

Response to Public Comment on the Proposed Removal of Port Arthur from the Air Pollutant Watch List

Texas Commission on Environmental Quality Air Permits Division

May 27, 2014

The Texas Commission on Environmental Quality (TCEQ) accepted public comments on its proposal to remove Port Arthur from its Air Pollutant Watch List (APWL). The TCEQ accepted written comments from August 28, 2013, through October 11, 2013.

Additionally, the TCEQ conducted a public meeting in Port Arthur to receive oral and written comments on its proposal on October 8, 2013. The Honorable Joseph D. Deshotel, State Representative for House District 22, the Honorable Jeff Branick, Jefferson County Judge, and the South East Texas Regional Planning Commission (SETRPC) provided oral testimony at the public meeting. SETRPC also provided written comments, as did the Honorable Allan B. Ritter, State Representative for House District 21, Texas Chemical Council (TCC), and the Plant Managers' Forum (d/b/a Industry of Southeast Texas) (Industry of Southeast Texas). All commenters supported the removal of Port Arthur from the APWL. The comments are summarized below.

Comment: Representative Deshotel expressed thanks to the TCEQ for its efforts to work with the Port Arthur industrial group, the local refineries, and local plants in monitoring and reducing benzene levels down to the level that they are now, which is closer to 0.44 parts per billion (ppb)—well below 1.4 ppb and the levels they were when monitoring began. Representative Deshotel commented that, except for 2008, levels have been below 1.4 ppb, which is very important for a number of reasons: particularly the health reasons of the people that live in the area; important to the quality of life for everyone; and from an economic development standpoint, an area that used to be known for high pollution is being known for much cleaner air. Representative Deshotel

further commented that each time there are expansions, because of the permitting process, not only is the new equipment state-of-the-art and lower in emissions, companies are also working on existing equipment at the plants and making them more efficient. Representative Deshotel also specifically noted that, even though Port Arthur will not remain on the APWL, area industries aren't going to be getting a "free hand" since monitoring will continue in the same areas. Representative Deshotel commented that getting placed on the APWL puts a target on your back and makes the community look unsafe, but that Port Arthur industry and citizens have worked together to make the changes that brought the area well below that danger level. Representative Deshotel commented that Port Arthur should not have the APWL designation anymore if it is not necessary. Representative Deshotel commented that when the TCEQ or the U.S. Environmental Protection Agency (EPA) says that an area has a dangerous situation, citizens take TCEQ's word and say that something should be done about it. He further commented that it is a two-way street—that citizens need to believe the TCEQ saying it is not a dangerous situation and move forward with that information, with the confidence that the area is going to continue to be monitored. Representative Deshotel commented that there has been a 56 percent reduction in emissions in Port Arthur plants over the last several years and a 96 or 98 percent reduction in upsets over the last few years, indicating that the area has made some significant strides. Representative Deshotel commended the TCEQ, industry, and citizen groups for working together to reach this very important goal.

Comment: Representative Ritter expressed his full support of the removal of Port Arthur from the APWL, commenting that, while the industrial sector in Southeast Texas has grown significantly over the past ten years, substantial reductions in air emissions have also occurred. Representative Ritter stated that objective data from the monitors placed have shown a steady decline in benzene levels, which was achieved from several sources within the area that implemented improvements leading to reductions in emissions. Representative Ritter further commented that city leaders and the industrial sector worked hard to achieve these results.

Comment: SETRPC stated that its regional air monitoring program, which is funded through voluntary contributions from area industries, has been monitoring air quality in the Beaumont-Port Arthur area since 1989. SETRPC commented that it worked hand-in-hand with the TCEQ when it started its program, that it shares the collected data with the TCEQ, and that it has established a historical database providing information on the trends in benzene levels in the Port Arthur area. SETRPC further commented that the data show industry has committed to, and achieved, good progress in reducing emissions from their facilities, and the current measured levels of benzene in the Port Arthur area demonstrate the success of their efforts. SETRPC further stated that it recognized the ongoing need to continue to protect the health of the Port Arthur citizens, and its monitoring program continues to provide data in that regard.

Comment: Judge Branick stated that he was born and raised in Port Arthur and was familiar with what the air and water quality was when he grew up there. Judge Branick stated that he was also familiar with the significant strides that have been made in those areas, both because of the TCEQ's oversight and the attitudes of the refiners

and the chemical manufacturers over the years, as they have changed and installed new equipment that has significantly impacted the emissions. He commented that when he first got out of law school 29 years ago, he represented plant workers with leukemia and aplastic anemia cases and thus has an in-depth understanding of benzene and its effects. Judge Branick stated that he supports Port Arthur's delisting and that he understands how scarce governmental resources sometimes are. He further commented that governmental resources not be expended looking at something that industry and local governments working through the regional planning commission are already monitoring.

Comment: TCC expressed appreciation for the continuous work by the TCEQ and industry to reduce the level of benzene in the Port Arthur area and credited the TCEQ's continued use of monitoring, investigations, enforcement, and air permitting efforts for the companies located in the APWL area. TCC also expressed support for industry and TCC member companies for their voluntary measures to reduce benzene emissions, particularly since there are ten chemical plants located in the Port Arthur APWL area and benzene is widely-used in the chemical industry. TCC reiterated that the TCEQ's Toxicology Division established benzene's long-term, health-based air monitoring comparison value (AMCV) at 1.4 ppb based on a lifetime exposure, and that concentrations below this level do not present expected adverse health effects. TCC noted that the AMCV was increased in 2007 from the previous level of 1.0 ppb after the TCEQ conducted a thorough scientific evaluation of benzene's toxicity, and that the short-term AMCV for benzene, based on data concerning acute health effects, the potential for odors, and effects on vegetation, is set at 180 ppb. TCC also stated that data on ambient benzene concentrations have been continuously collected since 1997 at the City Service Center monitor, which is the only monitor at which average benzene concentrations were persistently elevated. TCC noted that Port Arthur was placed on the APWL in 2001 because the annual average benzene concentration equaled or exceeded the AMCV every calendar year that monitoring had been conducted up to that point. TCC also noted that, currently, there are three TCEQ-operated canister sampler monitors located within the APWL area that each take a 24-hour concentration every sixth day, and that, additionally, SETRPC owns three more stationary monitors in the area that measure ambient benzene concentrations, two of which collect 24-hour concentrations every 12 days. TCC stated that, all together, these monitoring stations provide an extensive and adequate amount of data upon which to make a determination to delist the area from the APWL. TCC also noted that ambient benzene concentrations have been below the current long-term AMCV 10 of the last 11 years, showing only one spike in 2008, and have otherwise been showing a fairly consistent downward trend. TCC stated that this downward trend can be explained by the fact that industry, including TCC member companies, have been working internally and with the TCEQ and the EPA to reduce benzene emissions from their facilities. TCC further commented that these operational and infrastructure changes will result in a permanent reduction of benzene emissions, and that many of these changes have been incorporated into consent decrees, agreed orders, and permit amendments. For example, TCC noted that one company in the area has adopted a stringent leak detection and repair program and utilizes an infrared camera to identify leaks and make more timely repairs in addition to improving its wastewater management practices, and another company has ceased its

benzene production completely and has reduced its benzene storage and handling, while other companies have agreed to improve leak detection and repairs, make pollution control upgrades, install controls to mitigate the release of benzene from wastewater treatment and conveyance systems, and implement new controls and operational limits on equipment degassing and tank landings and refillings, among other activities. TCC noted that, since its listing in 2001, the Port Arthur area only exceeded the current long-term AMCV of 1.4 ppb in 2008, and that two significant events (one of which was later shown to be due to a spill at a facility in the area) are attributed to causing that year's spike. TCC stated that the area as a whole has been experiencing a significant downward trend of ambient benzene concentrations, evidenced by monitoring data at the City Service Center location, which has been below the standard over the last four years. TCC commented that, in addition to the assurances provided by individual industrial companies over the area, the TCEQ will continue to monitor the area to ensure that no issues arise, such as an isolated event similar to that which occurred in 2008.

TCC stated that, overall, the Port Arthur area should be removed from the APWL for benzene because, other than for a single event which caused a spike, the area has shown a downward trend for ambient benzene concentrations and has been monitored below the standard over the last four consecutive years. TCC also stated that permanent operational and infrastructure changes by industry, many of which are incorporated into consent decrees, agreed orders, and permit amendments, will ensure the continued reduction in benzene emissions and ambient concentrations. Finally, TCC supported the continued use of the APWL protocol for listing and delisting pollutants and supported the delisting of benzene in Port Arthur as an example of following the protocol. TCC stated that, because the TCEQ believes that all appropriate measures are in place to ensure with reasonable expectation that the level of benzene in the Port Arthur APWL will remain below the level deemed to be protective of public health and the environment, TCC fully supports the delisting of benzene from the Port Arthur APWL area.

Comment: Industry of Southeast Texas noted that the TCEQ added Port Arthur to the APWL in 2001 and commented that, since that time, industry both within and adjacent to the APWL area has prioritized efforts to reduce benzene concentrations, resulting in a significant reduction of benzene emissions and a significant improvement in benzene concentrations at the City Service Center monitor. Industry of Southeast Texas stated that its main focus has been and continues to be improving plant reliability by upgrading older facilities with new pollution control technology, implementing robust mechanical integrity programs, and trained and committed people. Industry of Southeast Texas also noted that they have implemented stringent leak detection and repair programs, employed infrared cameras within industry to help quickly identify leaks and make more timely repairs, and, as a result of these efforts, reportable annual emissions by its member companies have been reduced by more than 45 percent between 2000 and 2001 and greater than 85 percent in the quantity of pollutants emitted from unplanned emission events during the same time period. Industry of Southeast Texas stated that it has provided financial support for more than 20 years through voluntary contributions to SETRPC to supplement the TCEQ's air monitoring in the area with additional monitors, and that benzene levels measured by SETRPC inside the APWL area and in nearby communities have been holding below the TCEQ's AMCV

with a significant margin of safety, noting that, as always, these data are available to the TCEQ upon request. Industry of Southeast Texas commented that removing Port Arthur from the APWL is a major achievement and further commented that it will remain committed to continued improvement of the air quality in the area, maintaining its air monitoring resources, and encouraging the TCEQ to continue its air monitoring efforts as well.

Response: The TCEQ appreciates the testimony and comments supporting the area's delisting from the APWL. The TCEQ is finalizing the removal of Port Arthur from the APWL.