

## **PMVictoriaESPPEm Resource**

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**From:** Terry, Tomeka  
**Sent:** Thursday, May 24, 2012 8:44 PM  
**To:** Joshua.Trembley@exeloncorp.com  
**Cc:** Haque, Mohammad; Richard Codell; Gregory Poremba; Purdie, Michael; Avci, Halil I.; Wescott, Konstance L.; VictoriaESP Resource  
**Subject:** Victoria RAIs  
**Attachments:** Victoria Hydrology RAIs .doc; Socioeconomics& EJ RAIs (2).doc

JT,

Attached are draft Socio/EJ and Hydrology RAIs. If you have any questions please let me know.

Thanks!  
Tomeka

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**From:** Terry, Tomeka

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Files	Size	Date & Time
MESSAGE	139	5/24/2012 8:44:22 PM
Victoria Hydrology RAls .doc	48122	
Socioeconomics& EJ RAls (2).doc	44654	

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Request for Additional Information No. 6483 Revision 0

Victoria County Station ESP

Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 2.3.2 - Water Use

Application Section: Part 3, Environmental Report Section 2.3

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 2.3.2-1

HY-1 ESRP Section 2.3, "Water Use" directs the staff to obtain information for the proposed site related to the potential impacts on existing and known future water users during the period of project operation. ESRP Section 4.2 directs staff to obtain information to describe the hydrological alterations and water-use impacts from construction. ESRP Section 9.3 the staff to perform similar analyses for alternative sites in the region of interest. The staff needs to review surface water and groundwater uses at the alternative sites, particularly with regard to cumulative effects. The applicant agreed to provide links to water authorities that have this information. However, this form of reference citation only partially fulfills the applicant's responsibility to provide this information, and we therefore request that the applicant compile the information from the source documents. Provide information on past, present, and reasonably foreseeable water users in the vicinity of the alternative sites; i.e., users that could impact surface water and groundwater use and quality in bodies used by or affected by a potential nuclear plant at that location during the periods of construction and operation.

Request for Additional Information No. 6484 Revision 0

Victoria County Station ESP

Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 3.4 - Operational Activities

Application Section: Part 3,, Environmental Report Section 3.4

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 3.4-1

HY-2 ESRP Section 3.4.2 directs the staff to obtain information on the proposed intake, discharge and heat-dissipation systems. ESRP Section 5.2.1 directs the staff to identify, analyze and describe hydrologic alterations resulting from plant operation and the adequacy of water sources to supply plant water needs. ESRP section 9.4.2 directs the staff's analysis of alternatives to the proposed circulating water system. The staff needs to review the performance of the intake structure, particularly the approach velocity, trash removal, and maintenance. Therefore, the staff requests that the applicant provide information on the design and performance characteristics of the intake structure on the Guadalupe River and the alternative sites location. This information includes the approach velocity, trash removal, and maintenance of the structures, where available. Provide and docket the design reports for the VCS intake structure at the Guadalupe River location and the alternative sites location.

HY-3 ESRP Section 3.4.2 directs the staff's preparation of the proposed intake, discharge and heat dissipation system design and performance characteristics. The staff needs to review the performance of the discharge structure in terms of the thermal plume, erosion, and maintenance under a range of flow conditions in the Guadalupe River. Therefore, the staff requests that the applicant provide and docket any design reports on the discharge structure, especially the CORMIX model run reports. Provide additional information on the design and performance of the discharge structure in the Guadalupe River.

Request for Additional Information No. 6490 Revision 0

Victoria County Station ESP

Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 4.2 - Water-Related Impacts

Application Section: Part 3, Environmental Report Section 4.2.1

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 4.2-1

HY-4 ESRP Section 4.2.1 directs the Staff's identification, analysis and description of hydrologic alterations resulting from construction activities. There are apparently no BMPs listed in section 4.2.1 specifically for surface water, although they are listed in Section 4.3.2.3 with regard to construction of the RWMU pump station, intake canal and pipeline. Provide information on Best Management Practices (BMPs) that would be used in plant construction to protect surface water.

Request for Additional Information No. 6521 Revision 0

Victoria County Station ESP

Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 5.2 - Water-Related Impacts

Application Section: Part 3, Environmental Report Section 5.2

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 5.2-1

HY-5 ESRP Section 5.2.1 directs the staff's identification, analysis, and description of hydrologic alterations resulting from plant operation and the staff's analysis of the adequacy of the water sources proposed to supply plant water needs. It was mentioned during the VCS site audit meetings that there are calculations showing the effect of freshwater inflows from the Guadalupe River on the average salinity of San Antonio Bay. The staff would like to review the calculations and results from any available reports on this subject. The staff also requests any reports that estimate the effects of freshwater flow from the Guadalupe River on the salinity of Aransas Bay, particularly with regard to the Whooping Crane habitat. Provide available calculations for the Guadalupe River estuary, San Antonio Bay, and adjacent bays showing the potential effect of freshwater flow rate on salinity.

HY-6 ESRP Section 5.2.1 directs the staff's identification, analysis, and description of hydrologic alterations resulting from plant operation and the staff's analysis of the adequacy of the water sources proposed to supply plant water needs. ESRP Section 5.2.2 directs the staff's analysis and assessment of predicted impacts of plant operation on water use. ER Section 5.2.1.2.1 and 5.2.2.2 describe the analysis of development of groundwater from the Evangeline aquifer for VCS needs. The staff needs to review these studies for the adequacy of groundwater supply, effects on other groundwater users, and the potential for salt water intrusion. Please provide and docket the report "Groundwater Supply Development Study (25352-000-G65-GEK-00001, Rev 001)" and any other similar reports on this subject. Provide information on development of groundwater from the aquifers beneath the site for construction and operational needs.

Request for Additional Information No. 6491 Revision 0

Victoria County Station ESP

Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 9.3 - Alternative Sites

Application Section: Part 3, Environmental Report Section 9.3

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 9.3-1

HY- 7 ESRP Section 9.3 directs the staff's analysis and evaluation of alternatives to the applicant's proposed site for the construction and operation of a nuclear power plant. There is little or no information about the locations and types of intakes and discharges for the alternative sites in section 9.3. The designs and locations for the intake and discharge at the alternative sites are part of information needed for the staff review. Provide diagrams showing the designs of and the approximate locations of the intake and discharge structures for the alternative sites.

HY-8 ESRP Section 9.3 directs the staff's analysis and evaluation of alternatives to the applicant's proposed site for the construction and operation of a nuclear power plant. There is no information on the proposed water treatment options for the alternative sites. Staff needs to review water treatment options that might differ from those options explored for the preferred site. Provide information on water treatment options for the alternative sites, including chemicals used and rates of use for fresh water and salt water cooling systems.

Request for Additional Information No. 6492 Revision 0

Victoria County Station ESP

Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 9.4 - System Design Alternatives

Application Section: Part 3, Environmental Report Section 9.4

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 9.4-1

HY-9 ESRP Section 9.4.2 directs the staff's analysis of alternatives to the proposed circulating water system. Radial collector wells are a technology often evaluated as a low-impact alternative for nuclear power plant water supplies. Staff would like to review the feasibility of their use at the preferred and alternative sites. Provide information on the practicality of radial collector wells as an alternative technology for providing intake water.



Request for Additional Information  
No. 6461 Revision 0

Victoria County Station ESP  
Exelon Texas  
Docket No. 52-042  
SRP Section: ESP EIS 2.5 - Socioeconomics  
Application Section: Part 3, Environmental Report Sections 2.5.1

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 2.5-1

SE 2.5.1-1 ESRP Section 2.5.1 directs the staff to review the applicant's population data presented in the environmental report (ER). Population data were based on the 2000 census data throughout ER Section 2.5.1. Provide for the demographics within the region, more recent population data and estimates using verifiable sources such as the 2010 census and ACS data. Provide updated population estimates for ER Section 2.5.1.

SE 2.5.1-2 ESRP Section 2.5.1 directs the staff to review the applicant's transient population data presented in the ER. Transient populations should be updated to include current projects and investments. Such projects could include, but are not limited to, the Eagle Ford shale oil play, the new Caterpillar plant/facility, Caterpillar downstream manufacturing facilities, Invista plant reconfiguration, Port of Victoria expansion, hotel and residential housing development, and other major project workers in the ROI and 8-county area. Provide updated transient population estimates for ER Section 2.5.1.3.

SE 2.5.2.1-1 ESRP Section 2.5.2 directs the staff to review the applicant's employment and unemployment data presented in the ER. Update employment characteristics to recognize new local employment conditions with verifiable sources such as BLS, BEA, and local information for the ROI. Such information could include, but is not limited to, new employer characteristics at the Eagle Ford shale oil play, Invista plant reconfiguration, Caterpillar plant construction/operation, Caterpillar downstream manufacturing facilities, Port of Victoria expansion, hotel and residential housing development, and other major project workers for the ROI. Provide updated employment and unemployment information and projections for ER Section 2.5.2.1.

SE 2.5.2.2-1 ESRP Section 2.5.2 directs the staff to review the applicant's transportation/traffic data presented in the ER. Double-check numbers to make sure that all data is still accurate, including ongoing changes at the Port of Victoria. Add LOS to Table 2.5.2-7, Road Characteristics and Traffic Statistics, and a description to the narrative. Provide updated transportation/traffic information and projections for ER Section 2.5.2.2.

SE 2.5.2.3.4-1 ESRP Section 2.5.2 directs the staff to review the applicant's project site tax data presented in the ER. Provide additional information about the acreage, taxable value, location, and school district location for the two parcels that were added to the project site (see ER Table 2.5.2-19). Provide additional VCS site parcels and assessed value data for ER Section 2.5.2.3.4.

SE 2.5.2.5-1 ESRP Section 2.5.2 directs the staff to review the applicant's recreational use and availability data presented in the ER. Provide City, County, and ROI recreational facility and area use and availability data, if available. If not, indicate the jurisdictions where acres/1,000 population does not meet the standard selected as presented in ER table 2.5.2-33. Provide additional recreational use and availability data for ER Section 2.5.2.5.

SE 2.5.2.6-1 ESRP Section 2.5.2 directs the staff to review the applicant's hotel/motel and housing estimates and projections presented in the ER. The 2000 census housing data used to characterize number and types of units, vacancy, and adequacy of structures may no longer accurately reflect existing conditions. The staff assumes that housing data from organizations such as the regional planning organization (GCRPC), the Swearingen Report (Ron Brown Company – Caldwell Banker, September 2011), or other authoritative sources may provide more detailed information relative to the communities that could be affected by an influx of workers. Additional data relative to temporary lodging (hotels, motels, RV parks) would also be needed to assess potential impacts of the temporary construction workforce. Provide updated hotel/motel and housing estimates and projections for ER Section 2.5.2.6.

SE 2.5.2.7-1 ESRP Section 2.5.2 directs the staff to review the applicant's infrastructure and public services data presented in the ER. Provide updated information about the latest ROI infrastructure improvements (water, sewer, streets and other); new or additional water rights capacities and treatment plant upgrades; and police/fire/emergency response capabilities. Provide updated infrastructure and public services information for ER Section 2.5.2.7.

SE 2.5.2.8-1 ESRP Section 2.5.2 directs the staff to review the applicant's schools and higher education capabilities data presented in the ER. Provide updated information about the latest additions to school facilities, conversion of the University of Houston campus to a 4-year institution, and training programs in Victoria County and the surrounding ROI. Provide updated schools and higher education capabilities information for ER Section 2.5.2.8.

SE 2.5.2.8-2 ESRP Section 2.5.2 directs the staff to review the applicant's schools and higher education capabilities data presented in the ER. In correspondence from Exelon Generation on May 5, 2011 (NP-11-0015; D087 LIRO), updated information was provided indicating that the VCS site consists of 11 total parcels, with 9 of those parcels in the Refugio ISD and 2 parcels in the Victoria ISD. Although this topic is discussed in the ESP ER Section 2.5.2.3.5, updated pertinent information and discussions about funding issues for the Refugio ISD and Victoria ISD should also be provided in ESP ER Sections 2.5.2.8.1.5 and 2.5.2.8.1.6. The ESP ER Section 4.4.2.2.2 (page 4.4-26) indicated that the power block would be located in the Victoria ISD, but discussions with local leaders during the Site Audit indicated that the power block would be located in the Refugio ISD. Confirm the proposed location of the power block and describe Victoria ISD's "property-poor" (Chapter 42) property tax revenue status and Refugio ISD's

“property-wealthy” (Chapter 41) status in Section 2.5.2.8, as a baseline for understanding later impact analyses. Provide additional school/education information for ER Section 2.5.2.8.

SE 2.5.4-1 ESRP Section 2.5.4 directs the staff to review the applicant’s environmental justice minority and low-income population data presented in the ER. Provide updated Census Block Group (CBG) population information for minority and low-income populations using the 2010 Census data, ACS and/or other current sources. Provide updated environmental justice minority and low-income population information for ER Section 2.5.4.

Request for Additional Information  
No. 6462 Revision 0

Victoria County Station ESP  
Exelon Texas  
Docket No. 52-042

SRP Section: ESP EIS 4.4 - Socioeconomic Impacts  
Application Section: Part 3, Environmental Report Sections 4.4.2 and 4.4.3

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 4.4-1

SE 4.4.2-1 ESRP Section 4.4.2 directs the staff to review the applicant's worker in-migration population data presented in the ER. Provide support for the 95% in-migration assumption, and some additional narrative to ER Section 4.4.2 to support the assumption. Provide additional worker in-migration information for ER Section 4.4.2.

SE 4.4.2-2 ESRP Section 4.4.2 directs the staff to review the applicant's construction cost data presented in the ER. Verify the range of plant construction costs assumptions to conduct the impact analyses. Provide additional construction cost information for ER Section 4.4.2.

SE 4.4.2-3 ESRP Section 4.4.2 directs the staff to review the applicant's tax revenue data presented in the ER. Verify the tax impacts calculations, add an estimate of worker property tax contributions, and add footnotes or revise titles as appropriate to facilitate understanding of jurisdictional tax revenues addressed by the presented data. Provide additional tax revenue information for ER Section 4.4.2.

SE 4.4.2-4 ESRP Section 4.4.2 directs the staff to review the applicant's potential construction workforce residence distribution data presented in the ER. Conduct, or provide the previous analysis, to identify where the construction workforce would likely reside within each county in the ROI. Provide an existing model or prepare a new model for construction workforce distribution (for example a gravity model). Re-evaluate impacts as needed based upon that analysis. Provide additional information about potential construction workforce residence distribution for ER Section 4.4.2.

SE 4.4.3-1 ESRP Section 4.4.3 directs the staff to review the applicant's minority population potential impacts presented in the ER. Provide additional discussion and analysis about the potential minority population impacts from Highway 77 bordering the Hispanic CBG, and potential impacts from construction related traffic. Provide additional information about minority population potential impacts for ER Section 4.4.3.

Request for Additional Information  
No. 6510 Revision 0

Victoria County Station ESP  
Exelon Texas

Docket No. 52-042

SRP Section: ESP EIS 5.4 - Socioeconomic Impacts

Application Section: Part 3, Environmental Report Section 5.8.2 and Section 5.8.3

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 5.4-1

SE 5.8.2-1 ESRP Section 5.8.2 directs the staff to review the applicant's potential operational workforce residence distribution impacts presented in the ER. Conduct, or provide the previous analysis, to identify where the construction workforce would likely reside within each county in the ROI. Provide an existing model or prepare a new model for construction workforce distribution (for example a gravity model). Re-evaluate impacts as needed based upon that analysis. Provide additional information about potential operational workforce residence distribution for ER Section 5.8.2.

SE 5.8.3-1 ESRP Section 5.8.3 directs the staff to review the applicant's minority population potential impacts presented in the ER. Provide additional discussion and analysis about the potential minority population impacts from Highway 77 bordering the Hispanic CBG, and potential impacts from operations related traffic. Provide additional information about minority population potential impacts for ER Section 5.8.3.

Request for Additional Information  
No. 6511 Revision 0

Victoria County Station ESP  
Exelon Texas  
Docket No. 52-042

SRP Section: ESP EIS 7.4 - Socioeconomics and Environmental Justice  
Application Section: Part 3 Environmental Report Section 5.11

QUESTIONS for Environmental Projects Branch 2 (RAP2)

ESP EIS 7.0-1

SE 5.11-1 ESRP Section 5.11 directs the staff to review the applicant's impact information about cumulative projects occurring and proposed in the ROI and 8-County area presented in the ER. The section should be updated to include past, present, and reasonably foreseeable projects. Examples include, but are not limited to, the Eagle Ford shale oil/gas fracking, Caterpillar new plant/facility, Caterpillar downstream manufacturing facilities, Invista plant reconfiguration, Port of Victoria expansion, hotel and residential housing development, Port Comfort Plastics Plant, the potential new STP nuclear power plant, and other reasonably foreseeable major project workers in the ROI and 8-county area. Provide additional impact information about cumulative projects occurring and proposed in the ROI and 8-County area for ER Section 5.11.

SE-5.11.2 ESRP Section 5.11 directs the staff to review all of the applicant's correspondence and documentation of personal communications used to support the cumulative impact analysis presented in the ER. The projects that were considered in determining that cumulative impacts would be SMALL were very limited in ER Section 5.11. Provide copies of all correspondence and documentation of personal communications used to support the cumulative impact analysis presented in the ER, including, but not limited, to discussions with local government authorities on current or future activities/projects (public or private) in the vicinity of the VCS site for ER Section 5.11.