Response to Public Comment
TMDL for PCBs in Fish Tissue in Lake Worth
June 22, 2005

Tracking Number	Date Recd.	Affiliation of Commentor	Summary of Request or Comment	Summary of TCEQ Action or Explanation
001	05/02/05 (written)	Environmental Management Department, City of Fort Worth	(a) Document states that the current analytical detection limit for PCBs in fish tissue is 0.04 mg/kg; however, data presented from the Giggleman and Lewis study indicates much lower detection limits are possible.	(a) The Texas Department of State Health Services (TDSHS) has the authority for assessment of fish tissue contamination with regard to health risks due to fish consumption. TDSHS has determined that an ongoing ability to recover PCBs at a reporting limit of 0.04 mg/kg can be demonstrated through its laboratory QA/QC procedures. This value has been used as the lower limit for the TMDL fish tissue concentration. Other detection limits reported in the literature reflect differences in the ability to detect individual PCB congeners as opposed to Aroclor mixtures, as well as different laboratory capabilities. Reporting limits for single congeners are generally much lower than those of mixtures; however, cancer potency factors do not yet exist for individual congeners, and health risk assessments are based on Aroclor mixture concentrations. Wording in the TMDL has been revised to reflect that 0.04 mg/kg is the reporting limit used by TDSHS for risk assessments.
			(b) The footnote to Table 3 states that PCBs in all but two white crappie collected by Giggleman and Lewis were less than the detection limit; however, data in the original report show all values to be greater than the detection limit.	(b) Corrections have been made to the footnote.
002	05/12/05 (verbal)	Water Department, City of Fort Worth	The speaker expressed support for the TMDL and related Lake Worth restoration efforts.	The commission appreciates the commentor's support of the TMDL. No changes have been made to the TMDL based on this comment.

003	05/20/05 (written)	U.S. Air Force	(a) The TMDL mentions that the endpoint is the removal of the fish consumption advisory, but does not include a proposed number and a discussion of how the number was derived.	(a) The assessment endpoint, on which ultimate success will be evaluated, is the removal of the fish consumption advisory. The measurement endpoint, which is a numeric target, is the PCB concentration in fish tissue that is considered an acceptable risk to human health and that will allow the Texas Department of State Health Services (TDSHS) to remove the consumption advisory. The most protective target is the noncarcinogenic value for a 15-kg child, which is <0.04 mg/kg. This value was chosen as the TMDL measurement endpoint. Calculation of this numeric target is explained in the Endpoint Identification portion of the document. TDSHS has the authority and jurisdiction for the evaluation of all fish tissue data with regard to consumption risk, including any decision on how to apply numeric targets to the issuance or removal of a consumption advisory. The numeric target is a surrogate measure of the contaminant load, and can also be used to track progress toward achieving the assessment endpoint. Revisions have been made to the TMDL in order to clarify this issue.
			(b) Commentor asks if the City of Fort Worth water intake is indicated on the map in Figure 2 of the document.	(b) Public water supply intakes have not been indicated. The health risk in this case is via fish consumption. PCB concentrations in fish tissue do not pose a risk to the public water supply. No changes have been made to the TMDL based on this comment.

			©) Commentor states that, because the AFP4 and NASFW facilities are considered industrial land uses and a portion of the cited literature discusses PCB contributions from urban land uses, TCEQ should adequately characterize urban areas to address input from areas outside AFP4 and NASFW.	©) The literature cited in the TMDL discusses the general relationship between land use and PCB contamination. Some of these studies examined separate industrial and urban land use categories, while others include industrial as a part of urban land use. Both urban and industrial land use categories have been linked to PCB contamination. The TMDL includes a discussion of the land use and the major regulated facilities in the Lake Worth watershed. Studies conducted by the U.S. Geological Survey and other contractors for the Air Force tracked the major source of PCBs to the Woods Inlet area of the lake, then to the Woods Inlet watershed, and subsequently to Meandering Road Creek and storm sewer outfalls associated with AFP4. Discussion of the findings of a more recent investigation (Earth Tech, Inc.) into PCB sources has been added to the TMDL, as has a comparison of Lake Worth sediment PCB values to those of lake sediments in other urban and industrial areas.

			The following two comments pertain to the analytical detection limit discussion in the TMDL: (d) Commentor states that the stated 0.04 mg/kg detection limit cannot be reliably measured in fish tissue, and thus the endpoint target of <0.04 mg/kg is too low. (e) Commentor states that the specific type of detection limit (instrument, method, or practical quantitative) should be indicated, and that it is unlikely laboratories can reliably measure the cited limit of 0.04 mg/kg.	(d-e) The Texas Department of State Health Services (TDSHS) has the authority for assessment of fish tissue contamination with regard to health risks due to fish consumption. TDSHS has determined that an ongoing ability to recover PCBs at a reporting limit of 0.04 mg/kg can be demonstrated through its laboratory QA/QC procedures. This value has been used as the lower limit for the TMDL fish tissue concentration. Other detection limits reported in the literature may reflect differences in the ability to detect individual PCB congeners as opposed to Aroclor mixtures, as well as different laboratory capabilities. Reporting limits for single congeners are generally much lower than those of mixtures; however, cancer potency factors do not yet exist for individual congeners, and health risk assessments are based on Aroclor mixture concentrations. Wording in the TMDL has been revised to add this information and to indicate that 0.04 mg/kg is the reporting limit used by TDSHS for risk assessment purposes.
			(f) The default fish consumption rate of 30 grams of fish per day for adults is too high.	(f) The Texas Department of State Health Services (TDSHS) has the authority for assessment of fish tissue contamination with regard to health risks due to fish consumption. The consumption rate of 30 grams per day has been established by TDSHS for use in those assessments, and has therefore been used to calculate the TMDL fish tissue target. Any decision to alter the default consumption rate must be made by TDSHS. No changes have been made to the TMDL based on this comment.