the purpose of calculating hydrologic conditions as described in §298.470 of this title (relating to Calculation of Hydrologic Conditions).

(12) Wet condition--for all measurement points, the hydrologic condition that would occur approximately 25% of the time and that is intended to represent the wettest conditions.

(13) Winter--for all measurement points, the period of time November through February, inclusive.

§298.460. Findings.

(a) The Brazos River and its associated tributaries and bay and estuary system and the San Bernard River and its associated tributaries are healthy and sound ecological environments.

(b) The commission finds that these sound ecological environments can best be maintained by a set of flow standards that implement a schedule of flow quantities that contain subsistence flow, base flow, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in subsistence, dry, average, or wet base flow conditions, will vary from year to year and within a year from season to season, and the number of pulses protected will also vary with the amount of precipitation and hydrologic conditions.

§298.465. Set-Asides and Standards Priority Date.

The priority date for the environmental flow standards and set-asides established by this subchapter is March 1, 2012. The priority date for the environmental flow standards will be used in the water availability determination for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted, and has no other purpose.

§298.470. Calculation of Hydrologic Conditions.

(a) For new water right authorizations which increase the amount of water authorized to be stored, taken, or diverted as described in §298.10 of this title (relating to Applicability), the determination of the hydrologic condition for a particular season shall be determined once per season. The PHDI value present on the last day of the month of the preceding season, as reported by the National Weather Service, and calculated for the geographic area as described in subsection (b) of this section, will determine the hydrologic condition for the following season. For each measurement point specified in this section, the PHDI Index will determine the hydrologic condition, as described in subsection (c) of this section.

(b) The percentage of each climatic division within each geographic area, as defined in §298.455 of this title (relating to Definitions), are:

Figure: 30 TAC §298.470(b)

(c) For all measurement points, based on the geographic area in which the measurement point is located, as defined in §298.455 of this title, the PHDI Index and the corresponding hydrologic conditions are:

Figure: 30 TAC §298.470(c)

(d) The PHDI Index for the hydrologic conditions, as set out in subsection (b) of this section govern the operations of permits subject to this subchapter during the initial period, not longer than ten years, until the environmental flow standards in this subchapter are reevaluated. The PHDI Index was calculated to achieve compliance with the percentages of time for dry, average, and wet conditions of 25%, 50%, and 25%, respectively. The PHDI Index set out in subsection (c) of this section will be recalculated, no less frequently than once every ten years, in order to achieve, to the greatest extent possible, compliance with the percentages of time for dry, average, and wet conditions of 25%, 50%, and 25%, respectively.

§298.475. Schedule of Flow Quantities.

(a) Schedule of flow quantities. The environmental flow standards adopted by this subchapter constitute a schedule of flow quantities made up of subsistence flow, base flow, and high flow pulses. Environmental flow standards are established at 20 separate measurement locations in §298.480 of this title (relating to Environmental Flow Standards).

(b) Subsistence flow. The applicable subsistence flow standard varies depending on the seasons as described in §298.455 of this title (relating to Definitions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder may not store or divert water unless the flow at the measurement point is above the applicable subsistence flow standard for that point. If the flow at the applicable measurement point is above the subsistence flow standard but below the applicable dry condition base flow standard, then the water right holder must allow the applicable subsistence flow, plus 50% of the difference between measured streamflow and the applicable subsistence flow, to pass its measurement point and any remaining flow may be diverted or stored, according to its permit, subject to senior and superior water rights, as long as the flow at the measurement point does not fall below the applicable subsistence flow standard.

(c) Base flow. The applicable base flow level varies depending on the seasons as described in §298.455 of this title and the hydrologic condition described in §298.470 of this title (relating to Calculation of Hydrologic Conditions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder is subject to the base flow standard for the hydrologic condition prevailing at that time. For all measurement points, the water right will be subject to one of the following: a dry, an average, or a wet base flow standard. For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, when the flow at the applicable measurement point is above the applicable base flow standard, but below any applicable high flow pulse levels, the water right holder may store or divert water according to its permit, subject to senior and superior water rights, as long as the flow at the applicable measurement point does not fall below the applicable base flow standard for that hydrologic condition.

(d) High flow pulses. High flow pulses are relatively short-duration, high flows within the watercourse that occur during or immediately following a storm event.

(1) For all measurement points, one, two, three, or four pulses per season are to be passed (i.e., no storage or diversion by an applicable water right holder), if applicable, and as described in §298.480 of this title, if streamflows are above the applicable subsistence or base flow standard, and if the applicable high flow pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water until either the applicable volume amount has passed the applicable measurement point or the duration time has passed since the high flow pulse trigger level occurred except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse.

(2) If the applicable high flow pulse trigger level does not occur in a season, then the water right holder need not stop storing or diverting water to produce a high flow pulse. The water right holder is not required to release water lawfully stored to produce a high flow pulse.

(3) Each season is independent of the preceding and subsequent seasons with respect to high flow pulse frequency.

(4) High flow pulses at the applicable measurement point are dependent on the hydrologic conditions set out in §298.470 of this title.

(5) For measurement points in the Brazos River Basin described in §298.480(7) - (8) of this title, if a pulse flow requirement for the large seasonal pulse is satisfied for a particular season, one of the smaller pulse requirements is also considered to be satisfied.

(e) Stored water. A water right owner that has stored water in accordance with the terms and conditions of its water right, including any applicable environmental flow requirement in effect at the time the water was stored, may divert, release, or use this water, even if the applicable environmental flow requirement is not met at the time of the subsequent diversion, release, or use of that stored water.

§298.480. Environmental Flow Standards.

The following environmental flow standards are established for the following described measurement points:

(1) Double Mountain Fork Brazos River near Aspermont, Texas, generally described as United States Geological Survey (USGS) gage 08080500, and more specifically described as Latitude 33 degrees, 00 minutes, 29 seconds; Longitude 100 degrees, 10 minutes, 49 seconds.

Figure: 30 TAC §298.480(1)

(2) Salt Fork Brazos River near Aspermont, Texas, generally described as USGS gage 08082000, and more specifically described as Latitude 33 degrees, 20 minutes, 2 seconds; Longitude 100 degrees, 14 minutes, 16 seconds.

Figure: 30 TAC §298.480(2)

(3) Brazos River at Seymour, Texas, generally described as USGS gage 08082500, and more specifically described as Latitude 33 degrees, 34 minutes, 51 seconds; Longitude 99 degrees, 16 minutes, 02 seconds.

Figure: 30 TAC §298.480(3)

(4) Clear Fork Brazos River at Nugent, Texas, generally described as USGS gage 08084000, and more specifically described as Latitude 32 degrees, 41 minutes, 24 seconds; Longitude 99 degrees, 40 minutes, 09 seconds.

Figure: 30 TAC §298.480(4)

(5) Clear Fork Brazos River at Lueders, Texas, generally described as USGS gage 08084200, and more specifically described as Latitude 32 degrees, 47 minutes, 33.9 seconds; Longitude 99 degrees, 36 minutes, 43.30 seconds.

Figure: 30 TAC §298.480(5)

(6) Brazos River near South Bend, Texas, generally described as USGS gage 08088000, and more specifically described as Latitude 33 degrees, 01 minutes, 27 seconds; Longitude 98 degrees, 38 minutes, 37 seconds.

Figure: 30 TAC §298.480(6)

(7) Brazos River near Palo Pinto, Texas, generally described as USGS gage 08089000, and more specifically described as Latitude 32 degrees, 51 minutes, 45 seconds; Longitude 98 degrees, 18 minutes, 08 seconds.

Figure: 30 TAC §298.480(7)

(8) Brazos River near Glen Rose, Texas, generally described as USGS gage 080891000, and more specifically described as Latitude 32 degrees, 15 minutes, 32 seconds; Longitude 97 degrees, 42 minutes, 08 seconds.

Figure: 30 TAC §298.480(8)

(9) North Bosque River near Clifton, Texas, generally described as USGS gage 08095000, and more specifically described as Latitude 31 degrees, 47 minutes, 09 seconds; Longitude 97 degrees, 34 minutes, 04 seconds.

Figure: 30 TAC §298.480(9)

(10) Brazos River at Waco, Texas, generally described as USGS gage 08096500, and more specifically described as Latitude 31 degrees, 32 minutes, 09 seconds; Longitude 97 degrees, 04 minutes, 23 seconds.

Figure: 30 TAC §298.480(10)

(11) Leon River at Gatesville, Texas, generally described as USGS gage 08100500, and more specifically described as Latitude 31 degrees, 26 minutes, 05 seconds; Longitude 97 degrees, 45 minutes, 30 seconds.

Figure: 30 TAC §298.480(11)

(12) Lampasas River near Kempner, Texas, generally described as USGS gage 08103800, and more specifically described as Latitude 31 degrees, 04 minutes, 45 seconds; Longitude 98 degrees, 00 minutes, 59 seconds.

Figure: 30 TAC §298.480(12)

(13) Little River near Little River, Texas, generally described as USGS gage 08104500, and more specifically described as Latitude 30 degrees, 57 minutes, 59 seconds; Longitude 97 degrees, 20 minutes, 45 seconds.
Figure: 30 TAC §298.480(13)

(14) Little River near Cameron, Texas, generally described as USGS gage 08106500, and more specifically described as Latitude 30 degrees, 50 minutes, 06 seconds; Longitude 96 degrees, 56 minutes, 47 seconds.
Figure: 30 TAC §298.480(14)

(15) Brazos River at SH 21 near Bryan, Texas, generally described as USGS gage 08108700, and more specifically described as Latitude 30 degrees, 37 minutes, 36 seconds; Longitude 96 degrees, 32 minutes, 38 seconds.
Figure: 30 TAC §298.480(15)

(16) Navasota River near Easterly, Texas, generally described as USGS gage 08110500, and more specifically described as Latitude 31 degrees, 10 minutes, 12 seconds; Longitude 96 degrees, 17 minutes, 51 seconds.
Figure: 30 TAC §298.480(16)

(17) Brazos River near Hempstead, Texas, generally described as USGS gage 08111500, and more specifically described as Latitude 30 degrees, 07 minutes, 44 seconds; Longitude 96 degrees, 11 minutes, 15 seconds.
Figure: 30 TAC §298.480(17)

(18) Brazos River at Richmond, Texas, generally described as USGS gage 08114000, and more specifically described as Latitude 29 degrees, 34 minutes, 56 seconds; Longitude 95 degrees, 45 minutes, 27 seconds.
Figure: 30 TAC §298.480(18)

(19) Brazos River near Rosharon, Texas, generally described as USGS gage 08116650, and more specifically described as Latitude 29 degrees, 20 minutes, 58 seconds; Longitude 95 degrees, 34 minutes, 56 seconds.
Figure: 30 TAC §298.480(19)

(20) San Bernard River near Boling, Texas, generally described as USGS gage 08117500, and more specifically described as Latitude 29 degrees, 18 minutes, 48 seconds; Longitude 95 degrees, 53 minutes, 37 seconds.
Figure: 30 TAC §298.480(20)

§298.485. Water Right Permit Conditions.

(a) For water right permits with an authorization to store or divert water from the Brazos River and its associated tributaries, and from the Brazos-Colorado Coastal Basin, and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter.

(b) For water right permits with an authorization to divert water in the Brazos River Basin and the Brazos-Colorado Coastal Basin at a rate less than 20% of the pulse trigger level requirements of an applicable high flow pulse at a measurement point, as described in §298.480 of this title (relating to Environmental Flow Standards), and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter; however, no special conditions are necessary to preserve or pass that applicable high flow pulse.

(c) For water right permit applications that request only to increase authorized storage by up to 15%, in the Palo Pinto Creek watershed, and to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter; however, no special conditions are necessary to preserve or pass any otherwise applicable high flow pulses.

§298.490. Schedule for Revision of Standards.

The environmental flow standards or environmental flow set-asides adopted in this subchapter for the Brazos River and its associated tributaries and its associated bay and estuary system and the Brazos-Colorado Coastal Basin may be revised by the commission through the rulemaking process. The final revised rules shall be effective no sooner than ten years from the effective date of this rule, unless the Brazos River and Associated Bay and Estuary System Stakeholder Committee submits a work plan approved by the Environmental Flows Advisory Group under Texas Water Code, §11.02362(p), that provides for a periodic review to occur more frequently. The rulemaking process shall include participation by a balanced representation of stakeholders having interests in the Brazos River and its associated tributaries and its associated bay and estuary system and the Brazos-Colorado Coastal Basin.

This agency hereby certifies that the proposal has been reviewed by legal counsel and found to be within the agency's legal authority to adopt.

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SUBCHAPTER H. RIO GRANDE, RIO GRANDE ESTUARY, AND LOWER LAGUNA MADRE

30 TAC §§298.500, 298.505, 298.510, 298.515, 298.520, 298.525, 298.530, 298.535, 298.540

Statutory Authority

The new sections are proposed under Texas Water Code (TWC), §5.102, concerning General Powers; TWC, §5.103, concerning Rules; and TWC, §5.105, concerning General Policy, which authorize the commission to adopt rules as necessary to carry out its power and duties under the TWC. The new sections are also proposed under TWC, §11.0235, concerning Policy Regarding Waters of the State; TWC, §11.147, concerning Effects of Permit on Bays and Estuaries and Instream Uses; and TWC, §11.1471, concerning Environmental Flow Standards and Set-Asides.

The proposed new sections implement TWC, §§11.0235, 11.147, and 11.1471.

§298.500. Applicability and Purpose.

This subchapter contains the environmental flow standards for the Rio Grande and its associated tributaries. The provisions of this subchapter will prevail over any provisions of Subchapter A of this chapter

(relating to General Provisions) that are inconsistent with this subchapter relating to environmental flow standards and regulation in the Rio Grande basin.

§298.505. Definitions.

The following words or phrases have the following meanings in this subchapter unless the context clearly indicates otherwise:

(1) Average condition--the hydrologic condition that would occur approximately 50% of the time and that is intended to represent periods that are neither dry nor wet.

(2) Dry condition--the hydrologic condition that would occur approximately 15% of the time and that is intended to represent conditions that are dry but are above the subsistence condition.

(3) Fall--the period of time July through October, inclusive.

(4) Spring--the period of time March through June, inclusive.

(5) Sound ecological environment--an environment that sustains the full complement of the current suite of native species in perpetuity, or at least supports the introduction of extirpated species, sustains key habitat features required by these species, retains key features of the natural flow regime required by these species to complete their life cycles, and sustains key ecosystem processes and services, such as elemental cycling and the productivity of important plant and animal populations.

(6) Subsistence condition--the hydrologic condition that would occur approximately 10% of the time and that is intended to represent the driest periods.

(7) Wet condition--the hydrologic condition that would occur approximately 25% of the time and that is intended to represent the wettest conditions.

(8) Winter--the period of time November through February, inclusive.

§298.510. Findings.

For the Rio Grande, and its associated tributaries located within Texas, the commission finds that the environmental flow standards in this subchapter are appropriate environmental flow standards that are adequate to support a sound ecological environment to the maximum extent reasonable considering other public interests and other relevant factors. The commission finds that the sound ecological environment can best be maintained by a set of flow standards consisting of a schedule of flow quantities that contain subsistence flow, base flows, and high flow pulses at defined measurement points. Minimum flow levels for these components will vary by season and by year since the amount of precipitation and, therefore, whether a system is in subsistence or base flow conditions, will vary from year to year and within a year from season to season, and the number of pulses will also vary with the amount of precipitation.

§298.515. Set-Asides and Standards Priority Date.

The priority date for the environmental flow standards and set-asides established by this subchapter is July 25, 2012. The priority date for the environmental flow standards will be used in the water availability determination for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted, and has no other purpose.

§298.520. Calculation of Hydrologic Conditions.

(a) For new water right authorizations in the Rio Grande Basin which increase the amount of water authorized to be stored, taken, or diverted as described in §298.10 of this title (relating to Applicability), the determination of the hydrologic condition for a particular season shall be determined once per season. The conditions present on the last day of the month of the preceding season will determine the hydrologic condition for the following season for the applicable measurement point. For each measurement point, cumulative streamflow for the previous 12 months will determine the hydrologic condition.

(b) For purposes of permit special conditions related to hydrologic conditions, for water right applications in the Rio Grande Basin, which increase the amount of water to be stored, taken, or diverted, the hydrologic condition shall be calculated using the full period of record for the United States Geological Survey (USGS) gage or the International Boundary and Water Commission (IBWC) gage, as applicable, at each measurement point such that subsistence conditions occur approximately 10% of the time, dry conditions occur approximately 15% of the time, average conditions occur approximately 50% of the time, and wet conditions occur approximately 25% of the time.

(c) For purposes of water availability determinations, for water right permit applications in the Rio Grande Basin, which increase the amount of water to be stored, taken, or diverted, hydrologic conditions used in the commission's water availability model shall be calculated such that subsistence conditions occur approximately 10% of the time, dry conditions occur approximately 15% of the time, average conditions occur approximately 50% of the time, and wet conditions occur approximately 25% of the time, based on the period of record and simulated flows of the water availability model.

§298.525. Schedule of Flow Quantities.

(a) Schedule of flow quantities. The environmental flow standards proposed in this subchapter constitute a schedule of flow quantities made up of subsistence flow, base flows, and high flow pulses. Environmental flow standards are established for five measurement points in §298.530 of this title (relating to Environmental Flow Standards) and this section.

(b) Subsistence flow. The applicable subsistence flow standard varies depending on the seasons as described in §298.505 of this title (relating to Definitions) and hydrologic conditions, as described in §298.520 of this title (relating to Calculation of Hydrologic Conditions). For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, the water right holder may not store or divert water under subsistence hydrologic conditions, unless the flow at the measurement point is above the applicable subsistence flow standard for that point. During subsistence hydrologic conditions, if the flow at the measurement point is above the subsistence flow standard but below the applicable dry condition base flow standard, then the water right holder may divert or store water according to its permit, subject to senior and superior water rights, as long as the flow at the measurement point does not fall below the applicable subsistence flow standard.

(c) Base flow. The applicable base flow standard varies depending on the seasons, as described in §298.505 of this title, and the hydrologic conditions, as described in §298.520 of this title. For a water right holder, to which an environmental flow standard applies, at a measurement point that applies to a water right, the water right holder is subject to a base flow standard for the hydrologic conditions prevailing at the time, i.e., the water right holder will be subject to one of the following: a subsistence, a dry, an average, or a wet base flow standard. For a water right holder to which an environmental flow standard applies, at a measurement point that applies to the water right, when the flow at the applicable measurement point is above the applicable base flow standard, but below any applicable high flow pulse trigger levels, the water right holder may store or divert water according to its permit,

subject to senior and superior water rights, as long as the flow at the applicable measurement point does not fall below the applicable base flow standard.

(d) High flow pulses. High flow pulses are relatively short-duration, high flows within the watercourse that occur during or immediately following a storm event.

(1) One or two pulses per season are to be passed (i.e., no storage or diversion by an applicable water right holder), if applicable, and as described in §298.530 of this title, if the flows are above the applicable subsistence or base flow standard, and if the applicable high flow pulse trigger level is met at the applicable measurement point. The water right holder shall not divert or store water except during times that streamflow at the applicable measurement point exceeds the applicable high flow pulse trigger level and until either the applicable volume amount has passed the measurement point or the applicable duration time has passed since the high flow pulse trigger level occurred. A water right holder can divert water in excess of an applicable pulse flow trigger requirement as long as its diversions do not prevent the occurrence of the pulse flow trigger level of an applicable larger pulse.

(2) If the applicable high flow pulse flow trigger level does not occur in a season, then the water right holder need not stop storing or diverting water to produce a high flow pulse. The water right holder is not required to release water lawfully stored to produce a high flow pulse.

(3) Each season is independent of the preceding and subsequent seasons with respect to high flow pulse frequency.

(4) High flow pulses are independent of the hydrologic conditions set out in §298.520 of this title.

(5) If a pulse flow requirement for an annual pulse is satisfied for a particular season or year, one of the applicable smaller pulse requirements is also considered to be satisfied in that season.

(e) Stored water. A water right owner that has stored water in accordance with the terms and conditions of its water right, including any applicable environmental flow requirement in effect at the time the water was stored, may divert, release, or use this water, even if the applicable environmental flow requirement is not met at the time of the subsequent diversion, release, or use of that stored water.

§298.530. Environmental Flow Standards.

The following environmental flow standards are established for the following described measurement points:

(1) Rio Grande at Johnson Ranch near Castolon, Texas and Santa Elena, Chihuahua, Mexico generally described as International Boundary and Water Commission (IBWC) gage 08-3750.00, and more particularly described as Latitude 29 degrees, 02 minutes, 05 seconds; Longitude 103 degrees, 23 minutes, 25 seconds.
Figure: 30 TAC §298.530(1)

(2) Rio Grande at Foster Ranch near Langtry, Texas and Rancho Santa Rosa, Coahuila, Mexico generally described as IBWC gage 08-3772.00, and more particularly described as Latitude 29 degrees, 46 minutes, 50 seconds; Longitude 101 degrees, 45 minutes, 30 seconds.
Figure: 30 TAC §298.530(2)

(3) Pecos River near Girvin, Texas, generally described as USGS gage 08446500, and more particularly described as Latitude 31 degrees, 06 minutes, 47 seconds; Longitude 102 degrees, 25 minutes, 02 seconds.
Figure: 30 TAC §298.530(3)

(4) Devils River at Pafford Crossing near Comstock, Texas, generally described as IBWC gage 08-4494.00, and more particularly described as Latitude 29 degrees, 40 minutes, 35 seconds; Longitude 101 degrees, 00 minutes, 00 seconds.
Figure: 30 TAC §298.530(4)

§298.535. Water Right Permit Conditions.

For water right permits with an authorization to store or divert water in the Rio Grande Basin, to which the environmental flow standards apply, that are issued after the effective date of this subchapter, the water right permit or amendment shall contain flow restriction special conditions that are adequate to protect the environmental flow standards of this subchapter.

§298.540. Schedule for Revision of Standards.

The environmental flow standards adopted in this subchapter for the Rio Grande, and its associated tributaries in Texas, may be revised by the commission through the rulemaking process. The final revised rules shall be effective no sooner than ten years from the effective date of this rule, unless the Rio Grande Basin, Rio Grande estuary, and Lower Laguna Madre Stakeholder Committee submits a work plan approved by the advisory group under Texas Water Code, §11.02362(p), that provides for a periodic review to occur more frequently. The rulemaking process shall include participation by a balanced representation of stakeholders having interests in the Rio Grande, its associated tributaries, Rio Grande estuary and Lower Laguna Madre.

This agency hereby certifies that the proposal has been reviewed by legal counsel and found to be within the agency's legal authority to adopt.

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TITLE 31. NATURAL RESOURCES AND CONSERVATION

PART 2. TEXAS PARKS AND WILDLIFE DEPARTMENT

CHAPTER 57. FISHERIES

SUBCHAPTER N. STATEWIDE RECREATIONAL AND COMMERCIAL FISHING PROCLAMATION

The Texas Parks and Wildlife Department proposes an amendment to §57.792, concerning General Rules; new §57.1000, concerning Prohibited Transport of Live Nongame Fish; and new §57.1001, concerning Draining of Water from Vessels Leaving or Approaching Public Fresh Water. Proposed new §57.1000 and §57.1001 would comprise new Division 4 under Subchapter N, to be entitled Special Provisions to Prevent the Spread of Exotic Aquatic Species.

The proposed amendment to §57.972, concerning General Rules, would remove current subsection (j), which prohibits the

(d) OTHER FIXED FEES AND CHARGES
(1) Criminal History Evaluation Letter: $32
(2) Returned Check Fee: $25
(3) Duplication of License: $40
(4) Open Records Requests: Charges for all open records and other goods/services such as tapes and discs, will be in accordance with the Office of the Attorney General 1 TAC §§70.1 – 70.12 (relating to Cost of Copies of Public Information)
(5) Application Processing for Board Approval of Equine Dental Provider Certifying Entities: $1,500

Figure: 30 TAC §298.430(a)(3)

Bay and Estuary Freshwater Inflow Standards for Nueces Bay and Delta

Inflow Regime	Target Volume November - February (Target Frequency)	Target Volume March - June (Target Frequency)	Target Volume July - October (Target Frequency)	Target Volume Annual Inflow Target (Target Frequency)
Level 1	125,000 af (11%)	250,000 af (11%)	375,000 af (12%)	750,000 af (16%)
Level 2	22,000 af (23%)	88,000 af (30%)	56,000 af (40%)	166,000 af (47%)
Level 3	5,000 af (69%)	10,000 af (88%)	15,000 af (74%)	30,000 af (95%)

af = acre-feet

Figure: 30 TAC §298.430(c)(1)

United States Geological Survey Gage 08190000, Nueces River at Laguna

	Winter	Spring	Summer	Fall
Subsistence Flow	14 cfs	18 cfs	16 cfs	14 cfs
Base Flow	65 cfs	65 cfs	48 cfs	65 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 99 cfs Volume: 1,560 af Duration: 9 days	N/A	N/A
Large Seasonal Pulse (1 per season)	N/A	Trigger: 390 cfs Volume: 6,070 af Duration: 17 days	Trigger: 170 cfs Volume: 3,100 af Duration: 14 days	N/A
Annual Pulse (2 per year)	Trigger: 590 cfs Volume: 11,300 af Duration: 26 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(2)

United States Geological Survey Gage 08190500, West Nueces River near Bracketville

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	1 cfs	1 cfs	1 cfs	1 cfs
Large Seasonal Pulse (1 per season)	N/A	Trigger: 5 cfs Volume: 76 af Duration: 10 days	Trigger: 5 cfs Volume: 84 af Duration: 13 days	N/A
Annual Pulse (2 per year)	Trigger: 25 cfs Volume: 360 af Duration: 16 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(3)

United States Geological Survey Gage 08192000, Nueces River below Uvalde

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	21 cfs	21 cfs	17 cfs	19 cfs
Large Seasonal Pulse (1 per season)	N/A	Trigger: 110 cfs Volume: 1,280 af Duration: 11 days	N/A	Trigger: 50 cfs Volume: 690 af Duration: 11 days
Annual Pulse (2 per year)	Trigger: 510 cfs Volume: 8,240 af Duration: 26 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(4)

United States Geological Survey Gage 08194000, Nueces River at Cotulla

	Winter	Spring	Summer	Fall
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	6 cfs	10 cfs	7 cfs	15 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 190 cfs Volume: 2,370 af Duration: 17 days	N/A	Trigger: 35 cfs Volume: 360 af Duration: 14 days
Large Seasonal Pulse (1 per season)	Trigger: 96 cfs Volume: 1,570 af Duration: 20 days	N/A	Trigger: 100 cfs Volume: 1,030 af Duration: 16 days	N/A

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(5)

United States Geological Survey Gage 08194500, Nueces River near Tilden

	Winter	Spring	Summer	Fall
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	1 cfs	3 cfs	1 cfs	12 cfs
Small Seasonal Pulse (3 per season)	N/A	Trigger: 89 cfs Volume: 930 af Duration: 14 days	N/A	Trigger: 29 cfs Volume: 250 af Duration: 10 days
Medium Seasonal Pulse (2 Per season)	Trigger: 87 cfs Volume: 1,260 af Duration: 18 days	Trigger: 280 cfs Volume: 3,360 af Duration: 18 days	Trigger: 11 cfs Volume: 96 af Duration: 10 days	Trigger: 220 cfs Volume: 2,390 af Duration: 16 days
Large Seasonal Pulse (1 per season)	Trigger: 300 cfs Volume: 4,610 af Duration: 22 days	Trigger: 880 cfs Volume: 12,200 af Duration: 22 days	Trigger: 320 cfs Volume: 4,390 af Duration: 21 days	Trigger: 840 cfs Volume: 10,900 af Duration: 23 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(6)

United States Geological Survey Gage 08195000, Frio River at Concan

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	11 cfs	10 cfs	10 cfs	10 cfs
Base Flow	61 cfs	61 cfs	47 cfs	55 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 120 cfs Volume: 1,320 af Duration: 8 days	N/A	N/A
Large Seasonal Pulse (1 per season)	Trigger: 89 cfs Volume: 2,100 af Duration: 12 days	Trigger: 300 cfs Volume: 3,550 af Duration: 12 days	Trigger: 240 cfs Volume: 2,990 af Duration: 13 days	Trigger: 79 cfs Volume: 900 af Duration: 5 days
Annual Pulse (2 per year)	Trigger: 540 cfs Volume: 9,430 af Duration: 24 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(7)

United States Geological Survey Gage 08196000, Dry Frio River near Reagan Wells

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	12 cfs	9 cfs	8 cfs	12 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 30 cfs Volume: 370 af Duration: 9 days	N/A	N/A
Large Seasonal Pulse (1 per season)	Trigger: 32 cfs Volume: 650 af Duration: 13 days	Trigger: 120 cfs Volume: 1,470 af Duration: 16 days	Trigger: 81 cfs Volume: 1,100 af Duration: 15 days	Trigger: 35 cfs Volume: 620 af Duration: 13 days
Annual Pulse (2 per year)	Trigger: 210 cfs Volume: 3,500 af Duration: 26 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(8)

United States Geological Survey Gage 08198000, Sabinal River near Sabinal

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	21 cfs	21 cfs	13 cfs	21 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 64 cfs Volume: 750 af Duration: 10 days	N/A	N/A
Large Seasonal Pulse (1 per season)	Trigger: 62 cfs Volume: 1,530 af Duration: 17 days	Trigger: 180 cfs Volume: 2,210 af Duration: 15 days	Trigger: 100 cfs Volume: 1,180 af Duration: 12 days	Trigger: 53 cfs Volume: 840 af Duration: 12 days
Annual Pulse (2 per year)	Trigger: 330 cfs Volume: 5,420 af Duration: 24 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(9)

United States Geological Survey Gage 08198500, Sabinal River at Sabinal

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	1 cfs	1 cfs	2 cfs
Large Seasonal Pulse (1 Per season)	Trigger: 21cfs Volume: 310 af Duration: 11 days	Trigger: 56 cfs Volume: 430 af Duration: 9 days	N/A	Trigger: 20 cfs Volume: 150 af Duration: 6 days
Annual Pulse (2 per year)	Trigger: 230 cfs Volume: 2,680 af Duration: 17 days			
Annual Pulse (1 per year)	Trigger: 1,070 cfs Volume: 6,690 af Duration: 29 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(10)

United States Geological Survey Gage 08200000, Hondo Creek near Tarpley

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	6 cfs	5 cfs	9 cfs	8 cfs
Small Seasonal Pulse (2 per season)	Trigger: 16 cfs Volume: 200 af Duration: 8 days	Trigger: 91 cfs Volume: 950 af Duration: 12 days	Trigger: 24 cfs Volume: 220 af Duration: 7 days	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 61 cfs Volume: 1,020 af Duration: 15 days	Trigger: 290 cfs Volume: 3,360 af Duration: 18 days	Trigger: 90 cfs Volume: 890 af Duration: 12 days	Trigger: 50 cfs Volume: 580 af Duration: 11 days
Annual Pulse (2 per year)	Trigger: 330 cfs Volume: 4,530 af Duration: 22 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(11)

United States Geological Survey Gage 08201500, Seco Creek at Miller Ranch near Utopia

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	4 cfs	3 cfs	3 cfs	4 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 33 cfs Volume: 360 af Duration: 12 days	N/A	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 21 cfs Volume: 290 af Duration: 12 days	Trigger: 91 cfs Volume: 1,140 af Duration: 17 days	Trigger: 38 cfs Volume: 360 af Duration: 11 days	Trigger: 23 cfs Volume: 270 af Duration: 11 days
Annual Pulse (2 per year)	Trigger: 120 cfs Volume: 1,710 af Duration: 21 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(12)

United States Geological Survey Gage 08205500, Frio River near Derby

	Winter	Spring	Summer	Fall
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	17 cfs	11 cfs	7 cfs	12 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 210 cfs Volume: 1,810 af Duration: 14 days	N/A	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 87 cfs Volume: 1,450 af Duration: 20 days	Trigger: 900 cfs Volume: 7,940 af Duration: 17 days	Trigger: 58 cfs Volume: 510 af Duration: 13 days	Trigger: 350 cfs Volume: 4,340 af Duration: 24 days
Annual Pulse (2 per year)	Trigger: 1,670 cfs Volume: 18,800 af Duration: 25 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(13)

United States Geological Survey Gage 08206600, Frio River at Tilden

	Winter	Spring	Summer	Fall
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	12 cfs	7 cfs	2 cfs	3 cfs
Small Seasonal Pulse (2 per season)	Trigger: 86 cfs Volume: 1,070 af Duration: 13 days	Trigger: 460 cfs Volume: 4,470 af Duration: 14 days	Trigger: 36 cfs Volume: 280 af Duration: 9 days	Trigger: 120 cfs Volume: 1,080 af Duration: 12 days
Large Seasonal Pulse (1 per season)	Trigger: 390 cfs Volume: 5,320 af Duration: 20 days	N/A	Trigger: 270 cfs Volume: 2,440 af Duration: 14 days	Trigger: 960 cfs Volume: 10,400 af Duration: 20 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(14)

United States Geological Survey Gage 08206700, San Miguel Creek near Tilden

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	2 cfs	1 cfs	2 cfs
Small Seasonal Pulse (2 per season)	Trigger: 45 cfs Volume: 470 af Duration: 16 days	Trigger: 220 cfs Volume: 1,560 af Duration: 14 days	Trigger: 16 cfs Volume: 110 af Duration: 10 days	Trigger: 44 cfs Volume: 310 af Duration: 12 days
Large Seasonal Pulse (1 per season)	Trigger: 160 cfs Volume: 1,580 af Duration: 19 days	Trigger: 690 cfs Volume: 4,940 af Duration: 16 days	Trigger: 160 cfs Volume: 1,040 af Duration: 13 days	Trigger: 300 cfs Volume: 2,010 af Duration: 15 days
Annual Pulse (2 per year)	Trigger: 990 cfs Volume: 7,310 af Duration: 18 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(15)

United States Geological Survey Gage 08208000, Atascosa River at Whitsett

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	9 cfs	5 cfs	4 cfs	4 cfs
Small Seasonal Pulse (2 per season)	Trigger: 230 cfs Volume: 1,960 af Duration: 14 days	Trigger: 600 cfs Volume: 4,280 af Duration: 13 days	Trigger: 37 cfs Volume: 280 af Duration: 7 days	Trigger: 100 cfs Volume: 720 af Duration: 9 days
Large Seasonal Pulse (1 per season)	Trigger: 730 cfs Volume: 5,720 af Duration: 18 days	Trigger: 1,770 cfs Volume: 12,500 af Duration: 16 days	Trigger: 250 cfs Volume: 1,960 af Duration: 12 days	Trigger: 620 cfs Volume: 4,320 af Duration: 14 days
Annual Pulse (2 per year)	Trigger: 1,990 cfs Volume: 14,800 af Duration: 19 days			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(16)

United States Geological Survey Gage 08210000, Nueces River near Three Rivers

	Winter	Spring	Summer	Fall
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	37 cfs	37 cfs	30 cfs	37 cfs
Small Seasonal Pulse (2 per season)	Trigger: 720 cfs Volume: 8,460 af Duration: 13 days	Trigger: 1,660 cfs Volume: 22,200 af Duration: 16 days	Trigger: 280 cfs Volume: 2,520 af Duration: 9 days	Trigger: 710 cfs Volume: 7,920 af Duration: 13 days
Large Seasonal Pulse (1 per season)	Trigger: 2,050 cfs Volume: 26,800 af Duration: 18 days	Trigger: 4,090 cfs Volume: 64,600 af Duration: 22 days	Trigger: 1,100 cfs Volume: 13,600 af Duration: 15 days	Trigger: 2,420 cfs Volume: 34,200 af Duration: 19 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(17)

United States Geological Survey Gage 08211000, Nueces River near Mathis

	Winter	Spring	Summer	Fall
Subsistence Flow	37 cfs	37 cfs	37 cfs	37 cfs
Base Flow	96 cfs	120 cfs	140 cfs	110 cfs
Small Seasonal Pulse (2 per season)	Trigger: 590 cfs Volume: 6,270 af Duration: 9 days	Trigger: 420 cfs Volume: 5,090 af Duration: 9 days	N/A	Trigger: 240 cfs Volume: 2,670 af Duration: 7 days
Large Seasonal Pulse (1 per season)	Trigger: 1,120 cfs Volume: 14,200 af Duration: 12 days	Trigger: 2,540 cfs Volume: 49,400 af Duration: 19 days	Trigger: 370 cfs Volume: 4,970 af Duration: 10 days	Trigger: 1,550 cfs Volume: 24,700 af Duration: 15 days

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(18)

United States Geological Survey Gage 08211520, Oso Creek at Corpus Christi

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	2 cfs	2 cfs	2 cfs
Small Seasonal Pulse (2 per season)	Trigger: 59 cfs Volume: 450 af Duration: 13 days	Trigger: 48 cfs Volume: 330 af Duration: 9 days	N/A	Trigger: 64 cfs Volume: 450 af Duration: 11 days
Large Seasonal Pulse (1 Per season)	N/A	N/A	Trigger: 21 cfs Volume: 160 af Duration: 8 days	N/A

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.430(c)(19)

United States Geological Survey Gage 08211900, San Fernando Creek at Alice

	Winter	**Spring**	**Summer**	**Fall**
Subsistence Flow	1 cfs	1 cfs	1 cfs	1 cfs
Base Flow	2 cfs	2 cfs	1 cfs	1 cfs
Small Seasonal Pulse (2 per season)	N/A	Trigger: 14 cfs Volume: 100 af Duration: 7 days	N/A	N/A
Large Seasonal Pulse (1 Per season)	Trigger: 14 cfs Volume: 170 af Duration: 12 days	Trigger: 65 cfs Volume: 470 af Duration: 11 days	Trigger: 17 cfs Volume: 140 af Duration: 9 days	Trigger: 28 cfs Volume: 240 af Duration: 10 days
Annual Pulse (2 per year)	Trigger: 170 cfs Volume: 1,490 af Duration: 17 days			

cfs = cubic feet per second
af = acre-fee
N/A = not applicable

Figure: 30 TAC §298.470(b)

Percentage of Climatic Division Within Each Geographic Area

CLIMATIC DIVISION	PERCENTAGE LOCATED IN UPPER BASIN	PERCENTAGE LOCATED IN MIDDLE BASIN	PERCENTAGE LOCATED IN LOWER BASIN
High Plains	2.7%	N/A	N/A
Low Rolling Plains	64.7%	N/A	N/A
North Central	32.6%	100%	61.9%
East Texas	N/A	N/A	14.7%
Trans Pecos	N/A	N/A	N/A
Edwards Plateau	N/A	N/A	5.7%
South Central	N/A	N/A	13.2%
Upper Coast	N/A	N/A	4.5%

N/A = not applicable

Figure: 30 TAC §298.470(c)

PHDI Index for Calculating Hydrologic Conditions for all Measurement Points on the Brazos River and its associated tributaries and the San Bernard River and its associated tributaries

GEOGRAPHIC AREA	DRY	AVERAGE	WET
UPPER BASIN	less than -1.78	-1.78 - 2.18	greater than 2.18
MIDDLE BASIN	less than -1.95	-1.95 - 2.39	greater than 2.39
LOWER BASIN	less than -1.73	-1.73 - 2.13	greater than 2.13

Figure: 30 TAC §298.480(1)

United States Geological Survey Gage 08080500, Double Mountain Fork Brazos River near Aspermont

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	1 cfs	N/A	N/A	N/A
		Average	4 cfs			
		Wet	15 cfs			
Spring	1 cfs	Dry	1 cfs	1 per season Trigger: 280 cfs Volume: 1,270 af Duration: 10 days	2 per season Trigger: 280 cfs Volume: 1,270 af Duration: 10 days	1 per season Trigger: 570 cfs Volume: 2,600 af Duration: 12 days
		Average	3 cfs			
		Wet	8 cfs			
Summer	1 cfs	Dry	1 cfs	1 per season Trigger: 230 cfs Volume: 990 af Duration: 9 days	2 per season Trigger: 230 cfs Volume: 990 af Duration: 9 days	1 per season Trigger: 480 cfs Volume: 2,160 af Duration: 12 days
		Average	2 cfs			
		Wet	7 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(2)

United States Geological Survey Gage 08082000, Salt Fork Brazos River near Aspermont

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	1 cfs	N/A	N/A	N/A
		Average	4 cfs			
		Wet	9 cfs			
Spring	1 cfs	Dry	1 cfs	1 per season Trigger: 160 cfs Volume: 720 af Duration: 10 days	2 per season Trigger: 160 cfs Volume: 720 af Duration: 10 days	1 per season Trigger: 300 cfs Volume: 1,350 af Duration: 11 days
		Average	2 cfs			
		Wet	5 cfs			
Summer	1 cfs	Dry	1 cfs	1 per season Trigger: 140 cfs Volume: 560 af Duration: 8 days	2 per season Trigger: 140 cfs Volume: 560 af Duration: 8 days	1 per season Trigger: 260 cfs Volume: 1,090 af Duration: 10 days
		Average	1 cfs			
		Wet	3 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(3)

United States Geological Survey Gage 08082500, Brazos River at Seymour

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	10 cfs	N/A	N/A	N/A
		Average	25 cfs			
		Wet	46 cfs			
Spring	1 cfs	Dry	7 cfs	1 per season Trigger: 560 cfs Volume: 2,960 af Duration: 10 days	2 per season Trigger: 560 cfs Volume: 2,960 af Duration: 10 days	1 per season Trigger: 1,040 cfs Volume: 5,870 af Duration: 12 days
		Average	19 cfs			
		Wet	35 cfs			
Summer	1 cfs	Dry	4 cfs	1 per season Trigger: 370 cfs Volume: 1,870 af Duration: 8 days	2 per season Trigger: 370 cfs Volume: 1,870 af Duration: 8 days	1 per season Trigger: 800 cfs Volume: 4,290 af Duration: 11 days
		Average	13 cfs			
		Wet	32 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(4)

United States Geological Survey Gage 08084000, Clear Fork Brazos River at Nugent

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	5 cfs	N/A	N/A	1 per season Trigger: 26 cfs Volume: 160 af Duration: 9 days
		Average	8 cfs			
		Wet	13 cfs			
Spring	1 cfs	Dry	3 cfs	1 per season Trigger: 180 cfs Volume: 860 af Duration: 9 days	2 per season Trigger: 180 cfs Volume: 860 af Duration: 9 days	1 per season Trigger: 590 cfs Volume: 2,800 af Duration: 12 days
		Average	6 cfs			
		Wet	12 cfs			
Summer	1 cfs	Dry	1 cfs	1 per season Trigger: 100 cfs Volume: 460 af Duration: 8 days	2 per season Trigger: 100 cfs Volume: 460 af Duration: 8 days	1 per season Trigger: 390 cfs Volume: 1,890 af Duration: 12 days
		Average	4 cfs			
		Wet	9 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(5)

United States Geological Survey Gage 08084200, Clear Fork Brazos River at Lueders

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	1 cfs	N/A	N/A	1 per season Trigger: 26 cfs Volume: 158 af Duration: 9 days
		Average	4 cfs			
		Wet	7 cfs			
Spring	1 cfs	Dry	5 cfs	1 per season Trigger: 18 cfs Volume: 74 af Duration: 2 days	2 per season Trigger: 37 cfs Volume: 148 af Duration: 2 days	1 per season Trigger: 355 cfs Volume: 2,054 af Duration: 9 days
		Average	7 cfs			
		Wet	10 cfs			
Summer	1 cfs	Dry	11 cfs	1 per season Trigger: 18 cfs Volume: 74 af Duration: 2 days	2 per season Trigger: 37 cfs Volume: 148 af Duration: 2 days	1 per season Trigger: 170 cfs Volume: 779 af Duration: 5 Days
		Average	15 cfs			
		Wet	16 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(6)

United States Geological Survey Gage 08088000, Brazos River near South Bend

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	36 cfs	N/A	N/A	N/A
		Average	73 cfs			
		Wet	120 cfs			
Spring	1 cfs	Dry	29 cfs	1 per season Trigger: 1,260 cfs Volume: 7,280 af Duration: 10 days	2 per season Trigger: 1,260 cfs Volume: 7,280 af Duration: 10 days	1 per season Trigger: 2,480 cfs Volume: 15,700 af Duration: 13 days
		Average	60 cfs			
		Wet	100 cfs			
Summer	1 cfs	Dry	16 cfs	1 per season Trigger: 580 cfs Volume: 3,140 af Duration: 8 days	2 per season Trigger: 580 cfs Volume: 3,140 af Duration: 8 days	1 per season Trigger: 1,180 cfs Volume: 7,050 af Duration: 11 days
		Average	46 cfs			
		Wet	95 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(7)

United States Geological Survey Gage 08089000, Brazos River near Palo Pinto

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	17 cfs	Dry	40 cfs	2 per season Trigger: 850 cfs Volume: 3,690 af Duration: 5 days	4 per season Trigger: 850 cfs Volume: 3,690 af Duration: 5 days 2 per season Trigger: 1,390 cfs Volume: 7,180 af Duration: 7 days	4 per season Trigger: 850 cfs Volume: 3,690 af Duration: 5 days 3 per season Trigger: 1,390 cfs Volume: 7,180 af Duration: 7 days
		Average	61 cfs			
		Wet	100 cfs			
Spring	17 cfs	Dry	39 cfs	2 per season Trigger: 1,400 cfs Volume: 6,600 af Duration: 6 days	4 per season Trigger: 1,400 cfs Volume: 6,600 af Duration: 6 days 2 per season Trigger: 3,370 cfs Volume: 20,200 af Duration: 10 days	4 per season Trigger: 1,400 cfs Volume: 6,600 af Duration: 6 days 3 per season Trigger: 3,370 cfs Volume: 20,200 af Duration: 10 days
		Average	75 cfs			
		Wet	120 cfs			
Summer	17 cfs	Dry	40 cfs	2 per season Trigger: 1,230 cfs Volume: 5,920 af Duration: 6 days	4 per season Trigger: 1,230 cfs Volume: 5,920 af Duration: 6 days 2 per season Trigger: 2,260 cfs Volume: 13,000 af Duration: 9 days	4 per season Trigger: 1,230 cfs Volume: 5,920 af Duration: 6 days 3 per season Trigger: 2,260 cfs Volume: 13,000 af Duration: 9 days
		Average	72 cfs			
		Wet	120 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(8)

United States Geological Survey Gage 080891000, Brazos River near Glen Rose

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	16 cfs	Dry	42 cfs	2 per season Trigger: 930 cfs Volume: 5,400 af Duration: 8 days	4 per season Trigger: 930 cfs Volume: 5,400 af Duration: 8 days 2 per season Trigger: 1,700 cfs Volume: 10,800 af Duration: 10 days	4 per season Trigger: 930 cfs Volume: 5,400 af Duration: 8 days 3 per season Trigger: 1,700 cfs Volume: 10,800 af Duration: 10 days
		Average	77 cfs			
		Wet	160 cfs			
Spring	16 cfs	Dry	47 cfs	2 per season Trigger: 2,350 cfs Volume: 14,300 af Duration: 10 days	4 per season Trigger: 2,350 cfs Volume: 14,300 af Duration: 10 days 2 per season Trigger: 6,480 cfs Volume: 46,700 af Duration: 14 days	4 per season Trigger: 2,350 cfs Volume: 14,300 af Duration: 10 days 3 per season Trigger: 6,480 cfs Volume: 46,700 af Duration: 14 days
		Average	92 cfs			
		Wet	170 cfs			
Summer	16 cfs	Dry	37 cfs	2 per season Trigger: 1,320 cfs Volume: 7,830 af Duration: 8 days	4 per season Trigger: 1,320 cfs Volume: 7,830 af Duration: 8 days 2 per season Trigger: 3,090 cfs Volume: 21,200 af Duration: 12 days	4 per season Trigger: 1,320 cfs Volume: 7,830 af Duration: 8 days 3 per season Trigger: 3,090 cfs Volume: 21,200 af Duration: 12 days
		Average	70 cfs			
		Wet	160 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(9)

United States Geological Survey Gage 08095000, North Bosque River near Clifton

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	5 cfs	N/A	N/A	2 per season Trigger: 120 cfs Volume: 750 af Duration: 10 days
		Average	12 cfs			
		Wet	25 cfs			
Spring	1 cfs	Dry	7 cfs	1 per season Trigger: 710 cfs Volume: 3,490 af Duration: 12 days	3 per season Trigger: 710 cfs Volume: 3,490 af Duration: 12 days	3 per season Trigger: 710 cfs Volume: 3,490 af Duration: 12 days
		Average	16 cfs			
		Wet	33 cfs			
Summer	1 cfs	Dry	3 cfs	N/A	N/A	2 per season Trigger: 130 cfs Volume: 500 af Duration: 6 days
		Average	8 cfs			
		Wet	17 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(10)

United States Geological Survey Gage 08096500, Brazos River at Waco

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	56 cfs	Dry	120 cfs	1 per season Trigger: 2,320 cfs Volume: 12,400 af Duration: 7 days	3 per season Trigger: 2,320 cfs Volume: 12,400 af Duration: 7 days	2 per season Trigger: 4,180 cfs Volume: 25,700 af Duration: 9 days
		Average	210 cfs			
		Wet	480 cfs			
Spring	56 cfs	Dry	150 cfs	1 per season Trigger: 5,330 cfs Volume: 32,700 af Duration: 10 days	3 per season Trigger: 5,330 cfs Volume: 32,700 af Duration: 10 days	2 per season Trigger: 13,600 cfs Volume: 102,000 af Duration: 14 days
		Average	270 cfs			
		Wet	690 cfs			
Summer	56 cfs	Dry	140 cfs	1 per season Trigger: 1,980 cfs Volume: 10,500 af Duration: 7 days	3 per season Trigger: 1,980 cfs Volume: 10,500 af Duration: 7 days	2 per season Trigger: 4,160 cfs Volume: 26,400 af Duration: 10 days
		Average	250 cfs			
		Wet	590 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(11)

United States Geological Survey Gage 08100500, Leon River at Gatesville

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	9 cfs	N/A	N/A	2 per season Trigger: 100 cfs Volume: 540 af Duration: 6 days
		Average	20 cfs			
		Wet	52 cfs			
Spring	1 cfs	Dry	10 cfs	1 per season Trigger: 340 cfs Volume: 1,910 af Duration: 10 days	3 per season Trigger: 340 cfs Volume: 1,910 af Duration: 10 days	2 per season Trigger: 630 cfs Volume: 4,050 af Duration: 13 days
		Average	24 cfs			
		Wet	54 cfs			
Summer	1 cfs	Dry	4 cfs	1 per season Trigger: 58 cfs Volume: 220 af Duration: 4days	3 per season Trigger: 58 cfs Volume: 220 af Duration: 4 days	2 per season Trigger: 140 cfs Volume: 600 af Duration: 6 days
		Average	12 cfs			
		Wet	27 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(12)

United States Geological Survey Gage 08103800, Lampasas River near Kempner

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	10 cfs	Dry	18 cfs	1 per season Trigger: 78 cfs Volume: 430 af Duration: 8 days	3 per season Trigger: 78 cfs Volume: 430 af Duration: 8 days	2 per season Trigger: 190 cfs Volume: 1,150 af Duration: 11 days
		Average	27 cfs			
		Wet	39 cfs			
Spring	10 cfs	Dry	21 cfs	1 per season Trigger: 780 cfs Volume: 4,020 af Duration: 13 days	3 per season Trigger: 780 cfs Volume: 4,020 af Duration: 13 days	2 per season Trigger: 1,310 cfs Volume: 6,860 af Duration: 16 days
		Average	29 cfs			
		Wet	43 cfs			
Summer	10 cfs	Dry	16 cfs	1 per season Trigger: 77 cfs Volume: 270 af Duration: 4days	3 per season Trigger: 77 cfs Volume: 270 af Duration: 4 days	2 per season Trigger: 190 cfs Volume: 680 af Duration: 6 days
		Average	23 cfs			
		Wet	32 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(13)

United States Geological Survey Gage 08104500, Little River near Little River

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	55 cfs	Dry	82 cfs	1 per season Trigger: 520 cfs Volume: 2,350 af Duration: 5 days	3 per season Trigger: 520 cfs Volume: 2,350 af Duration: 5 days	2 per season Trigger: 1,600 cfs Volume: 11,800 af Duration: 11 days
		Average	110 cfs			
		Wet	190 cfs			
Spring	55 cfs	Dry	95 cfs	1 per season Trigger: 1,420 cfs Volume: 9,760 af Duration: 10 days	3 per season Trigger: 1,420 cfs Volume: 9,760 af Duration: 10 days	2 per season Trigger: 3,290 cfs Volume: 32,200 af Duration: 17 days
		Average	150 cfs			
		Wet	340 cfs			
Summer	55 cfs	Dry	84 cfs	1 per season Trigger: 430 cfs Volume: 1,560 af Duration: 4 days	3 per season Trigger: 430 cfs Volume: 1,560 af Duration: 4 days	2 per season Trigger: 1,060 cfs Volume: 5,890 af Duration: 8 days
		Average	120 cfs			
		Wet	200 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(14)

United States Geological Survey Gage 08106500, Little River near Cameron

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	32 cfs	Dry	110 cfs	1 per season Trigger: 1,080 cfs Volume: 6,680 af Duration: 8 days	3 per season Trigger: 1,080 cfs Volume: 6,680 af Duration: 8 days	2 per season Trigger: 2,140 cfs Volume: 14,900 af Duration: 10 days
		Average	190 cfs			
		Wet	460 cfs			
Spring	32 cfs	Dry	140 cfs	1 per season Trigger: 3,200 cfs Volume: 23,900 af Duration: 12 days	3 per season Trigger: 3,200 cfs Volume: 23,900 af Duration: 12 days	2 per season Trigger: 4,790 cfs Volume: 38,400 af Duration: 14 days
		Average	310 cfs			
		Wet	760 cfs			
Summer	32 cfs	Dry	97 cfs	1 per season Trigger: 560 cfs Volume: 2,860 af Duration: 6 days	3 per season Trigger: 560 cfs Volume: 2,860 af Duration: 6 days	2 per season Trigger: 990 cfs Volume: 5,550 af Duration: 8 days
		Average	160 cfs			
		Wet	330 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(15)

United States Geological Survey Gage 08108700, Brazos River at SH 21 near Bryan

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	300 cfs	Dry	540 cfs	1 per season Trigger: 3,230 cfs Volume: 21,100 af Duration: 7 days	3 per season Trigger: 3,320 cfs Volume: 21,100 af Duration: 7 days	2 per season Trigger: 5,570 cfs Volume: 41,900 af Duration: 10 days
		Average	860 cfs			
		Wet	1,760 cfs			
Spring	300 cfs	Dry	710 cfs	1 per season Trigger: 6,050 cfs Volume: 49,000 af Duration: 11 days	3 per season Trigger: 6,050 cfs Volume: 49,000 af Duration: 11 days	2 per season Trigger: 10,400 cfs Volume: 97,000 af Duration: 14 days
		Average	1,260 cfs			
		Wet	2,460 cfs			
Summer	300 cfs	Dry	630 cfs	1 per season Trigger: 2,060 cfs Volume: 12,700 af Duration: 7 days	3 per season Trigger: 2,060 cfs Volume: 12,700 af Duration: 7 days	2 per season Trigger: 2,990 cfs Volume: 20,100 af Duration: 8 days
		Average	920 cfs			
		Wet	1,470 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(16)

United States Geological Survey Gage 08110500, Navasota River near Easterly

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	1 cfs	Dry	9 cfs	1 per season Trigger: 260 cfs Volume: 1,610 af Duration: 9 days	3 per season Trigger: 260 cfs Volume: 1,610 af Duration: 9 days	2 per season Trigger: 800 cfs Volume: 5,440 af Duration: 12 days
		Average	14 cfs			
		Wet	23 cfs			
Spring	1 cfs	Dry	10 cfs	1 per season Trigger: 720 cfs Volume: 4,590 af Duration: 11 days	3 per season Trigger: 720 cfs Volume: 4,590 af Duration: 11 days	2 per season Trigger: 1,340 cfs Volume: 8,990 af Duration: 13 days
		Average	19 cfs			
		Wet	29 cfs			
Summer	1 cfs	Dry	3 cfs	N/A	N/A	2 per season Trigger: 49 cfs Volume: 220 af Duration: 5 days
		Average	8 cfs			
		Wet	16 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(17)

United States Geological Survey Gage 08111500, Brazos River near Hempstead

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	510 cfs	Dry	920 cfs	1 per season Trigger: 5,720 cfs Volume: 49,800 af Duration: 10 days	3 per season Trigger: 5,720 cfs Volume: 49,800 af Duration: 10 days	2 per season Trigger: 11,200 cfs Volume: 125,000 af Duration: 15 days
		Average	1,440 cfs			
		Wet	2,890 cfs			
Spring	510 cfs	Dry	1,130 cfs	1 per season Trigger: 8,530 cfs Volume: 85,000 af Duration: 13 days	3 per season Trigger: 8,530 cfs Volume: 85,000 af Duration: 13 days	2 per season Trigger: 16,800 cfs Volume: 219,000 af Duration: 19 days
		Average	1,900 cfs			
		Wet	3,440 cfs			
Summer	510 cfs	Dry	950 cfs	1 per season Trigger: 2,620 cfs Volume: 17,000 af Duration: 7 days	3 per season Trigger: 2,620 cfs Volume: 17,000 af Duration: 7 days	2 per season Trigger: 5,090 cfs Volume: 40,900 af Duration: 9 days
		Average	1,330 cfs			
		Wet	2,050 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(18)

United States Geological Survey Gage 08114000, Brazos River at Richmond

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	550 cfs	Dry	990 cfs	1 per season Trigger: 6,410 cfs Volume: 60,600 af Duration: 11 days	3 per season Trigger: 6,410 cfs Volume: 60,600 af Duration: 11 days	2 per season Trigger: 12,400 cfs Volume: 150,000 af Duration: 16 days
		Average	1,650 cfs			
		Wet	3,310 cfs			
Spring	550 cfs	Dry	1,190 cfs	1 per season Trigger: 8,930 cfs Volume: 94,000 af Duration: 13 days	3 per season Trigger: 8,930 cfs Volume: 94,000 af Duration: 13 days	2 per season Trigger: 16,300 cfs Volume: 215,000 af Duration: 19 days
		Average	2,140 cfs			
		Wet	3,980 cfs			
Summer	550 cfs	Dry	930 cfs	1 per season Trigger: 2,460 cfs Volume: 16,400 af Duration: 6 days	3 per season Trigger: 2,460 cfs Volume: 16,400 af Duration: 6 days	2 per season Trigger: 5,430 cfs Volume: 46,300 af Duration: 10 days
		Average	1,330 cfs			
		Wet	2,190 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(19)

United States Geological Survey Gage 08116650, Brazos River near Rosharon

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	430 cfs	Dry	1,140 cfs	1 per season Trigger: 9,090 cfs Volume: 94,700 af Duration: 12 days	3 per season Trigger: 9,090 cfs Volume: 94,700 af Duration: 12 days	2 per season Trigger: 13,600 cfs Volume: 168,000 af Duration: 16 days
		Average	2,090 cfs			
		Wet	4,700 cfs			
Spring	430 cfs	Dry	1,250 cfs	1 per season Trigger: 6,580 cfs Volume: 58,500 af Duration: 10 days	3 per season Trigger: 6,580 cfs Volume: 58,500 af Duration: 10 days	2 per season Trigger: 14,200 cfs Volume: 184,000 af Duration: 18 days
		Average	2,570 cfs			
		Wet	4,740 cfs			
Summer	430 cfs	Dry	930 cfs	1 per season Trigger: 2,490 cfs Volume: 14,900 af Duration: 6 days	3 per season Trigger: 2,490 cfs Volume: 14,900 af Duration: 6 days	2 per season Trigger: 4,980 cfs Volume: 39,100 af Duration: 9 days
		Average	1,420 cfs			
		Wet	2,630 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.480(20)

United States Geological Survey Gage 08117500, San Bernard River near Boling

Season	Subsistence	Hydrologic Condition	Base	Dry Condition Seasonal Pulse	Average Condition Seasonal Pulse	Wet Condition Seasonal Pulse
Winter	11 cfs	Dry	23 cfs	1 per season Trigger: 510 cfs Volume: 3,710 af Duration: 8 days	3 per season Trigger: 510 cfs Volume: 3,710 af Duration: 8 days	2 per season Trigger: 1,060 cfs Volume: 9,370 af Duration: 12 days
		Average	43 cfs			
		Wet	73 cfs			
Spring	11 cfs	Dry	32 cfs	1 per season Trigger: 350 cfs Volume: 2,360 af Duration: 7 days	3 per season Trigger: 350 cfs Volume: 2,360 af Duration: 7 days	2 per season Trigger: 680 cfs Volume: 5,300 af Duration: 10 days
		Average	53 cfs			
		Wet	85 cfs			
Summer	11 cfs	Dry	64 cfs	1 per season Trigger: 300 cfs Volume: 2,480 af Duration: 9 days	3 per season Trigger: 300 cfs Volume: 2,480 af Duration: 9 days	2 per season Trigger: 470 cfs Volume: 4,050 af Duration: 10 days
		Average	98 cfs			
		Wet	140 cfs			

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.530(1)

International Boundary and Water Commission Gage 08-3750.00, Rio Grande at Johnson Ranch

Season	**Hydrologic Condition**	**Subsistence**	**Base**	**Annual Pulse (1 per year)**
Winter	Subsistence	1 cfs	129 cfs	Trigger: 3,990 cfs Volume: 103,891 af Duration: 5 days
Winter	Dry	N/A	129 cfs	
Winter	Average	N/A	193 cfs	
Winter	Wet	N/A	299 cfs	
Spring	Subsistence	15 cfs	64 cfs	
Spring	Dry	N/A	64 cfs	
Spring	Average	N/A	98 cfs	
Spring	Wet	N/A	178 cfs	
Fall	Subsistence	15 cfs	87 cfs	
Fall	Dry	N/A	87 cfs	
Fall	Average	N/A	154 cfs	
Fall	Wet	N/A	244 cfs	

cfs = cubic feet per second
af = acre-feet
N/A = Not Applicable

Figure: 30 TAC §298.530(2)

International Boundary and Water Commission Gage 08-3772.00, Rio Grande at Foster Ranch

Season	Hydrologic Condition	Subsistence	Base	Seasonal Pulse (1 per season)
Winter	Subsistence	126 cfs	205 cfs	N/A
Winter	Dry	N/A	205 cfs	
Winter	Average	N/A	259 cfs	
Winter	Wet	N/A	336 cfs	
Spring	Subsistence	114 cfs	171 cfs	Trigger: 2,335 cfs Volume: 38,146 af Duration: 9 days
Spring	Dry	N/A	171 cfs	
Spring	Average	N/A	228 cfs	
Spring	Wet	N/A	313 cfs	
Fall	Subsistence	110 cfs	201 cfs	Trigger: 4,427 cfs Volume: 98,150 af Duration: 16 days
Fall	Dry	N/A	201 cfs	
Fall	Average	N/A	279 cfs	
Fall	Wet	N/A	371 cfs	

Figure: 30 TAC §298.530(3)

United States Geological Survey Gage 08446500, Pecos River near Girvin

Season	Hydrologic Condition	Subsistence	Base	Seasonal Pulse (1 per season)
Winter	Subsistence	8.7 cfs	22 cfs	Trigger: 231 cfs Volume: 1,581 af Duration: 6 days
Winter	Dry	N/A	22 cfs	
Winter	Average	N/A	27 cfs	
Winter	Wet	N/A	32 cfs	
Spring	Subsistence	6.8 cfs	14 cfs	Trigger: 72 cfs Volume: 1,199 af Duration: 6 days
Spring	Dry	N/A	14 cfs	
Spring	Average	N/A	19 cfs	
Spring	Wet	N/A	25 cfs	
Fall	Subsistence	6.3 cfs	13 cfs	Trigger: 100 cfs Volume: 1,419 af Duration: 7 days
Fall	Dry	N/A	13 cfs	
Fall	Average	N/A	18 cfs	
Fall	Wet	N/A	27 cfs	

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

Figure: 30 TAC §298.530(4)

International Boundary and Water Commission Gage 08-4494.00, Devils River at Pafford Crossing near Comstock

Season	Hydrologic Condition	Subsistence	Base	Seasonal Pulse (1 per season)	Annual Pulse (1 per year)
Winter	Subsistence	84 cfs	175 cfs	N/A	Trigger: 3,673 cfs Volume: 34,752 af Duration: 13 days
Winter	Dry	N/A	175 cfs		
Winter	Average	N/A	200 cfs		
Winter	Wet	N/A	243 cfs		
Spring	Subsistence	91 cfs	160 cfs	Trigger: 558 cfs Volume: 17,374 af Duration: 7 days	
Spring	Dry	N/A	160 cfs		
Spring	Average	N/A	207 cfs		
Spring	Wet	N/A	253 cfs		
Fall	Subsistence	87 cfs	166 cfs	Trigger: 1,872 cfs Volume: 27,781 af Duration: 9 days	
Fall	Dry	N/A	166 cfs		
Fall	Average	N/A	206 cfs		
Fall	Wet	N/A	238 cfs		

cfs = cubic feet per second
af = acre-feet
N/A = not applicable

AN ACT

relating to the management of the water resources of the state, including the protection of instream flows and freshwater inflows, and to the management of groundwater in the area regulated by the Edwards Aquifer Authority and to the operations and oversight of the authority.

BE IT ENACTED BY THE LEGISLATURE OF THE STATE OF TEXAS:

ARTICLE 1. MANAGEMENT OF STATE WATER

SECTION 1.01. The heading to Section 5.506, Water Code, is amended to read as follows:

Sec. 5.506. EMERGENCY SUSPENSION OF PERMIT CONDITION RELATING TO<u>, AND EMERGENCY AUTHORITY TO MAKE AVAILABLE WATER SET ASIDE FOR,</u> BENEFICIAL INFLOWS TO AFFECTED BAYS AND ESTUARIES AND INSTREAM USES.

SECTION 1.02. Section 5.506, Water Code, is amended by adding Subsection (a-1) and amending Subsections (b) and (c) to read as follows:

<u>(a-1) State water that is set aside by the commission to meet the needs for freshwater inflows to affected bays and estuaries and instream uses under Section 11.1471(a)(2) may be made available temporarily for other essential beneficial uses if the commission finds that an emergency exists that cannot practically be resolved in another way.</u>

(b) The commission must give written notice of the proposed

action [~~suspension~~] to the Parks and Wildlife Department before the commission suspends a permit condition under Subsection (a) or makes water available temporarily under Subsection (a-1) [~~this section~~]. The commission shall give the Parks and Wildlife Department an opportunity to submit comments on the proposed action [~~suspension~~] for a period of 72 hours from receipt of the notice and must consider those comments before issuing an order implementing the proposed action [~~imposing the suspension~~].

(c) The commission may suspend a permit condition under Subsection (a) or make water available temporarily under Subsection (a-1) [~~this section~~] without notice except as required by Subsection (b).

SECTION 1.03. Section 5.701(j), Water Code, is amended to read as follows:

(j) The fee for other uses of water not specifically named in this section is $1 per acre-foot, except that no political subdivision may be required to pay fees to use water for recharge of underground freshwater-bearing sands and aquifers or for abatement of natural pollution. A fee is not required for a water right that is [~~This fee is waived for applications for instream-use water rights~~] deposited into the Texas Water Trust.

SECTION 1.04. Section 11.002, Water Code, is amended by adding Subdivisions (15), (16), (17), (18), and (19) to read as follows:

(15) "Environmental flow analysis" means the application of a scientifically derived process for predicting the response of an ecosystem to changes in instream flows or freshwater

inflows.

(16) "Environmental flow regime" means a schedule of flow quantities that reflects seasonal and yearly fluctuations that typically would vary geographically, by specific location in a watershed, and that are shown to be adequate to support a sound ecological environment and to maintain the productivity, extent, and persistence of key aquatic habitats in and along the affected water bodies.

(17) "Environmental flow standards" means those requirements adopted by the commission under Section 11.1471.

(18) "Advisory group" means the environmental flows advisory group.

(19) "Science advisory committee" means the Texas environmental flows science advisory committee.

SECTION 1.05. Section 11.023(a), Water Code, is amended to read as follows:

(a) To the extent that state water has not been set aside by the commission under Section 11.1471(a)(2) to meet downstream instream flow needs or freshwater inflow needs, state [~~State~~] water may be appropriated, stored, or diverted for:

(1) domestic and municipal uses, including water for sustaining human life and the life of domestic animals;

(2) agricultural uses and industrial uses, meaning processes designed to convert materials of a lower order of value into forms having greater usability and commercial value, including the development of power by means other than hydroelectric;

(3) mining and recovery of minerals;

(4) hydroelectric power;

(5) navigation;

(6) recreation and pleasure;

(7) public parks; and

(8) game preserves.

SECTION 1.06. Section 11.0235, Water Code, is amended by amending Subsections (c) and (e) and adding Subsections (d-1) through (d-6) and (f) to read as follows:

(c) The legislature has expressly required the commission while balancing all other public interests to consider and, to the extent practicable, provide for the freshwater inflows and instream flows necessary to maintain the viability of the state's streams, rivers, and bay and estuary systems in the commission's regular granting of permits for the use of state waters. As an essential part of the state's environmental flows policy, all permit conditions relating to freshwater inflows to affected bays and estuaries and instream flow needs must be subject to temporary suspension if necessary for water to be applied to essential beneficial uses during emergencies.

(d-1) The legislature has determined that existing water rights that are converted to water rights for environmental purposes should be enforced in a manner consistent with the enforcement of water rights for other purposes as provided by the laws of this state governing the appropriation of state water.

(d-2) The legislature finds that to provide certainty in water management and development and to provide adequate protection of the state's streams, rivers, and bays and estuaries, the state

must have a process with specific timelines for prompt action to address environmental flow issues in the state's major basin and bay systems, especially those systems in which unappropriated water is still available.

(d-3) The legislature finds that:

(1) in those basins in which water is available for appropriation, the commission should establish an environmental set-aside below which water should not be available for appropriation; and

(2) in those basins in which the unappropriated water that will be set aside for instream flow and freshwater inflow protection is not sufficient to fully satisfy the environmental flow standards established by the commission, a variety of market approaches, both public and private, for filling the gap must be explored and pursued.

(d-4) The legislature finds that while the state has pioneered tools to address freshwater inflow needs for bays and estuaries, there are limitations to those tools in light of both scientific and public policy evolution. To fully address bay and estuary environmental flow issues, the foundation of work accomplished by the state should be improved. While the state's instream flow studies program appears to encompass a comprehensive and scientific approach for establishing a process to assess instream flow needs for rivers and streams across the state, more extensive review and examination of the details of the program, which may not be fully developed until the program is under way, are needed to ensure an effective tool for evaluating riverine

environmental flow conditions.

(d-5) The legislature finds that the management of water to meet instream flow and freshwater inflow needs should be evaluated on a regular basis and adapted to reflect both improvements in science related to environmental flows and future changes in projected human needs for water. In addition, the development of management strategies for addressing environmental flow needs should be an ongoing, adaptive process that considers and addresses local issues.

(d-6) The legislature finds that recommendations for state action to protect instream flows and freshwater inflows should be developed through a consensus-based, regional approach involving balanced representation of stakeholders and that such a process should be encouraged throughout the state.

(e) The fact that greater pressures and demands are being placed on the water resources of the state makes it of paramount importance to ensure [~~reexamine the process for ensuring~~] that these important priorities are effectively addressed by detailing how environmental flow standards are to be developed using the environmental studies that have been and are to be performed by the state and others and specifying in clear delegations of authority how those environmental flow standards will be integrated into the regional water planning and water permitting process [~~to the commission~~].

(f) The legislature recognizes that effective implementation of the approach provided by this chapter for protecting instream flows and freshwater inflows will require more

effective water rights administration and enforcement systems than are currently available in most areas of the state.

SECTION 1.07. Subchapter B, Chapter 11, Water Code, is amended by adding Sections 11.0236, 11.02361, 11.02362, and 11.0237 to read as follows:

Sec. 11.0236. ENVIRONMENTAL FLOWS ADVISORY GROUP. (a) In recognition of the importance that the ecological soundness of our riverine, bay, and estuary systems and riparian lands has on the economy, health, and well-being of the state there is created the environmental flows advisory group.

(b) The advisory group is composed of nine members as follows:

(1) three members appointed by the governor;

(2) three members of the senate appointed by the lieutenant governor; and

(3) three members of the house of representatives appointed by the speaker of the house of representatives.

(c) Of the members appointed under Subsection (b)(1):

(1) one member must be a member of the commission;

(2) one member must be a member of the board; and

(3) one member must be a member of the Parks and Wildlife Commission.

(d) Each member of the advisory group serves at the will of the person who appointed the member.

(e) The appointed senator with the most seniority and the appointed house member with the most seniority serve together as co-presiding officers of the advisory group.

(f) A member of the advisory group is not entitled to receive compensation for service on the advisory group but is entitled to reimbursement of the travel expenses incurred by the member while conducting the business of the advisory group, as provided by the General Appropriations Act.

(g) The advisory group may accept gifts and grants from any source to be used to carry out a function of the advisory group.

(h) The commission shall provide staff support for the advisory group.

(i) The advisory group shall conduct public hearings and study public policy implications for balancing the demands on the water resources of the state resulting from a growing population with the requirements of the riverine, bay, and estuary systems including granting permits for instream flows dedicated to environmental needs or bay and estuary inflows, use of the Texas Water Trust, and any other issues that the advisory group determines have importance and relevance to the protection of environmental flows. In evaluating the options for providing adequate environmental flows, the advisory group shall take notice of the strong public policy imperative that exists in this state recognizing that environmental flows are important to the biological health of our public and private lands, streams and rivers, and bay and estuary systems and are high priorities in the water management process. The advisory group shall specifically address:

(1) ways that the ecological soundness of those systems will be ensured in the water rights administration and

enforcement and water allocation processes; and

(2) appropriate methods to encourage persons voluntarily to convert reasonable amounts of existing water rights to use for environmental flow protection temporarily or permanently.

(j) The advisory group may adopt rules, procedures, and policies as needed to administer this section, to implement its responsibilities, and to exercise its authority under Sections 11.02361 and 11.02362.

(k) Chapter 2110, Government Code, does not apply to the size, composition, or duration of the advisory group.

(l) Not later than December 1, 2008, and every two years thereafter, the advisory group shall issue and promptly deliver to the governor, lieutenant governor, and speaker of the house of representatives copies of a report summarizing:

(1) any hearings conducted by the advisory group;

(2) any studies conducted by the advisory group;

(3) any legislation proposed by the advisory group;

(4) progress made in implementing Sections 11.02361 and 11.02362; and

(5) any other findings and recommendations of the advisory group.

(m) The advisory group is abolished on the date that the commission has adopted environmental flow standards under Section 11.1471 for all of the river basin and bay systems in this state.

Sec. 11.02361. TEXAS ENVIRONMENTAL FLOWS SCIENCE ADVISORY COMMITTEE. (a) The Texas environmental flows science advisory

committee consists of at least five but not more than nine members appointed by the advisory group.

(b) The advisory group shall appoint to the science advisory committee persons who will provide an objective perspective and diverse technical expertise, including expertise in hydrology, hydraulics, water resources, aquatic and terrestrial biology, geomorphology, geology, water quality, computer modeling, and other technical areas pertinent to the evaluation of environmental flows.

(c) Members of the science advisory committee serve five-year terms expiring March 1. A vacancy on the science advisory committee is filled by appointment by the co-presiding officers of the advisory group for the unexpired term.

(d) Chapter 2110, Government Code, does not apply to the size, composition, or duration of the science advisory committee.

(e) The science advisory committee shall:

(1) serve as an objective scientific body to advise and make recommendations to the advisory group on issues relating to the science of environmental flow protection; and

(2) develop recommendations to help provide overall direction, coordination, and consistency relating to:

(A) environmental flow methodologies for bay and estuary studies and instream flow studies;

(B) environmental flow programs at the commission, the Parks and Wildlife Department, and the board; and

(C) the work of the basin and bay expert science teams described in Section 11.02362.

(f) To assist the advisory group to assess the extent to which the recommendations of the science advisory committee are considered and implemented, the commission, the Parks and Wildlife Department, and the board shall provide written reports to the advisory group, at intervals determined by the advisory group, that describe:

(1) the actions taken by each agency in response to each recommendation; and

(2) for each recommendation not implemented, the reason it was not implemented.

(g) The science advisory committee is abolished on the date the advisory group is abolished under Section 11.0236(m).

Sec. 11.02362. DEVELOPMENT OF ENVIRONMENTAL FLOW REGIME RECOMMENDATIONS. (a) For the purposes of this section, the advisory group, not later than November 1, 2007, shall define the geographical extent of each river basin and bay system in this state for the sole purpose of developing environmental flow regime recommendations under this section and adoption of environmental flow standards under Section 11.1471.

(b) The advisory group shall give priority in descending order to the following river basin and bay systems of the state for the purpose of developing environmental flow regime recommendations and adopting environmental flow standards:

(1) the river basin and bay system consisting of the Trinity and San Jacinto Rivers and Galveston Bay and the river basin and bay system consisting of the Sabine and Neches Rivers and Sabine Lake Bay;

(2) the river basin and bay system consisting of the Colorado and Lavaca Rivers and Matagorda and Lavaca Bays and the river basin and bay system consisting of the Guadalupe, San Antonio, Mission, and Aransas Rivers and Mission, Copano, Aransas, and San Antonio Bays; and

(3) the river basin and bay system consisting of the Nueces River and Corpus Christi and Baffin Bays, the river basin and bay system consisting of the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre, and the Brazos River and its associated bay and estuary system.

(c) For the river basin and bay systems listed in Subsection (b)(1):

(1) the advisory group shall appoint the basin and bay area stakeholders committee not later than November 1, 2007;

(2) the basin and bay area stakeholders committee shall establish a basin and bay expert science team not later than March 1, 2008;

(3) the basin and bay expert science team shall finalize environmental flow regime recommendations and submit them to the basin and bay area stakeholders committee, the advisory group, and the commission not later than March 1, 2009, except that at the request of the basin and bay area stakeholders committee for good cause shown, the advisory group may extend the deadline provided by this subdivision;

(4) the basin and bay area stakeholders committee shall submit to the commission its comments on and recommendations regarding the basin and bay expert science team's recommended

environmental flow regime not later than September 1, 2009; and

(5) the commission shall adopt the environmental flow standards as provided by Section 11.1471 not later than September 1, 2010.

(d) The advisory group shall appoint the basin and bay area stakeholders committees for the river basin and bay systems listed in Subsection (b)(2) not later than September 1, 2008, and shall appoint the basin and bay area stakeholders committees for the river basin and bay systems listed in Subsection (b)(3) not later than September 1, 2009. The advisory group shall establish a schedule for the performance of the tasks listed in Subsections (c)(2) through (5) with regard to the river basin and bay systems listed in Subsections (b)(2) and (3) that will result in the adoption of environmental flow standards for that river basin and bay system by the commission as soon as is reasonably possible. Each basin and bay area stakeholders committee and basin and bay expert science team for a river basin and bay system listed in Subsection (b)(2) or (3) shall make recommendations to the advisory group with regard to the schedule applicable to that river basin and bay system. The advisory group shall consider the recommendations of the basin and bay area stakeholders committee and basin and bay expert science team as well as coordinate with, and give appropriate consideration to the recommendations of, the commission, the Parks and Wildlife Department, and the board in establishing the schedule.

(e) For a river basin and bay system or a river basin that does not have an associated bay system in this state not listed in

Subsection (b), the advisory group shall establish a schedule for the development of environmental flow regime recommendations and the adoption of environmental flow standards. The advisory group shall develop the schedule in consultation with the commission, the Parks and Wildlife Department, the board, and the pertinent basin and bay area stakeholders committee and basin and bay expert science team. The advisory group may, on its own initiative or on request, modify a schedule established under this subsection to be more responsive to particular circumstances, local desires, changing conditions, or time-sensitive conflicts. This subsection does not prohibit, in a river basin and bay system for which the advisory group has not yet established a schedule for the development of environmental flow regime recommendations and the adoption of environmental flow standards, an effort to develop information on environmental flow needs and ways in which those needs can be met by a voluntary consensus-building process.

(f) The advisory group shall appoint a basin and bay area stakeholders committee for each river basin and bay system in this state for which a schedule for the development of environmental flow regime recommendations and the adoption of environmental flow standards is specified by or established under Subsection (c), (d), or (e). Chapter 2110, Government Code, does not apply to the size, composition, or duration of a basin and bay area stakeholders committee. Each committee must consist of at least 17 members. The membership of each committee must:

(1) reflect a fair and equitable balance of interest groups concerned with the particular river basin and bay system for

which the committee is established; and

(2) be representative of appropriate stakeholders, including the following if they have a presence in the particular river basin and bay system for which the committee is established:

(A) agricultural water users, including representatives of each of the following sectors:

(i) agricultural irrigation;

(ii) free-range livestock; and

(iii) concentrated animal feeding operation;

(B) recreational water users, including coastal recreational anglers and businesses supporting water recreation;

(C) municipalities;

(D) soil and water conservation districts;

(E) industrial water users, including representatives of each of the following sectors:

(i) refining;

(ii) chemical manufacturing;

(iii) electricity generation; and

(iv) production of paper products or timber;

(F) commercial fishermen;

(G) public interest groups;

(H) regional water planning groups;

(I) groundwater conservation districts;

(J) river authorities and other conservation and reclamation districts with jurisdiction over surface water; and

(K) environmental interests.

(g) Members of a basin and bay area stakeholders committee serve five-year terms expiring March 1. If a vacancy occurs on a committee, the remaining members of the committee by majority vote shall appoint a member to serve the remainder of the unexpired term.

(h) Meetings of a basin and bay area stakeholders committee must be open to the public.

(i) Each basin and bay area stakeholders committee shall establish a basin and bay expert science team for the river basin and bay system for which the committee is established. The basin and bay expert science team must be established not later than six months after the date the basin and bay area stakeholders committee is established. Chapter 2110, Government Code, does not apply to the size, composition, or duration of a basin and bay expert science team. Each basin and bay expert science team must be composed of technical experts with special expertise regarding the river basin and bay system or regarding the development of environmental flow regimes. A person may serve as a member of more than one basin and bay expert science team at the same time.

(j) The members of a basin and bay expert science team serve five-year terms expiring April 1. A vacancy on a basin and bay expert science team is filled by appointment by the pertinent basin and bay area stakeholders committee to serve the remainder of the unexpired term.

(k) The science advisory committee shall appoint one of its members to serve as a liaison to each basin and bay expert science team to facilitate coordination and consistency in environmental

flow activities throughout the state. The commission, the Parks and Wildlife Department, and the board shall provide technical assistance to each basin and bay expert science team, including information about the studies conducted under Sections 16.058 and 16.059, and may serve as nonvoting members of the basin and bay expert science team to facilitate the development of environmental flow regime recommendations.

(l) Where reasonably practicable, meetings of a basin and bay expert science team must be open to the public.

(m) Each basin and bay expert science team shall develop environmental flow analyses and a recommended environmental flow regime for the river basin and bay system for which the team is established through a collaborative process designed to achieve a consensus. In developing the analyses and recommendations, the science team must consider all reasonably available science, without regard to the need for the water for other uses, and the science team's recommendations must be based solely on the best science available. For the Rio Grande below Fort Quitman, any uses attributable to Mexican water flows must be excluded from environmental flow regime recommendations.

(n) Each basin and bay expert science team shall submit its environmental flow analyses and environmental flow regime recommendations to the pertinent basin and bay area stakeholders committee, the advisory group, and the commission in accordance with the applicable schedule specified by or established under Subsection (c), (d), or (e). The basin and bay area stakeholders committee and the advisory group may not change the environmental

flow analyses or environmental flow regime recommendations of the basin and bay expert science team.

(o) Each basin and bay area stakeholders committee shall review the environmental flow analyses and environmental flow regime recommendations submitted by the committee's basin and bay expert science team and shall consider them in conjunction with other factors, including the present and future needs for water for other uses related to water supply planning in the pertinent river basin and bay system. For the Rio Grande, the basin and bay area stakeholders committee shall also consider the water accounting requirements for any international water sharing treaty, minutes, and agreement applicable to the Rio Grande and the effects on allocation of water by the Rio Grande watermaster in the middle and lower Rio Grande. The Rio Grande basin and bay expert science team may not recommend any environmental flow regime that would result in a violation of a treaty or court decision. The basin and bay area stakeholders committee shall develop recommendations regarding environmental flow standards and strategies to meet the environmental flow standards and submit those recommendations to the commission and to the advisory group in accordance with the applicable schedule specified by or established under Subsection (c), (d), or (e). In developing its recommendations, the basin and bay area stakeholders committee shall operate on a consensus basis to the maximum extent possible.

(p) In recognition of the importance of adaptive management, after submitting its recommendations regarding environmental flow standards and strategies to meet the

environmental flow standards to the commission, each basin and bay area stakeholders committee, with the assistance of the pertinent basin and bay expert science team, shall prepare and submit for approval by the advisory group a work plan. The work plan must:

(1) establish a periodic review of the basin and bay environmental flow analyses and environmental flow regime recommendations, environmental flow standards, and strategies, to occur at least once every 10 years;

(2) prescribe specific monitoring, studies, and activities; and

(3) establish a schedule for continuing the validation or refinement of the basin and bay environmental flow analyses and environmental flow regime recommendations, the environmental flow standards adopted by the commission, and the strategies to achieve those standards.

(q) In accordance with the applicable schedule specified by or established under Subsection (c), (d), or (e), the advisory group, with input from the science advisory committee, shall review the environmental flow analyses and environmental flow regime recommendations submitted by each basin and bay expert science team. If appropriate, the advisory group shall submit comments on the analyses and recommendations to the commission for use by the commission in adopting rules under Section 11.1471. Comments must be submitted not later than six months after the date of receipt of the analyses and recommendations.

(r) Notwithstanding the other provisions of this section, in the event the commission, by permit or order, has established an

estuary advisory council with specific duties related to implementation of permit conditions for environmental flows, that council may continue in full force and effect and shall act as and perform the duties of the basin and bay area stakeholders committee under this section. The estuary advisory council shall add members from stakeholder groups and from appropriate science and technical groups, if necessary, to fully meet the criteria for membership established in Subsection (f) and shall operate under the provisions of this section.

(s) Each basin and bay area stakeholders committee and basin and bay expert science team is abolished on the date the advisory group is abolished under Section 11.0236(m).

Sec. 11.0237. WATER RIGHTS FOR INSTREAM FLOWS DEDICATED TO ENVIRONMENTAL NEEDS OR BAY AND ESTUARY INFLOWS. (a) The commission may not issue a new permit for instream flows dedicated to environmental needs or bay and estuary inflows. The commission may approve an application to amend an existing permit or certificate of adjudication to change the use to or add a use for instream flows dedicated to environmental needs or bay and estuary inflows.

(b) This section does not alter the commission's obligations under Section 11.042(b) or (c), 11.046(b), 11.085(k)(2)(F), 11.134(b)(3)(D), 11.147, 11.1471, 11.1491, 11.150, 11.152, 16.058, or 16.059.

SECTION 1.08. Section 11.082(b), Water Code, is amended to read as follows:

(b) The state may recover the penalties prescribed in Subsection (a) [~~of this section~~] by suit brought for that purpose in

a court of competent jurisdiction. The state may seek those penalties regardless of whether a watermaster has been appointed for the water division, river basin, or segment of a river basin where the unlawful use is alleged to have occurred.

SECTION 1.09. Section 11.0841, Water Code, is amended by adding Subsection (c) to read as follows:

(c) For purposes of this section, the Parks and Wildlife Department has:

(1) the rights of a holder of a water right that is held in the Texas Water Trust, including the right to file suit in a civil court to prevent the unlawful use of such a right;

(2) the right to act in the same manner that a holder of a water right may act to protect the holder's rights in seeking to prevent any person from appropriating water in violation of a set-aside established by the commission under Section 11.1471 to meet instream flow needs or freshwater inflow needs; and

(3) the right to file suit in a civil court to prevent the unlawful use of a set-aside established under Section 11.1471.

SECTION 1.10. Section 11.0842(a), Water Code, is amended to read as follows:

(a) If a person violates this chapter, a rule or order adopted under this chapter or Section 16.236 [~~of this code~~], or a permit, certified filing, or certificate of adjudication issued under this chapter, the commission may assess an administrative penalty against that person as provided by this section. The commission may assess an administrative penalty for a violation relating to a water division or a river basin or segment of a river

basin regardless of whether a watermaster has been appointed for the water division or river basin or segment of the river basin.

SECTION 1.11. Section 11.0843(a), Water Code, is amended to read as follows:

(a) Upon witnessing a violation of this chapter or a rule or order or a water right issued under this chapter, the executive director or a person designated by the executive director, including a watermaster or the watermaster's deputy, [~~as defined by commission rule,~~] may issue the alleged violator a field citation alleging that a violation has occurred and providing the alleged violator the option of either:

(1) without admitting to or denying the alleged violation, paying an administrative penalty in accordance with the predetermined penalty amount established under Subsection (b) [~~of this section~~] and taking remedial action as provided in the citation; or

(2) requesting a hearing on the alleged violation in accordance with Section 11.0842 [~~of this code~~].

SECTION 1.12. Section 11.134(b), Water Code, is amended to read as follows:

(b) The commission shall grant the application only if:

(1) the application conforms to the requirements prescribed by this chapter and is accompanied by the prescribed fee;

(2) unappropriated water is available in the source of supply;

(3) the proposed appropriation:

(A) is intended for a beneficial use;

(B) does not impair existing water rights or vested riparian rights;

(C) is not detrimental to the public welfare;

(D) considers any applicable environmental flow standards established under Section 11.1471 and, if applicable, the assessments performed under Sections 11.147(d) and (e) and Sections 11.150, 11.151, and 11.152; and

(E) addresses a water supply need in a manner that is consistent with the state water plan and the relevant approved regional water plan for any area in which the proposed appropriation is located, unless the commission determines that conditions warrant waiver of this requirement; and

(4) the applicant has provided evidence that reasonable diligence will be used to avoid waste and achieve water conservation as defined by [~~Subdivision (8)(B),~~] Section 11.002(8)(B) [~~11.002~~].

SECTION 1.13. Section 11.147, Water Code, is amended by amending Subsections (b), (d), and (e) and adding Subsections (e-1), (e-2), and (e-3) to read as follows:

(b) In its consideration of an application for a permit to store, take, or divert water, the commission shall assess the effects, if any, of the issuance of the permit on the bays and estuaries of Texas. For permits issued within an area that is 200 river miles of the coast, to commence from the mouth of the river thence inland, the commission shall include in the permit any conditions considered necessary to maintain beneficial inflows to

any affected bay and estuary system, to the extent practicable when considering all public interests and the studies mandated by Section 16.058 as evaluated under Section 11.1491[~~, those conditions considered necessary to maintain beneficial inflows to any affected bay and estuary system~~].

(d) In its consideration of an application to store, take, or divert water, the commission shall include in the permit, to the extent practicable when considering all public interests, those conditions considered by the commission necessary to maintain existing instream uses and water quality of the stream or river to which the application applies. In determining what conditions to include in the permit under this subsection, the commission shall consider among other factors:

(1) the studies mandated by Section 16.059; and

(2) any water quality assessment performed under Section 11.150.

(e) The commission shall include in the permit, to the extent practicable when considering all public interests, those conditions considered by the commission necessary to maintain fish and wildlife habitats. In determining what conditions to include in the permit under this subsection, the commission shall consider any assessment performed under Section 11.152.

(e-1) Any permit for a new appropriation of water or an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted must include a provision allowing the commission to adjust the conditions included in the permit or amended water right to provide for protection of

instream flows or freshwater inflows. With respect to an amended water right, the provision may not allow the commission to adjust a condition of the amendment other than a condition that applies only to the increase in the amount of water to be stored, taken, or diverted authorized by the amendment. This subsection does not affect an appropriation of or an authorization to store, take, or divert water under a permit or amendment to a water right issued before September 1, 2007. The commission shall adjust the conditions if the commission determines, through an expedited public comment process, that such an adjustment is appropriate to achieve compliance with applicable environmental flow standards adopted under Section 11.1471. The adjustment:

(1) in combination with any previous adjustments made under this subsection may not increase the amount of the pass-through or release requirement for the protection of instream flows or freshwater inflows by more than 12.5 percent of the annualized total of that requirement contained in the permit as issued or of that requirement contained in the amended water right and applicable only to the increase in the amount of water authorized to be stored, taken, or diverted under the amended water right;

(2) must be based on appropriate consideration of the priority dates and diversion locations of any other water rights granted in the same river basin that are subject to adjustment under this subsection; and

(3) must be based on appropriate consideration of any voluntary contributions to the Texas Water Trust, and of any

voluntary amendments to existing water rights to change the use of a specified quantity of water to or add a use of a specified quantity of water for instream flows dedicated to environmental needs or bay and estuary inflows as authorized by Section 11.0237(a), that actually contribute toward meeting the applicable environmental flow standards.

(e-2) Any water right holder who makes a contribution or amends a water right as described by Subsection (e-1)(3) is entitled to appropriate credit for the benefits of the contribution or amendment against the adjustment of the holder's water right under Subsection (e-1).

(e-3) Notwithstanding Subsections (b)-(e), for the purpose of determining the environmental flow conditions necessary to maintain freshwater inflows to an affected bay and estuary system, existing instream uses and water quality of a stream or river, or fish and aquatic wildlife habitats, the commission shall apply any applicable environmental flow standard, including any environmental flow set-aside, adopted under Section 11.1471 instead of considering the factors specified by those subsections.

SECTION 1.14. Subchapter D, Chapter 11, Water Code, is amended by adding Section 11.1471 to read as follows:

Sec. 11.1471. ENVIRONMENTAL FLOW STANDARDS AND SET-ASIDES. (a) The commission by rule shall:

(1) adopt appropriate environmental flow standards for each river basin and bay system in this state that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant

factors;

(2) establish an amount of unappropriated water, if available, to be set aside to satisfy the environmental flow standards to the maximum extent reasonable when considering human water needs; and

(3) establish procedures for implementing an adjustment of the conditions included in a permit or an amended water right as provided by Sections 11.147(e-1) and (e-2).

(b) In adopting environmental flow standards for a river basin and bay system under Subsection (a)(1), the commission shall consider:

(1) the definition of the geographical extent of the river basin and bay system adopted by the advisory group under Section 11.02362(a) and the definition and designation of the river basin by the board under Section 16.051(c);

(2) the schedule established by the advisory group under Section 11.02362(d) or (e) for the adoption of environmental flow standards for the river basin and bay system, if applicable;

(3) the environmental flow analyses and the recommended environmental flow regime developed by the applicable basin and bay expert science team under Section 11.02362(m);

(4) the recommendations developed by the applicable basin and bay area stakeholders committee under Section 11.02362(o) regarding environmental flow standards and strategies to meet the flow standards;

(5) any comments submitted by the advisory group to the commission under Section 11.02362(q);

(6) the specific characteristics of the river basin and bay system;

(7) economic factors;

(8) the human and other competing water needs in the river basin and bay system;

(9) all reasonably available scientific information, including any scientific information provided by the science advisory committee; and

(10) any other appropriate information.

(c) Environmental flow standards adopted under Subsection (a)(1) must consist of a schedule of flow quantities, reflecting seasonal and yearly fluctuations that may vary geographically by specific location in a river basin and bay system.

(d) As provided by Section 11.023, the commission may not issue a permit for a new appropriation or an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted if the issuance of the permit or amendment would impair an environmental flow set-aside established under Subsection (a)(2). A permit for a new appropriation or an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted that is issued after the adoption of an applicable environmental flow set-aside must contain appropriate conditions to ensure protection of the environmental flow set-aside.

(e) An environmental flow set-aside established under Subsection (a)(2) for a river basin and bay system other than the middle and lower Rio Grande must be assigned a priority date

corresponding to the date the commission receives environmental flow regime recommendations from the applicable basin and bay expert science team and be included in the appropriate water availability models in connection with an application for a permit for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted.

(f) An environmental flow standard or environmental flow set-aside adopted under Subsection (a) may be altered by the commission in a rulemaking process undertaken in accordance with a schedule established by the commission. In establishing a schedule, the commission shall consider the applicable work plan approved by the advisory group under Section 11.02362(p). The commission's schedule may not provide for the rulemaking process to occur more frequently than once every 10 years unless the work plan provides for a periodic review under Section 11.02362(p) to occur more frequently than once every 10 years. In that event, the commission may provide for the rulemaking process to be undertaken in conjunction with the periodic review if the commission determines that schedule to be appropriate. A rulemaking process undertaken under this subsection must provide for the participation of stakeholders having interests in the particular river basin and bay system for which the process is undertaken.

SECTION 1.15. The heading to Section 11.148, Water Code, is amended to read as follows:

Sec. 11.148. EMERGENCY SUSPENSION OF PERMIT CONDITIONS AND EMERGENCY AUTHORITY TO MAKE AVAILABLE WATER SET ASIDE FOR

ENVIRONMENTAL FLOWS.

SECTION 1.16. Section 11.148, Water Code, is amended by adding Subsection (a-1) and amending Subsections (b) and (c) to read as follows:

(a-1) State water that is set aside by the commission to meet the needs for freshwater inflows to affected bays and estuaries and instream uses under Section 11.1471(a)(2) may be made available temporarily for other essential beneficial uses if the commission finds that an emergency exists that cannot practically be resolved in another way.

(b) Before the commission suspends a permit condition under Subsection (a) or makes water available temporarily under Subsection (a-1) [~~of this section~~], it must give written notice to the Parks and Wildlife Department of the proposed action [~~suspension~~]. The commission shall give the Parks and Wildlife Department an opportunity to submit comments on the proposed action [~~suspension~~] within 72 hours from such time and the commission shall consider those comments before issuing its order implementing the proposed action [~~imposing the suspension~~].

(c) The commission may suspend the permit condition under Subsection (a) or make water available temporarily under Subsection (a-1) without notice to any other interested party other than the Parks and Wildlife Department as provided by Subsection (b) [~~of this section~~]. However, all affected persons shall be notified immediately by publication, and a hearing to determine whether the suspension should be continued shall be held within 15 days of the date on which the order to suspend is issued.

SECTION 1.17. Section 11.1491(a), Water Code, is amended to read as follows:

(a) The Parks and Wildlife Department and the commission shall have joint responsibility to review the studies prepared under Section 16.058 [~~of this code~~], to determine inflow conditions necessary for the bays and estuaries, and to provide information necessary for water resources management. Each agency shall designate an employee to share equally in the oversight of the program. Other responsibilities shall be divided between the Parks and Wildlife Department and the commission to maximize present in-house capabilities of personnel and to minimize costs to the state. Each agency shall have reasonable access to all information produced by the other agency. Publication of reports completed under this section shall be submitted for comment to [~~both~~] the commission, [~~and~~] the Parks and Wildlife Department, the advisory group, the science advisory committee, and any applicable basin and bay area stakeholders committee and basin and bay expert science team.

SECTION 1.18. Section 11.329(g), Water Code, is amended to read as follows:

(g) The commission may not assess costs under this section against a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts or against a holder of a water right placed in the Texas Water Trust for a term of at least 20 years. [~~This subsection is not intended to affect in any way the fees assessed on a water right holder by the commission under~~

~~Section 1.29(d), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993. For purposes of Section 1.29(d), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts shall be assessed fees at the same rate per acre-foot charged to a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of more than two megawatts.~~]

SECTION 1.19. Section 11.404(e), Water Code, is amended to read as follows:

(e) The court may not assess costs and expenses under this section against:

(1) a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts; or

(2) a holder of a water right placed in the Texas Water Trust for a term of at least 20 years.

SECTION 1.20. Subchapter I, Chapter 11, Water Code, is amended by adding Section 11.4531 to read as follows:

Sec. 11.4531. WATERMASTER ADVISORY COMMITTEE. (a) For each river basin or segment of a river basin for which the executive director appoints a watermaster under this subchapter, the executive director shall appoint a watermaster advisory committee consisting of at least nine but not more than 15 members. A member of the advisory committee must be a holder of a water right or a representative of a holder of a water right in the river basin or

segment of the river basin for which the watermaster is appointed. In appointing members to the advisory committee, the executive director shall consider:

(1) geographic representation;

(2) amount of water rights held;

(3) different types of holders of water rights and users, including water districts, municipal suppliers, irrigators, and industrial users; and

(4) experience and knowledge of water management practices.

(b) An advisory committee member is not entitled to reimbursement of expenses or to compensation.

(c) An advisory committee member serves a two-year term expiring August 31 of each odd-numbered year and holds office until a successor is appointed.

(d) The advisory committee shall meet within 30 days after the date the initial appointments have been made and shall select a presiding officer to serve a one-year term. The committee shall meet regularly as necessary.

(e) The advisory committee shall:

(1) make recommendations to the executive director regarding activities of benefit to the holders of water rights in the administration and distribution of water to holders of water rights in the river basin or segment of the river basin for which the watermaster is appointed;

(2) review and comment to the executive director on the annual budget of the watermaster operation; and

(3) perform other advisory duties as requested by the executive director regarding the watermaster operation or as requested by holders of water rights and considered by the committee to benefit the administration of water rights in the river basin or segment of the river basin for which the watermaster is appointed.

SECTION 1.21. Sections 11.454 and 11.455, Water Code, are amended to read as follows:

Sec. 11.454. DUTIES AND AUTHORITY OF THE WATERMASTER. Section 11.327 applies to the duties and authority of a watermaster appointed for a river basin or segment of a river basin under this subchapter in the same manner as that section applies to the duties and authority of a watermaster appointed for a water division under Subchapter G [~~A watermaster as the agent of the commission and under the executive director's supervision shall:~~

[~~(1) divide the water of the streams or other sources of supply of his segment or basin in accordance with the authorized water rights;~~

[~~(2) regulate or cause to be regulated the controlling works of reservoirs and diversion works in time of water shortage, as is necessary because of the rights existing in the streams of his segment or basin, or as is necessary to prevent the waste of water or its diversion, taking, storage, or use in excess of the quantities to which the holders of water rights are lawfully entitled; and~~

[~~(3) perform any other duties and exercise any authority directed by the commission~~].

Sec. 11.455. COMPENSATION AND EXPENSES OF WATERMASTER [~~ASSESSMENTS~~]. (a) Section 11.329 applies to the payment of the compensation and expenses of a watermaster appointed for a river basin or segment of a river basin under this subchapter in the same manner as that section applies to the payment of the compensation and expenses of a watermaster appointed for a water division under Subchapter G.

(b) The executive director shall deposit the assessments collected under this section to the credit of the watermaster fund.

(c) Money deposited under this section to the credit of the watermaster fund may be used only for the purposes specified by Section 11.3291 with regard to the watermaster operation under this subchapter with regard to which the assessments were collected [~~The commission may assess the costs of the watermaster against all persons who hold water rights in the river basin or segment of the river basin under the watermaster's jurisdiction in accordance with Section 11.329 of this code~~].

SECTION 1.22. Subchapter F, Chapter 15, Water Code, is amended by adding Section 15.4063 to read as follows:

Sec. 15.4063. ENVIRONMENTAL FLOWS FUNDING. The board may authorize the use of money in the research and planning fund:

(1) to compensate the members of the Texas environmental flows science advisory committee established under Section 11.02361 for attendance and participation at meetings of the committee and for transportation, meals, lodging, or other travel expenses associated with attendance at those meetings as provided by the General Appropriations Act;

(2) for contracts with cooperating state and federal agencies and universities and with private entities as necessary to provide technical assistance to enable the Texas environmental flows science advisory committee and the basin and bay expert science teams established under Section 11.02362 to perform their statutory duties;

(3) to compensate the members of the basin and bay expert science teams established under Section 11.02362 for attendance and participation at meetings of the basin and bay expert science teams and for transportation, meals, lodging, or other travel expenses associated with attendance at those meetings as provided by the General Appropriations Act; and

(4) for contracts with political subdivisions designated as representatives of basin and bay area stakeholders committees established under Section 11.02362 to fund all or part of the administrative expenses incurred in conducting meetings of the basin and bay area stakeholders committees or the pertinent basin and bay expert science teams.

SECTION 1.23. Section 16.059(d), Water Code, is amended to read as follows:

(d) The priority studies shall be completed not later than December 31, 2016 [~~2010~~]. The Parks and Wildlife Department, the commission, and the board shall establish a work plan that prioritizes the studies and that sets interim deadlines providing for publication of flow determinations for individual rivers and streams on a reasonably consistent basis throughout the prescribed study period. Before publication, completed studies shall be

submitted for comment to the commission, the board, and the Parks and Wildlife Department.

SECTION 1.24. Section 26.0135(h), Water Code, as amended by Chapters 234 and 965, Acts of the 77th Legislature, Regular Session, 2001, is reenacted and amended to read as follows:

(h) The commission shall apportion, assess, and recover the reasonable costs of administering the water quality management programs under this section from users of water and wastewater permit holders in the watershed according to the records of the commission generally in proportion to their right, through permit or contract, to use water from and discharge wastewater in the watershed. Irrigation water rights, [~~and~~] non-priority hydroelectric rights of a water right holder that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts, and water rights held in the Texas Water Trust for terms of at least 20 years will not be subject to this assessment. The cost to river authorities and others to conduct water quality monitoring and assessment shall be subject to prior review and approval by the commission as to methods of allocation and total amount to be recovered. The commission shall adopt rules to supervise and implement the water quality monitoring, assessment, and associated costs. The rules shall ensure that water users and wastewater dischargers do not pay excessive amounts, that program funds are equitably apportioned among basins, that a river authority may recover no more than the actual costs of administering the water quality management programs called for in this section, and that no municipality shall be assessed cost for

any efforts that duplicate water quality management activities described in Section 26.177 [~~of this chapter~~]. The rules concerning the apportionment and assessment of reasonable costs shall provide for a recovery of not more than $5,000,000 annually. Costs recovered by the commission are to be deposited to the credit of the water resource management account and may be used only to accomplish the purposes of this section. The commission may apply not more than 10 percent of the costs recovered annually toward the commission's overhead costs for the administration of this section and the implementation of regional water quality assessments. The commission, with the assistance and input of each river authority, shall file a written report accounting for the costs recovered under this section with the governor, the lieutenant governor, and the speaker of the house of representatives on or before December 1 of each even-numbered year.

SECTION 1.25. Section 11.1491(b), Water Code, is repealed.

SECTION 1.26. (a) The governor, lieutenant governor, and speaker of the house of representatives shall appoint the initial members of the environmental flows advisory group as provided by Section 11.0236, Water Code, as added by this article, as soon as practicable on or after the effective date of this article.

(b) As soon as practicable after taking office, the initial members of the environmental flows advisory group shall appoint the initial members of the Texas environmental flows science advisory committee as provided by Section 11.02361, Water Code, as added by this article. The terms of the initial members of the committee expire March 1, 2012.

(c) The environmental flows advisory group shall appoint the members of each basin and bay area stakeholders committee as provided by Section 11.02362, Water Code, as added by this article. The terms of the initial members of each committee expire March 1 of the fifth year that begins after the year in which the initial appointments are made.

(d) Each basin and bay area stakeholders committee shall appoint the members of the basin and bay expert science team for the river basin and bay system for which the committee is established as provided by Section 11.02362, Water Code, as added by this article. The terms of the initial members of each team expire April 1 of the fifth year that begins after the year in which the initial appointments are made.

(e) The executive director of the Texas Commission on Environmental Quality shall appoint the members of the watermaster advisory committee under Section 11.4531, Water Code, as added by this article, for each river basin or segment of a river basin for which the executive director appoints a watermaster under Subchapter I, Chapter 11, Water Code. The terms of the initial members of each committee expire August 31 of the first odd-numbered year that begins after the year in which the initial appointments are made.

SECTION 1.27. The changes in law made by this article relating to a permit for a new appropriation of water or to an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted apply only to:

(1) water appropriated under a permit for a new

appropriation of water the application for which is pending with the Texas Commission on Environmental Quality on the effective date of this Act or is filed with the commission on or after that date; or

(2) the increase in the amount of water authorized to be stored, taken, or diverted under an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted and the application for which is pending with the Texas Commission on Environmental Quality on the effective date of this Act or is filed with the commission on or after that date.

ARTICLE 2. EDWARDS AQUIFER AUTHORITY

SECTION 2.01. Section 1.11, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended by amending Subsection (f) and adding Subsections (f-1) and (f-2) to read as follows:

(f) The authority may own, finance, design, [~~contract with a person who uses water from the aquifer for the authority or that person to~~] construct, operate, or [~~own, finance, and~~] maintain recharge [~~water supply~~] facilities. [~~Management fees or special fees may not be used for purchasing or operating these facilities.~~] For the purpose of this subsection, "recharge [~~water supply~~] facility" means [~~includes~~] a dam, reservoir, [~~treatment facility, transmission facility,~~] or other method of recharge project and associated facilities, structures, or works but does not include a facility to recirculate water at Comal or San Marcos Springs.

(f-1) The authority shall provide written notice of the intent to own, finance, design, construct, operate, or maintain

recharge facilities to:

(1) each groundwater conservation district in the area in which the recharge facility will be located;

(2) the mayor of each municipality in the area in which the recharge facility will be located;

(3) the county judge of each county in the area in which the recharge facility will be located; and

(4) each member of the legislature who represents the area in which the proposed recharge facility will be located.

(f-2) Any entity within the county in which a recharge facility is to be constructed shall be provided opportunity for input and allowed to provide proposals for partnering with the authority to own, finance, design, construct, operate, or maintain the recharge facility.

SECTION 2.02. Sections 1.14(a), (c), (e), (f), and (h), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, are amended to read as follows:

(a) Authorizations to withdraw water from the aquifer and all authorizations and rights to make a withdrawal under this Act shall be limited in accordance with this section to:

(1) protect the water quality of the aquifer;

(2) protect the water quality of the surface streams to which the aquifer provides springflow;

(3) achieve water conservation;

(4) maximize the beneficial use of water available for withdrawal from the aquifer;

(5) recognize the extent of the hydro-geologic

connection and interaction between surface water and groundwater;

(6) protect aquatic and wildlife habitat;

(7) [~~(6)~~] protect species that are designated as threatened or endangered under applicable federal or state law; and

(8) [~~(7)~~] provide for instream uses, bays, and estuaries.

(c) Except as provided by Subsections [~~(d),~~] (f)[~~,~~] and (h) of this section and Section 1.26 of this article, for the period beginning January 1, 2008, the amount of permitted withdrawals from the aquifer may not exceed or be less than 572,000 [~~400,000~~] acre-feet of water for each calendar year, which is the sum of all regular permits issued or for which an application was filed and issuance was pending action by the authority as of January 1, 2005.

(e) The authority may not allow withdrawals from the aquifer through wells drilled after June 1, 1993, except for replacement, test, or exempt wells or to the extent that the authority approves an amendment to an initial regular permit to authorize a change in the point of withdrawal under that permit [~~additional water as provided by Subsection (d) and then on an interruptible basis~~].

(f) If the level of the aquifer is equal to or greater than 660 [~~650~~] feet above mean sea level as measured at Well J-17, the authority may authorize withdrawal from the San Antonio pool, on an uninterruptible basis, of permitted amounts. If the level of the aquifer is equal to or greater than 845 feet at Well J-27, the authority may authorize withdrawal from the Uvalde pool, on an uninterruptible basis, of permitted amounts. [~~The authority shall limit the additional withdrawals to ensure that springflows are not~~

~~affected during critical drought conditions.~~]

(h) To accomplish the purposes of this article, [~~by June 1, 1994,~~] the authority, through a program, shall implement and enforce water management practices, procedures, and methods to ensure that, not later than December 31, 2012, the continuous minimum springflows of the Comal Springs and the San Marcos Springs are maintained to protect endangered and threatened species to the extent required by federal law and to achieve other purposes provided by Subsection (a) of this section and Section 1.26 of this article. The authority from time to time as appropriate may revise the practices, procedures, and methods. To meet this requirement, the authority shall require:

(1) phased adjustments to [~~reductions in~~] the amount of water that may be used or withdrawn by existing users or categories of other users, including adjustments in accordance with the authority's critical period management plan established under Section 1.26 of this article; or

(2) implementation of alternative management practices, procedures, and methods.

SECTION 2.03. Section 1.16(g), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(g) The authority shall issue an initial regular permit without a term, and an initial regular permit remains in effect until the permit is abandoned or[~~,~~] cancelled[~~, or retired~~].

SECTION 2.04. Section 1.19(b), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as

follows:

(b) Withdrawal of water under a term permit must be consistent with the authority's critical period management plan established under Section 1.26 of this article. A holder of a term permit may not withdraw water from the San Antonio pool of the aquifer unless:

(1) the level of the aquifer is higher than 675 [~~665~~] feet above sea level, as measured at Well J-17;

(2) the flow at Comal Springs as determined by Section 1.26(c) of this article is greater than 350 cubic feet per second; and

(3) the flow at San Marcos Springs as determined by Section 1.26(c) of this article is greater than 200 cubic feet per second.

SECTION 2.05. Section 1.22(a), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(a) The authority may acquire permitted rights to use water from the aquifer for the purposes of:

(1) holding those rights in trust for sale or transfer of the water or the rights to persons within the authority's jurisdiction who may use water from the aquifer;

(2) holding those rights in trust as a means of managing overall demand on the aquifer; or

(3) holding those rights for resale [~~or retirement as a means of complying with pumping reduction requirements under this article; or~~

[~~(4) retiring those rights, including those rights already permitted~~].

SECTION 2.06. Article 1, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended by amending Section 1.26 and adding Section 1.26A to read as follows:

Sec. 1.26. CRITICAL PERIOD MANAGEMENT PLAN. (a) After review of the recommendations received in the program document, as prescribed by Section 1.26A of this article, the [~~The~~] authority by rule shall adopt [~~prepare and coordinate implementation of~~] a [~~plan for~~] critical period management plan consistent with Sections 1.14(a), (f), and (h) of this article [~~on or before September 1, 1995~~]. The critical period management plan shall be adopted by the authority no later than six months after the authority's receipt of the program document. On adoption of the critical period management plan, the authority shall provide a written report to the governor, lieutenant governor, and speaker of the house of representatives describing the actions taken in response to each recommendation and, for each recommendation not implemented, the reason it was not implemented. The plan [~~mechanisms~~] must:

(1) distinguish between discretionary use and nondiscretionary use;

(2) require reductions of all discretionary use to the maximum extent feasible;

(3) require utility pricing, to the maximum extent feasible, to limit discretionary use by the customers of water utilities; [~~and~~]

(4) require reduction of nondiscretionary use by

permitted or contractual users, to the extent further reductions are necessary, in the reverse order of the following water use preferences:

(A) municipal, domestic, and livestock;

(B) industrial and crop irrigation;

(C) residential landscape irrigation;

(D) recreational and pleasure; and

(E) other uses that are authorized by law; and

(5) allow irrigation use to continue in order to permit the user to complete the irrigation of a crop in progress.

(b) In this section, "MSL" means the elevation above mean sea level, measured in feet, of the surface of the water in a well, and "CFS" means cubic feet per second. Not later than January 1, 2008, the authority shall, by rule, adopt and enforce a critical period management plan with withdrawal reduction percentages in the amounts indicated in Tables 1 and 2 whether according to the index well levels or the Comal or San Marcos Springs flow as applicable, for a total in critical period Stage IV of 40 percent of the permitted withdrawals under Table 1 and 35 percent under Table 2:

TABLE 1

CRITICAL PERIOD WITHDRAWAL REDUCTION STAGES

FOR THE SAN ANTONIO POOL

Comal Springs Flow cfs	San Marcos Springs Flow cfs	Index Well J-17 Level MSL	Critical Period Stage	Withdrawal Reduction-San Antonio Pool
<225	<96	<660	I	20%
<200	<80	<650	II	30%
<150	N/A	<640	III	35%
<100	N/A	<630	IV	40%

TABLE 2

CRITICAL PERIOD WITHDRAWAL REDUCTION STAGES

FOR THE UVALDE POOL

Withdrawal Reduction-Uvalde Pool	Index Well J-27 Level MSL	Critical Period Stage
N/A	---	I
5%	<850	II
20%	<845	III
35%	<842	IV

(c) A change to a critical period stage with higher withdrawal reduction percentages is triggered if the 10-day average of daily springflows at the Comal Springs or the San Marcos Springs or the 10-day average of daily aquifer levels at the J-17 Index Well drops below the lowest number of any of the trigger levels indicated in Table 1. A change to a critical period stage with lower withdrawal reduction percentages is triggered only when the 10-day average of daily springflows at the Comal Springs and the San Marcos Springs and the 10-day average of daily aquifer levels at the J-17 Index Well are all above the same stage trigger level. The authority may adjust the withdrawal percentages for Stage IV in Tables 1 and 2 if necessary in order to comply with Subsection (d) or (e) of this section.

(d) Beginning September 1, 2007, the authority may not require the volume of permitted withdrawals to be less than an annualized rate of 340,000 acre-feet, under critical period Stage IV.

(e) After January 1, 2013, the authority may not require the volume of permitted withdrawals to be less than an annualized rate

of 320,000 acre-feet, under critical period Stage IV unless, after review and consideration of the recommendations provided under Section 1.26A of this article, the authority determines that a different volume of withdrawals is consistent with Sections 1.14(a), (f), and (h) of this article in maintaining protection for federally listed threatened and endangered species associated with the aquifer to the extent required by federal law.

(f) Notwithstanding Subsections (d) and (e) of this section, the authority may require further withdrawal reductions before reviewing and considering the recommendations provided under Section 1.26A of this article if the discharge of Comal Springs or San Marcos Springs declines an additional 15 percent after Stage IV withdrawal reductions are imposed under Subsection (b) of this section. This subsection expires on the date that critical period management plan rules adopted by the authority based on the recommendations provided under Section 1.26A of this article take effect.

(g) Notwithstanding the existence of any stage of an interim or final critical period adopted by the authority under this section, a person authorized to withdraw groundwater from the aquifer for irrigation purposes shall, without regard to the withdrawal reductions prescribed for that stage, be allowed to finish a crop already planted in the calendar year during which the critical period is in effect.

Sec. 1.26A. DEVELOPMENT OF WITHDRAWAL REDUCTION LEVELS AND STAGES FOR CRITICAL PERIOD MANAGEMENT THROUGH RECOVERY IMPLEMENTATION PROGRAM. (a) The authority, with the assistance of

Texas A&M University, shall cooperatively develop a recovery implementation program through a facilitated, consensus-based process that involves input from the United States Fish and Wildlife Service, other appropriate federal agencies, and all interested stakeholders, including those listed under Subsection (e)(1) of this section. The recovery implementation program shall be developed for the species that are:

(1) listed as threatened or endangered species under federal law; and

(2) associated with the aquifer.

(b) The authority shall enter into a memorandum of agreement with the United States Fish and Wildlife Service, other appropriate federal agencies, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and other stakeholders, not later than December 31, 2007, in order to develop a program document that may be in the form of a habitat conservation plan used in issuance of an incidental take permit as outlined in Subsection (d) of this section.

(c) The authority shall enter into an implementing agreement with the United States Fish and Wildlife Service, other appropriate federal agencies, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and other stakeholders to develop a program document that may be in the form of a habitat conservation plan used in issuance of an incidental take permit as outlined in Subsection (d) of this

section not later than December 31, 2009.

(d) The authority, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and other stakeholders shall jointly prepare a program document that may be in the form of a habitat conservation plan used in issuance of an incidental take permit with the United States secretary of the interior, through the United States Fish and Wildlife Service and other appropriate federal agencies, under Section 4 or Section 6, Endangered Species Act of 1973 (16 U.S.C. Section 1533 or 1535), as applicable, based on the program developed under Subsection (a) of this section. The program document shall:

(1) provide recommendations for withdrawal adjustments based on a combination of spring discharge rates of the San Marcos and Comal Springs and levels at the J-17 and J-27 wells during critical periods to ensure that federally listed, threatened, and endangered species associated with the Edwards Aquifer will be protected at all times, including throughout a repeat of the drought of record;

(2) include provisions to pursue cooperative and grant funding to the extent available from all state, federal, and other sources for eligible programs included in the cooperative agreement under Subsection (c) of this section, including funding for a program director; and

(3) be approved and executed by the authority, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water

Development Board, and the United States Fish and Wildlife Service not later than September 1, 2012, and the agreement shall take effect December 31, 2012.

(e) Texas A&M University shall assist in the creation of a steering committee to oversee and assist in the development of the cooperative agreement under Subsection (c) of this section. The steering committee must be created not later than September 30, 2007. The initial steering committee shall be composed of:

(1) a representative of each of the following entities, as appointed by the governing body of that entity:

(A) the Edwards Aquifer Authority;

(B) the Texas Commission on Environmental Quality;

(C) the Parks and Wildlife Department;

(D) the Department of Agriculture;

(E) the Texas Water Development Board;

(F) the San Antonio Water System;

(G) the Guadalupe-Blanco River Authority;

(H) the San Antonio River Authority;

(I) the South Central Texas Water Advisory Committee;

(J) Bexar County;

(K) CPS Energy; and

(L) Bexar Metropolitan Water District or its successor; and

(2) nine other persons who respectively must be:

(A) a representative of a holder of an initial

regular permit issued to a retail public utility located west of Bexar County, to be appointed by the authority;

(B) a representative of a holder of an initial regular permit issued by the authority for industrial purposes, to be appointed by the authority;

(C) a representative of a holder of an industrial surface water right in the Guadalupe River Basin, to be appointed by the Texas Commission on Environmental Quality;

(D) a representative of a holder of a municipal surface water right in the Guadalupe River Basin, to be appointed by the Texas Commission on Environmental Quality;

(E) a representative of a retail public utility in whose service area the Comal Springs or San Marcos Springs is located;

(F) a representative of a holder of an initial regular permit issued by the authority for irrigation, to be appointed by the commissioner of agriculture;

(G) a representative of an agricultural producer from the Edwards Aquifer region, to be appointed by the commissioner of agriculture;

(H) a representative of environmental interests from the Texas Living Waters Project, to be appointed by the governing body of that project; and

(I) a representative of recreational interests in the Guadalupe River Basin, to be appointed by the Parks and Wildlife Commission.

(f) The steering committee shall work with Texas A&M

University to:

(1) establish a regular meeting schedule and publish that schedule to encourage public participation; and

(2) not later than October 31, 2007, hire a program director to be housed at Texas A&M University.

(g) Texas A&M University may accept outside funding to pay the salary and expenses of the program director hired under this section and any expenses associated with the university's participation in the creation of the steering committee or subcommittees established by the steering committee.

(h) Where reasonably practicable or as required by law, any meeting of the steering committee, the Edwards Aquifer area expert science subcommittee, or another subcommittee established by the steering committee must be open to the public.

(i) The steering committee appointed under this section shall appoint an Edwards Aquifer area expert science subcommittee not later than December 31, 2007. The expert science subcommittee must be composed of an odd number of not fewer than seven or more than 15 members who have technical expertise regarding the Edwards Aquifer system, the threatened and endangered species that inhabit that system, springflows, or the development of withdrawal limitations. The Bureau of Economic Geology of The University of Texas at Austin and the River Systems Institute at Texas State University shall assist the expert science subcommittee. Chapter 2110, Government Code, does not apply to the size, composition, or duration of the expert science subcommittee.

(j) The Edwards Aquifer area expert science subcommittee

shall, among other things, analyze species requirements in relation to spring discharge rates and aquifer levels as a function of recharge and withdrawal levels. Based on that analysis and the elements required to be considered by the authority under Section 1.14 of this article, the expert science subcommittee shall, through a collaborative process designed to achieve consensus, develop recommendations for withdrawal reduction levels and stages for critical period management including, if appropriate, establishing separate and possibly different withdrawal reduction levels and stages for critical period management for different pools of the aquifer needed to maintain target spring discharge and aquifer levels. The expert science subcommittee shall submit its recommendations to the steering committee and all other stakeholders involved in the recovery implementation program under this section.

(k) The initial recommendations of the Edwards Aquifer area expert science subcommittee must be completed and submitted to the steering committee and other stakeholders not later than December 31, 2008, and should include an evaluation:

(1) of the option of designating a separate San Marcos pool, of how such a designation would affect existing pools, and of the need for an additional well to measure the San Marcos pool, if designated;

(2) of the necessity to maintain minimum springflows, including a specific review of the necessity to maintain a flow to protect the federally threatened and endangered species; and

(3) as to whether adjustments in the trigger levels

for the San Marcos Springs flow for the San Antonio pool should be made.

(l) In developing its recommendations, the Edwards Aquifer area expert science subcommittee shall:

(1) consider all reasonably available science, including any Edwards Aquifer-specific studies, and base its recommendations solely on the best science available; and

(2) operate on a consensus basis to the maximum extent possible.

(m) After development of the cooperative agreement, the steering committee, with the assistance of the Edwards Aquifer area expert science subcommittee and with input from the other recovery implementation program stakeholders, shall prepare and submit recommendations to the authority. The recommendations must:

(1) include a review of the critical period management plan, to occur at least once every five years;

(2) include specific monitoring, studies, and activities that take into account changed conditions and information that more accurately reflects the importance of critical period management; and

(3) establish a schedule for continuing the validation or refinement of the critical period management plan adopted by the authority and the strategies to achieve the program and cooperative agreement described by this section.

(n) In this subsection, "recharge facility" means a dam, reservoir, or other method of recharge project and associated facilities, structures, or works but does not include facilities

designed to recirculate water at Comal or San Marcos Springs. The steering committee shall establish a recharge facility feasibility subcommittee to:

(1) assess the need for the authority or any other entity to own, finance, design, construct, operate, or maintain recharge facilities;

(2) formulate plans to allow the authority or any other entity to own, finance, design, construct, operate, or maintain recharge facilities;

(3) make recommendations to the steering committee as to how to calculate the amount of additional water that is made available for use from a recharge project including during times of critical period reductions;

(4) maximize available federal funding for the authority or any other entity to own, finance, design, construct, operate, or maintain recharge facilities; and

(5) evaluate the financing of recharge facilities, including the use of management fees or special fees to be used for purchasing or operating the facilities.

(o) The steering committee may establish other subcommittees as necessary, including a hydrology subcommittee, a community outreach and education subcommittee, and a water supply subcommittee.

(p) On execution of the memorandum of agreement described by Subsection (b) of this section, the steering committee described by Subsection (e) of this section may, by majority vote of its members, vote to add members to the steering committee, change the makeup of

the committee, or dissolve the committee. If the steering committee is dissolved, the program director hired under Subsection (f) of this section shall assume the duties of the steering committee.

(g) The authority shall provide an annual report to the governor, lieutenant governor, and speaker of the house of representatives not later than January 1 of each year that details:

(1) the status of the recovery implementation program development process;

(2) the likelihood of completion of the recovery implementation program and the cooperative agreement described by Subsection (c) of this section;

(3) the extent to which the recommendations of the Edwards Aquifer area expert science subcommittee are being considered and implemented by the authority;

(4) any other actions that need to be taken in response to each recommendation;

(5) reasons explaining why any recommendation received has not been implemented; and

(6) any other issues the authority considers of value for the efficient and effective completion of the program and the cooperative agreement under this section.

SECTION 2.07. Sections 1.29(b), (h), and (i), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, are amended to read as follows:

(b) The authority shall assess equitable aquifer management fees based on aquifer use under the water management plan to finance

its administrative expenses and programs authorized under this article. Each water district governed by Chapter 36 [~~52~~], Water Code, that is within the authority's boundaries may contract with the authority to pay expenses of the authority through taxes in lieu of user fees to be paid by water users in the district. The contract must provide that the district will pay an amount equal to the amount that the water users in the district would have paid through user fees. The authority may not collect a total amount of fees and taxes that is more than is reasonably necessary for the administration of the authority.

(h) Fees assessed by the authority may not be used to fund the cost of reducing withdrawals or retiring permits or of judgments or claims related to withdrawals or permit retirements [~~Special fees collected under Subsection (c) or (d) of this section may not be used to finance a surface water supply reservoir project~~].

(i) The authority and other stakeholders, including state agencies, listed under Section 1.26A of this article shall provide money as necessary[~~, but not to exceed five percent of the money collected under Subsection (d) of this section,~~] to finance the activities of the steering committee and any subcommittees appointed by the steering committee and the program director of the recovery implementation program under Section 1.26A of this article. The authority shall provide, as necessary, up to $75,000 annually, adjusted for changes in the consumer price index, to finance the South Central Texas Water Advisory Committee's administrative expenses and programs authorized under this

article.

SECTION 2.08. Section 1.45(a), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(a) The authority may own, finance, design, construct, [~~build or~~] operate, and maintain recharge dams and associated facilities, structures, or works in the contributing or recharge area of the aquifer if the recharge is made to increase the yield of the aquifer, [~~and~~] the recharge project does not impair senior water rights or vested riparian rights, and the recharge project is not designed to recirculate water at Comal or San Marcos Springs.

SECTION 2.09. Sections 1.14(b) and (d), Section 1.21, and Sections 1.29(a), (c), and (d), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, are repealed.

SECTION 2.10. (a) Before January 1, 2012, a suit may not be instituted in a state court contesting:

(1) the validity or implementation of this article; or

(2) the groundwater withdrawal amounts recognized in Section 2.02 of this Act.

(b) If applicable, a party that files a suit in any court shall be automatically removed from the steering committee established under Section 1.26A, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, as added by this article.

(c) A suit against the Edwards Aquifer Authority may not be instituted or maintained by a person who owns, holds, or uses a surface water right and claims injury or potential injury to that right for any reason, including any actions taken by the Edwards

Aquifer Authority to implement or enforce Article 1, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, as amended. This section does not apply to suits brought pursuant to Section 1.45, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993.

SECTION 2.11. The change in law made by this article applies only to a cause of action filed on or after the effective date of this article. A cause of action that is filed before the effective date of this article is governed by the law in effect immediately before the effective date of this article, and that law is continued in effect for that purpose.

SECTION 2.12. This article takes effect immediately if this Act receives a vote of two-thirds of all the members elected to each house, as provided by Section 39, Article III, Texas Constitution. If this Act does not receive the vote necessary for immediate effect, this article takes effect September 1, 2007.

ARTICLE 3. EFFECTIVE DATE

SECTION 3.01. Except as otherwise provided by this Act, this Act takes effect September 1, 2007.

President of the Senate

Speaker of the House

I certify that H.B. No. 3 was passed by the House on March 1, 2007, by the following vote: Yeas 142, Nays 1, 1 present, not voting; that the House refused to concur in Senate amendments to H.B. No. 3 on May 25, 2007, and requested the appointment of a conference committee to consider the differences between the two houses; and that the House adopted the conference committee report on H.B. No. 3 on May 28, 2007, by the following vote: Yeas 142, Nays 2, 2 present, not voting.

Chief Clerk of the House

I certify that H.B. No. 3 was passed by the Senate, with amendments, on May 23, 2007, by the following vote: Yeas 30, Nays 0; at the request of the House, the Senate appointed a conference committee to consider the differences between the two houses; and that the Senate adopted the conference committee report on H.B. No. 3 on May 28, 2007, by the following vote: Yeas 30, Nays 0.

_____

Secretary of the Senate

APPROVED: _____

Date

_____

Governor

AN ACT

relating to the development, management, and preservation of the water resources of the state; providing penalties.

BE IT ENACTED BY THE LEGISLATURE OF THE STATE OF TEXAS:

ARTICLE 1. ENVIRONMENTAL FLOWS

SECTION 1.01. The heading to Section 5.506, Water Code, is amended to read as follows:

Sec. 5.506. EMERGENCY SUSPENSION OF PERMIT CONDITION RELATING TO, AND EMERGENCY AUTHORITY TO MAKE AVAILABLE WATER SET ASIDE FOR, BENEFICIAL INFLOWS TO AFFECTED BAYS AND ESTUARIES AND INSTREAM USES.

SECTION 1.02. Section 5.506, Water Code, is amended by adding Subsection (a-1) and amending Subsections (b) and (c) to read as follows:

(a-1) State water that is set aside by the commission to meet the needs for freshwater inflows to affected bays and estuaries and instream uses under Section 11.1471(a)(2) may be made available temporarily for other essential beneficial uses if the commission finds that an emergency exists that cannot practically be resolved in another way.

(b) The commission must give written notice of the proposed action [~~suspension~~] to the Parks and Wildlife Department before the commission suspends a permit condition under Subsection (a) or makes water available temporarily under Subsection (a-1) [~~this~~

~~section~~]. The commission shall give the Parks and Wildlife Department an opportunity to submit comments on the proposed action [~~suspension~~] for a period of 72 hours from receipt of the notice and must consider those comments before issuing an order implementing the proposed action [~~imposing the suspension~~].

(c) The commission may suspend a permit condition under Subsection (a) or make water available temporarily under Subsection (a-1) [~~this section~~] without notice except as required by Subsection (b).

SECTION 1.03. Subsection (j), Section 5.701, Water Code, is amended to read as follows:

(j) The fee for other uses of water not specifically named in this section is $1 per acre-foot, except that no political subdivision may be required to pay fees to use water for recharge of underground freshwater-bearing sands and aquifers or for abatement of natural pollution. A fee is not required for a water right that is [~~This fee is waived for applications for instream-use water rights~~] deposited into the Texas Water Trust.

SECTION 1.04. Section 11.002, Water Code, is amended by adding Subdivisions (15), (16), (17), (18), and (19) to read as follows:

(15) "Environmental flow analysis" means the application of a scientifically derived process for predicting the response of an ecosystem to changes in instream flows or freshwater inflows.

(16) "Environmental flow regime" means a schedule of flow quantities that reflects seasonal and yearly fluctuations that

typically would vary geographically, by specific location in a watershed, and that are shown to be adequate to support a sound ecological environment and to maintain the productivity, extent, and persistence of key aquatic habitats in and along the affected water bodies.

(17) "Environmental flow standards" means those requirements adopted by the commission under Section 11.1471.

(18) "Advisory group" means the environmental flows advisory group.

(19) "Science advisory committee" means the Texas environmental flows science advisory committee.

SECTION 1.05. Subsection (a), Section 11.023, Water Code, is amended to read as follows:

(a) To the extent that state water has not been set aside by the commission under Section 11.1471(a)(2) to meet downstream instream flow needs or freshwater inflow needs, state [~~State~~] water may be appropriated, stored, or diverted for:

(1) domestic and municipal uses, including water for sustaining human life and the life of domestic animals;

(2) agricultural uses and industrial uses, meaning processes designed to convert materials of a lower order of value into forms having greater usability and commercial value, including the development of power by means other than hydroelectric;

(3) mining and recovery of minerals;

(4) hydroelectric power;

(5) navigation;

(6) recreation and pleasure;

(7) public parks; and

(8) game preserves.

SECTION 1.06. Section 11.0235, Water Code, is amended by amending Subsections (b), (c), and (e) and adding Subsections (d-1) through (d-6) and (f) to read as follows:

(b) Maintaining the biological soundness of the state's rivers, lakes, bays, and estuaries is of great importance to the public's economic health and general well-being. The legislature encourages voluntary water and land stewardship to benefit the water in the state, as defined by Section 26.001.

(c) The legislature has expressly required the commission while balancing all other public interests to consider and, to the extent practicable, provide for the freshwater inflows and instream flows necessary to maintain the viability of the state's streams, rivers, and bay and estuary systems in the commission's regular granting of permits for the use of state waters. As an essential part of the state's environmental flows policy, all permit conditions relating to freshwater inflows to affected bays and estuaries and instream flow needs must be subject to temporary suspension if necessary for water to be applied to essential beneficial uses during emergencies.

(d-1) The legislature has determined that existing water rights that are amended to authorize use for environmental purposes should be enforced in a manner consistent with the enforcement of water rights for other purposes as provided by the laws of this state governing the appropriation of state water.

(d-2) The legislature finds that to provide certainty in

water management and development and to provide adequate protection of the state's streams, rivers, and bays and estuaries, the state must have a process with specific timelines for prompt action to address environmental flow issues in the state's major basin and bay systems, especially those systems in which unappropriated water is still available.

(d-3) The legislature finds that:

(1) in those basins in which water is available for appropriation, the commission should establish an environmental set-aside below which water should not be available for appropriation; and

(2) in those basins in which the unappropriated water that will be set aside for instream flow and freshwater inflow protection is not sufficient to fully satisfy the environmental flow standards established by the commission, a variety of market approaches, both public and private, for filling the gap must be explored and pursued.

(d-4) The legislature finds that while the state has pioneered tools to address freshwater inflow needs for bays and estuaries, there are limitations to those tools in light of both scientific and public policy evolution. To fully address bay and estuary environmental flow issues, the foundation of work accomplished by the state should be improved. While the state's instream flow studies program appears to encompass a comprehensive and scientific approach for establishing a process to assess instream flow needs for rivers and streams across the state, more extensive review and examination of the details of the program,

which may not be fully developed until the program is under way, are needed to ensure an effective tool for evaluating riverine environmental flow conditions.

(d-5) The legislature finds that the management of water to meet instream flow and freshwater inflow needs should be evaluated on a regular basis and adapted to reflect both improvements in science related to environmental flows and future changes in projected human needs for water. In addition, the development of management strategies for addressing environmental flow needs should be an ongoing, adaptive process that considers and addresses local issues.

(d-6) The legislature finds that recommendations for state action to protect instream flows and freshwater inflows should be developed through a consensus-based, regional approach involving balanced representation of stakeholders and that such a process should be encouraged throughout the state.

(e) The fact that greater pressures and demands are being placed on the water resources of the state makes it of paramount importance to ensure [~~reexamine the process for ensuring~~] that these important priorities are effectively addressed by detailing how environmental flow standards are to be developed using the environmental studies that have been and are to be performed by the state and others and specifying in clear delegations of authority how those environmental flow standards will be integrated into the regional water planning and water permitting process [~~to the commission~~].

(f) The legislature recognizes that effective

implementation of the approach provided by this chapter for protecting instream flows and freshwater inflows will require more effective water rights administration and enforcement systems than are currently available in most areas of the state.

SECTION 1.07. Subchapter B, Chapter 11, Water Code, is amended by adding Sections 11.0236, 11.02361, 11.02362, and 11.0237 to read as follows:

Sec. 11.0236. ENVIRONMENTAL FLOWS ADVISORY GROUP. (a) In recognition of the importance that the ecological soundness of our riverine, bay, and estuary systems and riparian lands has on the economy, health, and well-being of the state there is created the environmental flows advisory group.

(b) The advisory group is composed of nine members as follows:

(1) three members appointed by the governor;

(2) three members of the senate appointed by the lieutenant governor; and

(3) three members of the house of representatives appointed by the speaker of the house of representatives.

(c) Of the members appointed under Subsection (b)(1):

(1) one member must be a member of the commission;

(2) one member must be a member of the board; and

(3) one member must be a member of the Parks and Wildlife Commission.

(d) Each member of the advisory group serves at the will of the person who appointed the member.

(e) The appointed senator with the most seniority and the

appointed house member with the most seniority serve together as co-presiding officers of the advisory group.

(f) A member of the advisory group is not entitled to receive compensation for service on the advisory group but is entitled to reimbursement of the travel expenses incurred by the member while conducting the business of the advisory group, as provided by the General Appropriations Act.

(g) The advisory group may accept gifts and grants from any source to be used to carry out a function of the advisory group.

(h) The commission shall provide staff support for the advisory group.

(i) The advisory group shall conduct public hearings and study public policy implications for balancing the demands on the water resources of the state resulting from a growing population with the requirements of the riverine, bay, and estuary systems including granting permits for instream flows dedicated to environmental needs or bay and estuary inflows, use of the Texas Water Trust, and any other issues that the advisory group determines have importance and relevance to the protection of environmental flows. In evaluating the options for providing adequate environmental flows, the advisory group shall take notice of the strong public policy imperative that exists in this state recognizing that environmental flows are important to the biological health of our public and private lands, streams and rivers, and bay and estuary systems and are high priorities in the water management process. The advisory group shall specifically address:

(1) ways that the ecological soundness of those systems will be ensured in the water rights administration and enforcement and water allocation processes; and

(2) appropriate methods to encourage persons voluntarily to convert reasonable amounts of existing water rights to use for environmental flow protection temporarily or permanently.

(j) The advisory group may adopt rules, procedures, and policies as needed to administer this section, to implement its responsibilities, and to exercise its authority under Sections 11.02361 and 11.02362.

(k) Chapter 2110, Government Code, does not apply to the size, composition, or duration of the advisory group.

(l) Not later than December 1, 2008, and every two years thereafter, the advisory group shall issue and promptly deliver to the governor, lieutenant governor, and speaker of the house of representatives copies of a report summarizing:

(1) any hearings conducted by the advisory group;

(2) any studies conducted by the advisory group;

(3) any legislation proposed by the advisory group;

(4) progress made in implementing Sections 11.02361 and 11.02362; and

(5) any other findings and recommendations of the advisory group.

(m) The advisory group is abolished on the date that the commission has adopted environmental flow standards under Section 11.1471 for all of the river basin and bay systems in this state.

Sec. 11.02361. TEXAS ENVIRONMENTAL FLOWS SCIENCE ADVISORY COMMITTEE. (a) The Texas environmental flows science advisory committee consists of at least five but not more than nine members appointed by the advisory group.

(b) The advisory group shall appoint to the science advisory committee persons who will provide an objective perspective and diverse technical expertise, including expertise in hydrology, hydraulics, water resources, aquatic and terrestrial biology, geomorphology, geology, water quality, computer modeling, and other technical areas pertinent to the evaluation of environmental flows.

(c) Members of the science advisory committee serve five-year terms expiring March 1. A vacancy on the science advisory committee is filled by appointment by the co-presiding officers of the advisory group for the unexpired term.

(d) Chapter 2110, Government Code, does not apply to the size, composition, or duration of the science advisory committee.

(e) The science advisory committee shall:

(1) serve as an objective scientific body to advise and make recommendations to the advisory group on issues relating to the science of environmental flow protection; and

(2) develop recommendations to help provide overall direction, coordination, and consistency relating to:

(A) environmental flow methodologies for bay and estuary studies and instream flow studies;

(B) environmental flow programs at the commission, the Parks and Wildlife Department, and the board; and

(C) the work of the basin and bay expert science teams described in Section 11.02362.

(f) To assist the advisory group to assess the extent to which the recommendations of the science advisory committee are considered and implemented, the commission, the Parks and Wildlife Department, and the board shall provide written reports to the advisory group, at intervals determined by the advisory group, that describe:

(1) the actions taken by each agency in response to each recommendation; and

(2) for each recommendation not implemented, the reason it was not implemented.

(g) The science advisory committee is abolished on the date the advisory group is abolished under Section 11.0236(m).

Sec. 11.02362. DEVELOPMENT OF ENVIRONMENTAL FLOW REGIME RECOMMENDATIONS. (a) For the purposes of this section, the advisory group, not later than November 1, 2007, shall define the geographical extent of each river basin and bay system in this state for the sole purpose of developing environmental flow regime recommendations under this section and adoption of environmental flow standards under Section 11.1471.

(b) The advisory group shall give priority in descending order to the following river basin and bay systems of the state for the purpose of developing environmental flow regime recommendations and adopting environmental flow standards:

(1) the river basin and bay system consisting of the Trinity and San Jacinto Rivers and Galveston Bay and the river basin

and bay system consisting of the Sabine and Neches Rivers and Sabine Lake Bay;

(2) the river basin and bay system consisting of the Colorado and Lavaca Rivers and Matagorda and Lavaca Bays and the river basin and bay system consisting of the Guadalupe, San Antonio, Mission, and Aransas Rivers and Mission, Copano, Aransas, and San Antonio Bays; and

(3) the river basin and bay system consisting of the Nueces River and Corpus Christi and Baffin Bays, the river basin and bay system consisting of the Rio Grande, the Rio Grande estuary, and the Lower Laguna Madre, and the Brazos River and its associated bay and estuary system.

(c) For the river basin and bay systems listed in Subsection (b)(1):

(1) the advisory group shall appoint the basin and bay area stakeholders committee not later than November 1, 2007;

(2) the basin and bay area stakeholders committee shall establish a basin and bay expert science team not later than March 1, 2008;

(3) the basin and bay expert science team shall finalize environmental flow regime recommendations and submit them to the basin and bay area stakeholders committee, the advisory group, and the commission not later than March 1, 2009, except that at the request of the basin and bay area stakeholders committee for good cause shown, the advisory group may extend the deadline provided by this subdivision;

(4) the basin and bay area stakeholders committee

shall submit to the commission its comments on and recommendations regarding the basin and bay expert science team's recommended environmental flow regime not later than September 1, 2009; and

(5) the commission shall adopt the environmental flow standards as provided by Section 11.1471 not later than September 1, 2010.

(d) The advisory group shall appoint the basin and bay area stakeholders committees for the river basin and bay systems listed in Subsection (b)(2) not later than September 1, 2008, and shall appoint the basin and bay area stakeholders committees for the river basin and bay systems listed in Subsection (b)(3) not later than September 1, 2009. The advisory group shall establish a schedule for the performance of the tasks listed in Subsections (c)(2) through (5) with regard to the river basin and bay systems listed in Subsections (b)(2) and (3) that will result in the adoption of environmental flow standards for that river basin and bay system by the commission as soon as is reasonably possible. Each basin and bay area stakeholders committee and basin and bay expert science team for a river basin and bay system listed in Subsection (b)(2) or (3) shall make recommendations to the advisory group with regard to the schedule applicable to that river basin and bay system. The advisory group shall consider the recommendations of the basin and bay area stakeholders committee and basin and bay expert science team as well as coordinate with, and give appropriate consideration to the recommendations of, the commission, the Parks and Wildlife Department, and the board in establishing the schedule.

(e) For a river basin and bay system or a river basin that does not have an associated bay system in this state not listed in Subsection (b), the advisory group shall establish a schedule for the development of environmental flow regime recommendations and the adoption of environmental flow standards. The advisory group shall develop the schedule in consultation with the commission, the Parks and Wildlife Department, the board, and the pertinent basin and bay area stakeholders committee and basin and bay expert science team. The advisory group may, on its own initiative or on request, modify a schedule established under this subsection to be more responsive to particular circumstances, local desires, changing conditions, or time-sensitive conflicts. This subsection does not prohibit, in a river basin and bay system for which the advisory group has not yet established a schedule for the development of environmental flow regime recommendations and the adoption of environmental flow standards, an effort to develop information on environmental flow needs and ways in which those needs can be met by a voluntary consensus-building process.

(f) The advisory group shall appoint a basin and bay area stakeholders committee for each river basin and bay system in this state for which a schedule for the development of environmental flow regime recommendations and the adoption of environmental flow standards is specified by or established under Subsection (c), (d), or (e). Chapter 2110, Government Code, does not apply to the size, composition, or duration of a basin and bay area stakeholders committee. Each committee must consist of at least 17 members. The membership of each committee must:

(1) reflect a fair and equitable balance of interest groups concerned with the particular river basin and bay system for which the committee is established; and

(2) be representative of appropriate stakeholders, including the following if they have a presence in the particular river basin and bay system for which the committee is established:

(A) agricultural water users, including representatives of each of the following sectors:

(i) agricultural irrigation;

(ii) free-range livestock; and

(iii) concentrated animal feeding operation;

(B) recreational water users, including coastal recreational anglers and businesses supporting water recreation;

(C) municipalities;

(D) soil and water conservation districts;

(E) industrial water users, including representatives of each of the following sectors:

(i) refining;

(ii) chemical manufacturing;

(iii) electricity generation; and

(iv) production of paper products or timber;

(F) commercial fishermen;

(G) public interest groups;

(H) regional water planning groups;

(I) groundwater conservation districts;

(J) river authorities and other conservation and reclamation districts with jurisdiction over surface water; and

(K) environmental interests.

(g) Members of a basin and bay area stakeholders committee serve five-year terms expiring March 1. If a vacancy occurs on a committee, the remaining members of the committee by majority vote shall appoint a member to serve the remainder of the unexpired term.

(h) Meetings of a basin and bay area stakeholders committee must be open to the public.

(i) Each basin and bay area stakeholders committee shall establish a basin and bay expert science team for the river basin and bay system for which the committee is established. The basin and bay expert science team must be established not later than six months after the date the basin and bay area stakeholders committee is established. Chapter 2110, Government Code, does not apply to the size, composition, or duration of a basin and bay expert science team. Each basin and bay expert science team must be composed of technical experts with special expertise regarding the river basin and bay system or regarding the development of environmental flow regimes. A person may serve as a member of more than one basin and bay expert science team at the same time.

(j) The members of a basin and bay expert science team serve five-year terms expiring April 1. A vacancy on a basin and bay expert science team is filled by appointment by the pertinent basin and bay area stakeholders committee to serve the remainder of the unexpired term.

(k) The science advisory committee shall appoint one of its

members to serve as a liaison to each basin and bay expert science team to facilitate coordination and consistency in environmental flow activities throughout the state. The commission, the Parks and Wildlife Department, and the board shall provide technical assistance to each basin and bay expert science team, including information about the studies conducted under Sections 16.058 and 16.059, and may serve as nonvoting members of the basin and bay expert science team to facilitate the development of environmental flow regime recommendations.

(l) Where reasonably practicable, meetings of a basin and bay expert science team must be open to the public.

(m) Each basin and bay expert science team shall develop environmental flow analyses and a recommended environmental flow regime for the river basin and bay system for which the team is established through a collaborative process designed to achieve a consensus. In developing the analyses and recommendations, the science team must consider all reasonably available science, without regard to the need for the water for other uses, and the science team's recommendations must be based solely on the best science available. For the Rio Grande below Fort Quitman, any uses attributable to Mexican water flows must be excluded from environmental flow regime recommendations.

(n) Each basin and bay expert science team shall submit its environmental flow analyses and environmental flow regime recommendations to the pertinent basin and bay area stakeholders committee, the advisory group, and the commission in accordance with the applicable schedule specified by or established under

Subsection (c), (d), or (e). The basin and bay area stakeholders committee and the advisory group may not change the environmental flow analyses or environmental flow regime recommendations of the basin and bay expert science team.

(o) Each basin and bay area stakeholders committee shall review the environmental flow analyses and environmental flow regime recommendations submitted by the committee's basin and bay expert science team and shall consider them in conjunction with other factors, including the present and future needs for water for other uses related to water supply planning in the pertinent river basin and bay system. For the Rio Grande, the basin and bay area stakeholders committee shall also consider the water accounting requirements for any international water sharing treaty, minutes, and agreement applicable to the Rio Grande and the effects on allocation of water by the Rio Grande watermaster in the middle and lower Rio Grande. The Rio Grande basin and bay expert science team may not recommend any environmental flow regime that would result in a violation of a treaty or court decision. The basin and bay area stakeholders committee shall develop recommendations regarding environmental flow standards and strategies to meet the environmental flow standards and submit those recommendations to the commission and to the advisory group in accordance with the applicable schedule specified by or established under Subsection (c), (d), or (e). In developing its recommendations, the basin and bay area stakeholders committee shall operate on a consensus basis to the maximum extent possible.

(p) In recognition of the importance of adaptive

management, after submitting its recommendations regarding environmental flow standards and strategies to meet the environmental flow standards to the commission, each basin and bay area stakeholders committee, with the assistance of the pertinent basin and bay expert science team, shall prepare and submit for approval by the advisory group a work plan. The work plan must:

(1) establish a periodic review of the basin and bay environmental flow analyses and environmental flow regime recommendations, environmental flow standards, and strategies, to occur at least once every 10 years;

(2) prescribe specific monitoring, studies, and activities; and

(3) establish a schedule for continuing the validation or refinement of the basin and bay environmental flow analyses and environmental flow regime recommendations, the environmental flow standards adopted by the commission, and the strategies to achieve those standards.

(q) In accordance with the applicable schedule specified by or established under Subsection (c), (d), or (e), the advisory group, with input from the science advisory committee, shall review the environmental flow analyses and environmental flow regime recommendations submitted by each basin and bay expert science team. If appropriate, the advisory group shall submit comments on the analyses and recommendations to the commission for use by the commission in adopting rules under Section 11.1471. Comments must be submitted not later than six months after the date of receipt of the analyses and recommendations.

(r) Notwithstanding the other provisions of this section, in the event the commission, by permit or order, has established an estuary advisory council with specific duties related to implementation of permit conditions for environmental flows, that council may continue in full force and effect and shall act as and perform the duties of the basin and bay area stakeholders committee under this section. The estuary advisory council shall add members from stakeholder groups and from appropriate science and technical groups, if necessary, to fully meet the criteria for membership established in Subsection (f) and shall operate under the provisions of this section.

(s) Each basin and bay area stakeholders committee and basin and bay expert science team is abolished on the date the advisory group is abolished under Section 11.0236(m).

Sec. 11.0237. WATER RIGHTS FOR INSTREAM FLOWS DEDICATED TO ENVIRONMENTAL NEEDS OR BAY AND ESTUARY INFLOWS. (a) The commission may not issue a new permit for instream flows dedicated to environmental needs or bay and estuary inflows. The commission may approve an application to amend an existing permit or certificate of adjudication to change the use to or add a use for instream flows dedicated to environmental needs or bay and estuary inflows.

(b) This section does not alter the commission's obligations under Section 11.042(b) or (c), 11.046(b), 11.085(k)(2)(F), 11.134(b)(3)(D), 11.147, 11.1471, 11.1491, 11.150, 11.152, 16.058, or 16.059.

SECTION 1.08. Subsection (b), Section 11.082, Water Code,

is amended to read as follows:

(b) The state may recover the penalties prescribed in Subsection (a) [~~of this section~~] by suit brought for that purpose in a court of competent jurisdiction. The state may seek those penalties regardless of whether a watermaster has been appointed for the water division, river basin, or segment of a river basin where the unlawful use is alleged to have occurred.

SECTION 1.09. Section 11.0841, Water Code, is amended by adding Subsection (c) to read as follows:

(c) For purposes of this section, the Parks and Wildlife Department has:

(1) the rights of a holder of a water right that is held in the Texas Water Trust, including the right to file suit in a civil court to prevent the unlawful use of such a right;

(2) the right to act in the same manner that a holder of a water right may act to protect the holder's rights in seeking to prevent any person from appropriating water in violation of a set-aside established by the commission under Section 11.1471 to meet instream flow needs or freshwater inflow needs; and

(3) the right to file suit in a civil court to prevent the unlawful use of a set-aside established under Section 11.1471.

SECTION 1.10. Subsection (a), Section 11.0842, Water Code, is amended to read as follows:

(a) If a person violates this chapter, a rule or order adopted under this chapter or Section 16.236 [~~of this code~~], or a permit, certified filing, or certificate of adjudication issued under this chapter, the commission may assess an administrative

penalty against that person as provided by this section. The commission may assess an administrative penalty for a violation relating to a water division or a river basin or segment of a river basin regardless of whether a watermaster has been appointed for the water division or river basin or segment of the river basin.

SECTION 1.11. Subsection (a), Section 11.0843, Water Code, is amended to read as follows:

(a) Upon witnessing a violation of this chapter or a rule or order or a water right issued under this chapter, the executive director or a person designated by the executive director, including a watermaster or the watermaster's deputy, [~~as defined by commission rule,~~] may issue the alleged violator a field citation alleging that a violation has occurred and providing the alleged violator the option of either:

(1) without admitting to or denying the alleged violation, paying an administrative penalty in accordance with the predetermined penalty amount established under Subsection (b) [~~of this section~~] and taking remedial action as provided in the citation; or

(2) requesting a hearing on the alleged violation in accordance with Section 11.0842 [~~of this code~~].

SECTION 1.12. Subsection (b), Section 11.134, Water Code, is amended to read as follows:

(b) The commission shall grant the application only if:

(1) the application conforms to the requirements prescribed by this chapter and is accompanied by the prescribed fee;

(2) unappropriated water is available in the source of supply;

(3) the proposed appropriation:

(A) is intended for a beneficial use;

(B) does not impair existing water rights or vested riparian rights;

(C) is not detrimental to the public welfare;

(D) considers any applicable environmental flow standards established under Section 11.1471 and, if applicable, the assessments performed under Sections 11.147(d) and (e) and Sections 11.150, 11.151, and 11.152; and

(E) addresses a water supply need in a manner that is consistent with the state water plan and the relevant approved regional water plan for any area in which the proposed appropriation is located, unless the commission determines that conditions warrant waiver of this requirement; and

(4) the applicant has provided evidence that reasonable diligence will be used to avoid waste and achieve water conservation as defined by [~~Subdivision (8)(B),~~] Section 11.002(8)(B) [~~11.002~~].

SECTION 1.13. Section 11.147, Water Code, is amended by amending Subsections (b), (d), and (e) and adding Subsections (e-1), (e-2), and (e-3) to read as follows:

(b) In its consideration of an application for a permit to store, take, or divert water, the commission shall assess the effects, if any, of the issuance of the permit on the bays and estuaries of Texas. For permits issued within an area that is 200

river miles of the coast, to commence from the mouth of the river thence inland, the commission shall include in the permit any conditions considered necessary to maintain beneficial inflows to any affected bay and estuary system, to the extent practicable when considering all public interests and the studies mandated by Section 16.058 as evaluated under Section 11.1491[~~, those conditions considered necessary to maintain beneficial inflows to any affected bay and estuary system~~].

(d) In its consideration of an application to store, take, or divert water, the commission shall include in the permit, to the extent practicable when considering all public interests, those conditions considered by the commission necessary to maintain existing instream uses and water quality of the stream or river to which the application applies. In determining what conditions to include in the permit under this subsection, the commission shall consider among other factors:

(1) the studies mandated by Section 16.059; and

(2) any water quality assessment performed under Section 11.150.

(e) The commission shall include in the permit, to the extent practicable when considering all public interests, those conditions considered by the commission necessary to maintain fish and wildlife habitats. In determining what conditions to include in the permit under this subsection, the commission shall consider any assessment performed under Section 11.152.

(e-1) Any permit for a new appropriation of water or an amendment to an existing water right that increases the amount of

water authorized to be stored, taken, or diverted must include a provision allowing the commission to adjust the conditions included in the permit or amended water right to provide for protection of instream flows or freshwater inflows. With respect to an amended water right, the provision may not allow the commission to adjust a condition of the amendment other than a condition that applies only to the increase in the amount of water to be stored, taken, or diverted authorized by the amendment. This subsection does not affect an appropriation of or an authorization to store, take, or divert water under a permit or amendment to a water right issued before September 1, 2007. The commission shall adjust the conditions if the commission determines, through an expedited public comment process, that such an adjustment is appropriate to achieve compliance with applicable environmental flow standards adopted under Section 11.1471. The adjustment:

(1) in combination with any previous adjustments made under this subsection may not increase the amount of the pass-through or release requirement for the protection of instream flows or freshwater inflows by more than 12.5 percent of the annualized total of that requirement contained in the permit as issued or of that requirement contained in the amended water right and applicable only to the increase in the amount of water authorized to be stored, taken, or diverted under the amended water right;

(2) must be based on appropriate consideration of the priority dates and diversion locations of any other water rights granted in the same river basin that are subject to adjustment under

this subsection; and

(3) must be based on appropriate consideration of any voluntary contributions to the Texas Water Trust, and of any voluntary amendments to existing water rights to change the use of a specified quantity of water to or add a use of a specified quantity of water for instream flows dedicated to environmental needs or bay and estuary inflows as authorized by Section 11.0237(a), that actually contribute toward meeting the applicable environmental flow standards.

(e-2) Any water right holder who makes a contribution or amends a water right as described by Subsection (e-1)(3) is entitled to appropriate credit for the benefits of the contribution or amendment against the adjustment of the holder's water right under Subsection (e-1).

(e-3) Notwithstanding Subsections (b)-(e), for the purpose of determining the environmental flow conditions necessary to maintain freshwater inflows to an affected bay and estuary system, existing instream uses and water quality of a stream or river, or fish and aquatic wildlife habitats, the commission shall apply any applicable environmental flow standard, including any environmental flow set-aside, adopted under Section 11.1471 instead of considering the factors specified by those subsections.

SECTION 1.14. Subchapter D, Chapter 11, Water Code, is amended by adding Section 11.1471 to read as follows:

Sec. 11.1471. ENVIRONMENTAL FLOW STANDARDS AND SET-ASIDES. (a) The commission by rule shall:

(1) adopt appropriate environmental flow standards

for each river basin and bay system in this state that are adequate to support a sound ecological environment, to the maximum extent reasonable considering other public interests and other relevant factors;

(2) establish an amount of unappropriated water, if available, to be set aside to satisfy the environmental flow standards to the maximum extent reasonable when considering human water needs; and

(3) establish procedures for implementing an adjustment of the conditions included in a permit or an amended water right as provided by Sections 11.147(e-1) and (e-2).

(b) In adopting environmental flow standards for a river basin and bay system under Subsection (a)(1), the commission shall consider:

(1) the definition of the geographical extent of the river basin and bay system adopted by the advisory group under Section 11.02362(a) and the definition and designation of the river basin by the board under Section 16.051(c);

(2) the schedule established by the advisory group under Section 11.02362(d) or (e) for the adoption of environmental flow standards for the river basin and bay system, if applicable;

(3) the environmental flow analyses and the recommended environmental flow regime developed by the applicable basin and bay expert science team under Section 11.02362(m);

(4) the recommendations developed by the applicable basin and bay area stakeholders committee under Section 11.02362(o) regarding environmental flow standards and strategies to meet the

flow standards;

(5) any comments submitted by the advisory group to the commission under Section 11.02362(q);

(6) the specific characteristics of the river basin and bay system;

(7) economic factors;

(8) the human and other competing water needs in the river basin and bay system;

(9) all reasonably available scientific information, including any scientific information provided by the science advisory committee; and

(10) any other appropriate information.

(c) Environmental flow standards adopted under Subsection (a)(1) must consist of a schedule of flow quantities, reflecting seasonal and yearly fluctuations that may vary geographically by specific location in a river basin and bay system.

(d) As provided by Section 11.023, the commission may not issue a permit for a new appropriation or an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted if the issuance of the permit or amendment would impair an environmental flow set-aside established under Subsection (a)(2). A permit for a new appropriation or an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted that is issued after the adoption of an applicable environmental flow set-aside must contain appropriate conditions to ensure protection of the environmental flow set-aside.

(e) An environmental flow set-aside established under Subsection (a)(2) for a river basin and bay system other than the middle and lower Rio Grande must be assigned a priority date corresponding to the date the commission receives environmental flow regime recommendations from the applicable basin and bay expert science team and be included in the appropriate water availability models in connection with an application for a permit for a new appropriation or for an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted.

(f) An environmental flow standard or environmental flow set-aside adopted under Subsection (a) may be altered by the commission in a rulemaking process undertaken in accordance with a schedule established by the commission. In establishing a schedule, the commission shall consider the applicable work plan approved by the advisory group under Section 11.02362(p). The commission's schedule may not provide for the rulemaking process to occur more frequently than once every 10 years unless the work plan provides for a periodic review under Section 11.02362(p) to occur more frequently than once every 10 years. In that event, the commission may provide for the rulemaking process to be undertaken in conjunction with the periodic review if the commission determines that schedule to be appropriate. A rulemaking process undertaken under this subsection must provide for the participation of stakeholders having interests in the particular river basin and bay system for which the process is undertaken.

SECTION 1.15. The heading to Section 11.148, Water Code, is

amended to read as follows:

Sec. 11.148. EMERGENCY SUSPENSION OF PERMIT CONDITIONS AND EMERGENCY AUTHORITY TO MAKE AVAILABLE WATER SET ASIDE FOR ENVIRONMENTAL FLOWS.

SECTION 1.16. Section 11.148, Water Code, is amended by adding Subsection (a-1) and amending Subsections (b) and (c) to read as follows:

(a-1) State water that is set aside by the commission to meet the needs for freshwater inflows to affected bays and estuaries and instream uses under Section 11.1471(a)(2) may be made available temporarily for other essential beneficial uses if the commission finds that an emergency exists that cannot practically be resolved in another way.

(b) Before the commission suspends a permit condition under Subsection (a) or makes water available temporarily under Subsection (a-1) [~~of this section~~], it must give written notice to the Parks and Wildlife Department of the proposed action [~~suspension~~]. The commission shall give the Parks and Wildlife Department an opportunity to submit comments on the proposed action [~~suspension~~] within 72 hours from such time and the commission shall consider those comments before issuing its order implementing the proposed action [~~imposing the suspension~~].

(c) The commission may suspend the permit condition under Subsection (a) or make water available temporarily under Subsection (a-1) without notice to any other interested party other than the Parks and Wildlife Department as provided by Subsection (b) [~~of this section~~]. However, all affected persons shall be notified

immediately by publication, and a hearing to determine whether the suspension should be continued shall be held within 15 days of the date on which the order to suspend is issued.

SECTION 1.17. Subsection (a), Section 11.1491, Water Code, is amended to read as follows:

(a) The Parks and Wildlife Department and the commission shall have joint responsibility to review the studies prepared under Section 16.058 [~~of this code~~], to determine inflow conditions necessary for the bays and estuaries, and to provide information necessary for water resources management. Each agency shall designate an employee to share equally in the oversight of the program. Other responsibilities shall be divided between the Parks and Wildlife Department and the commission to maximize present in-house capabilities of personnel and to minimize costs to the state. Each agency shall have reasonable access to all information produced by the other agency. Publication of reports completed under this section shall be submitted for comment to [~~both~~] the commission, [~~and~~] the Parks and Wildlife Department, the advisory group, the science advisory committee, and any applicable basin and bay area stakeholders committee and basin and bay expert science team.

SECTION 1.18. Subsection (g), Section 11.329, Water Code, is amended to read as follows:

(g) The commission may not assess costs under this section against a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts or against a holder of a water

right placed in the Texas Water Trust for a term of at least 20 years. [~~This subsection is not intended to affect in any way the fees assessed on a water right holder by the commission under Section 1.29(d), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993. For purposes of Section 1.29(d), Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts shall be assessed fees at the same rate per acre-foot charged to a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of more than two megawatts.~~]

SECTION 1.19. Subsection (e), Section 11.404, Water Code, is amended to read as follows:

(e) The court may not assess costs and expenses under this section against:

(1) a holder of a non-priority hydroelectric right that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts; or

(2) a holder of a water right placed in the Texas Water Trust for a term of at least 20 years.

SECTION 1.20. Subchapter I, Chapter 11, Water Code, is amended by adding Section 11.4531 to read as follows:

Sec. 11.4531. WATERMASTER ADVISORY COMMITTEE. (a) For each river basin or segment of a river basin for which the executive director appoints a watermaster under this subchapter, the executive director shall appoint a watermaster advisory committee

consisting of at least nine but not more than 15 members. A member of the advisory committee must be a holder of a water right or a representative of a holder of a water right in the river basin or segment of the river basin for which the watermaster is appointed. In appointing members to the advisory committee, the executive director shall consider:

(1) geographic representation;

(2) amount of water rights held;

(3) different types of holders of water rights and users, including water districts, municipal suppliers, irrigators, and industrial users; and

(4) experience and knowledge of water management practices.

(b) An advisory committee member is not entitled to reimbursement of expenses or to compensation.

(c) An advisory committee member serves a two-year term expiring August 31 of each odd-numbered year and holds office until a successor is appointed.

(d) The advisory committee shall meet within 30 days after the date the initial appointments have been made and shall select a presiding officer to serve a one-year term. The committee shall meet regularly as necessary.

(e) The advisory committee shall:

(1) make recommendations to the executive director regarding activities of benefit to the holders of water rights in the administration and distribution of water to holders of water rights in the river basin or segment of the river basin for which

the watermaster is appointed;

(2) review and comment to the executive director on the annual budget of the watermaster operation; and

(3) perform other advisory duties as requested by the executive director regarding the watermaster operation or as requested by holders of water rights and considered by the committee to benefit the administration of water rights in the river basin or segment of the river basin for which the watermaster is appointed.

SECTION 1.21. Sections 11.454 and 11.455, Water Code, are amended to read as follows:

Sec. 11.454. DUTIES AND AUTHORITY OF THE WATERMASTER. Section 11.327 applies to the duties and authority of a watermaster appointed for a river basin or segment of a river basin under this subchapter in the same manner as that section applies to the duties and authority of a watermaster appointed for a water division under Subchapter G [~~A watermaster as the agent of the commission and under the executive director's supervision shall:~~

[~~(1) divide the water of the streams or other sources of supply of his segment or basin in accordance with the authorized water rights;~~

[~~(2) regulate or cause to be regulated the controlling works of reservoirs and diversion works in time of water shortage, as is necessary because of the rights existing in the streams of his segment or basin, or as is necessary to prevent the waste of water or its diversion, taking, storage, or use in excess of the quantities to which the holders of water rights are lawfully~~

~~entitled; and~~

[~~(3) perform any other duties and exercise any authority directed by the commission~~].

Sec. 11.455. COMPENSATION AND EXPENSES OF WATERMASTER [~~ASSESSMENTS~~]. (a) Section 11.329 applies to the payment of the compensation and expenses of a watermaster appointed for a river basin or segment of a river basin under this subchapter in the same manner as that section applies to the payment of the compensation and expenses of a watermaster appointed for a water division under Subchapter G.

(b) The executive director shall deposit the assessments collected under this section to the credit of the watermaster fund.

(c) Money deposited under this section to the credit of the watermaster fund may be used only for the purposes specified by Section 11.3291 with regard to the watermaster operation under this subchapter with regard to which the assessments were collected [~~The commission may assess the costs of the watermaster against all persons who hold water rights in the river basin or segment of the river basin under the watermaster's jurisdiction in accordance with Section 11.329 of this code~~].

SECTION 1.22. Subchapter F, Chapter 15, Water Code, is amended by adding Section 15.4063 to read as follows:

Sec. 15.4063. ENVIRONMENTAL FLOWS FUNDING. The board may authorize the use of money in the research and planning fund:

(1) to compensate the members of the Texas environmental flows science advisory committee established under Section 11.02361 for attendance and participation at meetings of

the committee and for transportation, meals, lodging, or other travel expenses associated with attendance at those meetings as provided by the General Appropriations Act;

(2) for contracts with cooperating state and federal agencies and universities and with private entities as necessary to provide technical assistance to enable the Texas environmental flows science advisory committee and the basin and bay expert science teams established under Section 11.02362 to perform their statutory duties;

(3) to compensate the members of the basin and bay expert science teams established under Section 11.02362 for attendance and participation at meetings of the basin and bay expert science teams and for transportation, meals, lodging, or other travel expenses associated with attendance at those meetings as provided by the General Appropriations Act; and

(4) for contracts with political subdivisions designated as representatives of basin and bay area stakeholders committees established under Section 11.02362 to fund all or part of the administrative expenses incurred in conducting meetings of the basin and bay area stakeholders committees or the pertinent basin and bay expert science teams.

SECTION 1.23. Subsection (d), Section 16.059, Water Code, is amended to read as follows:

(d) The priority studies shall be completed not later than December 31, 2016 [~~2010~~]. The Parks and Wildlife Department, the commission, and the board shall establish a work plan that prioritizes the studies and that sets interim deadlines providing

for publication of flow determinations for individual rivers and streams on a reasonably consistent basis throughout the prescribed study period. Before publication, completed studies shall be submitted for comment to the commission, the board, and the Parks and Wildlife Department.

SECTION 1.24. Subsection (h), Section 26.0135, Water Code, as amended by Chapters 234 and 965, Acts of the 77th Legislature, Regular Session, 2001, is reenacted and amended to read as follows:

(h) The commission shall apportion, assess, and recover the reasonable costs of administering the water quality management programs under this section from users of water and wastewater permit holders in the watershed according to the records of the commission generally in proportion to their right, through permit or contract, to use water from and discharge wastewater in the watershed. Irrigation water rights, [~~and~~] non-priority hydroelectric rights of a water right holder that owns or operates privately owned facilities that collectively have a capacity of less than two megawatts, and water rights held in the Texas Water Trust for terms of at least 20 years will not be subject to this assessment. The cost to river authorities and others to conduct water quality monitoring and assessment shall be subject to prior review and approval by the commission as to methods of allocation and total amount to be recovered. The commission shall adopt rules to supervise and implement the water quality monitoring, assessment, and associated costs. The rules shall ensure that water users and wastewater dischargers do not pay excessive amounts, that program funds are equitably apportioned among basins,

that a river authority may recover no more than the actual costs of administering the water quality management programs called for in this section, and that no municipality shall be assessed cost for any efforts that duplicate water quality management activities described in Section 26.177 [~~of this chapter~~]. The rules concerning the apportionment and assessment of reasonable costs shall provide for a recovery of not more than $5,000,000 annually. Costs recovered by the commission are to be deposited to the credit of the water resource management account and may be used only to accomplish the purposes of this section. The commission may apply not more than 10 percent of the costs recovered annually toward the commission's overhead costs for the administration of this section and the implementation of regional water quality assessments. The commission, with the assistance and input of each river authority, shall file a written report accounting for the costs recovered under this section with the governor, the lieutenant governor, and the speaker of the house of representatives on or before December 1 of each even-numbered year.

SECTION 1.25. Subsection (b), Section 11.1491, Water Code, is repealed.

SECTION 1.26. (a) The governor, lieutenant governor, and speaker of the house of representatives shall appoint the initial members of the environmental flows advisory group as provided by Section 11.0236, Water Code, as added by this article, as soon as practicable on or after the effective date of this Act.

(b) As soon as practicable after taking office, the initial members of the environmental flows advisory group shall appoint the

initial members of the Texas environmental flows science advisory committee as provided by Section 11.02361, Water Code, as added by this article. The terms of the initial members of the committee expire March 1, 2012.

(c) The environmental flows advisory group shall appoint the members of each basin and bay area stakeholders committee as provided by Section 11.02362, Water Code, as added by this article. The terms of the initial members of each committee expire March 1 of the fifth year that begins after the year in which the initial appointments are made.

(d) Each basin and bay area stakeholders committee shall appoint the members of the basin and bay expert science team for the river basin and bay system for which the committee is established as provided by Section 11.02362, Water Code, as added by this article. The terms of the initial members of each team expire April 1 of the fifth year that begins after the year in which the initial appointments are made.

(e) The executive director of the Texas Commission on Environmental Quality shall appoint the members of the watermaster advisory committee under Section 11.4531, Water Code, as added by this article, for each river basin or segment of a river basin for which the executive director appoints a watermaster under Subchapter I, Chapter 11, Water Code. The terms of the initial members of each committee expire August 31 of the first odd-numbered year that begins after the year in which the initial appointments are made.

SECTION 1.27. The changes in law made by this article

relating to a permit for a new appropriation of water or to an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted apply only to:

(1) water appropriated under a permit for a new appropriation of water the application for which is pending with the Texas Commission on Environmental Quality on the effective date of this Act or is filed with the commission on or after that date; or

(2) the increase in the amount of water authorized to be stored, taken, or diverted under an amendment to an existing water right that increases the amount of water authorized to be stored, taken, or diverted and the application for which is pending with the Texas Commission on Environmental Quality on the effective date of this Act or is filed with the commission on or after that date.

ARTICLE 2. WATER CONSERVATION AND PLANNING AND OTHER WATER-RELATED PROVISIONS

SECTION 2.01. Section 1.003, Water Code, is amended to read as follows:

Sec. 1.003. PUBLIC POLICY. It is the public policy of the state to provide for the conservation and development of the state's natural resources, including:

(1) the control, storage, preservation, and distribution of the state's storm and floodwaters and the waters of its rivers and streams for irrigation, power, and other useful purposes;

(2) the reclamation and irrigation of the state's arid, semiarid, and other land needing irrigation;

(3) the reclamation and drainage of the state's overflowed land and other land needing drainage;

(4) the conservation and development of its forest, water, and hydroelectric power;

(5) the navigation of the state's inland and coastal waters; [~~and~~]

(6) the maintenance of a proper ecological environment of the bays and estuaries of Texas and the health of related living marine resources; and

(7) the voluntary stewardship of public and private lands to benefit waters of the state.

SECTION 2.02. Subchapter A, Chapter 1, Water Code, is amended by adding Section 1.004 to read as follows:

Sec. 1.004. FINDINGS AND POLICY REGARDING LAND STEWARDSHIP. (a) The legislature finds that voluntary land stewardship enhances the efficiency and effectiveness of this state's watersheds by helping to increase surface water and groundwater supplies, resulting in a benefit to the natural resources of this state and to the general public. It is therefore the policy of this state to encourage voluntary land stewardship as a significant water management tool.

(b) "Land stewardship," as used in this code, is the voluntary practice of managing land to conserve or enhance suitable landscapes and the ecosystem values of the land. Land stewardship includes land and habitat management, wildlife conservation, and watershed protection. Land stewardship practices include runoff reduction, prescribed burning, managed grazing, brush management,

erosion management, reseeding with native plant species, riparian management and restoration, and spring and creek-bank protection, all of which benefit the water resources of this state.

SECTION 2.03. Subtitle A, Title 2, Water Code, is amended by adding Chapter 10 to read as follows:

CHAPTER 10. WATER CONSERVATION ADVISORY COUNCIL

Sec. 10.001. DEFINITIONS. In this chapter:

(1) "Best management practices" has the meaning assigned by Section 11.002.

(2) "Board" means the Texas Water Development Board.

(3) "Commission" means the Texas Commission on Environmental Quality.

(4) "Council" means the Water Conservation Advisory Council.

Sec. 10.002. PURPOSE. The council is created to provide the governor, lieutenant governor, speaker of the house of representatives, legislature, board, commission, political subdivisions, and public with the resource of a select council with expertise in water conservation.

Sec. 10.003. CREATION AND MEMBERSHIP. (a) The council is composed of 23 members appointed by the board. The board shall appoint one member to represent each of the following entities or interest groups:

(1) Texas Commission on Environmental Quality;

(2) Department of Agriculture;

(3) Parks and Wildlife Department;

(4) State Soil and Water Conservation Board;

(5) Texas Water Development Board;

(6) regional water planning groups;

(7) federal agencies;

(8) municipalities;

(9) groundwater conservation districts;

(10) river authorities;

(11) environmental groups;

(12) irrigation districts;

(13) institutional water users;

(14) professional organizations focused on water conservation;

(15) higher education;

(16) agricultural groups;

(17) refining and chemical manufacturing;

(18) electric generation;

(19) mining and recovery of minerals;

(20) landscape irrigation and horticulture;

(21) water control and improvement districts;

(22) rural water users; and

(23) municipal utility districts.

(b) Each entity or interest group described by Subsection (a) may recommend one or more persons to fill the position on the council held by the member who represents that entity or interest group. If one or more persons are recommended for a position on the council, the board shall appoint one of the persons recommended to fill the position.

Sec. 10.004. TERMS. (a) Members of the council serve

staggered terms of six years, with seven or eight members' terms, as applicable, expiring August 31 of each odd-numbered year.

(b) The board shall fill a vacancy on the council for the unexpired term by appointing a person who has the same qualifications as required under Section 10.003 for the person who previously held the vacated position.

Sec. 10.005. PRESIDING OFFICER. The council members shall select one member as the presiding officer of the council to serve in that capacity until the person's term as a council member expires.

Sec. 10.006. COUNCIL STAFF. On request by the council, the board shall provide any necessary staff to assist the council in the performance of its duties.

Sec. 10.007. PUBLIC MEETINGS AND PUBLIC INFORMATION. (a) The council may hold public meetings as needed to fulfill its duties under this chapter.

(b) The council is subject to Chapters 551 and 552, Government Code.

Sec. 10.008. INAPPLICABILITY OF ADVISORY COMMITTEE LAW. Chapter 2110, Government Code, does not apply to the size, composition, or duration of the council.

Sec. 10.009. COMPENSATION OF MEMBERS. (a) Members of the council serve without compensation but may be reimbursed by legislative appropriation for actual and necessary expenses related to the performance of council duties.

(b) Reimbursement under Subsection (a) is subject to the approval of the presiding officer of the council.

Sec. 10.010. POWERS AND DUTIES OF COUNCIL. The council shall:

(1) monitor trends in water conservation implementation;

(2) monitor new technologies for possible inclusion by the board as best management practices in the best management practices guide developed by the water conservation implementation task force under Chapter 109, Acts of the 78th Legislature, Regular Session, 2003;

(3) monitor the effectiveness of the statewide water conservation public awareness program developed under Section 16.401 and associated local involvement in implementation of the program;

(4) develop and implement a state water management resource library;

(5) develop and implement a public recognition program for water conservation;

(6) monitor the implementation of water conservation strategies by water users included in regional water plans; and

(7) monitor target and goal guidelines for water conservation to be considered by the board and commission.

Sec. 10.011. REPORT. Not later than December 1 of each even-numbered year, the council shall submit to the governor, lieutenant governor, and speaker of the house of representatives a report on progress made in water conservation in this state.

Sec. 10.012. DESIGNATION OF CERTIFIED WATER CONSERVATION TRAINING FACILITIES STUDY. (a) The council shall conduct a study

to evaluate the desirability of requiring the board to:

(1) designate as certified water conservation training facilities entities and programs that provide assistance to retail public utilities in developing water conservation plans under Section 13.146; and

(2) give preference to certified water conservation training facilities in making loans or grants for water conservation training and education activities.

(b) Not later than December 1, 2008, the council shall submit a written report containing the findings of the study and the recommendations of the council to the governor, lieutenant governor, and speaker of the house of representatives.

(c) This section expires June 1, 2009.

SECTION 2.04. Section 11.002, Water Code, is amended by adding Subdivision (20) to read as follows:

(20) "Best management practices" means those voluntary efficiency measures developed by the commission and the board that save a quantifiable amount of water, either directly or indirectly, and that can be implemented within a specified time frame.

SECTION 2.05. Subdivisions (1-a), (5), and (8), Section 13.002, Water Code, are amended to read as follows:

(1-a) "Landowner," "owner of a tract of land," and "owners of each tract of land" include multiple owners of a single deeded tract of land as shown on the appraisal roll of the appraisal district established for each county in which the property is located.

(5) "Commission" means the Texas [~~Natural Resource Conservation~~] Commission on Environmental Quality.

(8) "Executive director" means the executive director of the commission [~~Texas Natural Resource Conservation Commission~~].

SECTION 2.06. Subchapter E, Chapter 13, Water Code, is amended by adding Sections 13.146 and 13.147 to read as follows:

Sec. 13.146. WATER CONSERVATION PLAN. The commission shall require a retail public utility that provides potable water service to 3,300 or more connections to submit to the executive administrator of the board a water conservation plan based on specific targets and goals developed by the retail public utility and using appropriate best management practices, as defined by Section 11.002, or other water conservation strategies.

Sec. 13.147. CONSOLIDATED BILLING AND COLLECTION CONTRACTS. (a) A retail public utility providing water service may contract with a retail public utility providing sewer service to bill and collect the sewer service provider's fees and payments as part of a consolidated process with the billing and collection of the water service provider's fees and payments. The water service provider may provide that service only for customers who are served by both providers in an area covered by both providers' certificates of public convenience and necessity. If the water service provider refuses to enter into a contract under this section or if the water service provider and sewer service provider cannot agree on the terms of a contract, the sewer service provider may petition the commission to issue an order requiring the water

service provider to provide that service.

(b) A contract or order under this section must provide procedures and deadlines for submitting billing and customer information to the water service provider and for the delivery of collected fees and payments to the sewer service provider.

(c) A contract or order under this section may require or permit a water service provider that provides consolidated billing and collection of fees and payments to:

(1) terminate the water services of a person whose sewage services account is in arrears for nonpayment; and

(2) charge a customer a reconnection fee if the customer's water service is terminated for nonpayment of the customer's sewage services account.

(d) A water service provider that provides consolidated billing and collection of fees and payments may impose on each sewer service provider customer a reasonable fee to recover costs associated with providing consolidated billing and collection of fees and payments for sewage services.

SECTION 2.07. Subchapter F, Chapter 13, Water Code, is amended by adding Section 13.188 to read as follows:

Sec. 13.188. ADJUSTMENT FOR CHANGE IN ENERGY COSTS. (a) Notwithstanding any other provision in this chapter, the commission by rule shall adopt a procedure allowing a utility to file with the commission an application to timely adjust the utility's rates to reflect an increase or decrease in documented energy costs in a pass through clause. The commission, by rule, shall require the pass through of documented decreases in energy

costs within a reasonable time. The pass through, whether a decrease or increase, shall be implemented on no later than an annual basis, unless the commission determines a special circumstance applies.

(b) Notwithstanding any other provision to the contrary, this adjustment is an uncontested matter not subject to a contested case hearing. However, the executive director shall hold an uncontested public meeting:

(1) on the request of a member of the legislature who represents the area served by the water and sewer utility; or

(2) if the executive director determines that there is substantial public interest in the matter.

(c) A proceeding under this section is not a rate case and Section 13.187 does not apply.

SECTION 2.08. Section 13.2451, Water Code, is amended to read as follows:

Sec. 13.2451. EXTENSION BEYOND EXTRATERRITORIAL JURISDICTION. (a) If [~~Except as provided by Subsection (b), if~~] a municipality extends its extraterritorial jurisdiction to include an area certificated to a retail public utility, the retail public utility may continue and extend service in its area of public convenience and necessity under the rights granted by its certificate and this chapter.

(b) A municipality that seeks to extend a certificate of public convenience and necessity beyond the municipality's extraterritorial jurisdiction must ensure that the municipality complies with Section 13.241 in relation to the area covered by the

portion of the certificate that extends beyond the municipality's extraterritorial jurisdiction.

(c) The commission, after notice to the municipality and an opportunity for a hearing, may decertify an area outside a municipality's extraterritorial jurisdiction if the municipality does not provide service to the area on or before the fifth anniversary of the date the certificate of public convenience and necessity was granted for the area. This subsection does not apply to a certificate of public convenience and necessity for an area:

(1) that was transferred to a municipality on approval of the commission; and

(2) in relation to which the municipality has spent public funds.

(d) To the extent of a conflict between this section and Section 13.245, Section 13.245 prevails [~~The commission may not extend a municipality's certificate of public convenience and necessity beyond its extraterritorial jurisdiction without the written consent of the landowner who owns the property in which the certificate is to be extended. The portion of any certificate of public convenience and necessity that extends beyond the extraterritorial jurisdiction of the municipality without the consent of the landowner is void~~].

SECTION 2.09. Subsection (a-1), Section 13.246, Water Code, is amended to read as follows:

(a-1) Except as otherwise provided by this subsection, in addition to the notice required by Subsection (a), the commission shall require notice to be mailed to each owner of a tract of land

that is at least 25 [~~50~~] acres and is wholly or partially included in the area proposed to be certified. Notice required under this subsection must be mailed by first class mail to the owner of the tract according to the most current tax appraisal rolls of the applicable central appraisal district at the time the commission received the application for the certificate or amendment. Good faith efforts to comply with the requirements of this subsection shall be considered adequate notice to landowners. Notice under this subsection is not required for a matter filed with the commission under:

(1) Section 13.248 or 13.255; or

(2) Chapter 65.

SECTION 2.10. Subsection (b), Section 15.102, Water Code, is amended to read as follows:

(b) The loan fund may also be used by the board to provide:

(1) grants or loans for projects that include supplying water and wastewater services in economically distressed areas or nonborder colonias as provided by legislative appropriations, this chapter, and board rules, including projects involving retail distribution of those services; and

(2) grants for:

(A) projects for which federal grant funds are placed in the loan fund;

(B) projects, on specific legislative appropriation for those projects; or

(C) water conservation, desalination, brush control, weather modification, regionalization, and projects

providing regional water quality enhancement services as defined by board rule, including regional conveyance systems.

SECTION 2.11. Subchapter Q, Chapter 15, Water Code, is amended by adding Section 15.9751 to read as follows:

Sec. 15.9751. PRIORITY FOR WATER CONSERVATION. The board shall give priority to applications for funds for the implementation of water supply projects in the state water plan by entities that:

(1) have already demonstrated significant water conservation savings; or

(2) will achieve significant water conservation savings by implementing the proposed project for which the financial assistance is sought.

SECTION 2.12. Section 16.017, Water Code, is amended to read as follows:

Sec. 16.017. TOPOGRAPHIC AND GEOLOGIC MAPPING. (a) The executive administrator shall carry out the program for topographic and geologic mapping of the state.

(b) The executive administrator shall operate as part of the Texas Natural Resources Information System a strategic mapping program to acquire, store, and distribute digital, geospatial information.

SECTION 2.13. Subchapter B, Chapter 16, Water Code, is amended by adding Sections 16.023 and 16.024 to read as follows:

Sec. 16.023. STRATEGIC MAPPING ACCOUNT. (a) The strategic mapping account is an account in the general revenue fund. The account consists of:

(1) money directly appropriated to the board;

(2) money transferred by the board from other funds available to the board;

(3) money from gifts or grants from the United States government, state, regional, or local governments, educational institutions, private sources, or other sources;

(4) proceeds from the sale of maps, data, publications, and other items; and

(5) interest earned on the investment of money in the account and depository interest allocable to the account.

(b) The account may be appropriated only to the board to:

(1) develop, administer, and implement the strategic mapping program;

(2) provide grants to political subdivisions for projects related to the development, use, and dissemination of digital, geospatial information; and

(3) administer, implement, and operate other programs of the Texas Natural Resources Information System, including:

(A) the operation of a Texas-Mexico border region information center for the purpose of implementing Section 16.021(e)(5);

(B) the acquisition, storage, and distribution of historical maps, photographs, and paper map products;

(C) the maintenance and enhancement of information technology; and

(D) the production, storage, and distribution of other digital base maps, as determined by the executive

administrator or a state agency that is a member of the Texas Geographic Information Council.

(c) The board may invest, reinvest, and direct the investment of any available money in the fund as provided by law for the investment of money under Section 404.024, Government Code.

Sec. 16.024. FINANCIAL ASSISTANCE FOR DIGITAL, GEOSPATIAL INFORMATION PROJECTS. (a) A political subdivision seeking a grant under Section 16.023 must file an application with the board.

(b) An application must be filed in the manner and form required by board rules.

(c) In reviewing an application by a political subdivision for a grant, the board shall consider:

(1) the degree to which the political subdivision has used other available resources to finance the development, use, and dissemination of digital, geospatial information;

(2) the willingness and ability of the political subdivision to develop, use, and disseminate digital, geospatial information; and

(3) the benefits that will be gained by making the grant.

(d) The board may approve a grant to a political subdivision only if the board finds that:

(1) the grant will supplement rather than replace money of the political subdivision;

(2) the public interest is served by providing the grant; and

(3) the grant will further the state's ability to

gather, develop, use, and disseminate digital, geospatial information.

SECTION 2.14. Subsection (h), Section 16.053, Water Code, is amended by adding Subdivisions (10) and (11) to read as follows:

(10) The regional water planning group may amend the regional water plan after the plan has been approved by the board. Subdivisions (1)-(9) apply to an amendment to the plan in the same manner as those subdivisions apply to the plan.

(11) This subdivision applies only to an amendment to a regional water plan approved by the board. This subdivision does not apply to the adoption of a subsequent regional water plan for submission to the board as required by Subsection (i). Notwithstanding Subdivision (10), the regional water planning group may amend the plan in the manner provided by this subdivision if the executive administrator makes a written determination that the proposed amendment qualifies for adoption in the manner provided by this subdivision before the regional water planning group votes on adoption of the amendment. A proposed amendment qualifies for adoption in the manner provided by this subdivision only if the amendment is a minor amendment, as defined by board rules, that will not result in the overallocation of any existing or planned source of water, does not relate to a new reservoir, and will not have a significant effect on instream flows or freshwater inflows to bays and estuaries. If the executive administrator determines that a proposed amendment qualifies for adoption in the manner provided by this subdivision, the regional water planning group may adopt the amendment at a public meeting held in accordance

with Chapter 551, Government Code. The proposed amendment must be placed on the agenda for the meeting, and notice of the meeting must be given in the manner provided by Chapter 551, Government Code, at least two weeks before the date the meeting is held. The public must be provided an opportunity to comment on the proposed amendment at the meeting.

SECTION 2.15. Subsection (r), Section 16.053, Water Code, as added by Chapter 1097, Acts of the 79th Legislature, Regular Session, 2005, is amended to read as follows:

(r) The board by rule shall provide for reasonable flexibility to allow for a timely amendment of a regional water plan, the board's approval of an amended regional water plan, and the amendment of the state water plan. If an amendment under this subsection is[~~,~~] to facilitate planning for water supplies reasonably required for a clean coal project, as defined by Section 5.001, the[~~. The~~] rules may allow for amending a regional water plan without providing notice and without a public meeting or hearing under Subsection (h) if the amendment does not:

(1) significantly change the regional water plan, as reasonably determined by the board; or

(2) adversely affect other water management strategies in the regional water plan.

SECTION 2.16. Subchapter E, Chapter 16, Water Code, is amended by adding Section 16.1311 to read as follows:

Sec. 16.1311. PRIORITY FOR WATER CONSERVATION. The board shall give priority to applications for funds for implementation of water supply projects in the state water plan by entities that:

(1) have already demonstrated significant water conservation savings; or

(2) will achieve significant water conservation savings by implementing the proposed project for which the financial assistance is sought.

SECTION 2.17. Sections 16.315 and 16.319, Water Code, are amended to read as follows:

Sec. 16.315. POLITICAL SUBDIVISIONS; COMPLIANCE WITH FEDERAL REQUIREMENTS. All political subdivisions are hereby authorized to take all necessary and reasonable actions that are not less stringent than [~~to comply with~~] the requirements and criteria of the National Flood Insurance Program, including but not limited to:

(1) making appropriate land use adjustments to constrict the development of land which is exposed to flood damage and minimize damage caused by flood losses;

(2) guiding the development of proposed future construction, where practicable, away from a location which is threatened by flood hazards;

(3) assisting in minimizing damage caused by floods;

(4) authorizing and engaging in continuing studies of flood hazards in order to facilitate a constant reappraisal of the flood insurance program and its effect on land use requirements;

(5) engaging in floodplain management, [~~and~~] adopting and enforcing permanent land use and control measures that are not less stringent than those [~~consistent with the criteria~~] established under the National Flood Insurance Act, and providing

for the imposition of penalties on landowners who violate this subchapter or rules adopted or orders issued under this subchapter;

(6) declaring property, when such is the case, to be in violation of local laws, regulations, or ordinances which are intended to discourage or otherwise restrict land development or occupancy in flood-prone areas and notifying the director, or whomever the director designates, of such property;

(7) consulting with, giving information to, and entering into agreements with the Federal Emergency Management Agency for the purpose of:

(A) identifying and publishing information with respect to all flood areas, including coastal areas; and

(B) establishing flood-risk zones in all such areas and making estimates with respect to the rates of probable flood-caused loss for the various flood-risk zones for each of these areas;

(8) cooperating with the director's studies and investigations with respect to the adequacy of local measures in flood-prone areas as to land management and use, flood control, flood zoning, and flood damage prevention;

(9) taking steps, using regional, watershed, and multi-objective approaches, to improve the long-range management and use of flood-prone areas;

(10) purchasing, leasing, and receiving property from the director when such property is owned by the federal government and lies within the boundaries of the political subdivision pursuant to agreements with the Federal Emergency Management Agency

or other appropriate legal representative of the United States Government;

(11) requesting aid pursuant to the entire authorization from the commission;

(12) satisfying criteria adopted and promulgated by the commission pursuant to the National Flood Insurance Program;

(13) adopting permanent land use and control measures with enforcement provisions that are not less stringent than [~~which are consistent with~~] the criteria for land management and use adopted by the director;

(14) adopting more comprehensive floodplain management rules that the political subdivision determines are necessary for planning and appropriate to protect public health and safety;

(15) participating in floodplain management and mitigation initiatives such as the National Flood Insurance Program's Community Rating System, Project Impact, or other initiatives developed by federal, state, or local government; and

(16) collecting reasonable fees to cover the cost of administering a local floodplain management program.

Sec. 16.319. QUALIFICATION. Political subdivisions wishing to qualify under the National Flood Insurance Program shall have the authority to do so by complying with the directions of the Federal Emergency Management Agency and by:

(1) evidencing to the director a positive interest in securing flood insurance coverage under the National Flood Insurance Program; and

(2) giving to the director satisfactory assurance that measures will have been adopted for the political subdivision that [~~which measures~~] will be not less stringent than [~~consistent with~~] the comprehensive criteria for land management and use developed by the Federal Emergency Management Agency.

SECTION 2.18. Chapter 16, Water Code, is amended by adding Subchapter K to read as follows:

SUBCHAPTER K. WATER CONSERVATION

Sec. 16.401. STATEWIDE WATER CONSERVATION PUBLIC AWARENESS PROGRAM. (a) The executive administrator shall develop and implement a statewide water conservation public awareness program to educate residents of this state about water conservation. The program shall take into account the differences in water conservation needs of various geographic regions of the state and shall be designed to complement and support existing local and regional water conservation programs.

(b) The executive administrator is required to develop and implement the program required by Subsection (a) in a state fiscal biennium only if the legislature appropriates sufficient money in that biennium specifically for that purpose.

Sec. 16.402. WATER CONSERVATION PLAN REVIEW. (a) Each entity that is required to submit a water conservation plan to the commission under this code shall submit a copy of the plan to the executive administrator.

(b) Each entity that is required to submit a water conservation plan to the executive administrator, board, or commission under this code shall report annually to the executive

administrator on the entity's progress in implementing the plan.

(c) The executive administrator shall review each water conservation plan and annual report to determine compliance with the minimum requirements established by Section 11.1271 and the submission deadlines developed under Subsection (e) of this section.

(d) The board may notify the commission if the board determines that an entity has violated this section or a rule adopted under this section. Notwithstanding Section 7.051(b), a violation of this section or of a rule adopted under this section is enforceable in the manner provided by Chapter 7 for a violation of a provision of this code within the commission's jurisdiction or of a rule adopted by the commission under a provision of this code within the commission's jurisdiction.

(e) The board and commission jointly shall adopt rules:

(1) identifying the minimum requirements and submission deadlines for the annual reports required by Subsection (b); and

(2) providing for the enforcement of this section and rules adopted under this section.

SECTION 2.19. Section 17.125, Water Code, is amended by adding Subsection (b-2) to read as follows:

(b-2) The board shall give priority to applications for funds for implementation of water supply projects in the state water plan by entities that:

(1) have already demonstrated significant water conservation savings; or

(2) will achieve significant water conservation savings by implementing the proposed project for which the financial assistance is sought.

SECTION 2.20. Chapter 35, Water Code, is amended by adding Section 35.020 to read as follows:

Sec. 35.020. PUBLIC PARTICIPATION IN GROUNDWATER MANAGEMENT PROCESS. It is the policy of the state to encourage public participation in the groundwater management process in areas within a groundwater management area not represented by a groundwater conservation district.

SECTION 2.21. Subsection (d), Section 36.113, Water Code, is amended to read as follows:

(d) Before granting or denying a permit or permit amendment, the district shall consider whether:

(1) the application conforms to the requirements prescribed by this chapter and is accompanied by the prescribed fees;

(2) the proposed use of water unreasonably affects existing groundwater and surface water resources or existing permit holders;

(3) the proposed use of water is dedicated to any beneficial use;

(4) the proposed use of water is consistent with the district's certified water management plan;

(5) if the well will be located in the Hill Country Priority Groundwater Management Area, the proposed use of water from the well is wholly or partly to provide water to a pond, lake,

or reservoir to enhance the appearance of the landscape;

(6) the applicant has agreed to avoid waste and achieve water conservation; and

(7) [~~(6)~~] the applicant has agreed that reasonable diligence will be used to protect groundwater quality and that the applicant will follow well plugging guidelines at the time of well closure.

SECTION 2.22. Subsection (d), Section 36.117, Water Code, is amended to read as follows:

(d) Notwithstanding Subsection (b), a district may require a well to be permitted by the district and to comply with all district rules if:

(1) the withdrawals from a well in the Hill Country Priority Groundwater Management Area and exempted under Subsection (b)(1) are no longer used solely for domestic use or to provide water for livestock or poultry;

(2) the purpose of a well exempted under Subsection (b)(2) is no longer solely to supply water for a rig that is actively engaged in drilling or exploration operations for an oil or gas well permitted by the Railroad Commission of Texas; or

(3) [~~(2)~~] the withdrawals from a well exempted under Subsection (b)(3) are no longer necessary for mining activities or are greater than the amount necessary for mining activities specified in the permit issued by the Railroad Commission of Texas under Chapter 134, Natural Resources Code.

SECTION 2.23. Subchapter H, Chapter 49, Water Code, is amended by adding Section 49.2205 to read as follows:

Sec. 49.2205. USE OF RIGHT-OF-WAY EASEMENTS FOR CERTAIN ENERGY-RELATED PURPOSES. (a) To foster the generation and transmission of electricity from clean coal projects, as defined by Section 5.001, renewable energy technology projects, and the capture and storage of carbon dioxide and other greenhouse gases, a district or water supply corporation may allow others to construct, maintain, and operate transmission lines and pipelines over, under, across, on, or along rights-of-way and easements of the district or water supply corporation for transmission of electricity generated by those projects and the transportation of carbon dioxide and other greenhouse gases, unless the use:

(1) is incompatible with the public use for which the easement was acquired or condemned; or

(2) compromises public health or safety.

(b) The district or water supply corporation is not required to obtain additional consideration for the construction, maintenance, and operation of the transmission lines and pipelines under this section if the person constructing, maintaining, and operating the transmission lines and pipelines bears all costs of the construction, maintenance, and operation of the transmission lines and pipelines and restoring the property. The activities authorized by this subsection may be exercised only with the consent of and subject to the direction of the governing body of the district or water supply corporation.

(c) A person that is subject to Subsection (a) that acquires a right-of-way easement on real property for a public use may include in the notice of the acquisition a statement that to foster

the generation and transmission of electricity from clean coal projects as defined by Section 5.001, Water Code, renewable energy technology projects, and the capture and storage of carbon dioxide and other greenhouse gases, water districts and water supply corporations may allow others to construct, maintain, and operate transmission lines and pipelines over, under, across, on, or along the rights-of-way and easements for the transmission of electricity that is generated by those projects and transportation of carbon dioxide and other greenhouse gases, unless the use:

(1) is incompatible with the public use for which the easement was acquired or condemned; or

(2) compromises public health or safety.

(d) This section applies only to a right-of-way or easement acquired by the district or water supply corporation on or after September 1, 2007.

(e) This section does not apply to a right-of-way or easement that is used for the transmission of electricity without the consent of a person owning the transmission lines if that use began before September 1, 2007.

SECTION 2.24. Chapter 49, Water Code, is amended by adding Subchapter O to read as follows:

SUBCHAPTER O. EFFECT OF SUBDIVISION OF NONAGRICULTURAL LAND ON WATER RIGHTS

Sec. 49.501. DEFINITION. In this subchapter, "municipal water supplier" means a municipality or a water supply corporation.

Sec. 49.502. APPLICABILITY. This subchapter applies only to a district, other than a drainage district, located wholly or

partly in a county:

(1) that borders the Gulf of Mexico and the United Mexican States; or

(2) that is adjacent to a county described by Subdivision (1).

Sec. 49.503. PETITION BY MUNICIPAL WATER SUPPLIER TO CONVERT WATER USE AFTER SUBDIVISION. (a) This section applies only to land:

(1) that is:

(A) subdivided into town lots or blocks or small parcels of the same general nature as town lots or blocks;

(B) designed, intended, or suitable for residential or other nonagricultural purposes, including streets, alleys, parkways, parks, detention or retention ponds, and railroad property and rights-of-way; or

(C) in a subdivision created to meet the requirements of a governmental entity authorized to require a recorded plat of subdivided lands;

(2) that is in a subdivision for which a plat or map has been filed and recorded in the office of the county clerk of each county in which the subdivision is wholly or partly located; and

(3) that is or was assessed as flat rate irrigable property in the municipal water supplier's certificated service area or its corporate area.

(b) A municipal water supplier that serves land described by Subsection (a) may petition the district in accordance with this

section to convert the proportionate irrigation water right to the Rio Grande from irrigation use to municipal use with municipal priority of allocation under commission rules, for the use and benefit of the municipal water supplier.

(c) The municipal water supplier must file the petition with the district not later than January 1 after the expiration of two years after the date the plat or map was recorded under Subsection (a). The district shall consider the petition not later than January 31 of the year following the year in which the petition was filed.

(d) The petition must identify by subdivision name or other sufficient description the land that the municipal water supplier supplies or has the right to supply potable water.

(e) This section applies only to one subdivision of the land recorded under Subsection (a). This section does not apply to any further subdivision of the same property.

Sec. 49.504. EFFECT OF MUNICIPAL WATER SUPPLIER'S FAILURE TO FILE A PETITION. (a) If a municipal water supplier does not file a petition under Section 49.503, the district may retain the water rights for use by the district or may declare the water as excess and contract for the sale or use of the water as determined by the district.

(b) Before a district may contract for the sale or use of water for more than one year with a purchaser located outside of a county described by Section 49.502, the district must, for 90 days:

(1) make the water available under the same terms to all municipal water suppliers located in those counties; and

(2) advertise the offer to sell or contract for the use of the water by posting notice on:

(A) any website of the Rio Grande Watermaster's Office;

(B) any website of the Rio Grande Regional Water Authority; and

(C) the official posting place for the district's board meetings at the district's office.

(c) If, after the 90th day after the last date on which the district posted notice, a municipal water supplier in a county described by Section 49.502 has not contracted with the district for the sale or use of the water, the district may contract with any other person for the sale or use of the water under the terms of the offer advertised under Subsection (b).

Sec. 49.505. CALCULATION OF PROPORTIONATE WATER RIGHTS. A district that receives a petition under Section 49.503 shall compute the proportionate amount of water rights to the Rio Grande. The proportionate amount of water rights is equal to the amount of irrigable acres of land in the subdivision multiplied by the lesser of:

(1) 1.25 acre-feet per irrigable acre; or

(2) the sum of all irrigation water rights owned by the district on September 1, 2007, as if the water rights had been converted to municipal use under applicable commission rules, divided by the total amount of irrigable acres of land in the district on September 1, 2007.

Sec. 49.506. PROVISION OR CONVERSION OF PROPORTIONATE WATER

RIGHTS BY DISTRICT. (a) Not later than the second anniversary of the date the municipal water supplier files a petition under Section 49.503:

(1) a district shall provide the municipal water supplier with the proportionate water rights described by Section 49.505 from the district's existing water rights; or

(2) a district shall, if the district does not have sufficient existing water rights:

(A) apply for appropriate amendments to the district's water rights under commission rules to convert the proportionate water rights from irrigation use to municipal use with municipal priority of allocation; and

(B) provide to the municipal water supplier the converted rights described by Section 49.505.

(b) The district may continue to use the irrigation use water for district purposes until:

(1) the commission approves the amendment to the district's water rights; or

(2) the water is otherwise provided to the municipal water supplier.

(c) A district that applies for appropriate amendments under Subsection (a)(2) shall provide the municipal water supplier with an estimate of the district's reasonable costs for the administrative proceedings. The district is not required to begin the proceedings until the municipal water supplier deposits the amount of the estimate with the district. The municipal water supplier shall pay the district any reasonable costs that exceed

the estimate. The district shall refund the balance of the deposit if the actual cost is less than the estimate.

Sec. 49.507. CONTRACT TO PURCHASE PROPORTIONATE WATER RIGHTS; WATER RIGHTS SALE CONTRACT. (a) A municipal water supplier may contract to purchase the proportionate water rights described by Section 49.505.

(b) The purchase price may not exceed 68 percent of the current market value, as determined under Section 49.509, for the year that the municipal water supplier petitions the district.

(c) The contract must be in writing in a document entitled "Water Rights Sales Contract."

(d) The contract must include the purchase price for the water rights or, if the consideration for the sale is not monetary, the terms of the sale.

(e) The municipal water supplier shall file the contract with the Rio Grande watermaster not later than the 10th day after the date the contract is executed.

(f) The municipal water supplier shall pay the purchase price when the proportionate amount of water rights is made available to the municipal water supplier.

Sec. 49.508. CONTRACT TO USE PROPORTIONATE WATER RIGHTS; WATER SUPPLY CONTRACT. (a) A municipal water supplier may contract to use water associated with the proportionate water rights described by Section 49.505.

(b) The contract must be for at least 40 years.

(c) The price for the contractual right to use the municipal use water is based on an amount for one acre-foot of municipal use

water with a municipal use priority of allocation and may not exceed the sum of:

(1) an amount equal to the district's annual flat rate charge per assessed acre; and

(2) the equivalent of the charge for four irrigations per flat rate acre of irrigable property in the district.

(d) The parties to the contract shall agree on the terms of payment of the contract price.

(e) The board periodically shall determine the flat rate charge and irrigation per acre charge described by Subsection (c).

(f) The contract must be in writing in a document entitled "Water Supply Contract." The contract may contain any terms to which the parties agree.

(g) The municipal water supplier shall file the contract with the Rio Grande watermaster not later than the 10th day after the date the contract is executed.

Sec. 49.509. DUTY OF RIO GRANDE REGIONAL WATER AUTHORITY TO CALCULATE CURRENT MARKET VALUE. (a) The Rio Grande Regional Water Authority annually at its January meeting shall calculate the current market value by using the average price per acre-foot of municipal use water after conversion from irrigation use water to municipal use water with a municipal priority of allocation under commission rules of the last three purchases involving:

(1) a municipal water supplier;

(2) a party other than a municipal water supplier; and

(3) at least 100 acre-feet of municipal use water, with municipal priority of allocation.

(b) The Rio Grande Regional Water Authority shall use information from the water rights sales contracts reported to the Rio Grande Watermaster's Office to calculate the current market value.

(c) The Rio Grande Regional Water Authority shall make the calculation:

(1) without charging any of the parties involved; and

(2) using 100 percent of the value of monetary exchanges, not in-kind exchanges.

Sec. 49.510. ACCOUNTING FOR SALE OF WATER RIGHTS. A district shall maintain an accounting of money received from the sale of water rights under this subchapter.

Sec. 49.511. CAPITAL IMPROVEMENTS. A district shall designate at least 75 percent of the proceeds from the sale of water rights for capital improvements in the district.

Sec. 49.512. MAP OF SERVICE AREA. (a) In this section, "outer boundaries of a district" means district boundaries without considering any exclusion of land from inside the district.

(b) Each municipal water supplier that has a certificate of convenience and necessity service area in the outer boundaries of a district shall file a map of the service area with the district.

(c) The municipal water supplier shall update the map and forward the map to the district when changes are made.

(d) A district periodically shall provide to a municipal water supplier that serves territory in the district a copy of the district's map showing the outer boundaries of the district.

(e) A district may request from a municipal water supplier a

map of the municipal water supplier's service area, and a municipal water supplier may request from the district a map of the district's outer boundaries. On request, the district and a municipal water supplier shall provide the map free of charge to each other at least one time each year. If the district or municipal water supplier receives more than one request a year for a map, the district or municipal water supplier may charge a reasonable fee for the map.

SECTION 2.25. Subchapter Z, Chapter 51, Education Code, is amended by adding Section 51.969 to read as follows:

Sec. 51.969. ON-SITE RECLAIMED SYSTEM TECHNOLOGIES CURRICULUM. The Texas Higher Education Coordinating Board shall encourage each institution of higher education to develop curriculum and provide related instruction regarding on-site reclaimed system technologies, including rainwater harvesting, condensate collection, or cooling tower blow down.

SECTION 2.26. Chapter 68, Education Code, is amended by adding Subchapter B to read as follows:

SUBCHAPTER B. POWERS AND DUTIES OF BOARD

Sec. 68.21. SUSTAINABLE WATER SUPPLY RESEARCH CENTER. (a) In this section, "center" means the Sustainable Water Supply Research Center.

(b) The board may establish and operate the Sustainable Water Supply Research Center as part of The University of Texas at Arlington.

(c) If established, the center shall:

(1) conduct, sponsor, or direct multidisciplinary research directed toward:

(A) promoting water conservation through development of a sustainable water supply for this state; and

(B) mitigating the effect of diminishing water supplies on the economy and people of this state; and

(2) conduct a comprehensive, interdisciplinary instructional program in water conservation with emphasis on development of a sustainable water supply at the graduate level and offer undergraduate courses for students interested in water conservation and sustainable water supply development.

(d) The organization, control, and management of the center are vested in the board.

(e) The center may enter into an agreement or may cooperate with a public or private entity to perform the research functions of the center.

(f) The board may solicit, accept, and administer gifts and grants from any public or private source for the use and benefit of the center.

SECTION 2.27. Section 447.004, Government Code, is amended by adding Subsection (c-1) to read as follows:

(c-1) The procedural standards adopted under this section must require that on-site reclaimed system technologies, including rainwater harvesting, condensate collection, or cooling tower blow down, or a combination of those system technologies, for nonpotable indoor use and landscape watering be incorporated into the design and construction of:

(1) each new state building with a roof measuring at least 10,000 square feet; and

(2) any other new state building for which the incorporation of such systems is feasible.

SECTION 2.28. Section 341.042, Health and Safety Code, is amended to read as follows:

Sec. 341.042. STANDARDS FOR HARVESTED RAINWATER. (a) The commission shall establish recommended standards relating to the domestic use of harvested rainwater, including health and safety standards for treatment and collection methods for harvested rainwater intended for drinking, cooking, or bathing.

(b) The commission by rule shall provide that if a structure is connected to a public water supply system and has a rainwater harvesting system for indoor use:

(1) the structure must have appropriate cross-connection safeguards; and

(2) the rainwater harvesting system may be used only for nonpotable indoor purposes.

(c) Standards and rules adopted by the commission under this chapter governing public drinking water supply systems do not apply to a person:

(1) who harvests rainwater for domestic use; and

(2) whose property is not connected to a public drinking water supply system.

SECTION 2.29. Subsection (b), Section 212.0101, Local Government Code, is amended to read as follows:

(b) The Texas [~~Natural Resource Conservation~~] Commission on Environmental Quality by rule shall establish the appropriate form and content of a certification to be attached to a plat application

under this section.

SECTION 2.30. Subsection (b), Section 232.0032, Local Government Code, is amended to read as follows:

(b) The Texas [~~Natural Resource Conservation~~] Commission on Environmental Quality by rule shall establish the appropriate form and content of a certification to be attached to a plat application under this section.

SECTION 2.31. Chapter 401, Local Government Code, is amended by adding Section 401.006 to read as follows:

Sec. 401.006. WATER CONSERVATION BY HOME-RULE MUNICIPALITY. A home-rule municipality may adopt and enforce ordinances requiring water conservation in the municipality and by customers of the municipality's municipally owned water and sewer utility in the extraterritorial jurisdiction of the municipality.

SECTION 2.32. Subchapter Z, Chapter 402, Local Government Code, is amended by adding Section 402.911 to read as follows:

Sec. 402.911. DUTIES OF WATER SERVICE PROVIDER TO AN AREA SERVED BY SEWER SERVICE OF CERTAIN POLITICAL SUBDIVISIONS. (a) This section applies only to an area:

(1) that is located in a county that has a population of more than 1.3 million; and

(2) in which a customer's sewer service is provided by a municipality or conservation and reclamation district that also provides water service to other customers and the same customer's water service is provided by another entity.

(b) For each person the water service provider serves in an area to which this section applies, the water service provider

shall provide the municipality or district with any relevant customer information so that the municipality or district may bill users of the sewer service directly and verify the water consumption of users. Relevant customer information provided under this section includes the name, address, and telephone number of the customer of the water service provider, the monthly meter readings of the customer, monthly consumption information, including any billing adjustments, and certain meter information, such as brand, model, age, and location.

(c) The municipality or district shall reimburse the water service provider for its reasonable and actual incremental costs for providing services to the municipality or district under this section. Incremental costs are limited to only those costs that are in addition to the water service provider's costs in providing its services to its customers, and those costs must be consistent with the costs incurred by other water utility providers. Only if requested by the wastewater provider, the water service provider must provide the municipality or district with documentation certified by a certified public accountant of the reasonable and actual incremental costs for providing services to the municipality or district under this section.

(d) A municipality or conservation and reclamation district may provide written notice to a person to whom the municipality's or district's sewer service system provides service if the person has failed to pay for the service for more than 90 days. The notice must state the past due amount owed and the deadline by which the past due amount must be paid or the person will lose water service. The

notice may be sent by mail or hand-delivered to the location at which the sewer service is provided.

(e) The municipality or district may notify the water service provider of a person who fails to make timely payment after the person receives notice under Subsection (d). The notice must indicate the number of days the person has failed to pay for sewer service and the total amount past due. On receipt of the notice, the water service provider shall discontinue water service to the person.

(f) This section does not apply to a nonprofit water supply or sewer service corporation created under Chapter 67, Water Code, or a district created under Chapter 65, Water Code.

SECTION 2.33. Section 430.003, Local Government Code, is amended to read as follows:

Sec. 430.003. EXEMPTIONS OF CERTAIN [~~STATE~~] PROPERTY FROM INFRASTRUCTURE FEES. No county, municipality, or utility district may collect from a state agency or a public or private institution of higher education any fee charged for the development or maintenance of programs or [~~of~~] facilities for the control of excess water or storm water.

SECTION 2.34. Section 1903.053, Occupations Code, is amended to read as follows:

Sec. 1903.053. STANDARDS. (a) The commission shall adopt by rule and enforce standards governing:

(1) the connection of irrigation systems to any water supply;

(2) the design, installation, and operation of

irrigation systems;

(3) water conservation; and

(4) the duties and responsibilities of licensed irrigators.

(b) [~~The commission may adopt standards for irrigation that include water conservation, irrigation system design and installation, and compliance with municipal codes.~~

[~~(c)~~] The commission may not require or prohibit the use of any irrigation system, component part, or equipment of any particular brand or manufacturer.

(c) In adopting standards under this section, the commission shall consult the council.

SECTION 2.35. (a) In this section, "board" means the Texas Water Development Board.

(b) The board, in coordination with the Far West Texas Regional Water Planning Group established pursuant to Section 16.053, Water Code, shall conduct a study regarding the possible impact of climate change on surface water supplies from the Rio Grande.

(c) In conducting the study, the board shall convene a conference within the Far West Texas regional water planning area designated pursuant to Section 16.053, Water Code, to review:

(1) any analysis conducted by a state located to the west of this state regarding the impact of climate change on surface water supplies in that state;

(2) any other current analysis of potential impacts of climate change on surface water resources; and

(3) recommendations for incorporation of potential impacts of climate change into the Far West Texas Regional Water Plan, including potential impacts to the Rio Grande in Texas subject to the Rio Grande Compact and identification of feasible water management strategies to offset any potential impacts.

(d) The conference should include, but not be limited to, the participation of representatives of:

(1) the Far West Texas Regional Water Planning Group;

(2) water authorities;

(3) industrial customers;

(4) agricultural interests;

(5) municipalities;

(6) fishing or recreational interests;

(7) environmental advocacy organizations; and

(8) institutions of higher education.

(e) Not later than December 31, 2008, the board shall submit to the legislature a written report regarding the study findings under this section.

SECTION 2.36. (a) Chapter 9, Water Code, is repealed.

(b) The Texas Water Advisory Council is abolished on the effective date of this article.

SECTION 2.37. Chapter 64, Water Code, is repealed.

SECTION 2.38. As soon as practicable on or after the effective date of this article, the Texas Water Development Board shall appoint the initial members of the Water Conservation Advisory Council, as required by Section 10.003, Water Code, as added by this article. In making the initial appointments, the

board shall designate seven members to serve terms expiring August 31, 2009, eight members to serve terms expiring August 31, 2011, and eight members to serve terms expiring August 31, 2013.

SECTION 2.39. The changes made by this Act to Section 13.2451, Water Code, apply only to:

(1) an application for a certificate of public convenience and necessity or for an amendment to a certificate of public convenience and necessity submitted to the Texas Commission on Environmental Quality on or after the effective date of this Act;

(2) a proceeding to amend or revoke a certificate of public convenience and necessity initiated on or after the effective date of this Act;

(3) a certificate of public convenience and necessity issued to a municipality, regardless of the date the certificate was issued;

(4) an application by a municipality or by a utility owned by a municipality for a certificate of public convenience and necessity or for an amendment to a certificate, regardless of the date the application was filed; and

(5) a proceeding to amend or revoke a certificate of public convenience and necessity held by a municipality or by a utility owned by a municipality, regardless of the date the proceeding was initiated.

SECTION 2.40. Sections 15.102 and 17.125, Water Code, as amended by this article, and Sections 15.9751 and 16.1311, Water Code, as added by this article, apply only to an application for financial assistance filed with the Texas Water Development Board

on or after the effective date of this article. An application for financial assistance filed before the effective date of this article is governed by the law in effect on the date the application was filed, and the former law is continued in effect for that purpose.

SECTION 2.41. The change in law made by Subchapter O, Chapter 49, Water Code, as added by this Act, applies only to a subdivision for which a plat or map has been recorded in the office of the county clerk of a county on or after the effective date of this Act. A subdivision for which a plat or map was recorded before the effective date of this Act is covered by the law in effect on the date the plat or map was recorded, and the former law is continued in effect for that purpose.

SECTION 2.42. Not later than June 1, 2008, the Texas Commission on Environmental Quality shall adopt standards as required by Section 1903.053, Occupations Code, as amended by this article, to take effect January 1, 2009.

SECTION 2.43. Section 2.27 of this article, adding Subsection (c-1), Section 447.004, Government Code, takes effect September 1, 2009.

ARTICLE 3. CONSTRUCTION AND OPERATION OF RESERVOIRS

SECTION 3.01. Section 16.051, Water Code, is amended by adding Subsection (i) to read as follows:

(i) For purposes of this section, the acquisition of fee title or an easement by a political subdivision for the purpose of providing retail public utility service to property in the reservoir site or allowing an owner of property in the reservoir

site to improve or develop the property may not be considered a significant impairment that prevents the construction of a reservoir site under Subsection (g). A fee title or easement acquired under this subsection may not be considered the basis for preventing the future acquisition of land needed to construct a reservoir on a designated site.

SECTION 3.02. Subchapter E, Chapter 16, Water Code, is amended by adding Sections 16.143 and 16.144 to read as follows:

Sec. 16.143. OPTION TO LEASE. (a) A former owner of real property used for agricultural purposes that was acquired, voluntarily or through the exercise of the power of eminent domain, for a reservoir whose site has been designated as unique for the construction of a reservoir under Section 16.051(g) is entitled to lease the property from the person who acquired the property under terms that allow the former owner to continue to use the property for agricultural purposes until the person who acquired the property determines that such use must be terminated to allow for the physical construction of the reservoir. Consistent with Subsection (b), the lease is subject to the terms and conditions set forth by the person who has acquired the property that are related to the use of the property by the former owner, including the term of the lease, the rent the former owner is required to pay under the lease, and the uses that may be allowed on the property during the term of the lease.

(b) A former owner of real property used for agricultural purposes is entitled to lease the property for the property's agricultural rental value until the person who acquired the

property determines that the lease must be terminated to allow for the physical construction of the reservoir.

Sec. 16.144. ENVIRONMENTAL MITIGATION. (a) If a person proposing to construct a reservoir whose site has been designated as unique for the construction of a reservoir under Section 16.051(g) is required to mitigate future adverse environmental effects arising from the construction or operation of the reservoir or its related facilities, the person shall, if authorized by the applicable regulatory authority, attempt to mitigate those effects by offering to contract with and pay an amount of money to an owner of real property located outside of the reservoir site to maintain the property through an easement instead of acquiring the fee simple title to the property for that purpose.

(b) An owner of real property may reject an offer made under Subsection (a). If agreement on the terms of an easement under Subsection (a) cannot be reached by the parties after a good faith attempt and offer is made, then the party constructing the reservoir may obtain fee title to the property through voluntary or involuntary means.

ARTICLE 4. UNIQUE RESERVOIR SITES AND SITES OF UNIQUE ECOLOGICAL VALUE

SECTION 4.01. Section 16.051, Water Code, is amended by adding Subsection (g-1) to read as follows:

(g-1) Notwithstanding any other provisions of law, a site is considered to be a designated site of unique value for the construction of a reservoir if the site is recommended for designation in the 2007 state water plan adopted by the board and in

effect on May 1, 2007. The designation of a unique reservoir site under this subsection terminates on September 1, 2015, unless there is an affirmative vote by a proposed project sponsor to make expenditures necessary in order to construct or file applications for permits required in connection with the construction of the reservoir under federal or state law.

SECTION 4.02. DESIGNATION OF SITES OF UNIQUE ECOLOGICAL VALUE. The legislature, as authorized by Subsection (f), Section 16.051, Water Code, designates those river or stream segment sites recommended in the 2007 state water plan as being of unique ecological value.

SECTION 4.03. RESTRICTION ON ELIGIBILITY TO HOLD WATER RIGHTS; LIABILITY FOR CONSTRUCTION, OPERATION, AND MAINTENANCE COSTS. (a) This section applies only to the proposed Marvin Nichols and Lake Fastrill reservoirs.

(b) The right to appropriate at least 20 percent of the quantity of water that is authorized to be appropriated from each proposed reservoir must be held by one or more entities located in the regional water planning area in which the reservoir is to be located.

(c) If one or more entities located outside the regional water planning area in which a proposed reservoir is to be located are to hold the right to appropriate a majority of the quantity of water that is authorized to be appropriated from the reservoir, that entity or those entities must pay all of the costs of constructing, operating, and maintaining the reservoir until such time as one or more entities located in the regional water planning

area in which the reservoir is to be located begins diverting water. At such time, the entity or entities making a diversion shall pay a pro-rata share of the cost of operating and maintaining the reservoir.

SECTION 4.04. STUDY COMMISSION ON REGION C WATER SUPPLY. (a) The Study Commission on Region C Water Supply is established. The study commission consists of six members as follows:

(1) three members appointed by the Region C Regional Water Planning Group; and

(2) three members appointed by the Region D Regional Water Planning Group.

(b) A member of the study commission may be, but is not required to be, a voting member of the regional water planning group that appointed the member.

(c) The members of the study commission shall select a presiding officer from among the members.

(d) Members of the study commission are not entitled to compensation for service on the study commission but may be reimbursed for travel expenses incurred while conducting the business of the study commission, as provided for in the General Appropriations Act.

(e) The study commission shall:

(1) review the water supply alternatives available to the Region C Regional Water Planning Area, including obtaining additional water supply from Wright Patman Lake, Toledo Bend Reservoir, Lake Texoma, Lake O' the Pines, other existing and proposed reservoirs, and groundwater;

(2) in connection with the review under Subdivision (1) of this subsection, analyze the socioeconomic effect on the area where the water supply is located that would result from the use of the water to meet the water needs of the Region C Regional Water Planning Area, including:

(A) the effects on landowners, agricultural and natural resources, businesses, industries, and taxing entities of different water management strategies; and

(B) in connection with the use by the Region C Regional Water Planning Area of water from Wright Patman Lake, the effect on water availability in that lake and the effect on industries relying on that water availability;

(3) determine whether water demand in the Region C Regional Water Planning Area may be reduced through additional conservation and reuse measures so as to postpone the need for additional water supplies;

(4) evaluate measures that would need to be taken to comply with the mitigation requirements of the United States Army Corps of Engineers in connection with any proposed new reservoirs, including identifying potential mitigation sites;

(5) consider whether the mitigation burden described by Subdivision (4) of this subsection may be shared by the Regions C and D Regional Water Planning Areas in proportion to the allocation to each region of water in any proposed reservoir;

(6) review innovative methods of compensation to affected property owners, including royalties for water stored on acquired properties and annual payments to landowners for

properties acquired for the construction of a reservoir to satisfy future water management strategies;

(7) evaluate the minimum number of surface acres required for the construction of proposed reservoirs in order to develop adequate water supply; and

(8) identify the locations of proposed reservoir sites and proposed mitigation sites, as applicable, as selected in accordance with existing state and federal law, in the Regions C and D Regional Water Planning Areas using satellite imagery with sufficient resolution to permit land ownership to be determined.

(f) The study commission may not be assisted by any person that is a party to or is employed by a party to a contract to perform engineering work with respect to site selection, permitting, design, or construction of the proposed Marvin Nichols reservoir.

(g) The Texas Water Development Board, on request of the study commission, may provide staff support or other assistance necessary to enable the study commission to carry out its duties. The Texas Water Development Board shall provide funding for the study commission, including funding of any studies conducted by the study commission, from the regional planning budget of the board.

(h) Not later than December 1, 2010, the study commission shall deliver a report to the governor, lieutenant governor, and speaker of the house of representatives that includes:

(1) any studies completed by the study commission;

(2) any legislation proposed by the study commission;

(3) a recommendation as to whether Marvin Nichols should remain a designated reservoir site; and

(4) other findings and recommendations of the study commission.

(i) The study commission is abolished and this section expires December 31, 2011.

SECTION 4.05. EFFECTIVE DATE. This article takes effect immediately if this Act receives a vote of two-thirds of all the members elected to each house, as provided by Section 39, Article III, Texas Constitution. If this Act does not receive the vote necessary for immediate effect, this article takes effect September 1, 2007.

ARTICLE 5. LEGISLATIVE JOINT INTERIM COMMITTEE

SECTION 5.01. (a) In this section, "committee" means the joint interim committee on state water funding.

(b) The committee is composed of eight members as follows:

(1) the chair of the Senate Committee on Natural Resources and the chair of the House Committee on Natural Resources who shall serve as joint chairs of the committee;

(2) three members of the senate appointed by the lieutenant governor; and

(3) three members of the house of representatives appointed by the speaker of the house of representatives.

(c) An appointed member of the committee serves at the pleasure of the appointing official.

(d) The committee shall meet at least annually with the executive director of the Texas Commission on Environmental Quality and the executive administrator of the Texas Water Development Board to:

(1) receive information on water infrastructure needs as identified in the state water plan;

(2) receive information on infrastructure cost and funding options to be used by local entities to meet the needs identified in the state water plan;

(3) receive analyses of the funding gap and recommendations on how to address those funding needs;

(4) receive information on whether all water fees assessed are sufficient to support the required regulatory water-related state program functions and activities; and

(5) identify viable, sustainable, dedicated revenues and fee sources, or increases to existing revenue and fees, to support state water programs and to provide for natural resources data collection and dissemination, financial assistance programs, and water resources planning, including funding to implement water management strategies in the state water plan.

(e) The committee may hold hearings and may request reports and other information from state agencies as necessary to carry out this section.

(f) The Senate Committee on Natural Resources and the House Committee on Natural Resources shall provide staff necessary for the committee to fulfill its duties.

(g) Not later than December 1, 2008, the committee shall report to the governor, the lieutenant governor, and the speaker of the house of representatives on the committee's activities under Subsection (d) of this section. The report shall include recommendations of any legislative action necessary to address

funding needs to support the state's water programs and water infrastructure needs.

ARTICLE 6. WATER DEVELOPMENT BOARD

SECTION 6.01. Section 16.344, Water Code, is amended by adding Subsections (d) through (i) to read as follows:

(d) Notwithstanding Section 16.343(g) or Section 16.350(a), a political subdivision may temporarily continue to receive funds under Subchapter K, Chapter 17, if the political subdivision submits a request for temporary continuation of funding and the board determines that:

(1) the political subdivision's initial funding application and any amendments for a designated area were reviewed and approved by the board before January 1, 2007;

(2) withholding funds would result in an undue hardship for occupants of the property to be served by unreasonably delaying the provision of adequate water or wastewater services;

(3) withholding funds would result in inefficient use of local, state, or federal funds under the program;

(4) the political subdivision has committed to take the necessary and appropriate actions to correct any deficiencies in adoption or enforcement of the model rules within the time designated by the board, but not later than the 90th day after the date the board makes the determinations under this subsection;

(5) the political subdivision has sufficient safeguards in place to prevent the proliferation of colonias; and

(6) during the 30 days after the date the board receives a request under this subsection, the board, after

consulting with the attorney general, secretary of state, and commission, has not received an objection from any of those entities to the request for temporary continuation of funding.

(e) In applying Subsection (d) to applications for increased financial assistance, the board shall only consider areas that were included in the initial application, except that the board may reconsider the eligibility of areas that were the subject of a facility plan in the initial application and that may be determined to be eligible based on criteria in effect September 1, 2005.

(f) The political subdivision shall take necessary and appropriate actions to correct any deficiencies in its adoption and enforcement of the model rules within the time period required by the board, not to exceed the 90-day period described by Subsection (d)(4), and provide evidence of compliance to the board. The board shall discontinue funding unless the board makes a determination based on the evidence provided that the political subdivision has demonstrated sufficient compliance to continue funding.

(g) Except as provided by Subsections (d)-(f), if the board determines that a county or city that is required to adopt and enforce the model rules is not enforcing the model rules, the board shall discontinue funding for all projects within the county or city that are funded under Subchapter K, Chapter 17.

(h) The board may not accept or grant applications for temporary funding under Subsection (d) after June 1, 2009.

(i) Subsections (d), (e), (f), (g), and (h) and this subsection expire September 1, 2009.

ARTICLE 7. RATE CLASSES FOR BILLING

SECTION 7.01. Subchapter H, Chapter 49, Water Code, is amended by adding Section 49.2122 to read as follows:

Sec. 49.2122. ESTABLISHMENT OF CUSTOMER CLASSES. (a) Notwithstanding any other law, a district may establish different charges, fees, rentals, or deposits among classes of customers that are based on any factor the district considers appropriate, including:

(1) the similarity of the type of customer to other customers in the class, including:

(A) residential;

(B) commercial;

(C) industrial;

(D) apartment;

(E) rental housing;

(F) irrigation;

(G) homeowner associations;

(H) builder;

(I) out-of-district;

(J) nonprofit organization; and

(K) any other type of customer as determined by the district;

(2) the type of services provided to the customer class;

(3) the cost of facilities, operations, and administrative services to provide service to a particular class of customer, including additional costs to the district for security,

recreational facilities, or fire protection paid from other revenues; and

(4) the total revenues, including ad valorem tax revenues and connection fees, received by the district from a class of customers relative to the cost of service to the class of customers.

(b) A district is presumed to have weighed and considered appropriate factors and to have properly established charges, fees, rentals, and deposits absent a showing that the district acted arbitrarily and capriciously.

ARTICLE 8. STUDY OF ROLE OF LAKE SOMERVILLE IN ECONOMIC DEVELOPMENT

SECTION 8.01. The legislature finds that:

(1) in 1954, the United States Congress authorized the construction of Lake Somerville to provide flood control, water conservation, and other beneficial uses for nearby areas; subsequently, the United States Army Corps of Engineers began reservoir construction in 1962 and began to impound water in 1967;

(2) straddling the borders of Burleson, Washington, and Lee Counties, on Yegua Creek 20 river miles upstream from that creek's confluence with the Brazos River, the lake has a storage capacity of 337,700 acre-feet;

(3) operation of the lake is supervised by the Fort Worth District of the United States Army Corps of Engineers; the lake is one of nine federal reservoirs that are integrated into the Brazos River Authority's basin-wide system and associated water resource development master plan;

(4) the Brazos River Authority owns the stored water,

a source from which it furnishes supplies to the City of Brenham according to a contract that was last renewed for a 10-year period in 2003;

(5) also significantly involved in the region is the Lower Colorado River Authority, which, from its diverse mix of power plants, provides wholesale electricity to various communities as well as offering them its economic research and expertise;

(6) although Lake Somerville has long been a tourist destination for fishing and other water recreation, the facility has not fully effectuated the three-county economic impact that originally was expected at the time that it was built; and

(7) a study of Lake Somerville's role in economic development would assist in explaining why the lake has not yet had that impact, beyond the tourism industry, and would help to identify impediments that currently restrict its contribution as well as strategies that would better maximize its economic potential.

SECTION 8.02. The Brazos River Authority and the Lower Colorado River Authority shall:

(1) conduct, with appropriate input from the public and private sectors, a joint baseline study of the role of Lake Somerville in the economic development of the surrounding vicinity; and

(2) jointly submit a full report of their findings and recommendations to the 81st Legislature when that legislature convenes in January 2009.

ARTICLE 9. AGUA SPECIAL UTILITY DISTRICT

SECTION 9.01. The heading to Chapter 7201, Special District Local Laws Code, is amended to read as follows:

CHAPTER 7201. AGUA [~~LA JOYA~~] SPECIAL UTILITY DISTRICT

SECTION 9.02. Section 7201.001, Special District Local Laws Code, is amended by amending Subdivision (3) and adding Subdivision (4) to read as follows:

(3) "Director" means a member of the board.

(4) "District" means the Agua [~~La Joya~~] Special Utility District.

SECTION 9.03. Subsection (c), Section 7201.002, Special District Local Laws Code, is amended to read as follows:

(c) The [~~On the effective date of the Act enacting this chapter, the~~] corporation shall be dissolved and succeeded without interruption by the district as provided by Subchapter A1.

SECTION 9.04. Section 7201.005, Special District Local Laws Code, is amended by amending Subsections (a) and (b) and adding Subsection (d) to read as follows:

(a) The [~~boundaries of the corporation and initial boundaries of the~~] district is composed of the territory described by Section 9.12 of the Act enacted by the 80th Legislature, Regular Session, 2007, amending this subsection [~~are coextensive with the service areas covered by Certificates of Convenience and Necessity Nos. 10559 and 20785, as recorded on the Texas Commission on Environmental Quality maps associated with those certificates. Those maps are incorporated in this section by reference~~].

(b) The boundaries and field notes contained in Section 9.12

of the Act enacted by the 80th Legislature, Regular Session, 2007, amending this subsection form a closure. A mistake made in the field notes or in copying the field notes in the legislative process [~~preparation, copying, or filing of the maps described by Subsection (a) and on file with the Texas Commission on Environmental Quality~~] does not affect:

(1) the organization, existence, or validity of the district;

(2) the right of the district to issue bonds; or

(3) the legality or operation of the district.

(d) The territory of the district does not include and the district does not have jurisdiction over land that has never been in the service area of the corporation regardless of any erroneous inclusion of that land in the boundaries and field notes in Section 9.12 of the Act enacted by the 80th Legislature, Regular Session, 2007, amending this section.

SECTION 9.05. Section 7201.021, Special District Local Laws Code, is amended by amending Subsections (a), (b), and (d) and adding Subsection (f) to read as follows:

(a) Except as provided by this subsection, after the appointment of initial directors under Section 7201.051, the receiver for the corporation [~~On the effective date of the Act enacting this chapter, the corporation~~] shall transfer the assets, debts, and contractual rights and obligations of the corporation, including all legal claims against the corporation in effect on the date of the transfer, to the district and provide notices and make recordings of the transfer required by the Water Code and general

law. If the transfer of any debt requires the permission of the lender, the receiver shall initiate proceedings to obtain that permission.

(b) In accordance with the orders of the receivership court and not [~~Not~~] later than the 30th day after the date of the transfer under Subsection (a), the receiver for [~~board of directors of~~] the corporation shall commence dissolution proceedings of the corporation.

(d) The receiver for [~~board of directors of~~] the corporation shall notify the Texas Commission on Environmental Quality of the dissolution of the corporation and its succession in interest by [~~the creation of~~] the district in order [~~to replace it~~] to effect the transfer of Certificates of Convenience and Necessity Nos. 10559 and 20785 to the district.

(f) After the Texas Commission on Environmental Quality takes the action required by Subsection (e), the court shall terminate the receivership.

SECTION 9.06. Section 7201.022, Special District Local Laws Code, is amended to read as follows:

Sec. 7201.022. EXPIRATION OF SUBCHAPTER. This subchapter expires September 1, 2012 [~~2008~~].

SECTION 9.07. Section 7201.051, Special District Local Laws Code, is amended to read as follows:

Sec. 7201.051. APPOINTMENT OF INITIAL [~~TEMPORARY~~] DIRECTORS. (a) As soon as practicable after the effective date of the Act enacted by the 80th Legislature, Regular Session, 2007, amending this section, seven initial directors shall be appointed

as provided by this section [~~The directors of the corporation who hold office on the effective date of the Act enacting this chapter shall serve as the temporary directors of the district until successor directors are elected and qualify for office~~].

(b) To be eligible to be appointed as an initial director, an individual must meet the same requirements as a candidate for an elected position as director under Section 7201.052. The initial directors shall be appointed as follows:

(1) one director to represent the residents of the district in the City of Mission appointed by the governing body of that city;

(2) one director to represent the residents of the district in the City of Palmview appointed by the governing body of that city;

(3) one director to represent the residents of the district in the City of Penitas appointed by the governing body of that city;

(4) one director to represent the residents of the district in the City of Sullivan City appointed by the governing body of that city; and

(5) three directors to represent the residents of the district outside the municipalities listed in Subdivisions (1)-(4) appointed by the Hidalgo County Commissioners Court [~~The temporary directors of the district are assigned position numbers as follows:~~

[~~(1) Position 1, Jose Luis Trigo;~~

[~~(2) Position 2, Jose Guadalupe Reyna;~~

[~~(3) Position 3, George Barreiro;~~

[~~(4) Position 4, Frolian Ramirez;~~

[~~(5) Position 5, Russell Wicker;~~

[~~(6) Position 6, Benito Salinas;~~

[~~(7) Position 7, Manuel Ricardo Garcia;~~

[~~(8) Position 8, Valente Alaniz, Jr.; and~~

[~~(9) Position 9, Juan Lino Garza~~].

(c) An initial director serves a term that expires on June 1 of the year in which the director's successor is elected under Section 7201.052 [~~If there is a vacancy on the temporary board of directors of the district, the temporary board shall appoint a person to fill the vacancy for the remainder of the term for the vacated position until the applicable election under Section 7201.052~~].

SECTION 9.08. Subchapter B, Chapter 7201, Special District Local Laws Code, is amended by adding Sections 7201.0512 and 7201.0513 to read as follows:

Sec. 7201.0512. INITIAL BOARD TRAINING. (a) Not later than the 60th day after the first date on which all of the initial directors have been appointed, each initial director shall complete at least 12 hours of training on district management and compliance with laws applicable to the district as determined by the receiver for the corporation.

(b) The district shall reimburse an initial director for the reasonable expenses incurred by the director in attending the training.

Sec. 7201.0513. EDUCATION PROGRAM. (a) Before the first election of directors under Section 7201.052, the initial board

shall establish a program of education for directors that includes information on:

(1) the history of the district;

(2) the district's enabling legislation;

(3) Chapters 49 and 65, Water Code, and other laws that apply to the district, including the requirements of the:

(A) open meetings law, Chapter 551, Government Code; and

(B) public information law, Chapter 552, Government Code;

(4) relevant legal developments related to water district governance;

(5) the duties and responsibilities of the board;

(6) the requirements of conflict of interest laws and other laws relating to public officials; and

(7) any applicable ethics policies adopted by the Texas Commission on Environmental Quality or the Texas Ethics Commission.

(b) The district shall pay any costs associated with the development of the education program from district revenue.

(c) The education program may include training provided by an organization offering courses that have been approved by the Texas Commission on Environmental Quality.

(d) The board may adopt bylaws modifying the education program as necessary to meet district needs.

SECTION 9.09. Section 7201.052, Special District Local Laws Code, is amended to read as follows:

Sec. 7201.052. BOARD OF DIRECTORS. (a) Except as provided by Subsection (l), the [~~The~~] district shall be governed by a board of seven [~~not fewer than nine and not more than 11~~] directors, elected as follows:

(1) one director elected by the voters of the part of the City of Mission inside the district to represent that part of the city;

(2) one director elected by the voters of the City of Palmview to represent that city;

(3) one director elected by the voters of the City of Penitas to represent that city;

(4) one director elected by the voters of the City of Sullivan City to represent that city; and

(5) three directors elected at-large to numbered positions on the board by the district voters who do not reside in any of the municipalities listed in Subdivisions (1)-(4) to represent the part of the district that is not included in those municipalities, unless the number of at-large directors is increased under Subsection (l) [~~in accordance with Section 49.103, Water Code, notwithstanding Subsection (f)(2) of that section~~].

(b) A [~~Except for a temporary director under Section 7201.051, a~~] candidate for one of the numbered [~~a position as~~] director positions:

(1) [~~is elected at large to represent the entire service area of the district;~~

[~~(2)~~] must reside in the part of the service area of the district that is not included in any of the municipalities

listed in Subsections (a)(1)-(4); and

(2) [~~(3)~~] must be eligible to hold office under Section 141.001, Election Code.

(c) A candidate for one of the director positions representing a municipality listed in Subsection (a)(1), (2), (3), or (4):

(1) must reside in the municipality the candidate seeks to represent; and

(2) must be eligible to hold office under Section 141.001, Election Code.

(d) It is the policy of the district that the directors shall represent and reside in as broad a cross-section of the geographic area of the district as possible.

(e) [~~(d)~~] The district shall fill a vacancy on the board in accordance with Section 49.105, Water Code.

(f) [~~(e)~~] Except for the initial [~~temporary~~] directors appointed [~~listed~~] under Section 7201.051 or elected at the first election under Subsection (g), directors serve staggered terms of four [~~three~~] years.

(g) [~~(f)~~] On the uniform election date in May 2008, or in May 2010, if the election is postponed under Subsection (h), the district shall hold an election to elect seven directors. On the [~~2006, and on that~~] uniform election date in May of each even-numbered [~~every third~~] year after that date, the district shall hold an election to elect the appropriate number of [~~three~~] directors [~~to serve in positions 1, 4, and 7~~].

(h) The initial board by order may postpone until the

uniform election date in May 2010 the first election for directors under Subsection (g) if the initial board determines that there is not sufficient time to comply with the requirements of law and to order the election of directors to be held on the first uniform election date specified by that subsection.

(i) The directors elected at the first election under Subsection (g) shall cast lots to determine which three directors shall serve terms expiring June 1 of the first even-numbered year after the year in which the directors are elected and which four directors shall serve terms expiring June 1 of the second even-numbered year after the year in which the directors are elected.

(j) A director may not serve consecutive terms.

(k) A person who has served as a member of the board of directors of the corporation is not eligible to serve as a district director.

(l) If, before the expiration of the term of a director elected to represent a municipality under Subsection (a)(1), (2), (3), or (4), the district determines that all of the incorporated territory of the municipality is outside the boundaries of the district, the position immediately becomes an at-large numbered position to be filled at the next general election of the district in accordance with Subsections (a)(5) and (b) [~~(g) On the uniform election date in May 2007, and on that uniform election date every third year after that date, the district shall hold an election to elect three directors to serve in positions 2, 3, and 5.~~

[~~(h) On the uniform election date in May 2008, and on that~~

~~uniform election date every third year after that date, the district shall hold an election to elect three directors to serve in positions 6, 8, and 9~~].

SECTION 9.10. Subchapter B, Chapter 7201, Special District Local Laws Code, is amended by adding Sections 7201.053 and 7201.054 to read as follows:

Sec. 7201.053. DISTRICT TREASURER. (a) The board shall elect from among its members one director to serve as district treasurer.

(b) The district treasurer shall comply with the training requirements provided by Section 49.1571, Water Code, for an investment officer of a district.

Sec. 7201.054. EDUCATION FOR DIRECTORS. (a) Except for an initial director whose term expires in 2008, each director shall complete the education program established under Section 7201.0513 before the first anniversary of the date on which the director was appointed or elected.

(b) The district shall reimburse a director for the reasonable expenses incurred by the director in attending the education program.

(c) A director who is elected to serve a subsequent term shall fulfill the education requirements specified by district bylaws.

SECTION 9.11. Section 7201.206, Special District Local Laws Code, is amended to read as follows:

Sec. 7201.206. RATES AND FEES FOR SERVICES. (a) The district, in connection with water or sewer retail public utility

services, shall establish lifeline, senior citizen, or minimum consumption level rates for services. The rate impact of such services shall be allocated on the basis of costs of services to achieve conservation principles, while securing necessary reserves for the payment of operating expenses, sinking funds, principal, interest, and debt coverage factors, and any other objective established by the district's annual budget.

(b) Chapter 395, Local Government Code, does not apply to any fee, charge, or assessment that, before the corporation's dissolution and conversion to a district, is adopted by the receiver for the purpose of generating revenue to fund or recoup the costs of capital improvements or facility expansions necessitated by and attributable to new developments.

(c) Notwithstanding Subsection (b), beginning on December 31, 2009, the district may not impose any fee, charge, or assessment that, before the corporation's dissolution and conversion to a district, is adopted by the receiver for the purpose of generating revenue to fund or recoup the costs of capital improvements or facility expansions necessitated by and attributable to new developments unless the district readopts the fee, charge, or assessment or adopts a new fee, charge, or assessment in accordance with Chapter 395, Local Government Code. This subsection does not apply to a retail water or sewer rate adopted by the receiver or the district.

SECTION 9.12. (a) Except for the areas excluded under Subsection (b) of this section, the boundaries of the Agua Special Utility District are as follows:

Beginning at a point in the centerline of FM 495 (Mile 1 Road) a distance of approximately .18 miles west of the intersection of FM 495 and Inspiration Road.

Thence due north approximately 1.0 miles to a point approximately 166 feet south of the centerline of Mile 2 Road and approximately .18 miles west of the intersection of Mile 2 Road and Inspiration Road

Thence follow west along a straight westerly line approximately 180 feet south of Mile 2 Road approximately .51 miles to a point in the centerline of Schubach Road.

Following westerly in a straight line approximately .78 miles to the centerline of Bentsen Palm Drive.

From the point at the centerline of Bentsen Palm Road continue westerly approximately .78 miles to a point at 26 15 00 latitude and -98 22 10 longitude.

Turn right and due north and follow approximately 7.0 miles in a northerly direction .10 miles west and parallel to Bentsen Palm Drive to a point at 226 21 04 latitude and -98 21 06 longitude.

Turn left and follow westerly along a straight line a distance of approximately 1.66 miles to the intersection of Abram Road and 9 Mile Road.

Follow along the centerline of 9 Mile Road westerly approximately 1.65 miles to its intersection with Iowa Avenue. (Latitude: 26 21 31, Longitude: -98 24 16)

Continue westerly along a straight line from latitude 26 21 31, longitude -98 24 16 approximately 3.79 miles to the center line of FM 2221 (Jara Chinas Road)

Thence due south along FM 2221 (Jara Chinas Road) approximate distance of 8.02 Miles to a point approximately .75 miles north of the Intersection of Expressway 83 and FM 2221(Jara Chinas Road)

Thence at a distance of approximately .75 miles north of the centerline of Expressway 83 due west to northwest approximately 4 miles following along the same contour as Expressway 83 to the centerline of El Faro Road from a point .62 miles east of the intersection of El Faro Road and Expressway 83.

Turn right and follow due north down the centerline of El Faro Road until its end and continue northerly for a total of approximately 2.79 miles to a point at latitude 26 19 13 and longitude -98 32 40.

Turn left and follow northwesterly in a straight line along the east side of 16 Mile Road (Starr County) approximately 1.87 miles to a point located at 26 19 30 latitude and -98 34 27 longitude.

Turn right and follow northeasterly in a straight line approximately 1.02 miles to a point located at 26 20 22 latitude and -98 34 17 longitude.

Turn right and follow southeasterly in a straight line approximately 1.26 miles to a point located at 26 20 22 latitude and -98 33 05 longitude.

Turn right and follow northeasterly in a straight line along the west side of County Line Road (Starr County) approximately .61 miles to a point located at 26 20 43 latitude and -98 32 60 longitude.

Turn left and follow northwesterly in a straight line approximately 1.26 miles to a point located at 26 20 53 latitude and -98 34 12 longitude.

Turn right and follow northeasterly in a straight line along the east side of 16 Mile Road (Starr County) approximately 1.32 miles to a point located at 26 22 02 latitude and -98 33 59 longitude.

Turn left and follow northwesterly in a straight line approximately .55 miles to a point located at 26 22 07 latitude and -98 34 30 longitude.

Turn left and follow southwesterly in a straight line approximately 6.17 miles to a point located at 26 16 48 latitude and -98 35 29 longitude.

Turn left and follow southeasterly in a straight line approximately .91 miles to a point located at 26 16 30 latitude and -98 34 40 longitude, near the Hidalgo-Starr County line.

Turn right and follow southwesterly along the Hidalgo-Starr County line approximately 1.28 miles to its intersection with the Rio Grande River (U.S. side).

Thence due south approximately 7.77 miles to the northern winding banks (U.S. side) of the Rio Grande River

Thence east along the northern winding banks (US side) of the Rio Grande River approximately 22 miles to a point approximately 1.16 miles south of Greene Road

Thence from that center line on Bentsen Park Road approximately .82 miles east northeast to the centerline of Breyfogle/Shuerbach Road

Turn left and follow westerly in a straight line approximately .56 miles to a point located 26 11 20 latitude and -98 22 30 longitude.

Turn left and follow southerly in a straight line approximately .50 miles to the centerline of Miltary Road.

Turn right and follow northerly and then northwesterly along the north side of Military Road approximately .36 miles to its intersection with Farm-to-Market Road 2062.

Turn left and follow southerly along Farm-to-Market Road 2062 approximately .16 miles to a point located at 26 11 02 latitude and -98 22 46 longitude.

Turn right and follow northerly, westerly, southerly, southwesterly, northerly, westerly and then southwesterly for approximately 1.27 miles to a point located at 26 11 11 latitude and -98 23 38 longitude running just north of Park Road 43.

Turn right and follow northeasterly along a straight line for approximately .71 miles to the north side of Military Road.

Turn left and follow along westerly approximately .44 miles along the north side of Military Road to its intersection with Goodwin Road.

Turn right and follow northerly along the centerline of Goodwin Road approximately .33 miles to a point located at 26 12 07 latitude and -98 23 53 longitude.

Turn right and follow easterly, northerly, easterly and then southeasterly approximately .78 miles to the intersection with Green Road.

Turn left and follow northerly along the centerline of Green

Road approximately .32 miles.

Turn right and follow easterly and then southwesterly approximately 1.16 miles to the north side of Military Road at points 26 11 42 latitude and -98 23 16 longitude.

Turn left and follow southeasterly along the north side of Military Road approximately 0.07 miles to a point located at 26 11 40 latitude and -98 23 13 longitude.

Turn left and follow northeasterly, northerly, northeasterly, northerly, northeasterly, easterly, southerly and then easterly approximately 2.04 miles to the centerline of Shuebach Road/Airfield Road

Turn left and follow northeasterly along the centerline of Airfield Road approximately 1.48 miles to its intersection with U.S. Highway 83 Business.

Turn right and follow easterly along the centerline of U.S. Highway 83 Business approximately .27 miles to its intersection with Moorefield Road.

Turn left and follow northerly along the centerline of Moorefield Road approximately .32 miles to a point located at 26 13 23 latitude and -98 21 21 longitude.

Make a slight right and follow northeasterly and then northerly along the west banks of the Edinburg Main Canal approximately .66 miles to that point on the centerline of FM 495 the beginning (Mile 1 Road) a distance of approximately .18 miles west of the intersection of FM 495 and Inspiration Road to Close.

(b) The territory of the Agua Special Utility District does not include the area within the city limits of La Joya, Texas, as it

existed on January 1, 1991; the area within the Certificate of Convenience and Necessity of Hidalgo County Municipal Utility District No. 1 as reflected on the records of the Texas Commission on Environmental Quality as of January 1, 2007; and the area within the following boundary lines, which lie wholly within the district:

Beginning at a point located at 26 14 57 Latitude and -98 25 55 Longitude follow in a northwesterly direction along an unnamed creek approximately .23 Miles to a point located at 26 15 03 Latitude and -98 26 05 Longitude.

From the point located at 26 15 03 Latitude and -98 26 05 Longitude follow in a westerly direction along an unnamed creek approximately .24 Miles to a point located at 26 15 04 Latitude and -98 26 19 Longitude.

From the point located at 26 15 04 Latitude and -98 26 19 Longitude turn right and follow in a straight line northeasterly approximately .97 Miles to a point located at 26 15 54 Latitude and -98 26 09 Longitude.

From the point located at 26 15 54 Latitude and -98 26 09 Longitude turn right and follow in a straight line easterly-southeasterly approximately .43 Miles to a point located at 26 15 50 Latitude and -98 25 45 Longitude.

From a point located at 26 15 50 Latitude and -98 25 45 Longitude turn right and follow in a straight line southwesterly approximately 1.03 Miles to a point located at 26 14 57 Latitude and -98 25 55 Longitude and Place of Beginning.

SECTION 9.13. Initial directors of the board of the Agua Special Utility District shall be appointed in accordance with

Section 7201.051, Special District Local Laws Code, as amended by this Act, as soon as practicable after the effective date of this Act.

SECTION 9.14. Except as otherwise provided by Chapter 7201, Special District Local Laws Code, as amended by this Act, the Agua Special Utility District is subject to:

(1) any judicial or administrative order imposing an injunction against the La Joya Water Supply Corporation that is in effect on the date of the transfer under Section 7201.021, Special District Local Laws Code, as amended by this Act; or

(2) any judicial or administrative order imposing liability for monetary damages or a civil or administrative penalty against the La Joya Water Supply Corporation that:

(A) results from a legal proceeding that is pending on the date of the transfer under Section 7201.021, Special District Local Laws Code, as amended by this Act; or

(B) is unsatisfied on the date of the transfer under Section 7201.021, Special District Local Laws Code, as amended by this Act.

SECTION 9.15. (a) The legal notice of the intention to introduce the article of this Act that amends Chapter 7201, Special District Local Laws Code, setting forth the general substance of the article, has been published as provided by law, and the notice and a copy of the article have been furnished to all persons, agencies, officials, or entities to which they are required to be furnished under Section 59, Article XVI, Texas Constitution, and Chapter 313, Government Code.

(b) The governor has submitted the notice and article to the Texas Commission on Environmental Quality.

(c) The Texas Commission on Environmental Quality has filed its recommendations relating to this article with the governor, lieutenant governor, and speaker of the house of representatives within the required time.

(d) All requirements of the constitution and laws of this state and the rules and procedures of the legislature with respect to the notice, introduction, and passage of this article are fulfilled and accomplished.

SECTION 9.16. This article takes effect immediately if this Act receives a vote of two-thirds of all the members elected to each house, as provided by Section 39, Article III, Texas Constitution. If this Act does not receive the vote necessary for immediate effect, this article takes effect September 1, 2007.

ARTICLE 10. TRUE RANCH MUNICIPAL UTILITY DISTRICT NO. 1

SECTION 10.01. Subtitle F, Title 6, Special District Local Laws Code, is amended by adding Chapter 8269 to read as follows:

CHAPTER 8269. TRUE RANCH MUNICIPAL UTILITY DISTRICT NO. 1

SUBCHAPTER A. GENERAL PROVISIONS

Sec. 8269.001. DEFINITIONS. In this chapter:

(1) "Board" means the board of directors of the district.

(2) "Director" means a board member.

(3) "District" means the True Ranch Municipal Utility District No. 1.

Sec. 8269.002. NATURE OF DISTRICT. The district is a

municipal utility district in Hays County created under and essential to accomplish the purposes of Section 59, Article XVI, Texas Constitution.

Sec. 8269.003. CONFIRMATION ELECTION REQUIRED. If the creation of the district is not confirmed at a confirmation election held under Section 8269.023 before September 1, 2012:

(1) the district is dissolved September 1, 2012, except that:

(A) any debts incurred shall be paid;

(B) any assets that remain after the payment of debts shall be transferred to Hays County; and

(C) the organization of the district shall be maintained until all debts are paid and remaining assets are transferred; and

(2) this chapter expires September 1, 2015.

Sec. 8269.004. FINDINGS OF BENEFIT AND PUBLIC PURPOSE. (a) All land and other property in the district will benefit from the works and projects to be accomplished by the district under powers conferred by Section 59, Article XVI, Texas Constitution.

(b) The district is created to serve a public use and benefit.

Sec. 8269.005. INITIAL DISTRICT TERRITORY. (a) The district is initially composed of the territory described by Section 10.02 of the Act creating this chapter.

(b) The boundaries and field notes contained in Section 10.02 of the Act creating this chapter form a closure. A mistake made in the field notes or in copying the field notes in the

legislative process does not affect:

(1) the organization, existence, or validity of the district;

(2) the right of the district to impose taxes;

(3) the right of the district to issue bonds, notes, or other indebtedness or to pay the principal of and interest on a bond;

(4) the validity of the district's bonds, notes, or other indebtedness; or

(5) the legality or operation of the district or the board.

[Sections 8269.006-8269.020 reserved for expansion]

SUBCHAPTER A-1. TEMPORARY PROVISIONS

Sec. 8269.021. TEMPORARY DIRECTORS. (a) On or after September 1, 2007, a person who owns land in the district may submit a petition to the Texas Commission on Environmental Quality requesting that the commission appoint as temporary directors the five persons named in the petition.

(b) The commission shall appoint as temporary directors the five persons named in the first petition received by the commission under Subsection (a).

(c) If a temporary director fails to qualify for office or if a vacancy occurs in the office of temporary director, the vacancy shall be filled as provided by Section 49.105, Water Code.

(d) Temporary directors serve until the earlier of:

(1) the date directors are elected under Section 8269.023; or

(2) the date this chapter expires under Section 8269.003.

Sec. 8269.022. ORGANIZATIONAL MEETING OF TEMPORARY DIRECTORS. As soon as practicable after all the temporary directors have qualified under Section 49.055, Water Code, the directors shall meet at a location in the district agreeable to a majority of the directors. If a location cannot be agreed upon, the meeting shall be at the Hays County Courthouse. At the meeting, the temporary directors shall elect officers from among the temporary directors and conduct any other district business.

Sec. 8269.023. CONFIRMATION AND INITIAL DIRECTORS' ELECTION. (a) The temporary directors shall hold an election to confirm the creation of the district and to elect five directors as provided by Section 49.102, Water Code.

(b) Section 41.001(a), Election Code, does not apply to a confirmation and initial directors' election held under this section.

Sec. 8269.024. INITIAL ELECTED DIRECTORS; TERMS. The directors elected under Section 8269.023 shall draw lots to determine which two serve until the first regularly scheduled election of directors under Section 8269.052 and which three shall serve until the second regularly scheduled election of directors.

Sec. 8269.025. DATE OF FIRST REGULARLY SCHEDULED ELECTION OF DIRECTORS. The board by order may postpone the first election under Section 8269.052 following the confirmation and initial directors' election held under Section 8269.023 if:

(1) the election would otherwise occur not later than

the 60th day after the date on which the confirmation election is held; or

(2) the board determines that there is not sufficient time to comply with the requirements of law and to order the election.

Sec. 8269.026. EXPIRATION OF SUBCHAPTER. This subchapter expires September 1, 2015.

[Sections 8269.027-8269.050 reserved for expansion]

SUBCHAPTER B. BOARD OF DIRECTORS

Sec. 8269.051. DIRECTORS; TERMS. (a) The district is governed by a board of five directors.

(b) Directors serve staggered four-year terms.

Sec. 8269.052. ELECTION OF DIRECTORS. On the uniform election date in May of each even-numbered year, the appropriate number of directors shall be elected.

[Sections 8269.053-8269.100 reserved for expansion]

SUBCHAPTER C. POWERS AND DUTIES

Sec. 8269.101. GENERAL POWERS AND DUTIES. The district has the powers and duties necessary to accomplish the purposes for which the district is created.

Sec. 8269.102. MUNICIPAL UTILITY DISTRICT POWERS AND DUTIES. The district has the powers and duties provided by the general law of this state, including Chapters 49 and 54, Water Code, applicable to municipal utility districts created under Section 59, Article XVI, Texas Constitution.

Sec. 8269.103. ROAD PROJECTS. (a) To the extent authorized by Section 52, Article III, Texas Constitution, the

district may construct, acquire, improve, maintain, or operate arterials or main feeder roads or improvements in aid of those roads.

(b) A road project must meet all applicable construction standards, zoning and subdivision requirements, and regulatory ordinances of the municipality or county in whose jurisdiction the district is located.

Sec. 8269.104. COMPLIANCE WITH MUNICIPAL CONSENT ORDINANCES OR RESOLUTIONS. Subject to the limitations of Section 54.016, Water Code, the district shall comply with all valid and applicable requirements of any ordinance or resolution adopted by a municipality in the corporate limits or extraterritorial jurisdiction of which the district is located, including an ordinance or resolution adopted before September 1, 2007, that consents to the creation of the district or to the inclusion of lands within the district.

[Sections 8269.105-8269.150 reserved for expansion]

SUBCHAPTER D. GENERAL FINANCIAL PROVISIONS

Sec. 8269.151. ELECTIONS REGARDING TAXES OR BONDS. (a) Except as provided by Section 8269.201(b), the district may issue, without an election, bonds and other obligations secured by revenue or contract payments from any source other than ad valorem taxation.

(b) The district must hold an election in the manner provided by Chapters 49 and 54, Water Code, to obtain voter approval before the district may impose an operation and maintenance tax or issue bonds payable from ad valorem taxes.

Sec. 8269.152. OPERATION AND MAINTENANCE TAX. (a) If authorized at an election held under Section 8269.151, the district may impose an operation and maintenance tax on taxable property in the district in accordance with Section 49.107, Water Code.

(b) The board shall determine the tax rate. The rate may not exceed the rate approved at the election.

[Sections 8269.153-8269.200 reserved for expansion]

SUBCHAPTER E. BONDS AND OTHER OBLIGATIONS

Sec. 8269.201. AUTHORITY TO ISSUE BONDS AND OTHER OBLIGATIONS. (a) The district may issue bonds or other obligations payable wholly or partly from ad valorem taxes, impact fees, revenue, grants, or other district money, or any combination of those sources, to pay for any authorized district purpose.

(b) The district may not issue bonds to finance projects authorized by Section 8269.103 unless the issuance is approved by a vote of a two-thirds majority of the voters of the district voting at an election called for that purpose.

(c) Bonds or other obligations issued or incurred to finance projects authorized by Section 8269.103 may not exceed one-fourth of the assessed value of the real property in the district.

Sec. 8269.202. TAXES FOR BONDS. At the time bonds payable wholly or partly from ad valorem taxes are issued:

(1) the board shall impose a continuing direct annual ad valorem tax, without limit as to rate or amount, for each year that all or part of the bonds are outstanding; and

(2) the district annually shall impose an ad valorem tax on all taxable property in the district in an amount sufficient

to:

(A) pay the interest on the bonds as the interest becomes due;

(B) create a sinking fund for the payment of the principal of the bonds when due or the redemption price at any earlier required redemption date; and

(C) pay the expenses of imposing the taxes.

SECTION 10.02. The True Ranch Municipal Utility District No. 1 includes all the territory contained in the following area: BEING ALL THAT CERTAIN TRACT OR PARCEL OF LAND CONTAINING 465.71 ACRES, MORE OR LESS, OF LAND AREA IN THE JOHN INGRAIM SURVEY, ABSTRACT NO. 256, HAYS COUNTY, TEXAS, BEING A PORTION OF THAT TRACT DESCRIBED AS 1279.69 ACRES IN A DEED FROM LESLIE TRUE VESPER ET AL TO LESLIE TRUE VESPER DATED AUGUST 10, 1992 AND RECORDED IN VOLUME 948, PAGE 789 OF THE HAYS COUNTY OFFICIAL PUBLIC RECORDS, AND BEING MORE PARTICULARLY DESCRIBED BY METES AND BOUNDS AS FOLLOWS:

BEGINNING at a ½" iron rod found in the southwest line of R.M. Highway No. 2325 and that tract described as an 80' R.O.W. in a deed from Cecil H. Hale, et al to the State of Texas dated August 29, 1956 and recorded in Volume 169, Page 304 of the Hays County Deed Records for the most northerly northwest corner of the panhandle portion of this description and the Vesper 1279.69 acre tract and east corner of that tract described as 592.30 acres in a deed from Leslie True Vesper et al to Ameritrust Texas, N.A., Trustee dated August 10, 1992 and recorded in Volume 949, Page 572 of the Hays County Official Public Records, from which a TXDOT concrete monument found bears N 69°45'42" W 162.75 feet;

THENCE leaving the Ameritrust Texas 592.30 acre tract and the PLACE OF BEGINNING as shown on that plat numbered 24587-06-3-d dated May 30, 2006 prepared for Leslie Vesper by Byrn & Associates, Inc., of San Marcos, Texas with the common northeast line of the Vesper 1279.69 acre tract and southwest line of R.M. Highway No. 2325 and the State of Texas 80' R.O.W. tract S 69°48'34" E 599.94 feet to a ½" iron rod set for the northwest corner of that tract described as "Tract 1-1.00 acres" in a deed from Thomas W. Slaughter et ux to Randy C. Brown et ux dated February 12, 1996 and recorded in Volume 1206, Page 780 of the Hays County Official Public Records, from which A TXDOT concrete monument found bears S 69°47'57" E 120.11 feet;

THENCE leaving R.M. Highway No. 2325 and the State of Texas 80' R.O.W. tract with the common east line of the Vesper 1279.69 acre tract and west and south lines of the Brown 1.00 acre Tract 1 the following two courses:

1. S 20°06'33" W 226.56 feet to a 2.5" pipe fence corner post found for corner, and

S 69°41'58" E 234.42 feet to a 2" pipe fence corner post found in the west line of that tract described as "Tract 2-5.347 acres" in the previously mentioned deed to Randy C. Brown et ux for the southeast comer of the Brown 1.00 acre Tract 1;

THENCE leaving the Brown 1.00 acre Tract 1 and continuing with the common east line of the Vesper 1279.69 acre tract and west line of the Brown 5.347 acre Tract 2, as fenced and used, the following three courses:

S 00°10'12" E 410.74 feet to a ½" iron rod set at the

approximate centerline of an underground pipeline for angle point,

S 00°04'22" E 196.11 feet to a 2.5" pipe fence post found for angle point, and

S 00°24'09" E 15.83 feet to an iron rod found with an aluminum cap stamped "Pro-Tech Eng" at fence corner for the southwest corner of the Brown 5.347 acre Tract 2 and northwest corner of the remaining portion of that tract described as 187.78 acres in a deed from Henry Polvado & Lillie Polvado to Wesley Springs dated May 6, 1983 and recorded in Volume 393, Page 570 of the Hays County Deed Records (the Brown 5.347 acre Tract 2 being a portion of the Springs 187.78 acre tract);

THENCE leaving the Brown 5.347 acre Tract 2 and continuing with the east line of the Vesper 1279.69 acre tract and west line of the Springs 187.78 acre tract, as fenced and used, the following three courses:

S 00°00'57" E 1012.24 feet to a 2.5" pipe fence post found for angle point,

S 00°06'57" W 908.05 feet to a 4" pipe fence corner post found for angle point, and

S 00°03'12" E 354.80 feet to a 4" pipe fence corner post found for the southwest corner of the springs 187.78 acre tract and northwest corner of that tract described as 126.97 acres in a deed from Stanual W. Farris to the Stanual W. Farris Living Trust dated March 10, 2005 and recorded in Volume 2646, Page 385 of the Hays County Official Public Records;

THENCE leaving the Springs 187.78 acre tract and continuing with the common east line of the Vesper 1279.69 acre tract and west

line of Farris Living Trust 126.97 acre tract, as fenced and used, the following three courses:

S 00°12'25" W 952.36 feet to a 4" pipe fence post found for angle point,

S 00°09'57"W 1087.12 feet to a 4" cedar post found for angle point, and

S 00°22'11" W 1072.11 feet to a ½" iron rod found at fence corner for the southwest corner of the Farris Living Trust 126.97 acre tract and northwest corner of that tract described as 32.03 acres in a deed from Phil Harris to Shannon Harris dated April 8, 1998 and recorded in Volume 1463, Page 335 of the Hays County Official Public Records;

THENCE leaving the Farris Living Trust 126.97 acre tract and continuing with the common east line of the Vesper 1279.69 acre tract and west line of the Shannon Harris 32.03 acre tract, as fenced and used, S 00°44'10"W 120.44 feet to a 4" cedar fence corner post found for the southwest corner of the Shannon Harris 32.03 acre tract and northwest corner of that tract described as 28.92 acres in a deed from A.J. Farris et ux to Philip D. Farris dated July 18, 1991 and recorded in Volume 882, page 620 of the Hays County Official Public Records;

THENCE leaving the Shannon Harris 32.03 acre tract and continuing with the common east line of the Vesper 1279.69 acre tract and west line of the Philip D. Farris 28.92 acre tract, as fenced and used, S 00°24'02" W 279.19 feet to a ½" iron rod found at fence corner for the southeast corner of this description and northeast corner of that tract described as 52.30 acres in a deed

from Leslie True Vesper to Paul R. Eastup et ux dated June 5, 1996 and recorded in Volume 1240, Page 309 of the Hays County Official Public Records (the Eastup 52.30 acre tract being a portion of the Vesper 1279.69 acre tract);

THENCE leaving the Phillip D. Farris 28.92 acre tract and entering the Vesper 1279.69 acre tract with the north line of the Eastup 52.30 acre tract, N 87°10'57" W 1356.38 feet to a ½" iron rod found in fence for the northwest corner of the Eastup 52.03 acre tract and northeast corner of that tract described as 209.16 acres in a deed from Leslie True Vesper to James Nicholas Edwards and Lynn S. Edwards dated July 6, 2005 and recorded in Volume 2719, Page 740 of the Hays County Official Public Record (the Edwards 209.16 acre tract being a portion of the Vesper 1279.69 acre tract);

THENCE leaving the Eastup 52.30 acre tract with the north line of the Edwards 209.16 acre tract, as fenced and used, the following five courses:

N 87°19'31" W 665.61 feet to a 4" pipe fence post found for angle point,

N 86°58'45" W 535.67 feet to a 3" cedar fence post found for angle point,

N 87°09'05" W 302.22 feet to a 3" cedar fence post found for angle point,

N 87°26'23" W 724.92 feet to a 4" cedar fence post found for angle point, and

N 86°46'01" W 426.90 feet to a ½" iron rod found with a plastic cap stamped "Byrn Survey" in the east line of that tract described as 504.13 acres in a deed from Leslie True Vesper to James L. Pierce

and David L. Pierce dated February 8, 1999 and recorded in Volume 1500, Page 452 of the Hays County Official Public Records (the Pierce 504.13 acre tract being a portion of the Vesper 1279.69 acre tract);

THENCE leaving the Edwards 209.16 acre tract with the east line of the Pierce 504.13 acre tract the following two courses:

N 08°19'22" E 124.79 feet to a ½" iron rod found with a plastic cap stamped "Byrn Survey" for corner, and

N 87°41'56" W 751.30 feet to a ½" iron rod found with a plastic cap stamped "Byrn Survey" for the southwest corner of this description, an interior corner in the east line of the Pierce 504.13 acre tract, and the south corner of that tract described as 10.59 acres in a deed from Leslie True Vesper to James L. Pierce and David L. Pierce dated June 15, 2001 and recorded in Volume 1872, Page 802 of the Hays County Official Public Records (the Pierce 10.59 acre tract being a portion of the Vesper 1279.69 acre tract);

THENCE leaving the Pierce 504.13 acre tract with the east line of Pierce 10.59 acre tract the following two courses:

N 05°37'42" E (being the bearing basis for description) 734.58 feet to a ½" iron rod found with a plastic cap stamped "Byrn Survey" for angle point, and

N 16°12'16" E 1026.26 feet to a 16" cedar tree stump found in fence in the east line of the previously mentioned Pierce 504.13 acre tract for the north corner of the Pierce 10.59 acre tract;

THENCE leaving the Pierce 10.59 acre tract and continuing with the east line of the Pierce 504.13 acre tract, as fenced and used, the following eight courses:

N 20°34'38" E 42.67 feet to a 16" cedar tree stump found for angle point,

N 15°43'09" E 241.85 feet to a 12" cedar tree stump found for angle point,

N 08°41'46" E 86.90 feet to a 14" cedar tree stump found for angle point,

N 07°33'58" E 244.38 feet to a 2.5" pipe fence post found for angle point,

N 24°14'46" E 623.77 feet to a 6" cedar fence post found for angle point,

N 24°15'46" E 420.45 feet to a 2.5" pipe fence post found for angle point,

N 12°52'45" E 194.02 feet to a 2.5" pipe fence post found for angle point, and

N 01°30'08" E 340.55 feet to a 4" pipe fence corner post found in the south line of the previously mentioned Ameritrust Texas 592.30 acre tract and north line of the Vesper 1279.69 acre tract for the northeast corner of the Pierce 504.13 acre tract and exterior west corner of this description;

THENCE leaving the Pierce 504.13 acre tract with the common north line of the Vesper 1279.69 acre tract, and south line of the Ameritrust Texas 592.30 acre tract, as fenced and used, the following six courses:

N 73°32'00" E 130.18 feet to a 4" pipe fence post found for angle point,

S 48°36'36" E 170.02 feet to a ½" iron rod found for angle point,

S 76°17'07" E 88.03 feet to a 4" pipe fence post found for angle point,

S 86°44'44" E 798.24 feet to a 4" pipe fence post found for angle point,

S 86°55'19" E 913.16 feet to a 4" pipe fence post found for angle point, and

S 86°56'50" E 421.51 feet to a ½" iron rod found for the southeast corner of the Ameritrust Texas 592.30 acre tract and southwest corner of the panhandle portion of this description and the Vesper 1279.69 acre tract;

THENCE leaving the fence with the common west line of the panhandle portion of the Vesper 1279.69 acre tract and east line of the Ameritrust Texas 592.30 acre tract the following two courses:

N 00°00'32" E 1999.62 feet to a ½" iron rod found for angle point, and

N 32°23'54" E 1152.96 feet to the PLACE OF BEGINNING.

THERE are contained within these metes and bounds 465.71 acres, more or less, as prepared from public records and surveys made on the ground in 1999, 2001, 2005 and on May 30, 2006 by Byrn & Associates, Inc., of San Marcos, Texas. All ½" iron rods set are capped with a plastic cap stamped "Byrn Survey".

SECTION 10.03. (a) The legal notice of the intention to introduce this article, setting forth the general substance of this article, has been published as provided by law, and the notice and a copy of this article have been furnished to all persons, agencies, officials, or entities to which they are required to be furnished under Section 59, Article XVI, Texas Constitution, and Chapter 313,

Government Code.

(b) The governor, one of the required recipients, has submitted the notice and article to the Texas Commission on Environmental Quality.

(c) The Texas Commission on Environmental Quality has filed its recommendations relating to this article with the governor, the lieutenant governor, and the speaker of the house of representatives within the required time.

(d) All requirements of the constitution and laws of this state and the rules and procedures of the legislature with respect to the notice, introduction, and passage of this article are fulfilled and accomplished.

SECTION 10.04. This article takes effect immediately if this Act receives a vote of two-thirds of all the members elected to each house, as provided by Section 39, Article III, Texas Constitution. If this Act does not receive the vote necessary for immediate effect, this article takes effect September 1, 2007.

ARTICLE 11. TABLEROCK GROUNDWATER CONSERVATION DISTRICT

SECTION 11.01. Subtitle H, Title 6, Special District Local Laws Code, is amended by adding Chapter 8823 to read as follows:

CHAPTER 8823. TABLEROCK GROUNDWATER CONSERVATION DISTRICT

SUBCHAPTER A. GENERAL PROVISIONS

Sec. 8823.001. DEFINITIONS. In this chapter:

(1) "Board" means the district's board of directors.

(2) "Director" means a board member.

(3) "District" means the Tablerock Groundwater Conservation District.

Sec. 8823.002. NATURE OF DISTRICT. The district is a groundwater conservation district in Coryell County created under and essential to accomplish the purposes of Section 59, Article XVI, Texas Constitution.

Sec. 8823.003. CONFIRMATION ELECTION REQUIRED. (a) If the creation of the district is not confirmed at a confirmation election held before September 1, 2012:

(1) the district is dissolved on September 1, 2012, except that the district shall:

(A) pay any debts incurred;

(B) transfer to Coryell County any assets that remain after the payment of debts; and

(C) maintain the organization of the district until all debts are paid and remaining assets are transferred; and

(2) this chapter expires September 1, 2012.

(b) This section expires September 1, 2012.

Sec. 8823.004. INITIAL DISTRICT TERRITORY. The initial boundaries of the district are coextensive with the boundaries of Coryell County, Texas.

Sec. 8823.005. CONSTRUCTION OF CHAPTER. This chapter shall be liberally construed to achieve the legislative intent and purposes of Chapter 36, Water Code. A power granted by Chapter 36, Water Code, or this chapter shall be broadly interpreted to achieve that intent and those purposes.

Sec. 8823.006. APPLICABILITY OF OTHER GROUNDWATER CONSERVATION DISTRICT LAW. Except as otherwise provided by this chapter, Chapter 36, Water Code, applies to the district.

[Sections 8823.007-8823.020 reserved for expansion]

SUBCHAPTER A-1. TEMPORARY PROVISIONS

Sec. 8823.021. APPOINTMENT OF TEMPORARY DIRECTORS. (a) Not later than the 45th day after the effective date of this chapter, five temporary directors shall be appointed as follows:

(1) the Coryell County Commissioners Court shall appoint one temporary director from each of the four commissioners precincts in the county to represent the precincts in which the temporary directors reside; and

(2) the county judge of Coryell County shall appoint one temporary director who resides in the district to represent the district at large.

(b) If there is a vacancy on the temporary board, the authority who appointed the temporary director whose position is vacant shall appoint a person to fill the vacancy.

(c) Temporary directors serve until the earlier of:

(1) the time the temporary directors become initial directors as provided by Section 8823.024; or

(2) the date this chapter expires under Section 8823.003.

Sec. 8823.022. ORGANIZATIONAL MEETING OF TEMPORARY DIRECTORS. As soon as practicable after all the temporary directors have qualified under Section 36.055, Water Code, a majority of the temporary directors shall convene the organizational meeting of the district at a location within the district agreeable to a majority of the directors. If an agreement on location cannot be reached, the organizational meeting shall be

at the Coryell County Courthouse.

Sec. 8823.023. CONFIRMATION ELECTION. (a) The temporary directors shall hold an election to confirm the creation of the district.

(b) Section 41.001(a), Election Code, does not apply to a confirmation election held as provided by this section.

(c) Except as provided by this section, a confirmation election must be conducted as provided by Sections 36.017(b), (c), and (e)-(i), Water Code, and the Election Code. Section 36.017(d), Water Code, does not apply to the confirmation election.

(d) The ballot for the election must be printed in accordance with the Election Code and provide for voting for or against the proposition: "The creation of the Tablerock Groundwater Conservation District and the imposition of a maintenance tax at a rate not to exceed two cents on each $100 of assessed valuation of taxable property in the district."

(e) If a majority of the votes cast at the election are not in favor of the creation of the district, the temporary directors may hold a subsequent confirmation election. The subsequent election may not be held before the first anniversary of the date on which the previous election was held.

(f) The district may not impose a maintenance tax unless a majority of the votes cast at the election are in favor of the imposition of the maintenance tax.

Sec. 8823.024. INITIAL DIRECTORS. (a) If creation of the district is confirmed at an election held under Section 8823.023, the temporary directors become the initial directors and serve for

the terms provided by Subsection (b).

(b) The initial directors representing commissioners precincts 2 and 4 serve until the election of directors under Section 8823.025, and the initial directors representing commissioners precincts 1 and 3 and the at-large director serve until the next regularly scheduled election of directors under Section 8823.053.

Sec. 8823.025. INITIAL ELECTION OF DIRECTORS. On the uniform election date in November of the first even-numbered year after the year in which the creation of the district is confirmed at an election held under Section 8823.023, the district shall hold an election of two directors to replace the initial directors who, under Section 8823.024(b), serve until that election.

Sec. 8823.026. EXPIRATION OF SUBCHAPTER. This subchapter expires September 1, 2012.

[Sections 8823.027-8823.050 reserved for expansion]

SUBCHAPTER B. BOARD OF DIRECTORS

Sec. 8823.051. DIRECTORS; TERMS. (a) The district is governed by a board of five directors.

(b) Directors serve staggered four-year terms.

Sec. 8823.052. METHOD OF ELECTING DIRECTORS. One director is elected from each county commissioners precinct in Coryell County and one director is elected at large.

Sec. 8823.053. ELECTION DATE. The district shall hold an election in the district to elect directors on the uniform election date in November of each even-numbered year.

Sec. 8823.054. QUALIFICATIONS FOR ELECTION. (a) To be

qualified for election as a director, a person must reside in the district.

(b) To be qualified for election as a director from a precinct, a person must reside in that precinct.

[Sections 8823.055-8823.100 reserved for expansion]

SUBCHAPTER C. POWERS AND DUTIES

Sec. 8823.101. GROUNDWATER CONSERVATION DISTRICT POWERS AND DUTIES. Except as provided by this chapter, the district has the powers and duties provided by the general law of this state, including Chapter 36, Water Code, and Section 59, Article XVI, Texas Constitution, applicable to groundwater conservation districts.

Sec. 8823.102. REGISTRATION AND REPORTING REQUIREMENTS FOR CERTAIN EXEMPT WELLS. The district may adopt rules that require the owner or operator of a well or class of wells exempt from permitting under Section 36.117, Water Code, to register the well with the district and, if the well is not exempt under Section 36.117(b)(1), Water Code, to report groundwater withdrawals from the well using reasonable and appropriate reporting methods and frequency.

Sec. 8823.103. WELL SPACING RULES; EXEMPTIONS. (a) Except as provided by Subsection (b), the district shall exempt from the well spacing requirements adopted by the district any well that is completed on or before the effective date of those requirements.

(b) The district may provide by rule that a well may lose its exemption under this section if the well is modified in a manner that substantially increases the capacity of the well after the effective date of the well spacing requirements adopted by the

district.

(c) Except as provided by this section, the district may require any well or class of wells exempt from permitting under Chapter 36, Water Code, to comply with the well spacing requirements adopted by the district. The district shall apply well spacing requirements uniformly to any well or class of wells based on the size or capacity of the well and without regard to the type of use of the groundwater produced by the well.

Sec. 8823.104. ADOPTION OF RULES AND ISSUANCE OF PERMITS. Before the district adopts a management plan, the district may adopt rules and issue permits.

Sec. 8823.105. CONTRACTS WITH OTHER GOVERNMENTAL ENTITIES. (a) The district and another governmental entity, including a river authority located in the district, may contract for the performance by that entity of a district function.

(b) The district may accept a loan from Coryell County to pay for any initial costs of the district, including costs related to a confirmation election.

Sec. 8823.106. NO EMINENT DOMAIN POWER. The district may not exercise the power of eminent domain.

Sec. 8823.107. DISTRICT TERRITORY REQUIREMENTS; DISSOLUTION OF DISTRICT. (a) On September 1, 2011, the district boundaries must include at least one county adjacent to Coryell County.

(b) As soon as practicable after September 1, 2011, the Texas Commission on Environmental Quality shall determine whether the district complies with Subsection (a).

(c) If the Texas Commission on Environmental Quality determines that the district does not comply with Subsection (a), the commission shall dissolve the district in accordance with Sections 36.304, 36.305, 36.307, 36.308, 36.309, and 36.310, Water Code, regardless of whether the district meets the criteria for dissolution under Section 36.304(a), Water Code.

(d) This section expires September 1, 2013.

[Sections 8823.108-8823.150 reserved for expansion]

SUBCHAPTER D. GENERAL FINANCIAL PROVISIONS

Sec. 8823.151. REVENUE. To pay the maintenance and operating costs of the district and to pay any bonds or notes issued by the district, the district may:

(1) impose an ad valorem tax at a rate that:

(A) is approved by a majority of district voters voting at an election held for that purpose; and

(B) does not exceed two cents on each $100 of assessed valuation of taxable property in the district;

(2) assess fees for services or for water withdrawn from nonexempt wells; or

(3) solicit and accept grants from any private or public source.

[Sections 8823.152-8823.200 reserved for expansion]

SUBCHAPTER E. DISSOLUTION

Sec. 8823.201. ELECTION FOR DISSOLUTION. (a) If the district has no outstanding bond or other long-term indebtedness, the district may be dissolved by a favorable vote of a majority of the registered voters of the district at an election held for that

purpose.

(b) The board shall hold a dissolution election if the board receives a petition for dissolution signed by at least 50 percent of the registered voters in the district as computed by using the list of registered voters for Coryell County.

(c) If the district is dissolved under this section, the board shall:

(1) notify the Texas Commission on Environmental Quality and the secretary of state of the dissolution; and

(2) transfer title to any assets of the district to Coryell County.

SECTION 11.02. (a) The legal notice of the intention to introduce this article, setting forth the general substance of this article, has been published as provided by law, and the notice and a copy of this article have been furnished to all persons, agencies, officials, or entities to which they are required to be furnished under Section 59, Article XVI, Texas Constitution, and Chapter 313, Government Code.

(b) The governor has submitted the notice and article to the Texas Commission on Environmental Quality.

(c) The Texas Commission on Environmental Quality has filed its recommendations relating to this article with the governor, lieutenant governor, and speaker of the house of representatives within the required time.

(d) All requirements of the constitution and laws of this state and the rules and procedures of the legislature with respect to the notice, introduction, and passage of this article are

fulfilled and accomplished.

ARTICLE 12. EDWARDS AQUIFER AUTHORITY

SECTION 12.01. Section 1.11, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended by amending Subsection (f) and adding Subsections (f-1) and (f-2) to read as follows:

(f) The authority may own, finance, design, [~~contract with a person who uses water from the aquifer for the authority or that person to~~] construct, operate, or [~~own, finance, and~~] maintain recharge [~~water supply~~] facilities. [~~Management fees or special fees may not be used for purchasing or operating these facilities.~~] For the purpose of this subsection, "recharge [~~water supply~~] facility" means [~~includes~~] a dam, reservoir, [~~treatment facility, transmission facility,~~] or other method of recharge project and associated facilities, structures, or works but does not include a facility to recirculate water at Comal or San Marcos Springs.

(f-1) The authority shall provide written notice of the intent to own, finance, design, construct, operate, or maintain recharge facilities to:

(1) each groundwater conservation district in the area in which the recharge facility will be located;

(2) the mayor of each municipality in the area in which the recharge facility will be located;

(3) the county judge of each county in the area in which the recharge facility will be located; and

(4) each member of the legislature who represents the area in which the proposed recharge facility will be located.

(f-2) Any entity within the county in which a recharge facility is to be constructed shall be provided opportunity for input and allowed to provide proposals for partnering with the authority to own, finance, design, construct, operate, or maintain the recharge facility.

SECTION 12.02. Subsections (a), (c), (e), (f), and (h), Section 1.14, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, are amended to read as follows:

(a) Authorizations to withdraw water from the aquifer and all authorizations and rights to make a withdrawal under this Act shall be limited in accordance with this section to:

(1) protect the water quality of the aquifer;

(2) protect the water quality of the surface streams to which the aquifer provides springflow;

(3) achieve water conservation;

(4) maximize the beneficial use of water available for withdrawal from the aquifer;

(5) recognize the extent of the hydro-geologic connection and interaction between surface water and groundwater;

(6) protect aquatic and wildlife habitat;

(7) [~~(6)~~] protect species that are designated as threatened or endangered under applicable federal or state law; and

(8) [~~(7)~~] provide for instream uses, bays, and estuaries.

(c) Except as provided by Subsections [~~(d),~~] (f)[~~,~~] and (h) of this section and Section 1.26 of this article, for the period beginning January 1, 2008, the amount of permitted withdrawals from

the aquifer may not exceed or be less than 572,000 [~~400,000~~] acre-feet of water for each calendar year, which is the sum of all regular permits issued or for which an application was filed and issuance was pending action by the authority as of January 1, 2005.

(e) The authority may not allow withdrawals from the aquifer through wells drilled after June 1, 1993, except for replacement, test, or exempt wells or to the extent that the authority approves an amendment to an initial regular permit to authorize a change in the point of withdrawal under that permit [~~additional water as provided by Subsection (d) and then on an interruptible basis~~].

(f) If the level of the aquifer is equal to or greater than 660 [~~650~~] feet above mean sea level as measured at Well J-17, the authority may authorize withdrawal from the San Antonio pool, on an uninterruptible basis, of permitted amounts. If the level of the aquifer is equal to or greater than 845 feet at Well J-27, the authority may authorize withdrawal from the Uvalde pool, on an uninterruptible basis, of permitted amounts. [~~The authority shall limit the additional withdrawals to ensure that springflows are not affected during critical drought conditions.~~]

(h) To accomplish the purposes of this article, [~~by June 1, 1994,~~] the authority, through a program, shall implement and enforce water management practices, procedures, and methods to ensure that, not later than December 31, 2012, the continuous minimum springflows of the Comal Springs and the San Marcos Springs are maintained to protect endangered and threatened species to the extent required by federal law and to achieve other purposes provided by Subsection (a) of this section and Section 1.26 of this

article. The authority from time to time as appropriate may revise the practices, procedures, and methods. To meet this requirement, the authority shall require:

(1) phased adjustments to [~~reductions in~~] the amount of water that may be used or withdrawn by existing users or categories of other users, including adjustments in accordance with the authority's critical period management plan established under Section 1.26 of this article; or

(2) implementation of alternative management practices, procedures, and methods.

SECTION 12.03. Subsection (g), Section 1.16, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(g) The authority shall issue an initial regular permit without a term, and an initial regular permit remains in effect until the permit is abandoned or[~~,~~] cancelled[~~, or retired~~].

SECTION 12.04. Subsection (b), Section 1.19, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(b) Withdrawal of water under a term permit must be consistent with the authority's critical period management plan established under Section 1.26 of this article. A holder of a term permit may not withdraw water from the San Antonio pool of the aquifer unless:

(1) the level of the aquifer is higher than 675 [~~665~~] feet above sea level, as measured at Well J-17;

(2) the flow at Comal Springs as determined by Section

1.26(c) of this article is greater than 350 cubic feet per second; and

(3) the flow at San Marcos Springs as determined by Section 1.26(c) of this article is greater than 200 cubic feet per second.

SECTION 12.05. Subsection (a), Section 1.22, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(a) The authority may acquire permitted rights to use water from the aquifer for the purposes of:

(1) holding those rights in trust for sale or transfer of the water or the rights to persons within the authority's jurisdiction who may use water from the aquifer;

(2) holding those rights in trust as a means of managing overall demand on the aquifer; or

(3) holding those rights for resale [~~or retirement as a means of complying with pumping reduction requirements under this article; or~~

[~~(4) retiring those rights, including those rights already permitted~~].

SECTION 12.06. Article 1, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended by amending Section 1.26 and adding Section 1.26A to read as follows:

Sec. 1.26. CRITICAL PERIOD MANAGEMENT PLAN. (a) After review of the recommendations received in the program document, as prescribed by Section 1.26A of this article, the [~~The~~] authority by rule shall adopt [~~prepare and coordinate implementation of~~] a [~~plan~~

~~for~~] critical period management plan consistent with Sections 1.14(a), (f), and (h) of this article [~~on or before September 1, 1995~~]. The critical period management plan shall be adopted by the authority no later than six months after the authority's receipt of the program document. On adoption of the critical period management plan, the authority shall provide a written report to the governor, lieutenant governor, and speaker of the house of representatives describing the actions taken in response to each recommendation and, for each recommendation not implemented, the reason it was not implemented. The plan [~~mechanisms~~] must:

(1) distinguish between discretionary use and nondiscretionary use;

(2) require reductions of all discretionary use to the maximum extent feasible;

(3) require utility pricing, to the maximum extent feasible, to limit discretionary use by the customers of water utilities; [~~and~~]

(4) require reduction of nondiscretionary use by permitted or contractual users, to the extent further reductions are necessary, in the reverse order of the following water use preferences:

(A) municipal, domestic, and livestock;

(B) industrial and crop irrigation;

(C) residential landscape irrigation;

(D) recreational and pleasure; and

(E) other uses that are authorized by law; and

(5) allow irrigation use to continue in order to

permit the user to complete the irrigation of a crop in progress.

(b) In this section, "MSL" means the elevation above mean sea level, measured in feet, of the surface of the water in a well, and "CFS" means cubic feet per second. Not later than January 1, 2008, the authority shall, by rule, adopt and enforce a critical period management plan with withdrawal reduction percentages in the amounts indicated in Tables 1 and 2 whether according to the index well levels or the Comal or San Marcos Springs flow as applicable, for a total in critical period Stage IV of 40 percent of the permitted withdrawals under Table 1 and 35 percent under Table 2:

TABLE 1

CRITICAL PERIOD WITHDRAWAL REDUCTION STAGES

FOR THE SAN ANTONIO POOL

Comal Springs Flow cfs	San Marcos Springs Flow cfs	Index Well J-17 Level MSL	Critical Period Stage	Withdrawal Reduction-San Antonio Pool
<225	<96	<660	I	20%
<200	<80	<650	II	30%
<150	N/A	<640	III	35%
<100	N/A	<630	IV	40%

TABLE 2

CRITICAL PERIOD WITHDRAWAL REDUCTION STAGES

FOR THE UVALDE POOL

Withdrawal Reduction-Uvalde Pool	Index Well J-27 Level MSL	Critical Period Stage
N/A	---	I
5%	<850	II
20%	<845	III
35%	<842	IV

(c) A change to a critical period stage with higher withdrawal reduction percentages is triggered if the 10-day average of daily springflows at the Comal Springs or the San Marcos Springs

or the 10-day average of daily aquifer levels at the J-17 Index Well drops below the lowest number of any of the trigger levels indicated in Table 1. A change to a critical period stage with lower withdrawal reduction percentages is triggered only when the 10-day average of daily springflows at the Comal Springs and the San Marcos Springs and the 10-day average of daily aquifer levels at the J-17 Index Well are all above the same stage trigger level. The authority may adjust the withdrawal percentages for Stage IV in Tables 1 and 2 if necessary in order to comply with Subsection (d) or (e) of this section.

(d) Beginning September 1, 2007, the authority may not require the volume of permitted withdrawals to be less than an annualized rate of 340,000 acre-feet, under critical period Stage IV.

(e) After January 1, 2013, the authority may not require the volume of permitted withdrawals to be less than an annualized rate of 320,000 acre-feet, under critical period Stage IV unless, after review and consideration of the recommendations provided under Section 1.26A of this article, the authority determines that a different volume of withdrawals is consistent with Sections 1.14(a), (f), and (h) of this article in maintaining protection for federally listed threatened and endangered species associated with the aquifer to the extent required by federal law.

(f) Notwithstanding Subsections (d) and (e) of this section, the authority may require further withdrawal reductions before reviewing and considering the recommendations provided under Section 1.26A of this article if the discharge of Comal

Springs or San Marcos Springs declines an additional 15 percent after Stage IV withdrawal reductions are imposed under Subsection (b) of this section. This subsection expires on the date that critical period management plan rules adopted by the authority based on the recommendations provided under Section 1.26A of this article take effect.

(g) Notwithstanding the existence of any stage of an interim or final critical period adopted by the authority under this section, a person authorized to withdraw groundwater from the aquifer for irrigation purposes shall, without regard to the withdrawal reductions prescribed for that stage, be allowed to finish a crop already planted in the calendar year during which the critical period is in effect.

Sec. 1.26A. DEVELOPMENT OF WITHDRAWAL REDUCTION LEVELS AND STAGES FOR CRITICAL PERIOD MANAGEMENT THROUGH RECOVERY IMPLEMENTATION PROGRAM. (a) The authority, with the assistance of Texas A&M University, shall cooperatively develop a recovery implementation program through a facilitated, consensus-based process that involves input from the United States Fish and Wildlife Service, other appropriate federal agencies, and all interested stakeholders, including those listed under Subsection (e)(1) of this section. The recovery implementation program shall be developed for the species that are:

(1) listed as threatened or endangered species under federal law; and

(2) associated with the aquifer.

(b) The authority shall enter into a memorandum of agreement

with the United States Fish and Wildlife Service, other appropriate federal agencies, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and other stakeholders, not later than December 31, 2007, in order to develop a program document that may be in the form of a habitat conservation plan used in issuance of an incidental take permit as outlined in Subsection (d) of this section.

(c) The authority shall enter into an implementing agreement with the United States Fish and Wildlife Service, other appropriate federal agencies, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and other stakeholders to develop a program document that may be in the form of a habitat conservation plan used in issuance of an incidental take permit as outlined in Subsection (d) of this section not later than December 31, 2009.

(d) The authority, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and other stakeholders shall jointly prepare a program document that may be in the form of a habitat conservation plan used in issuance of an incidental take permit with the United States secretary of the interior, through the United States Fish and Wildlife Service and other appropriate federal agencies, under Section 4 or Section 6, Endangered Species Act of 1973 (16 U.S.C. Section 1533 or 1535), as applicable, based on the program developed under Subsection (a) of

this section. The program document shall:

(1) provide recommendations for withdrawal adjustments based on a combination of spring discharge rates of the San Marcos and Comal Springs and levels at the J-17 and J-27 wells during critical periods to ensure that federally listed, threatened, and endangered species associated with the Edwards Aquifer will be protected at all times, including throughout a repeat of the drought of record;

(2) include provisions to pursue cooperative and grant funding to the extent available from all state, federal, and other sources for eligible programs included in the cooperative agreement under Subsection (c) of this section, including funding for a program director; and

(3) be approved and executed by the authority, the Texas Commission on Environmental Quality, the Parks and Wildlife Department, the Department of Agriculture, the Texas Water Development Board, and the United States Fish and Wildlife Service not later than September 1, 2012, and the agreement shall take effect December 31, 2012.

(e) Texas A&M University shall assist in the creation of a steering committee to oversee and assist in the development of the cooperative agreement under Subsection (c) of this section. The steering committee must be created not later than September 30, 2007. The initial steering committee shall be composed of:

(1) a representative of each of the following entities, as appointed by the governing body of that entity:

(A) the Edwards Aquifer Authority;

(B) the Texas Commission on Environmental Quality;

(C) the Parks and Wildlife Department;

(D) the Department of Agriculture;

(E) the Texas Water Development Board;

(F) the San Antonio Water System;

(G) the Guadalupe-Blanco River Authority;

(H) the San Antonio River Authority;

(I) the South Central Texas Water Advisory Committee;

(J) Bexar County;

(K) CPS Energy; and

(L) Bexar Metropolitan Water District or its successor; and

(2) nine other persons who respectively must be:

(A) a representative of a holder of an initial regular permit issued to a retail public utility located west of Bexar County, to be appointed by the authority;

(B) a representative of a holder of an initial regular permit issued by the authority for industrial purposes, to be appointed by the authority;

(C) a representative of a holder of an industrial surface water right in the Guadalupe River Basin, to be appointed by the Texas Commission on Environmental Quality;

(D) a representative of a holder of a municipal surface water right in the Guadalupe River Basin, to be appointed by the Texas Commission on Environmental Quality;

(E) a representative of a retail public utility in whose service area the Comal Springs or San Marcos Springs is located;

(F) a representative of a holder of an initial regular permit issued by the authority for irrigation, to be appointed by the commissioner of agriculture;

(G) a representative of an agricultural producer from the Edwards Aquifer region, to be appointed by the commissioner of agriculture;

(H) a representative of environmental interests from the Texas Living Waters Project, to be appointed by the governing body of that project; and

(I) a representative of recreational interests in the Guadalupe River Basin, to be appointed by the Parks and Wildlife Commission.

(f) The steering committee shall work with Texas A&M University to:

(1) establish a regular meeting schedule and publish that schedule to encourage public participation; and

(2) not later than October 31, 2007, hire a program director to be housed at Texas A&M University.

(g) Texas A&M University may accept outside funding to pay the salary and expenses of the program director hired under this section and any expenses associated with the university's participation in the creation of the steering committee or subcommittees established by the steering committee.

(h) Where reasonably practicable or as required by law, any

meeting of the steering committee, the Edwards Aquifer area expert science subcommittee, or another subcommittee established by the steering committee must be open to the public.

(i) The steering committee appointed under this section shall appoint an Edwards Aquifer area expert science subcommittee not later than December 31, 2007. The expert science subcommittee must be composed of an odd number of not fewer than seven or more than 15 members who have technical expertise regarding the Edwards Aquifer system, the threatened and endangered species that inhabit that system, springflows, or the development of withdrawal limitations. The Bureau of Economic Geology of The University of Texas at Austin and the River Systems Institute at Texas State University shall assist the expert science subcommittee. Chapter 2110, Government Code, does not apply to the size, composition, or duration of the expert science subcommittee.

(j) The Edwards Aquifer area expert science subcommittee shall, among other things, analyze species requirements in relation to spring discharge rates and aquifer levels as a function of recharge and withdrawal levels. Based on that analysis and the elements required to be considered by the authority under Section 1.14 of this article, the expert science subcommittee shall, through a collaborative process designed to achieve consensus, develop recommendations for withdrawal reduction levels and stages for critical period management including, if appropriate, establishing separate and possibly different withdrawal reduction levels and stages for critical period management for different pools of the aquifer needed to maintain target spring discharge and

aquifer levels. The expert science subcommittee shall submit its recommendations to the steering committee and all other stakeholders involved in the recovery implementation program under this section.

(k) The initial recommendations of the Edwards Aquifer area expert science subcommittee must be completed and submitted to the steering committee and other stakeholders not later than December 31, 2008, and should include an evaluation:

(1) of the option of designating a separate San Marcos pool, of how such a designation would affect existing pools, and of the need for an additional well to measure the San Marcos pool, if designated;

(2) of the necessity to maintain minimum springflows, including a specific review of the necessity to maintain a flow to protect the federally threatened and endangered species; and

(3) as to whether adjustments in the trigger levels for the San Marcos Springs flow for the San Antonio pool should be made.

(l) In developing its recommendations, the Edwards Aquifer area expert science subcommittee shall:

(1) consider all reasonably available science, including any Edwards Aquifer-specific studies, and base its recommendations solely on the best science available; and

(2) operate on a consensus basis to the maximum extent possible.

(m) After development of the cooperative agreement, the steering committee, with the assistance of the Edwards Aquifer area

expert science subcommittee and with input from the other recovery implementation program stakeholders, shall prepare and submit recommendations to the authority. The recommendations must:

(1) include a review of the critical period management plan, to occur at least once every five years;

(2) include specific monitoring, studies, and activities that take into account changed conditions and information that more accurately reflects the importance of critical period management; and

(3) establish a schedule for continuing the validation or refinement of the critical period management plan adopted by the authority and the strategies to achieve the program and cooperative agreement described by this section.

(n) In this subsection, "recharge facility" means a dam, reservoir, or other method of recharge project and associated facilities, structures, or works but does not include facilities designed to recirculate water at Comal or San Marcos Springs. The steering committee shall establish a recharge facility feasibility subcommittee to:

(1) assess the need for the authority or any other entity to own, finance, design, construct, operate, or maintain recharge facilities;

(2) formulate plans to allow the authority or any other entity to own, finance, design, construct, operate, or maintain recharge facilities;

(3) make recommendations to the steering committee as to how to calculate the amount of additional water that is made

available for use from a recharge project including during times of critical period reductions;

(4) maximize available federal funding for the authority or any other entity to own, finance, design, construct, operate, or maintain recharge facilities; and

(5) evaluate the financing of recharge facilities, including the use of management fees or special fees to be used for purchasing or operating the facilities.

(o) The steering committee may establish other subcommittees as necessary, including a hydrology subcommittee, a community outreach and education subcommittee, and a water supply subcommittee.

(p) On execution of the memorandum of agreement described by Subsection (b) of this section, the steering committee described by Subsection (e) of this section may, by majority vote of its members, vote to add members to the steering committee, change the makeup of the committee, or dissolve the committee. If the steering committee is dissolved, the program director hired under Subsection (f) of this section shall assume the duties of the steering committee.

(q) The authority shall provide an annual report to the governor, lieutenant governor, and speaker of the house of representatives not later than January 1 of each year that details:

(1) the status of the recovery implementation program development process;

(2) the likelihood of completion of the recovery implementation program and the cooperative agreement described by

Subsection (c) of this section;

(3) the extent to which the recommendations of the Edwards Aquifer area expert science subcommittee are being considered and implemented by the authority;

(4) any other actions that need to be taken in response to each recommendation;

(5) reasons explaining why any recommendation received has not been implemented; and

(6) any other issues the authority considers of value for the efficient and effective completion of the program and the cooperative agreement under this section.

SECTION 12.07. Subsections (b), (h), and (i), Section 1.29, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, are amended to read as follows:

(b) The authority shall assess equitable aquifer management fees based on aquifer use under the water management plan to finance its administrative expenses and programs authorized under this article. Each water district governed by Chapter 36 [~~52~~], Water Code, that is within the authority's boundaries may contract with the authority to pay expenses of the authority through taxes in lieu of user fees to be paid by water users in the district. The contract must provide that the district will pay an amount equal to the amount that the water users in the district would have paid through user fees. The authority may not collect a total amount of fees and taxes that is more than is reasonably necessary for the administration of the authority.

(h) Fees assessed by the authority may not be used to fund

the cost of reducing withdrawals or retiring permits or of judgments or claims related to withdrawals or permit retirements [~~Special fees collected under Subsection (c) or (d) of this section may not be used to finance a surface water supply reservoir project~~].

(i) The authority and other stakeholders, including state agencies, listed under Section 1.26A of this article shall provide money as necessary[~~, but not to exceed five percent of the money collected under Subsection (d) of this section,~~] to finance the activities of the steering committee and any subcommittees appointed by the steering committee and the program director of the recovery implementation program under Section 1.26A of this article. The authority shall provide, as necessary, up to $75,000 annually, adjusted for changes in the consumer price index, to finance the South Central Texas Water Advisory Committee's administrative expenses and programs authorized under this article.

SECTION 12.08. Subsection (a), Section 1.45, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, is amended to read as follows:

(a) The authority may own, finance, design, construct, [~~build or~~] operate, and maintain recharge dams and associated facilities, structures, or works in the contributing or recharge area of the aquifer if the recharge is made to increase the yield of the aquifer, [~~and~~] the recharge project does not impair senior water rights or vested riparian rights, and the recharge project is not designed to recirculate water at Comal or San Marcos Springs.

SECTION 12.09. Subsections (b) and (d), Section 1.14, Section 1.21, and Subsections (a), (c), and (d), Section 1.29, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, are repealed.

SECTION 12.10. (a) Before January 1, 2012, a suit may not be instituted in a state court contesting:

(1) the validity or implementation of this article; or

(2) the groundwater withdrawal amounts recognized in Section 1.14, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, as amended by this Act.

(b) If applicable, a party that files a suit in any court shall be automatically removed from the steering committee established under Section 1.26A, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, as added by this Act.

(c) A suit against the Edwards Aquifer Authority may not be instituted or maintained by a person who owns, holds, or uses a surface water right and claims injury or potential injury to that right for any reason, including any actions taken by the Edwards Aquifer Authority to implement or enforce Article 1, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993, as amended. This section does not apply to suits brought pursuant to Section 1.45, Chapter 626, Acts of the 73rd Legislature, Regular Session, 1993.

SECTION 12.11. The change in law made by this article applies only to a cause of action filed on or after the effective date of this article. A cause of action that is filed before the effective date of this article is governed by the law in effect

immediately before the effective date of this article, and that law is continued in effect for that purpose.

SECTION 12.12. This article takes effect immediately if this Act receives a vote of two-thirds of all the members elected to each house, as provided by Section 39, Article III, Texas Constitution. If this Act does not receive the vote necessary for immediate effect, this article takes effect September 1, 2007.

ARTICLE 13. TERRITORY OF CULBERSON COUNTY GROUNDWATER CONSERVATION DISTRICT

SECTION 13.01. Chapter 1075, Acts of the 75th Legislature, Regular Session, 1997, is amended by adding Section 3A to read as follows:

Sec. 3A. In addition to the portions of Culberson County included in the boundaries of the district on August 31, 2007, the boundaries of the district include all of the remaining territory in Culberson County.

SECTION 13.02. (a) The annexation under Section 3A, Chapter 1075, Acts of the 75th Legislature, Regular Session, 1997, as added by this article, of the additional territory in Culberson County that was not included in the boundaries of the Culberson County Groundwater Conservation District on August 31, 2007, is subject to ratification at an election held under Section 36.328, Water Code, and this section in which only the voters residing in the territory to be annexed are eligible to vote.

(b) The board of directors of the Culberson County Groundwater Conservation District shall hold the ratification election on the first uniform election date that occurs after the

effective date of this article that allows for compliance with the time requirements of the Election Code.

(c) If a majority of the voters voting at the ratification election vote in favor of the annexation, the Culberson County Groundwater Conservation District boundaries include all of Culberson County.

(d) If a majority of the voters voting at the ratification election do not vote in favor of the annexation, the Culberson County Groundwater Conservation District boundaries are unchanged and this article expires.

ARTICLE 14. EFFECTIVE DATE

SECTION 14.01. Except as otherwise provided by this Act, this Act takes effect September 1, 2007.

President of the Senate

Speaker of the House

I hereby certify that S.B. No. 3 passed the Senate on March 27, 2007, by the following vote: Yeas 30, Nays 0; May 24, 2007, Senate refused to concur in House amendments and requested appointment of Conference Committee; May 26, 2007, House granted request of the Senate; May 27, 2007, Senate adopted Conference Committee Report by the following vote: Yeas 29, Nays 1.

Secretary of the Senate

I hereby certify that S.B. No. 3 passed the House, with amendments, on May 23, 2007, by the following vote: Yeas 133, Nays 8, one present not voting; May 26, 2007, House granted request of the Senate for appointment of Conference Committee; May 28, 2007, House adopted Conference Committee Report by the following vote: Yeas 113, Nays 28, two present not voting.

Chief Clerk of the House

Approved:

Date

Governor

TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

ORDER ADOPTING NEW RULES

Docket No. 2012-2484-RUL

On February 12, 2014, the Texas Commission on Environmental Quality (Commission) adopted new rules in 30 TAC Chapter 298 concerning Environmental Flow Standards for Surface Water. The proposed rules were published for comment in the September 20, 2013 issue of the *Texas Register* (38 TexReg 6176).

IT IS THEREFORE ORDERED BY THE COMMISSION that the new rules are hereby adopted. The Commission further authorizes staff to make any non-substantive revisions to the rules necessary to comply with *Texas Register* requirements. The adopted rules and the preamble to the adopted rules are incorporated by reference in this Order as if set forth at length verbatim in this Order.

This Order constitutes the Order of the Commission required by the Administrative Procedure Act, Government Code, § 2001.033.

If any portion of this Order is for any reason held to be invalid by a court of competent jurisdiction, the invalidity of any portion shall not affect the validity of the remaining portions.

Date Issued:

TEXAS COMMISSION ON
ENVIRONMENTAL QUALITY

Bryan W. Shaw, Ph.D., P.E., Chairman