

The Texas Commission on Environmental Quality (commission) adopts the amendments to §§115.222, 115.223, 115.240, 115.242, 115.243, 115.245, 115.248, and 115.249. The amendments to §§115.222, 115.240, and 115.245 are adopted *with changes* to the proposed text as published in the December 3, 2004, issue of the *Texas Register*. The amendments to §§115.223, 115.242, 115.243, 115.248, and 115.249 are adopted *without changes* to the proposed text as published in the December 3, 2004, issue of the *Texas Register* (29 TexReg 11274) and will not be republished.

The commission will submit the amendments and revised state implementation plan (SIP) narrative to the United States Environmental Protection Agency (EPA) as revisions to the SIP.

#### BACKGROUND AND SUMMARY OF THE FACTUAL BASIS FOR THE ADOPTED RULES

The commission adopted the Stage II rules and SIP narrative on October 16, 1992 (revised on November 10, 1993, and on November 22, 2002) to satisfy a requirement of the Federal Clean Air Act amendments of 1990, §182(b)(3) (42 United States Code (USC), §7511a(b)(3)). The original rules followed the California Air Resources Board (CARB) certification procedures for vapor recovery equipment. The CARB is currently implementing an enhanced vapor recovery (EVR) program, and therefore, no longer certifies non-EVR vapor recovery systems. In lieu of incorporating the CARB EVR program, the commission adopted requirements for more frequent testing of vapor recovery systems at gasoline dispensing facilities and for installing or retrofitting Stage II systems in order to be compatible with onboard refueling vapor recovery (ORVR) equipment required on newer vehicles. In order to provide additional ORVR compatibility options to owners and operators of gasoline dispensing facilities, the commission is expanding the definition of “Onboard refueling vapor recovery

compatible.” Additionally, the commission is adopting language that will enhance the commission’s ability to approve both Stage I and Stage II vapor recovery systems and components certified by independent third parties. The commission is also making changes to the rule language, which should result in requirements that are easier to understand and enforce.

#### SECTION BY SECTION DISCUSSION

Throughout this rulemaking, except after §115.242(2)(F), the phrase “or third-party certification” is added after every reference to a CARB executive order in order to allow for vapor recovery equipment or systems approved for use by the executive director outside of the CARB certification program.

Additionally, throughout this rulemaking, administrative changes to the use of the word “shall” in the rule language are made as needed to conform to the drafting guidelines in the *Texas Legislative Council Drafting Manual*, October 2002. In cases where a requirement is a condition precedent, the word “must” is substituted. In other cases, present tense is substituted when this construction is clearer. In the cases where an obligation is placed on a person by the rule, “shall” is retained. Justification for these changes will not be discussed further in this preamble other than to point out where each change is made.

#### *Subchapter C, Division 2, Stage I Vapor Recovery*

The amendment to §115.222, Control Requirements, adds “or third-party certification” to §115.222(5) and changes “shall” to “must” in §115.222 (1), (10), and (11), as previously discussed in this preamble. In §115.222(7), the word “tank” is inserted to state more clearly which vapors are covered by the provision. In §115.222(9), the phrase “combustible gas detector” is being replaced with the

term “hydrocarbon gas analyzer.” The revision to §115.222(12) clarifies that the exemption limits in §115.227 do not establish applicability to the rule. At proposal, the requirement was rewritten to state that if a motor vehicle fuel dispensing facility does not meet an exemption in §115.227, then the owner or operator has 120 days to come into compliance with the provisions of this division. At adoption, the proposed language is changed to clarify that exceeding a throughput level that pertains to an exemption in §115.227 means that exemption no longer applies to the facility. Also, in §115.222(12), the word “subsection” is replaced with “section” to conform to Texas Register guidelines.

The amendment to §115.223, Alternate Control Requirements, removes the language referencing §115.910 for demonstrating an alternate control requirement (ACR) and replaces it with language comparable to that given in §115.243, which regulates ACRs for Stage II. This amendment will make the approval of new Stage I equipment easier and more commensurate with the approval process in place for Stage II equipment.

#### *Subchapter C, Division 4, Stage II Vapor Recovery*

The amendment to §115.240, Stage II Vapor Recovery Definitions and List of California Air Resources Board Certified Stage II Equipment, revises the definition of “Onboard refueling vapor recovery compatible.” Following the promulgation of the last Stage II rule revision (November 2002), new vapor recovery technologies have been developed that are limited by the prior definition. The new definition considers any vapor recovery system certified by CARB as ORVR compatible, regardless of whether it is vacuum assisted, to also be ORVR compatible in Texas. In addition, a system certified, using test methods approved by the executive director, by an independent third-party

evaluator to maintain an overall efficiency of at least 95% while dispensing fuel to both ORVR-equipped and non-ORVR-equipped vehicles may be considered ORVR compatible in Texas. The use of the acronym “ORVR” in the title is also deleted to conform to agency guidelines. The amendment also changes “shall” in §115.240(a) to present tense, as previously discussed in this preamble. At adoption, based on public comment, the definition of “major system replacement or modification,” which was added to §115.245(1)(D) at proposal, is moved to this section as §115.240(a)(1), and the subsequent definitions are renumbered. At adoption to conform to Texas Register guidelines, the phrase “the California Air Resources Board” in the proposed language in §115.240(a)(3) is replaced by the acronym “CARB” because the language added at adoption as §115.240(a)(1) defines the acronym earlier in the same section. The amendment to §115.240(b) removes the phrase “in the following figure” and replaces it with “contained in this subsection” to conform to Texas Register guidelines. At adoption to conform to Texas Register guidelines, the phrase “California Air Resources Board” in the existing language in §115.240(b) is removed and the acronym “CARB” retained because the language added at adoption as §115.240(a)(1) defines the acronym earlier in the same section.

The amendment to §115.242, Control Requirements, adds “or third-party certification” to §115.242(2), (3), (3)(B) and (G), and (12)(C); changes “shall” to “must” in §115.242(2), (2)(A) - (F), (5), (6), and (9); changes “shall” to “may” in §115.242(1)(A) and (B); and changes “shall” to present tense in §115.242(2)(B) and (D), as previously discussed in this preamble. The amendment removes “vacuum assist” from §115.242(1)(C) because this distinction is no longer necessary because CARB determined that all previously certified balance systems are ORVR compatible. In §115.242(2), a grammatical error is corrected by inserting “and” into a series of sections. The amendment to

§115.242(2)(C) removes the phrase “one-eighth of an” and replaces it with “1/8” to conform to Texas Register guidelines. In §115.242(2)(D), the provision for the minimum size of vapor piping is rephrased to be consistent with the rule drafting guideline. Additionally, the phrase “and shall slope towards the storage tank at all points” is added to §115.242(2)(E) to augment the requirements for riser piping. This language ensures that the piping within and below the dispenser will be free of liquid traps. The words “or control” is added to §115.242(3)(H) to cover newer vapor recovery system designs that are not necessarily considered “vapor processors.” In §115.242(6), language concerning the removal of out-of-order tags and returning equipment to service is changed to be more understandable. The revision to §115.242(10) clarifies that the exemption limits in §115.247 do not establish applicability to the rule. The requirement has been rewritten to state that if a motor vehicle fuel dispensing facility does not meet an exemption in §115.247, then the owner or operator has 120 days to come into compliance with the provisions of this division. In §115.242(12), the phrase “with jurisdiction” is inserted after the phrase “local air pollution program” to add specificity. In §115.242(12)(C), the word “number(s)” is added after the phrase “CARB Executive Order” to show that the entire CARB Executive Order does not need to be submitted.

The only amendment to §115.243(2), Alternate Control Requirements, is a change from the word “verified” to “certified.” This change is needed both to strengthen the ACRs and to make this language consistent with the rest of the rule.

The amendment to §115.245, Testing Requirements, reconfigures the entire section, but results in only a minor additional requirement. Language is reconfigured to make §115.245(1) applicable only to

initial or full system testing; §115.245(2) applicable to only annual testing; and new §115.245(3) applicable only to pretest notification and reporting of test results. At adoption, based on public comment, the definition of “major system replacement or modification,” which was added to §115.245(1)(D) as part of the reconfiguration, is moved to §115.240(1) as discussed previously in this preamble. The amendment to §115.245(2) removes “twelve” and replace it with “12” to conform to Texas Register guidelines. The provisions in §115.245(3) are broken out of §115.245(2) and modified because the current language in this section is redundant, confusing, and somewhat difficult to enforce. The remaining paragraphs are renumbered. Other changes add “or third-party certification” to §115.245(1)(A)(i) and (C) and change “shall” to “must” in §115.245(1), (1)(A)(i) - (iv), (1)(B) and (C), (2), (5), and (6), as previously discussed in this preamble. In §115.245(1), the word “commission’s” is added before the title “Vapor Recovery Test Procedure Handbook” to add specificity. Additionally, the changes add the applicable Texas test procedure number after the description of each required test and add test time as a required item for pretest notifications in new §115.245(3). At adoption, new wording is added to renumbered §115.245(4) to make it clear that only test modifications that have been approved by the executive director may be used.

The amendment to §115.248, Training Requirements, adds “and testing” to §115.248(3)(C) to better ensure that testing requirements are included in the curriculum of approved Stage II training courses. The commission is changing “shall” to the present tense in §115.248(1) and (4)(B)(ii) and changing “shall” to “must” in §115.248(1), as previously discussed in this preamble. The proposed amendment also corrects a typographic error in §115.248(4)(B)(ii).

The amendment to §115.249, Counties and Compliance Schedules, removes “vacuum assist” from §115.249(c), (c)(1), and (c)(2). This distinction is no longer necessary because CARB determined that all previously certified balance systems are ORVR compatible.

#### FINAL REGULATORY IMPACT ANALYSIS DETERMINATION

The commission reviewed the adopted rulemaking action in light of the regulatory analysis requirements of Texas Government Code, §2001.0225, and determined that the adopted amendments do not meet the definition of a “major environmental rule” as defined in that statute. Furthermore, it does not meet any of the four applicability requirements listed in Texas Government Code, §2001.0225(a). A “major environmental rule” is a rule which is specifically intended to protect the environment or reduce risks to human health from environmental exposure, and that may adversely affect in a material way the economy, a sector of the economy, productivity, competition, jobs, the environment, or the public health and safety of the state or a sector of the state. The intent of this adopted rulemaking action is to correct errors and change definitions in the rules to match emerging control technologies. The adopted amendments will provide additional ORVR compatibility options to owners and operators of gasoline dispensing facilities by expanding the definition of “Onboard refueling vapor recovery compatible” to include new technologies. Additionally, the commission is adopting language that will enhance the commission’s ability to approve vapor recovery systems and components certified by independent third parties. The commission is also making changes to the rule language, which should result in requirements that are easier to understand and enforce. The adopted amendments to Chapter 115 do not increase the stringency of existing rules and will not adversely affect, in a material way, the economy, a sector of the economy, productivity, competition, jobs, the

environment, or the public health and safety of the state or a sector of the state. The adopted amendments are primarily procedural. No additional fiscal impacts are expected from these amendments to those gasoline dispensing facilities that are currently required to have Stage I or Stage II vapor recovery systems installed.

In addition, Texas Government Code, §2001.0225 only applies to a major environmental rule, the result of which is to: 1) exceed a standard set by federal law, unless the rule is specifically required by state law; 2) exceed an express requirement of state law, unless the rule is specifically required by federal law; 3) exceed a requirement of a delegation agreement or contract between the state and an agency or representative of the federal government to implement a state and federal program; or 4) adopt a rule solely under the general powers of the agency instead of under a specific state law. This adopted rulemaking is not subject to the regulatory analysis provisions of Texas Government Code, §2001.0225(b), because the adopted amendments do not meet any of the four applicability requirements. Specifically, the adopted amendments implement requirements of 42 USC, §7511a(b)(3), (c), and (d) and Texas Health and Safety Code (THSC), §§382.002, 382.011, 382.012, 382.019, and 382.208.

#### TAKINGS IMPACT ASSESSMENT

The commission evaluated this adopted rulemaking action and performed an analysis of whether Texas Government Code, Chapter 2007 is applicable. The analysis indicates this action is reasonably being taken to fulfill an obligation mandated by federal law, and therefore is exempt under Texas Government Code, §2007.003(b)(4). Specifically, this adopted rulemaking action amends the Stage I and Stage II gasoline vapor recovery rules and SIP narrative required under 42 USC, §7511a(b)(3), (c), and (d). The specific purpose of the adopted rulemaking is to provide additional ORVR compatibility options to owners and operators of gasoline dispensing facilities by expanding the definition of “Onboard refueling vapor recovery compatible” to include new technologies. Additionally, the commission is adopting language that will enhance the commission’s ability to approve vapor recovery systems and components certified by independent third parties. The commission is also making changes to the rule language, which should result in requirements that are easier to understand and enforce.

Nevertheless, the commission further evaluated this adopted rulemaking action and performed an analysis of whether this action would constitute a takings under Texas Government Code, Chapter 2007. The specific purpose of these adopted amendments is to continue to satisfy federal requirements for vapor recovery from gasoline dispensing facilities in nonattainment areas of the state.

Promulgation and enforcement of these adopted amendments would be neither a statutory or constitutional taking of private real property. Specifically, the adopted amendments do not affect a landowner’s rights in private real property, because this rulemaking action does not burden, restrict, nor limit the owner’s rights to property or reduce its value by 25 % or more beyond that which would

otherwise exist in the absence of the adopted regulations. In other words, these amendments are adopted to continue to meet the requirements of 42 USC, §7511a(b)(3) and THSC, §382.019 and §382.208, but in a less financially burdensome manner on owners and operators of gasoline dispensing facilities. The adopted amendments will enhance the commission's ability to approve vapor recovery systems and components certified by independent third parties and allow the use of new technologies. An alternative would be to implement the CARB EVR program in Texas at a substantially increased cost to facility owners and operators in order to meet the requirements of the Federal Clean Air Act. Therefore, these adopted amendments will not constitute a takings under Texas Government Code, Chapter 2007.

#### CONSISTENCY WITH THE COASTAL MANAGEMENT PROGRAM

The commission determined that this rulemaking action relates to an action or actions subject to the Texas Coastal Management Program (CMP) in accordance with the Coastal Coordination Act of 1991, as amended (Texas Natural Resources Code, §§33.201 *et seq.*), and the commission rules in 30 TAC Chapter 281, Subchapter B, concerning Consistency with the CMP. As required by §281.45(a)(3) and 31 TAC §505.11(b)(2), relating to Actions and Rules Subject to the Coastal Management Program, commission rules governing air pollutant emissions must be consistent with the applicable goals and policies of the CMP. The commission reviewed this action for consistency with the CMP goals and policies in accordance with the rules of the Coastal Coordination Council, and determined that the action is consistent with the applicable CMP goals and policies. The CMP goal applicable to this rulemaking action is the goal to protect, preserve, and enhance the diversity, quality, quantity, functions, and values of coastal natural resource areas (31 TAC §501.12(l)). No new sources of air

contaminants will be authorized, and the adopted revisions will maintain the same level of emissions control as the existing rules. The CMP policy applicable to this rulemaking action is the policy that commission rules comply with federal regulations in 40 Code of Federal Regulations, to protect and enhance air quality in the coastal areas (31 TAC §501.14(q)). This rulemaking action complies with 40 Code of Federal Regulations Part 51, Requirements for Preparation, Adoption, and Submittal of Implementation Plans. Therefore, in compliance with 31 TAC §505.22(e), the commission affirms that this rulemaking action is consistent with CMP goals and policies.

#### EFFECT ON SITES SUBJECT TO THE FEDERAL OPERATING PERMITS PROGRAM

Chapter 115 contains applicable requirements under 30 TAC Chapter 122, Federal Operating Permits; therefore, owners or operators subject to the Federal Operating Permit Program must, consistent with the revision process in Chapter 122, revise their operating permits to include the revised Chapter 115 requirements for each emission unit at their sites affected by the revisions to Chapter 115.

#### PUBLIC COMMENT

A public hearing on this proposal was held in Austin, Texas, on January 3, 2005, and oral comments were received from Husky Corporation (Husky). The public comment period ended at 5:00 p.m. on January 3, 2005. Written comments were submitted by the Sierra Club, Houston Regional Group (HSC); Valero Energy Corporation (Valero); Technology Resources International, Inc. (TRI); ARID Technologies, Inc. (ARID); EPA Region VI; Dresser Wayne, Inc. (DW); the American Petroleum Institute (API); and ExxonMobil Downstream (ExxonMobil). Valero, TRI, ARID, EPA Region VI, and DW indicated that they supported the rules. HSC opposed the adoption of the rules. ExxonMobil

did not indicate whether it was for or against the adoption of the rule amendments, but provided specific comments on the existing rules. API indicated that its members support the rule amendments, but opposed part of the existing rules.

## RESPONSE TO COMMENTS

### *Comment*

HSC commented that the proposal indicated that the CARB is implementing an EVR program and no longer certifying non-EVR vapor recovery systems, but that the proposal did not provide the public with information on what an EVR program is or on why the commission is not doing the same. HSC commented that the commission must document the effectiveness of the proposal and why it is better than an EVR program. The HSC stated that the citizens of Texas deserve the best and most comprehensive protection from air pollution equal to that in California. HSC requested that the commission withdraw the proposal and provide information on EVR programs and why the proposed amendments are better.

### *Response*

CARB's EVR program was initiated in 1999 in response to legal action brought against the State of California by the National Resources Defense Council, the Coalition for Clean Air, and others. CARB claims that EVR will produce a higher vapor recovery system efficiency than non-EVR systems (from 95% to 98%). EVR requires all systems to be ORVR compatible, possess in-station monitoring equipment, utilize only single-hose dispensers, and have minimal post-fueling drips and liquid retention/spitback. The commission, sharing CARB's concerns over the compatibility of vapor

recovery systems with federally mandated ORVR systems installed on new automobiles, promulgated requirements for ORVR compatibility in the 2002 Stage II rule revision (November 6, 2002). In fact, the ORVR compatibility compliance date of April 1, 2005, for new systems in Texas is a full year earlier than that required under CARB's EVR program. However, it is the commission's position that the additional cost to owners and operators of vapor recovery systems is unwarranted for the minor increase in overall system efficiency gained by the full CARB EVR program. CARB's own estimates indicate that EVR will have an average total fixed cost of nearly \$46,000 per facility (August 2002). CARB has also calculated an overall EVR cost effectiveness of \$4.85 per pound of reactive organic gases (ROG) reduced (originally calculated at approximately \$1.80 per pound). The commission has taken other steps to increase the operational efficiency of vapor recovery systems in Texas, including an increase in the frequency of system testing, a modification of the agency's investigation strategy to allow for more on-site test observations, and additional outreach to vapor recovery system testers.

The commission agrees that the citizens of Texas deserve better air quality. For this reason the commission strives to ensure that the Texas program meets or exceeds the standards set forth by the EPA. The commission makes no claims that its current vapor recovery program is better than California's EVR program. However, the commission does maintain that the costs of EVR are prohibitive and excessive when compared to other volatile organic compound (VOC) control measures currently being implemented. No change was made in response to this comment.

*Comment*

The HSC commented that it is not clear in the proposal how the commission will set up third-party certifications. In addition, HSC commented that the commission must define the phrases “qualified independent testing organization,” “code or standard or practice acceptable to the executive director,” and “which has been developed by a nationally recognized agency, association, or independent testing laboratory” that are used in the amendment to §115.223(2).

*Response*

Third-party certification of petroleum-related equipment is a long-standing, nationally recognized process. Many universities and public and private organizations, including Underwriters Laboratories, Inc., (UL) and the National Work Group on Leak Detection Evaluations (NWGLDE), conduct or evaluate independent evaluations of equipment and/or services. UL has been testing and certifying products and services for over 100 years. The NWGLDE is a group of state and EPA representatives who review leak detection system evaluations to determine if each evaluation was performed in accordance with an acceptable leak detection test method protocol and ensure that the leak detection system meets EPA and/or other applicable regulatory performance standards. The NWGLDE reviews evaluations prepared by a number of third-party testers/evaluators and seeks to ensure that EPA-approved methodologies were followed.

The commission’s third-party vapor recovery equipment certification program strives to ensure it is no less stringent than the examples given in the previous paragraph. All third-party evaluations must be performed by a nationally recognized entity using CARB’s pre-EVR certification standards. This

entity must provide proof that it has the knowledge, experience, and staff necessary to perform a comprehensive evaluation. To date, the commission has approved two third-party evaluators for vapor recovery equipment certifications: Ken Wilcox Associates, Inc. (KWA) and TRI. Since 1989, KWA has conducted hundreds of different evaluations for almost every manufacturer of leak detection equipment. It has been contracted by the EPA, the API, the Federal Aviation Administration, and others to perform such evaluations. TRI provides such services as technology planning, evaluation, and development, regulatory advocacy, and litigation support.

In light of this information, the commission maintains that the addition of the definitions requested by HSC in §115.10 is not necessary. No change was made in response to this comment.

*Comment*

HSC commented that the commission must require specific training for third-party certifiers under §115.248.

*Response*

Requiring additional training for individuals, companies, or organizations involved in third-party testing and evaluation of vapor recovery equipment would not be consistent with other third-party certification programs created by the commission. Moreover, it is not evident that training of this type currently exists. The intent of these third-party certification programs is to ensure rigorous testing and evaluation of new equipment and methods without taxing the limited funds and resources available to the commission. Developing or requiring additional training would unnecessarily burden the

commission with another level of bureaucratic oversight. No change was made in response to this comment.

*Comment*

HSC commented that the commission must define what is meant by maintaining “an overall efficiency of at least 95% while dispensing fuel” in §115.240.

*Response*

Vapor recovery systems approved for use in Texas must reduce the emissions of VOCs (i.e., gasoline vapors) to the atmosphere by 95%. The 95% efficiency criteria provided in the rule follows EPA’s guidance. Under the Federal Clean Air Act, EPA is required to issue guidance, as appropriate, regarding the effectiveness of vapor recovery systems. EPA’s guidance set a 95% efficiency level based on CARB’s pre-EVR certification efficiency levels. The modification to the definition of “ORVR compatible” requires that any system or retrofit meet the required minimum overall system efficiency of 95% while fueling vehicles, even equipped with ORVR. No change was made in response to this comment.

*Comment*

HSC commented that the commission must be specific about how the rules will be easier to enforce, as was stated in the proposal.

*Response*

The changes to the rules that will result in requirements that are easier to understand and enforce include modifications to the subsection regulating the testing of vapor recovery systems. The current language of §115.245 is redundant and can be difficult to understand. The proposed language for §115.245 only introduces a minor new requirement regarding the inclusion of test time on pretest notifications. The main goal of the revision is to reconfigure the section to make paragraph (1) applicable to initial or full system testing, paragraph (2) applicable to annual testing, and new paragraph (3) applicable to pretest notification and reporting of test results. These changes will be easier to enforce because there will no longer be confusion about which citation applies to specific situations.

*Comment*

HSC commented that an addition should be made to §115.242(6) to require that verbal and written notifications be made to the commission's regional offices and to local air pollution control agencies with jurisdiction.

*Response*

It is unclear what this request would accomplish. The language in §115.242(6) requires verbal and written notification to the agency that originally tagged the equipment out of service. This ensures that the notifications are submitted to the appropriate agency. No change was made in response to this comment.

*Comment*

HSC commented that the definition for “major system replacement or modification” in §115.245(1)(D) should be moved to §115.240.

*Response*

The commission agrees and has amended the rule language accordingly.

*Comment*

Valero stated that it generally welcomes the amendments as a practical and economic method for owners and operators to comply and to maintain their systems at 95% efficiency. In discussing its reasons for support, Valero commented that it has been reported that the current ORVR penetration in Texas is at least 45%.

*Response*

The commission acknowledges the comments made by Valero and appreciates the support of the rulemaking. With respect to the estimated ORVR penetration rates referenced by Valero in its response, recent third-party certification testing conducted in the Houston area revealed an actual penetration rate of approximately 33%. While other areas of the state may be experiencing slightly higher or lower rates, the commission believes the observed rate is representative of current conditions.

*Comment*

Valero expressed its continued support for personnel certification for testing companies and would welcome the commission switching from a tester registry to an accredited certification program.

*Response*

The commission appreciates Valero's support of an accredited certification program for vapor recovery system testers. However, the commission is unable to implement these changes at this time. The Stage II vapor recovery program is authorized by THSC, Chapter 382, but there are no provisions in the THSC that explicitly authorize an occupational licensing or certification program for vapor recovery equipment installers, repair technicians, or testers. It is not commission practice to establish and regulate a licensing program without explicit statutory authority. The commission's licensing programs are based on the authority provided in Texas Water Code (TWC), Chapter 37, and there are no provisions in the TWC for the licensing of Stage II vapor recovery equipment testers. No change was made in response to this comment.

*Comment*

Valero expressed continued support for a thorough reconciliation of submitted test results and regulated Stage II Vapor Recovery facilities by the commission's regional offices. Detailed periodic analyses of the results received against the test results required would identify noncompliant facilities.

*Response*

The commission appreciates Valero's continued support of thorough reconciliation of Stage II test results. The commission's regional offices in Dallas/Fort Worth, El Paso, Beaumont, and Houston and local air pollution control agencies with jurisdiction currently conduct analyses of "test results received" versus "test results required." These offices maintain detailed data for each facility equipped with a vapor recovery system, including the type of Stage II system installed, the date of the initial or last triennial test, the date of the last successful annual test, the date of the last test observation performed by staff of the commission or local air pollution control agencies with jurisdiction, and the date of the last routine Stage II inspection. Since the commission modified its investigation strategy in 2002 to focus more resources on actual observation of annual and triennial testing, the amount and accuracy of data collected has increased significantly. The commission is now better able to determine which facilities are not conducting annual or triennial testing. If it is determined that a facility has not submitted test results by its due date, the facility is added to the commission's investigation target list. No change was made in response to this comment.

*Comment*

Valero commented that Stage I vapor recovery should be required of all retail fuel facilities in Texas. Valero stated that all of its company-operated facilities are so equipped.

*Response*

The commission greatly appreciates Valero's efforts to install Stage I controls on all company-operated facilities within the state. With regard to a statewide Stage I requirement, the commission is currently

amending its regulations to reduce the Stage I threshold for facilities within Bexar, Comal, Guadalupe, Wilson, Bastrop, Caldwell, Hays, Travis, and Williamson Counties through early action compacts to address eight-hour ozone organized by local and regional authorities in those areas. In these counties, any facility dispensing 25,000 gallons of gasoline or more in any month will be required to install Stage I controls. Additionally, the commission has proposed rules to require facilities in Ellis, Johnson, Kaufman, Parker, and Rockwall Counties to install Stage I if they dispense 10,000 gallons or more per month (those dispensing 125,000 per month are already required to have Stage I). There are currently no plans to expand the Stage I program further than these proposed amendments and it is beyond the scope of the current rulemaking to do so. No change was made in response to this comment.

*Comment*

TRI commented that the current requirement for ORVR compatibility needs to be modified to be more flexible. The current requirements only allow the use of technology available in the dispensing nozzle, rather than also allowing more versatile vent processing technology. The amendments will allow either CARB certification of ORVR compatibility or maintenance of a minimum overall system efficiency of 95%. TRI expressed support for allowing certification by parties other than CARB and commented that the CARB's new EVR rules are cost-prohibitive for some small companies that produce control equipment. TRI commented that an EVR program is not needed in Texas.

*Response*

The commission recognizes the comments provided by TRI and appreciates its support of the rule changes.

*Comment*

ARID commented that the expanded definition of ORVR compatibility allows for more hardware choices for facilities and that additional commercial options will likely yield lower capital equipment costs. ARID commented that independent third-party certification of equipment will provide benefits in several ways. ARID expressed strong support for the rulemaking.

*Response*

The commission acknowledges the comments provided by ARID and appreciates its support of the rulemaking.

*Comment*

DW expressed support for allowing third-party certification of equipment. DW commented that allowing additional sources of certification will help relieve the gridlock caused by overloading CARB to oversee national requirements, some of which are not applicable to the California market and that the additional avenues for certification will help alleviate the problems of long delays and high costs for obtaining CARB certifications.

*Response*

The commission acknowledges DW's support of the third-party certification program for Stage I and Stage II equipment and appreciates the overall support for the rule changes.

*Comment*

EPA commented that the amendments are primarily clarifications which will make the rules easier to understand and enforce. EPA commented that third-party certification is useful since CARB certifications of equipment now must meet a higher VOC capture efficiency than other states currently need and that the expanded definition of “Onboard refueling vapor recovery compatible” provides a much clearer description of what this system is expected to achieve. EPA offered support to Texas during the rulemaking process.

*Response*

The commission appreciates the EPA’s acceptance of the Stage I and Stage II rule revisions and continues to value its support during this rulemaking process.

*Comment*

Husky expressed support for the rulemaking in oral testimony.

*Response*

The commission appreciates Husky’s support of the rulemaking.

*Comment*

API expressed appreciation for the additional flexibility for third-party certification outside of the CARB process.

*Response*

The commission appreciates API's support of the Stage I and Stage II third-party certification program and of the increased flexibility it provides.

*Comment*

API commented that the existing requirement for ORVR compatible equipment is unnecessary and unjustified. API provided documentation which it claims indicates CARB's willingness to maintain pre-EVR certifications and to continue to test and certify pre-EVR equipment.

*Response*

The commission does not agree with API's assertion that ORVR compatibility requirements are unnecessary and unjustified. Incompatibility issues between ORVR-equipped vehicles and vacuum assist vapor recovery systems are an increasing threat to air quality in Texas. Vacuum assist vapor recovery systems comprise 92% of the systems installed in the state, while representing only 30% to 35% of the systems in California. CARB has addressed this issue by developing the EVR program (of which, ORVR compatibility represents a small portion of the estimated capital cost). Because the commission assessed the cost of the full EVR program as burdensome and not justified by the estimated amount of VOC reductions, the commission chose not to implement EVR in Texas. However, due to the increasing threat of emissions caused by incompatibility with ORVR-equipped vehicles, the commission acted in 2002 to require ORVR compatibility in order to protect the health of the citizens of Texas.

API references a November 1, 2004, compliance advisory from the San Luis Obispo Air Pollution Control District as an indication that CARB may continue to maintain pre-EVR certifications and even certify equipment to work with pre-EVR systems. The commission has received no word from CARB indicating its desire to continue certification under the pre-EVR standards. Regardless, the compliance advisory notes that facilities within the San Luis Obispo Air Pollution Control District would not be exempt from ORVR compatibility requirements and would eventually be required to install a Phase I (Stage I) EVR system. This referenced “exemption” offered by San Luis Obispo Air Pollution Control District is more restrictive than the current Texas program. No change was made in response to this comment.

*Comment*

API commented that ORVR systems are a significant improvement over vapor recovery systems and that their effectiveness has been rigorously tested.

*Response*

API contends that the in-use effectiveness of ORVR systems is far superior to vapor recovery systems, but offers no data or references to bolster this claim. To date, the commission has received no detailed reports from any independent evaluations conducted to assess the reliability or in-use efficiency of ORVR systems. No change was made in response to this comment.

*Comment*

API commented that the commission should reevaluate the cost of implementing the ORVR requirement and show the specific cost per ton reduced.

*Response*

API's comment suggests that the commission attempted to gain additional VOC reductions and SIP credits with the implementation of the ORVR compatibility requirement. In truth, the ORVR compatibility requirement was implemented in order to maintain the efficiency level mandated by the SIP. Given the extremely high percentage of vacuum assist vapor recovery systems operating in Texas, not acting to require ORVR compatibility would have resulted in greater emissions.

A detailed cost analysis has been conducted by CARB. In August 2002 CARB calculated an overall cost-effectiveness of ORVR compatibility at \$1.74 per pound of reactive organic gases (ROG) reduced. Per CARB's calculations, ORVR compatibility represents 17.5% of the daily ROG reductions achieved by its EVR program, but only represents approximately 6% of the annual cost of EVR. No change was made in response to this comment.

*Comment*

API and ExxonMobil commented that the commission should reexamine the ORVR compatibility requirement and that the requirement should be delayed until EPA has determined how it will handle the definition of widespread use.

*Response*

This request is beyond the scope of the current rule revision. Moreover, it is not clear when the EPA will finalize its definition and issue guidance to the states. Therefore, the commission will continue to ensure that Stage II systems in the 16 one-hour ozone nonattainment counties operate at the prescribed 95% efficiency level in the interim. No change was made in response to this comment.

*Comment*

ExxonMobil expressed support for making the requirements as flexible as possible.

*Response*

The commission appreciates ExxonMobil's support for flexibility within the regulations.

**SUBCHAPTER C: VOLATILE ORGANIC COMPOUND TRANSFER OPERATIONS**

**DIVISION 2: FILLING OF GASOLINE STORAGE VESSELS**

**(STAGE I) FOR MOTOR VEHICLE FUEL DISPENSING FACILITIES**

**§115.222, §115.223**

**STATUTORY AUTHORITY**

The amendments are adopted under TWC, §5.103, and §5.105, which authorize the commission to adopt rules necessary to carry out its powers and duties under the TWC; and under THSC, §382.017, which authorizes the commission to adopt rules consistent with the policy and purposes of the Texas Clean Air Act. The amendments are also adopted under THSC, §382.002, which establishes the commission's purpose to safeguard the state's air resources, consistent with the protection of public health, general welfare, and physical property; §382.011, which authorizes the commission to control the quality of the state's air; §382.012, which authorizes the commission to prepare and develop a general, comprehensive plan for the control of the state's air; and §382.208, which authorizes the commission to develop and implement transportation programs and other measures necessary to demonstrate attainment and protect the public from exposure to hazardous air contaminants from motor vehicles.

The adopted amendments implement TWC, §5.103, concerning Rules and §5.105, General Policy; and under THSC, §382.002, relating to Policy and Purpose, §382.011, General Powers and Duties, §382.012, State Air Control Plan, §382.017, Rules, and §382.208, Attainment Program.

**§115.222. Control Requirements.**

A vapor balance system will be assumed to comply with the specified emission limitation of §115.221 of this title (relating to Emission Specifications) if the following conditions are met:

(1) the container is equipped with a submerged fill pipe as defined in §101.1 of this title (relating to Definitions). The path through the submerged fill pipe to the bottom of the tank must not be obstructed by a screen, grate, or similar device whose presence would preclude the determination of the submerged fill pipe's proximity to the tank bottom while the submerged fill tube is properly installed;

(2) a vapor-tight return line is connected before gasoline can be transferred into the storage container;

(3) no avoidable gasoline leaks, as detected by sight, sound, or smell, exist anywhere in the liquid transfer or vapor balance systems;

(4) the vapor return line's cross-sectional area is at least one-half of the product drop line's cross-sectional area;

(5) in the Beaumont/Port Arthur, Dallas/Fort Worth, El Paso, and Houston/Galveston areas, the only atmospheric emission during gasoline transfer into the storage container is through a

storage container vent line equipped with a pressure-vacuum relief valve set to open at a pressure of no more than eight ounces per square inch (3.4 kPa) or in accordance with the facility's Stage II system as defined in the California Air Resources Board (CARB) Executive Order(s) or third-party certification for the facility;

(6) in the covered attainment counties, as defined in §115.10 of this title (relating to Definitions), the only atmospheric emission during gasoline transfer into the storage container is through a storage container vent line equipped with a pressure-vacuum relief valve set to open at a pressure of no more than eight ounces per square inch (3.4 kPa);

(7) after unloading, the tank-truck tank is kept vapor-tight until the vapors in the tank-truck tank are returned to a loading, cleaning, or degassing operation and discharged in accordance with the control requirements of that operation;

(8) the gauge pressure in the tank-truck tank does not exceed 18 inches of water (4.5 kPa) or vacuum exceed six inches of water (1.5 kPa);

(9) no leak, as defined in §101.1 of this title, exists from potential leak sources when measured with a hydrocarbon gas analyzer;

(10) in the Beaumont/Port Arthur, Dallas/Fort Worth, El Paso, and Houston/Galveston areas, any storage tank installed after November 15, 1993, which is required to

install Stage I control equipment must be equipped with a non-coaxial Stage I connection. In addition, any modification to a storage tank existing prior to November 15, 1993, requiring excavation of the top of the storage tank must be equipped with a non-coaxial Stage I connection, even if the original installation utilized coaxial Stage I connections. At any facility for which a Stage II system was installed prior to November 15, 1993, the Stage I system utilized must be consistent with the relevant requirements of the CARB Executive Order for the Stage II system installed at that facility;

(11) in the covered attainment counties, any storage tank installed after December 22, 1998 which is required to install Stage I control equipment must be equipped with a non-coaxial Stage I connection. In addition, any modification to a storage tank existing prior to December 22, 1998, requiring excavation of the top of the storage tank must be equipped with a non-coaxial Stage I connection, even if the original installation utilized coaxial Stage I connections; and

(12) any motor vehicle fuel dispensing facility that no longer meets an exemption in §115.227 of this title (relating to Exemptions) because of an increase in throughput shall have 120 days to come into compliance with the provisions of this subsection and will remain subject to the provisions of this section, even if its gasoline throughput later falls below exemption limits. However, if gasoline throughput exceeds the exemption limit due to a natural disaster or emergency condition for a period not to exceed one month, upon written request, the executive director may grant a facility continued exempt status.

**§115.223. Alternate Control Requirements.**

Alternate methods of complying with §115.222 of this title (relating to Control Requirements) may be approved by the executive director if:

(1) emission reductions are demonstrated to be equivalent or greater than those afforded by the requirements in §115.222 of this title; and

(2) the Stage I vapor recovery system is capable of meeting the applicable performance requirements prescribed in this division (relating to Filling of Gasoline Storage Vessels (Stage I) for Motor Vehicle Fuel Dispensing Facilities), as certified by third-party evaluation conducted by a qualified independent testing organization using a code or standard of practice, acceptable to the executive director, which has been developed by a nationally recognized agency, association, or independent testing laboratory.

**SUBCHAPTER C: VOLATILE ORGANIC COMPOUND TRANSFER OPERATIONS**

**DIVISION 4: CONTROL OF VEHICLE REFUELING EMISSIONS (STAGE II)**

**AT MOTOR VEHICLE FUEL DISPENSING FACILITIES**

**§§115.240, 115.242, 115.243, 115.245, 115.248, 115.249**

**STATUTORY AUTHORITY**

The amendments are adopted under TWC, §5.103, and §5.105, which authorize the commission to adopt rules necessary to carry out its powers and duties under the TWC; and under THSC, §382.017, which authorizes the commission to adopt rules consistent with the policy and purposes of the Texas Clean Air Act. The amendments are also adopted under THSC, §382.002, which establishes the commission's purpose to safeguard the state's air resources, consistent with the protection of public health, general welfare, and physical property; §382.011, which authorizes the commission to control the quality of the state's air; §382.012, which authorizes the commission to prepare and develop a general, comprehensive plan for the control of the state's air; §382.019, which authorizes the commission to adopt rules requiring Stage II vapor recovery systems in nonattainment areas; and §382.208, which authorizes the commission to develop and implement transportation programs and other measures necessary to demonstrate attainment and protect the public from exposure to hazardous air contaminants from motor vehicles.

The adopted amendments implement TWC, §5.103, concerning Rules and §5.105, General Policy; and under THSC, §382.002, relating to Policy and Purpose, §382.011, General Powers and Duties,

§382.012, State Air Control Plan, §382.017, Rules, §382.019, Methods Used to Control and Reduce Emissions from Land Vehicles, and §382.208, Attainment Program.

**§115.240. Stage II Vapor Recovery Definitions and List of California Air Resources Board Certified Stage II Equipment.**

(a) The following words and terms, when used in this division, have the following meanings, unless the context clearly indicates otherwise. Additional definitions for terms used in this division are found in §§115.10, 101.1, and 3.2 of this title (relating to Definitions).

**(1) Major system replacement or modification:**

(A) the repair or replacement of any stationary storage tank equipped with a Stage II vapor recovery system;

(B) the replacement of an existing California Air Resources Board (CARB) certified Stage II vapor recovery system with a system certified by CARB under a different CARB Executive Order, or certified by an approved third-party;

(C) the repair or replacement of any part of a piping system attached to a stationary storage tank equipped with a Stage II vapor recovery system, excluding the repair or

replacement of piping which is accessible for such repair or replacement without excavation or modification of the vapor recovery equipment; or

(D) the replacement of at least one fuel dispenser.

(2) **Onboard refueling vapor recovery** - A system on motor vehicles designed to recover hydrocarbon vapors that escape during refueling.

(3) **Onboard refueling vapor recovery compatible** - A Stage II vapor recovery system certified by CARB or other acceptable independent third-party evaluator, using test methods approved by the executive director, as onboard refueling vapor recovery (ORVR) compatible or a system listed in subsection (b) of this section, either of which maintains a required minimum overall system efficiency of 95% (as certified under third-party evaluation) while dispensing fuel without difficulty to both ORVR-equipped and non ORVR-equipped vehicles.

(4) **Owner or operator of a motor vehicle fuel dispensing facility** - Any person who owns, leases, operates, or controls the motor vehicle fuel dispensing facility.

(b) The table contained in this subsection is a list of the Stage II vapor recovery systems certified by a CARB Executive Order in effect as of January 1, 2002.

**Figure: 30 TAC §115.240(b)**

CARB Certified Stage II Vapor Recovery Systems in Effect as of January 1, 2002.

CARB Executive Order Number	Certified System
G-70-25-AA	Recertification of the Atlantic Richfield Balance Phase II Vapor Recovery System
G-70-33-AB	Certification of the Modified Hirt VCS-200 Vacuum Assist Phase II Vapor Recovery System
G-70-36-AD	Modification of Certification of the OPW Balance Phase II Vapor Recovery System
G-70-37-B	Modification of Certification of the Chevron Balance Phase II Vapor Recovery System with OPW nozzles for Service
G-70-38-AB	Recertification of the Texaco Balance Phase II Vapor Recovery System
G-70-48-AA	Recertification of the Mobil Oil Balance Phase II Vapor Recovery System
G-70-49-AA	Recertification of the Union Balance Phase II Vapor Recovery System
G-70-52-AM	Certification of Components for Red Jacket, Hirt, and Balance Phase II Vapor Recovery System
G-70-53-AA	Recertification of the Chevron Balance Phase II Vapor Recovery System
G-70-70-AC	Certification of the Healy Phase II Vapor Recovery System for Service Stations
G-70-77	Certification of the OPW Repair/Replacement Parts and Modification of the Certification of the OPW Balance Phase II Vapor Recovery System
G-70-78	Certification of the E-Z Flo Nozzle Company Rebuilt Vapor Recovery Nozzles and Vapor Recovery Components
G-70-101-B	Certification of the E-Z Flo Model 3006 and 3007 Vapor Recovery Nozzles and Use of E-Z Flo Components with OPW Models 11VC and 11VE Vapor Recovery Nozzles
G-70-107	Certification of Rainbow Petroleum Products Model RA3003, RA3005, RA3006 and RA3007 Vapor Recovery Nozzles and Vapor Recovery Components
G-70-110	Certification of Stage I and II Vapor Recovery Systems for Methanol Fueling Facilities
G-70-116-F	ConVault Aboveground Tank Vapor Recovery System

CARB Executive Order Number	Certified System
G-70-118-AB	Certification of the Amoco V-1 Vapor Recovery System
G-70-125-AA	Modification of Certification of the Husky Model V Balance Phase II Vapor Recovery Nozzle
G-70-127	Certification of the OPW Model 111-V Phase Vapor Recovery Nozzle
G-70-128	Bryant Fuel Cell Aboveground Tank Vapor Recovery System
G-70-130A	Petrovault Aboveground Tank Vapor Recovery System
G-70-131A	Tank Vault Aboveground Tank Vapor Recovery System
G-70-132-A	Supervault Aboveground Tank Vapor Recovery System
G-70-132-B	Supervault Aboveground Tank Vapor Recovery System
G-70-134	Certification of the E-Z Flo Rebuilt A-4000 Series and 11V-Series Vapor Recovery Nozzle
G-70-136	FireSafe Aboveground Tank Vapor Recovery System
G-70-137	FuelSafe Aboveground Tank Vapor Recovery System
G-70-138	Phase II Vapor Recovery Systems Installed on Gasoline Bulk Plants/Dispensing Facilities with Aboveground Tanks
G-70-139	Addition to the Certification of the Hirt Model Phase II Vapor Recovery System
G-70-140-A	Integral Phase I and Phase II Aboveground Configurations with the Healy Phase II Vapor Recovery System
G-70-142-B	Phase I Vapor Recovery System for Aboveground Gasoline Storage Tanks
G-70-143	P/T Vault Aboveground Tank Vapor Recovery System
G-70-148-A	Lube Cube Aboveground Tank Vapor Recovery System
G-70-150-AE	Modification to the Certification of the Marconi Commerce Systems, Inc. (MCS) "Formerly Gilbarco" VaporVac Phase II Vapor Recovery System
G-70-152	Moiser Brothers Tanks and Manufacturing Aboveground Tank Vapor Recovery System
G-70-153-AD	Modification to the Certification of the Dresser/Wayne WayneVac Phase II Vapor Recovery System

CARB Executive Order Number	Certified System
G-70-154-AA	Modification to the Certification of the Tokheim MaxVac Phase II Vapor Recovery System
G-70-155	Petroleum Marketing Aboveground Tank Vapor Recovery System
G-70-156	Ecovault Aboveground Tank Vacuum Assist Vapor Recovery System
G-70-157	Ecovault Aboveground Tank Balance Vapor Recovery System
G-70-158-A	Firesafe Aboveground Tank Vapor Recovery System
G-70-159-AB	Modification to the Certification of the Saber Nozzle for Use with the Gilbarco VaporVac Phase II Vapor Recovery System
G-70-160	Above Ground Tank Vault Vapor Recovery System
G-70-161	Hoover Containment Systems, Incorporated Aboveground Tank Vapor Recovery System
G-70-162-A	Steel Tank Institute Fireguard Aboveground Tank Vapor Recovery System
G-70-163-AA	Certification of the OPW VaporEZ Phase II Vapor Recovery System
G-70-164-AA	Modification to the Certification of the Hasstech VCP-3A Vacuum Assist Phase II Vapor Recovery System
G-70-165	Healy Vacuum Assist Phase II Vapor Recovery System
G-70-167	EnviroVault Aboveground Tank Vapor Recovery System
G-70-168	Bryant Fuel Systems Phase I Vapor Recovery System
G-70-169-AA	Modification to the Certification of the Franklin Electric INTELLIVAC Phase II Vapor Recovery System
G-70-170	Certification of the E-Z Flo Rebuilt 5005 and 5015 Nozzles for use with the Balance Phase II Vapor Recovery System
G-70-175	Hasstech VCP-3A Vacuum Assist Phase II Vapor Recovery System for Aboveground Tank Systems
G-70-177-AA	Modification to the Certification of the Hirt VCS400-7 Vacuum Assist Phase II Vapor Recovery System
G-70-179	Certification of the Catlow ICVN-V1 Vacuum Assist Phase II Vapor Recovery System
G-70-180	Order Revoking Certification of Healy Phase II Vapor Recovery

CARB Executive Order Number	Certified System
	Systems for Gasoline Dispensing Facilities
G-70-181	Hirt VCS400-7 Bootless Nozzle Phase II Vapor Recovery System for Aboveground Storage Tank Systems
G-70-183-AA	Relating to Language Correction in Existing Executive Order G-70-183 (Healy/ Franklin System)
G-70-186	Certification of the Healy 400 ORVR Vapor Recovery System
G-70-187	Healy Model 400 ORVR Vapor Recovery System Aboveground Tank Systems
G-70-188	Certification of the Catlow ICVN Vapor Recovery Nozzle System for use with the Gilbarco VaporVac Vapor Recovery System
G-70-190	Guardian Containment, Corporation Armor Cast Aboveground Tank Vapor Recovery System
G-70-191-AA	Relating to Language Correction in Existing Executive Order G-70-191 (Healy 600 ORVR/800)
G-70-192	Certification of the Healy Model 400 ORVR Nozzle for Existing Aboveground Storage Tank Systems
G-70-193	Certification of the Hill-Vac Vapor Recovery System for Cargo Tank Motor Vehicle Fueling Systems
G-70-194	Containment Solutions Hoover Vault Aboveground Vapor Recovery System
G-70-195	Cretex Companies, Inc FuelVault Aboveground Tank Vapor Recovery System
G-70-196	Certification of the Saber Technologies, LLC SaberVac VR Phase II Vapor Recovery System
G-70-197	Synchrotek Fastflo 3 Phase II Vapor Recovery System
G-70-200	Oldcastle Aboveground Below-Grade Fuel Vault with Balance Vapor Recovery System and Buried Vapor Return Piping
G-70-201	Oldcastle Aboveground Below-Grade Fuel Vault with Balance Vapor Recovery System and Trenched Vapor Return Piping
G-70-202	Oldcastle Aboveground Below-Grade Fuel Vault with Gilbarco VaporVac Phase II Recovery System and Trenched Vapor Return Piping

**§115.242. Control Requirements.**

For all persons in the counties listed in §115.249 of this title (relating to Counties and Compliance Schedules) and affected by this division (relating to Control of Vehicle Refueling Emissions (Stage II) at Motor Vehicle Fuel Dispensing Facilities), a vapor recovery system will be assumed to comply with the specified emission limitation of §115.241 of this title (relating to Emission Specifications) if the following conditions are met.

(1) The facility is equipped with a Stage II vapor recovery system certified by a California Air Resources Board (CARB) Executive Order in effect as of January 1, 2002 (as specified in §115.240(b) of this title (relating to Stage II Vapor Recovery Definitions and List of California Air Resources Board Certified Stage II Equipment)); or certified by a CARB Executive Order in effect after January 1, 2002, except that the executive director reserves the right to continue to recognize any CARB Executive Orders decertified after January 1, 2002; or certified by an alternative procedure which meets the requirements specified in §115.243 of this title (relating to Alternate Control Requirements). In addition:

(A) Stage II vapor recovery balance systems which include vapor check valves in a location other than the nozzle may not be installed;

(B) Stage II vapor recovery systems which include dual-hang (non-coaxial) hoses may not be installed; and

(C) all Stage II vapor recovery systems must be onboard refueling vapor recovery (ORVR) compatible, as defined in §115.240 of this title in accordance with the schedules in §115.249 of this title.

(2) All underground piping must be installed by a person holding a valid License A as defined in §§334.401, 334.407, and 334.424 of this title (relating to License and Registration Required; Other Requirements for an Underground Storage Tank Container; and Other Requirements for an On-Site Supervisor). Piping specifications must be in compliance with the applicable CARB Executive Order(s) or third-party certification for the Stage II vapor recovery system. For any facility newly constructed after November 15, 1993, or at any facility undergoing a major modification to the Stage II vapor recovery system after November 15, 1993, the following requirements apply where piping specifications are not provided in the applicable CARB Executive Order(s) or third-party certification.

(A) All underground piping must be constructed of rigid material and conform to the applicable portions of the technical standards for new piping defined by §334.45(c) and (e) of this title (relating to Technical Standards for New Underground Storage Tank Systems).

(B) Noncorrodible piping or cathodically protected metallic piping must be used. In the event metallic piping is used, the applicable portions of the general requirements for corrosion protection defined by §334.49(a)(1) - (5) and (c)(1) - (4) of this title (relating to Corrosion Protection) apply.

(C) Minimum slope on vapor piping must be 1/8 inch per foot from the dispenser to the storage tank. Piping installed after January 1, 2002 must not include liquid collection points (condensate traps) unless the associated underground storage tanks:

(i) were installed prior to November 15, 1992; and

(ii) are not at sufficient depth to allow for minimum slope requirements.

(D) Vapor piping on balance systems must be two inches or greater in diameter, and when there are more than four fueling points connected to one vapor line, the minimum vapor piping size must be three inches in diameter. For the purposes of this paragraph, a single nozzle dispenser constitutes one fueling point and a multi-nozzle dispenser constitutes two fueling points.

(E) Riser piping must have a minimum inside diameter of one inch and must slope towards the storage tank at all points. Riser piping is defined as the predominantly vertically oriented vapor recovery piping that enters the gasoline dispenser base, which connects the dispenser mounted piping with the buried vapor recovery piping that leads to one or more storage tanks.

(F) If a fire protection agency with jurisdiction requires a vapor shear valve on the vapor return line at the base of a dispenser, the shear valve must be CARB-certified and/or Underwriters Laboratories listed for use in vapor recovery systems.

(3) The owner or operator shall maintain the Stage II vapor recovery system in proper operating condition, as specified by the manufacturer and/or any applicable CARB Executive Order(s) or third-party certification, and free of defects that would impair the effectiveness of the system, including, but not limited to:

(A) absence or disconnection of any component that is a part of the approved system;

(B) a vapor hose that is crimped or flattened such that the vapor passage is blocked, or the backpressure through the vapor system exceeds the value as certified in the approved system's CARB Executive Order(s) or third-party certification;

(C) a nozzle boot that is torn in one or more of the following ways:

(i) a triangular-shaped or similar tear more than 1/2 inch on a side;

(ii) a hole more than 1/2 inch in diameter; or

(iii) a slit more than one inch in length;

(D) for balance nozzles, a faceplate that is damaged such that the capability to achieve a seal with a fill pipe interface is affected for a total of at least one-fourth of the circumference of the faceplate;

(E) for booted nozzles in vacuum assist type systems, a flexible cone for which a total of at least one-fourth of the cone is damaged or missing;

(F) a nozzle shut-off mechanism that malfunctions in any manner;

(G) vapor return lines, including such components as swivels, anti-recirculation valves, and underground piping, that malfunction, are blocked, or are restricted such that the pressure decay and/or dynamic backpressure through the line exceeds the value as certified in the approved system's CARB Executive Order(s) or third-party certification;

(H) a vapor processing or control unit that is inoperative or defective;

(I) a vacuum producing device that is inoperative or defective;

(J) pressure/vacuum relief valves, vapor check valves, or Stage I dry breaks that are inoperative or defective;

(K) a system monitor or printer that is malfunctioning or out of paper;

(L) a nozzle, hose, break-away, or any other component that is not approved for use with the certified vapor recovery system in use; and

(M) any equipment defect that is identified in the certification of an approved system as substantially impairing the effectiveness of the system in reducing refueling vapor emissions.

(4) No gasoline leaks, as detected by sampling, sight, sound, or smell, exist anywhere in the dispensing equipment or Stage II vapor recovery system.

(5) Upon identification of any of the defects described in paragraphs (3) and (4) of this section, the owner or operator or his or her representative shall remove from service all dispensing equipment for which vapor recovery has been impaired. The impaired equipment must remain out of service until such time as the equipment has been properly repaired, replaced, or adjusted, as necessary. Once repaired, the equipment may be returned to service by the owner or operator or his or her representative.

(6) Upon identification of any of the defects described in paragraphs (3) and (4) of this section, any inspector with jurisdiction shall tag the impaired equipment out-of-order. The "Out-of-Order" tag must state "use of this device is prohibited under state law, and unauthorized removal of this tag or use of this equipment will constitute a violation of the law punishable by a maximum civil penalty of up to \$25,000 per day or a maximum criminal penalty of \$50,000 and/or up to 180 days in jail." The impaired equipment must remain out of service until such time as the

equipment has been properly repaired, replaced, or adjusted, as necessary. After repairs are completed and verbal notification is given to the agency that originally tagged the equipment out of service, the "Out-of-Order" tag may be removed by the owner or operator or the facility representative and the equipment may be returned to service. Within ten days of placing the equipment back in service, written notification that the equipment has been returned to service must be provided by the owner or operator or the facility representative to the agency that originally tagged the equipment out-of-service. For the purposes of this paragraph, "facility representative" has the meaning ascribed to it in §115.248(1) of this title (relating to Training Requirements).

(7) No person shall repair, modify, or permit the repair or modification of the Stage II vapor recovery system or its components such that they are different from their approved configuration, and only original equipment manufacturer (OEM) parts or CARB-certified non-OEM aftermarket parts shall be used as replacement parts.

(8) No person shall tamper with, or permit tampering with, any part of the Stage II vapor recovery system in a manner that would impair the operation or effectiveness of the system.

(9) The owner or operator of a motor vehicle fuel dispensing facility shall post operating instructions conspicuously on the front of each gasoline dispensing pump equipped with a Stage II vapor recovery system. These instructions, at a minimum, include:

(A) a clear description of how to correctly dispense gasoline using the system;

and

(B) a warning against attempting to continue to refuel after initial automatic shutoff of the system (an indication that the vehicle fuel tank is full).

(10) Any motor vehicle fuel dispensing facility that does not meet an exemption in §115.247 of this title (relating to Exemptions) shall have 120 days to come into compliance with the provisions of this division and will remain subject to the provisions of this division even if its gasoline throughput later falls below throughput limits, except that:

(A) at a facility exempted under §115.247(2) of this title for which an exceedance occurred between January 1, 1991, and November 15, 1992, the owner or operator may petition the executive director to permit a continuance of the facility's exempt status provided that the average monthly throughput calculated from January 1, 1991, to November 15, 1992, remained below 10,000 gallons. If exempt status is continued by the executive director, the annual verification of exempt status as required in §115.247(2) of this title must be fulfilled; and

(B) at a facility exempted under §115.247(2) of this title for which an exceedance occurred for any consecutive 30-day period due to an emergency condition or natural disaster after November 15, 1992, the owner or operator may petition the executive director to permit the continuance of the facility's exempt status or extended compliance schedule status. If exempt status

is continued by the executive director, the requirement of annual verification of the status as stated in §115.247(2) of this title must be fulfilled.

(11) Any facility having installed Stage II vapor recovery system(s) or component(s) previously certified by CARB via an Executive Order, for which certification was revoked by CARB, prior to January 1, 2002, must install and have operational an approved system(s) or component(s) as referenced in paragraph (1) of this section as soon as practicable, but no later than September 1, 2006.

(12) After November 15, 1993, the owner or operator shall provide written notification of any Stage II vapor recovery system installation to the appropriate regional office and any local air pollution program with jurisdiction at least 30 days prior to start of construction. The information in the notification shall include, but is not limited to:

(A) facility name, location (physical and mailing address); name, address, and phone number of owner(s) and operator(s); name and phone number of owner's representative; name, address, and phone number of contractor(s); and the Petroleum Storage Tank Facility ID number and Owner ID number (if known);

(B) proposed start date; and

(C) type of Stage II system to be installed, including CARB Executive Order number(s) or third-party certification number(s) and the number of gasoline nozzles at the facility.

**§115.243. Alternate Control Requirements.**

Alternate methods of complying with §115.242(1) of this title (relating to Control Requirements) may be approved by the executive director if:

(1) emission reductions are demonstrated to be equivalent or greater than those afforded by the requirements in §115.242(1) of this title; and

(2) the Stage II vapor recovery system is capable of meeting the applicable performance requirements prescribed in this division (relating to Control of Vehicle Refueling Emissions (Stage II) at Motor Vehicle Fuel Dispensing Facilities), as certified by third-party evaluation conducted by a qualified independent testing organization using a code or standard of practice, acceptable to the executive director, which has been developed by a nationally recognized agency, association, or independent testing laboratory.

**§115.245. Testing Requirements.**

For all affected persons, compliance with §115.241 and §115.242 of this title (relating to Emission Specifications and Control Requirements) shall be determined at each facility by testing as follows.

(1) Within 30 days of installation, at least once every 36 months thereafter, and upon major system replacement or modification, Stage II vapor recovery systems must successfully meet the performance criteria proper to the system by successfully completing the following testing requirements using the test procedures as found in the commission's Vapor Recovery Test Procedures Handbook (test procedures handbook) (RG-399, November 2002).

(A) For balance and assist systems:

(i) the manifolding or interconnectivity of the vapor space must be consistent with the Executive Order or third-party certification requirements for the installed system (Texas test procedure TXP-101 or equivalent);

(ii) the sum of the vapor leaks in the system must not exceed acceptable limits for the system as defined in the pressure decay test (Texas test procedure TXP-102 or equivalent);

(iii) the maximum acceptable backpressure through a given vapor path must not exceed the limits as found in the backpressure/liquid blockage test applicable for the vapor path for the system (Texas test procedure TXP-103 or equivalent); and

(iv) the maximum gasoline flow rate through the nozzle must not exceed the limits found in the Executive Order or third-party certification for the system (Texas test procedure TXP-104 or equivalent).

(B) For bootless nozzle assist systems, the volume-to-liquid ratio (V/L ratio) or air-to-liquid ratio (A/L ratio) must be within acceptable limits (Texas test procedure TXP-106 or equivalent).

(C) Each system must meet minimum performance criteria specific to the individual system as defined in the California Air Resources Board (CARB) Executive Order or third-party certification. The criteria and test methods contained in the test procedures handbook specified in paragraph (1) of this section must take precedence for applicable tests where performance criteria exist in both the Executive Order and the test procedures handbook; otherwise, the Executive Order specific criteria must take precedence.

(2) Verification of proper operation of the Stage II equipment must be performed in accordance with the test procedures referenced in paragraph (1) of this section at least once every 12 months. The verification must include all functional tests that were required for the initial system test, except for TXP-101, Determination of Vapor Space Manifolding of Vapor Recovery Systems at Gasoline Dispensing Facilities, and TXP-103, Determination of Dynamic Pressure Performance (Dynamic Back-Pressure) of Vapor Recovery Systems at Gasoline Dispensing Facilities, which must be performed at least once every 36 months.

(3) The owner or operator, or his or her representative, shall provide written notification to the appropriate regional office and any local air pollution program with jurisdiction of the testing date and time and of whom will conduct the test. The notification must be received by the appropriate regional office and any local air pollution program with jurisdiction at least ten working days in advance of the test, and the notification must contain the information and be in the format as found in the test procedures handbook. Notification may take the form of a facsimile or telecopier transmission, as long as the facsimile is received by the appropriate regional office and any local air pollution program with jurisdiction at least ten working days prior to the test and it is followed up within two weeks of the transmission with a written notification. The owner or operator, or his or her representative, shall give at least 24-hour notification to the appropriate regional office and any local air pollution program with jurisdiction if a scheduled test is cancelled. In the event that the test cancellation is not anticipated prior to 24 hours before the scheduled test, the owner or operator, or his or her representative, shall notify the appropriate regional office and any local air pollution program with jurisdiction as soon in advance of the scheduled test as is practicable.

(4) Minor modifications of these test methods may only be used if they have been approved by the executive director.

(5) All required tests must be conducted either in the presence of a Texas Commission on Environmental Quality or local program inspector with jurisdiction, or by a person who is registered with the executive director to conduct Stage II vapor recovery tests. The requirement to be registered shall begin on November 15, 1993, or 60 days after the executive director has established the registry,

whichever occurs later. The executive director may remove an individual from the registry of testers for any of the following causes:

(A) the executive director can demonstrate that the individual has failed to conduct the test(s) properly in at least three separate instances; or

(B) the individual falsifies test results for tests conducted to fulfill the requirements of this section.

(6) The owner or operator, or his or her representative, shall submit the results of all tests required by this section to the appropriate regional office and any local air pollution control program with jurisdiction within ten working days of the completion of the test(s) using the format specified in the test procedures handbook. For purposes of on-site recordkeeping, the Test Procedures Results Cover Sheet, properly completed with the summary of the testing, is acceptable. The detailed results from each test conducted along with a properly completed summary sheet, as provided for in the test procedures handbook, must be submitted to the appropriate regional office and any local air pollution control program with jurisdiction.

**§115.248. Training Requirements.**

For all persons affected by this division (relating to Control of Vehicle Refueling Emissions (Stage II) at Motor Vehicle Fuel Dispensing Facilities), the following training requirements apply.

(1) The owner or operator of a motor vehicle fuel dispensing facility shall ensure that at least one facility representative receive training and instruction in the operation and maintenance of the Stage II vapor recovery system by successfully completing a training course approved by the executive director. Successful completion constitutes certification of the facility representative. Each such facility representative is then responsible for making every current and future employee aware of the purposes and correct operating procedures of the system. The required training must be completed as soon as practicable prior to the initiation of operation of the facility's Stage II equipment. The following additional requirements apply to the designation of the facility representative.

(A) For normally unattended facilities such as unattended card-lock facilities, or for normally unattended refueling facilities not open to the public, a single person may fulfill the facility representative role at more than one facility.

(B) For facilities normally attended, a single person shall not fulfill the facility representative role at more than one facility at a time.

(2) If the facility representative who received the approved training is no longer employed at that facility, another facility representative must successfully complete approved training within three months of the departure of the previously trained employee.

(3) An approved training course will include, but is not limited to, the following:

(A) federal and state Stage I and Stage II regulations (including enforcement consequences of noncompliance) and vapor recovery health effects and benefits;

(B) equipment operation and function of each type of vapor recovery system;

(C) general overview of maintenance and testing schedules and requirements for Stage II vapor recovery equipment;

(D) general overview of structure and content of California Air Resources Board (CARB) Executive Orders; and

(E) recordkeeping and inspection requirements for Stage I and Stage II vapor recovery systems.

(4) The executive director may revoke approval of a training course if the training provider:

(A) fails to administer the training course as proposed in the application made to the executive director to provide such training; or

(B) fails to notify the executive director of upcoming courses in writing at least 21 days prior to the date of the training as to the date, time, and place the training is to be held, or in

the event of a scheduled course cancellation, fails to notify the executive director at least 24 hours in advance of the cancellation, except:

(i) for all training providers, if conditions exist such that 24-hour notice of course cancellation is impossible or impracticable, notice must be given to the executive director as soon as practicable, preferably prior to the time the course was originally scheduled; and

(ii) for training courses provided at no charge to the persons who attend, such as company-provided in-house training, the 21-day advance notice does not apply, and advance notice of upcoming courses is only required when such notice is requested, in writing, by the executive director.

**§115.249. Counties and Compliance Schedules.**

(a) The rules in this division (relating to Control of Vehicle Refueling Emissions (Stage II) at Motor Vehicle Fuel Dispensing Facilities) apply to affected persons in Brazoria, Chambers, Collin, Dallas, Denton, El Paso, Fort Bend, Galveston, Harris, Hardin, Jefferson, Liberty, Montgomery, Orange, Tarrant, and Waller Counties.

(b) All affected persons shall continue to comply with this division as required by §115.930 of this title (relating to Compliance Dates).

(c) All Stage II vapor recovery systems must be onboard refueling vapor recovery (ORVR) compatible according to the following schedules:

(1) all installations of Stage II vapor recovery systems installed on or after April 1, 2005, must be ORVR compatible; and

(2) all Stage II vapor recovery systems installed before April 1, 2005, must be upgraded to an ORVR compatible system no later than April 1, 2007.