

Bryan W. Shaw, Ph.D., *Chairman*  
 Buddy Garcia, *Commissioner*  
 Carlos Rubinstein, *Commissioner*  
 Mark R. Vickery, P.G., *Executive Director*

## TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

*Protecting Texas by Reducing and Preventing Pollution*

February 9, 2010

RECEIVED

Ms. Marilyn Kray  
 Vice-President, Project Development  
 Exelon Generation  
 200 Exelon Way, KSA1-E  
 Kennett Square, Pennsylvania 19348

FEB 16 2010

MARILYN C. KRAY

Dear Ms. Kray

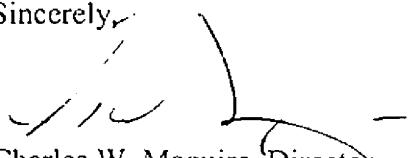
Thank you for your December 21, 2009 letter requesting information about the potential 401 certification of a Nuclear Regulatory Commission (NRC) license for the proposed Exelon Generation Company's Victoria County Station. Your letter states Exelon's intentions to only seek NRC authorization for "pre-construction" activities and that at this time you are not requesting authorization to initiate nuclear construction activities at the Victoria County site. As you point out, any discharge activities would be required to meet the Texas Commission on Environmental Quality (TCEQ) and other regulatory agency requirements.

The TCEQ understands the NRC requires a Section 401 certification decision as part of their NRC license process. Staff of the NRC and TCEQ have discussed the NRC's requirement for a 401 certification for NRC licenses, and have not identified any discharges to waters of the U.S. that would not also be subject to regulation under either Section 402 (NPDES Permits) or Section 404 (Fill Permits). The TCEQ would like to satisfy the NRC requirement for a 401 certification decision but avoid a duplicate regulatory review of an activity that will be evaluated under separate permitting processes.

TCEQ anticipates that the request for a Section 401 certification of the NRC license for the Victoria County Station would be waived per our authority under Title 30, Texas Administrative Code (TAC), Chapter 279.2(b)(4) to act on a request for water quality certification.

If you have any questions or need additional information regarding this waiver decision please contact Mr. David Galindo at (512) 239-0951 or by email at [dgalindo@tceq.state.tx.us](mailto:dgalindo@tceq.state.tx.us).

Sincerely,

  
 Charles W. Maguire, Director  
 Water Quality Division

NP-11-0002

January 25, 2011

Ms. Kate Zultner  
Texas General Land Office  
Coastal Resources Division  
1700 North Congress Avenue, Room 620  
Austin, Texas 78701-1495

Subject: Exelon Victoria County Station Site – Statement of Coastal Management Program Consistency and Request for Consistency Determination

References: (1) Exelon Nuclear Texas Holdings, LLC letter to USNRC, Application for Early Site Permit for Victoria County Station, dated March 25, 2010  
  
(2) Exelon Nuclear Texas Holdings, LLC letter to Texas General Land Office, Exelon Victoria County Station Site - Request for Coastal Zone Management Act Consistency Review Applicability Determination, dated December 21, 2009

Dear Ms. Zultner:

Exelon Generation Company, LLC (Exelon), met with the General Land Office (GLO) on April 15, 2008, regarding nuclear licensing activities associated with a site in Victoria County. On September 2, 2008, Exelon submitted a Combined License (COL) application to the U.S. Nuclear Regulatory Commission (NRC) seeking authorization to construct and operate a nuclear power plant at the referenced site (known as the Victoria County Station (VCS) site). Exelon subsequently withdrew the COL and informed the NRC of our intent to seek an Early Site Permit (ESP) in lieu of a COL, citing the need to take a longer term approach to new nuclear development.

Exelon submitted the ESP application to the NRC on March 25, 2010. The site referenced in the application, the VCS site, is located approximately 13 miles south of the City of Victoria in Victoria County. If the ESP application were to be approved, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. As described in 10 CFR 52, Subpart A, the ESP could later be used to support an application for a construction permit or COL to construct and operate such a plant. An ESP is valid for 10 to 20 years from the date of issuance and can be renewed for an additional 10 to 20 years.

Recognizing that an ESP (if issued) would not authorize any activities within the jurisdiction of the NRC, Exelon requested (in Reference 2) a determination from the GLO regarding the applicability of the Coastal Management Program (CMP)

January 25, 2011

Ms. Kate Zultner

Page 2

consistency determination requirements at 31 TAC 506 to the NRC action of issuing an ESP. Subsequent discussions with GLO staff indicated that it is unclear as to whether a consistency determination is required in conjunction with the issuance of an ESP. However, given that an ESP constitutes a Nuclear Regulatory Commission License under Section 103 of the Atomic Energy Act of 1954 and is therefore a "listed" federal action under 31 TAC 506.12, GLO staff recommended that Exelon submit a consistency determination request for the proposed VCS project.

The purpose of this correspondence is to provide Exelon's signed affirmation that the VCS project would comply with the goals and policies of the Texas CMP and request a CMP consistency determination from the GLO. Consistent with 31 TAC 506.30(b)(1), Exelon is providing the ESP application (Reference 1) as the basis for the consistency determination request. Enclosure 1 provides the ESP application (Enclosure 1, Attachment 4) and additional supporting information, as follows:

Enclosure 1: Completed and signed form titled "Consistency with the Texas Coastal Management Program", including the following attachments:

Attachment 1 – Supporting Notes

Attachment 2 – Project Description

Attachment 3 – Annotated Figure, Bloomington SW, CMP Atlas (Middle Texas Coast)

Attachment 4 – Two compact discs containing four of the six parts of the VCS ESP application submitted to the NRC on March 25, 2010. Disc 1 contains Part 1 – Administrative Information and Part 2 – Site Safety Analysis Report (SSAR). Disc 2 contains Part 3 – Environmental Report (ER) and Part 4 – Emergency Plan (NRC public version). The VCS ESP application is being provided consistent with the requirements at 31 TAC 506.30(b)(1).

Two portions of the VCS ESP application are not being transmitted as part of this request. Part 5, Enclosures, contains field logs from the site subsurface geotechnical investigation. Although Part 5 is not included, the information therein is publicly available on the NRC website (<http://www.nrc.gov/reactors/new-reactors/esp/victoria.html>) or upon request. Part 6 – Proprietary Information, has also been withheld, consistent with the public version of the application available on the NRC website.

The enclosed version of the application does not contain sensitive information with respect to nuclear safety or security.

January 25, 2011

Ms. Kate Zultner

Page 3

Attachment 5 – ESP application ER Table of Contents

Attachment 6 – Explanation of Consistency with Enforceable Policies at  
31 TAC 501

**Additional Authorizations Applicable to the Texas CMP**

The NRC regulations at 10 CFR 50.10(c) define the requirements for a person wishing to conduct nuclear construction:

*No person may begin the construction of a production or utilization facility on a site on which the facility is to be operated until that person has been issued either a construction permit under this part, a combined license under part 52 of this chapter, an early site permit authorizing the activities under paragraph (d) of this section, or a limited work authorization under paragraph (d) of this section.*

At this time, Exelon does not intend to seek authorization (i.e., via a limited work authorization or ESP authorizing the activities described at 10 CFR 50.10(d), as referenced in the above citation) to initiate nuclear construction activities at the VCS site prior to the issuance of a COL or construction permit (CP). Accordingly, if an ESP is approved for the VCS site, a CP or COL would later be required from the NRC prior to the initiation of nuclear construction activities. In addition to the CP or COL, numerous Federal, Texas, and local permits could be required to support the construction and operation of VCS<sup>1</sup>, as summarized in Tables 1.2-1 and 1.2-2 of the ESP application ER (see Enclosure 1, Attachment 4).

A CP or COL, like an ESP, would constitute an NRC license issued under Section 103 of the Atomic Energy Act. As a result, it is apparent that a second NRC action listed at 31 TAC 506.12 would be required to authorize the construction of nuclear facilities at VCS. Additionally, several of the non-NRC authorizations anticipated to be required to support facility construction and / or operation are included in either the list of federal actions requiring CMP consistency determinations located at 31 TAC 506.12 (e.g., U.S. Army Corps of Engineers (USACE) dredge / fill permit) or the list of applicable state agency actions found at 31 TAC 505.11 (e.g., Texas Commission on Environmental Quality (TCEQ) wastewater discharge permit).

Given the likely redundancy in the need for CMP consistency determinations, and consistent with the regulations at 31 TAC 505.11(e)(1) and (2) and 506.30(c), Exelon requests that the GLO consolidate its CMP consistency determination reviews for the applicable permits / authorizations associated with the VCS project to the extent practicable. Since Exelon is not currently seeking Federal, Texas, or local authorizations beyond the ESP, Exelon believes that it would be appropriate to

---

<sup>1</sup> Note that the reactor technology selected for the site, the regulations in place at the time of application, and other factors could affect which of the authorizations summarized in the referenced tables are ultimately required in conjunction with the VCS project.

January 25, 2011

Ms. Kate Zultner

Page 4

generally recognize the need for additional authorizations, as well the likely requirement for one or more additional Texas CMP consistency determinations, in any statement of CMP consistency for the currently proposed federal action (i.e., NRC issuance of an ESP for the VCS site).

It should be noted that the NRC does not have authority to regulate all of the activities that could be required to develop the VCS site. The NRC regulations at 10 CFR 50.10(a)(2) identify activities (informally known as "pre-construction" activities) that are not related to nuclear safety and, therefore, fall beyond the scope of NRC jurisdiction. Examples of "preconstruction" activities include site grading, monitoring well installation, and the erection of support structures. Such activities may be undertaken by an applicant prior to issuance of an NRC license or permit, subject to compliance with other applicable laws and regulations. Should Exelon choose to initiate pre-construction activities at the VCS site prior to pursuing an NRC CP or COL, we would coordinate with the GLO to determine the need for an additional or updated consistency determination in conjunction with the permits required for the applicable activities.

Please address correspondence regarding this matter to:

Exelon Generation Company, LLC  
Attn: Mr. Joshua Trembley  
200 Exelon Way, KSA1-E  
Kennett Square, PA 19348

If you have questions or require additional information, please contact Mr. Joshua Trembley at 610-765-5345.

Note that this correspondence is concurrently being transmitted to the NRC under a separate cover letter. The NRC's Environmental Project Manager for VCS is Tomeka Terry. Ms. Terry can be reached at 301-415-1488.

Respectfully,

*Marilyn Kray*

Marilyn Kray

Vice-President, Nuclear Project Development

Enclosures: (1) Completed and signed form titled "Consistency with the Texas Coastal Management Program", with six attachments

cc: Mr. Tony Williams, Texas General Land Office (w/enclosures)

## **Enclosure 1**

Completed and signed form titled  
“Consistency with the Texas Coastal Management Program”

**THE APPLICANT SHOULD SIGN THIS STATEMENT AND  
RETURN WITH APPLICATION PACKET TO:**

COASTAL PERMIT SERVICE CENTER  
TAMU-GALVESTON  
P.O. BOX 1675  
GALVESTON, TX 77553-1675  
FAX: (409) 741-4010

**FOR USACE USE ONLY:**

PERMIT #: \_\_\_\_\_

PROJECT MGR. \_\_\_\_\_

**APPLICANT'S NAME AND ADDRESS (PLEASE PRINT):**

Exelon Generation Company, LLC  
c/o Mr. Joshua Trembley  
200 Exelon Way, KSA1-E  
Kennett Square, PA 19348

The Texas Coastal Management Program (CMP) coordinates state, local, and federal programs for the management of Texas coastal resources. Activities within the CMP boundary must comply with the enforceable policies of the Texas Coastal Management Program and be conducted in a manner consistent with those policies. The boundary definition is contained in the CMP rules (31 TAC §503.1).

- To determine whether your proposed activity lies within the CMP boundary, please find the project location using the following link: <http://www.glo.state.tx.us/coastal/maps/cmp/index.html>.

**PROJECT DESCRIPTION:**

Is the proposed activity at a waterfront site or within coastal, tidal, or navigable waters?  Yes

(Note that the NRC's issuance of an Early Site Permit (ESP) would not authorize nuclear construction activities at the VCS Site.

See Attachment 1, Note 1 for additional detail)

If Yes, name affected coastal, tidal, or navigable waters: Guadalupe River

Is the proposed activity water dependent? (31 TAC §501.3(a)(14))  Yes  No

[http://info.sos.state.tx.us/pls/pub/readtac\\$ext.TacPage?sl=R&app=9&p\\_dir=&p\\_rloc=&p\\_tloc=&p\\_ploc=&pg=1&p\\_tac=&ti=31&pt=16&ch=501&rl=3](http://info.sos.state.tx.us/pls/pub/readtac$ext.TacPage?sl=R&app=9&p_dir=&p_rloc=&p_tloc=&p_ploc=&pg=1&p_tac=&ti=31&pt=16&ch=501&rl=3)

If yes, please describe how project is water dependent: NA

**Please briefly describe the project and all possible effects on coastal resources:**

Please see Attachment 2.

**Indicate area of impact:**

The Nuclear Regulatory Commission's (NRC) decision on whether to grant an Early Site Permit (ESP) for the proposed Victoria County Station (VCS) site constitutes an NRC License, as identified at TAC 506.12(a)(2)(F). Although the ESP, if issued, could later be used to support an application for a construction permit or Combined License (COL) to construct and operate one or more nuclear facilities, the ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

Attachment 1, Notes 2 and 3, provide estimates of the potential land disturbances within the CMP boundary that could be realized if Exelon were to pursue the project in the future, after obtaining the applicable Federal, Texas, and local authorizations. Note that several of the potentially needed permits would require CMP consistency determinations.

**ADDITIONAL PERMITS/AUTHORIZATIONS REQUIRED:**

- Coastal Easement – Date application submitted \_\_\_\_\_
  - Coastal Lease – Date application submitted \_\_\_\_\_
  - Stormwater Permit – Date application submitted See Attachment 1, Note 4
  - Water Quality Certification – Date application submitted: See Attachment 1, Note 5
- Other state/federal/local permits/authorizations required: ER Section 1.2 discusses the Federal, Texas, and local authorizations that are anticipated to be required to support construction and operation of the proposed VCS.  
See Attachment 1, Note 4.

The proposed activity must not adversely affect coastal natural resource areas (CNRAs).

**PLEASE CHECK ALL COASTAL NATURAL RESOURCE AREAS THAT MAY BE AFFECTED:**

- |  |   |   |   |
|--|---|---|---|
| <input type="checkbox"/> Coastal Barriers        | <input type="checkbox"/> Coastal Historic Areas | <input type="checkbox"/> Coastal Preserves            | <input type="checkbox"/> Coastal Shore Areas  |
| <input type="checkbox"/> Coastal Wetlands        | <input type="checkbox"/> Critical Dune Areas    | <input type="checkbox"/> Critical Erosion Areas       | <input type="checkbox"/> Gulf Beaches         |
| <input type="checkbox"/> Hard Substrate Reefs    |   | <input type="checkbox"/> Oyster Reefs                 | <input type="checkbox"/> Special Hazard Areas |
| <input type="checkbox"/> Submerged Lands         |   | <input type="checkbox"/> Submerged Aquatic Vegetation |   |
| <input type="checkbox"/> Tidal Sand Or Mud Flats |   | <input type="checkbox"/> Waters of Gulf of Mexico     |   |

✓ Waters Under Tidal Influence. (See Attachment 1, Note 6)

*The applicant affirms that the proposed activity, its associated facilities, and their probable effects comply with the relevant enforceable policies of the CMP, and that the proposed activity will be conducted in a manner consistent with such policies.*

**PLEASE CHECK ALL APPLICABLE ENFORCEABLE POLICIES:**

AFFECTED	ENFORCEABLE POLICY
x	§501.15 Policy for Major Actions
x	§501.16 Policies for Construction of Electric Generating and Transmission Facilities
	§501.17 Policies for Construction, Operation, and Maintenance of Oil and Gas Exploration and Production Facilities
	§501.18 Policies for Discharges of Wastewater and Disposal of Waste from Oil and Gas Exploration and Production Activities
	§501.19 Policies for Construction and Operation of Solid Waste Treatment, Storage, and Disposal Facilities
	§501.20 Policies for Prevention, Response and Remediation of Oil Spills
	§501.21 Policies for Discharge of Municipal and Industrial Wastewater to Coastal Waters
x	§501.22 Policies for Nonpoint Source (NPS) Water Pollution
	§501.23 Policies for Development in Critical Areas
x	§501.24 Policies for Construction of Waterfront Facilities and Other Structures on Submerged Lands
x	§501.25 Policies for Dredging and Dredged Material Disposal and Placement
	§501.26 Policies for Construction in the Beach/Dune System
	§501.27 Policies for Development in Coastal Hazard Areas
	§501.28 Policies for Development Within Coastal Barrier Resource System Units and Otherwise Protected Areas on Coastal Barriers
	§501.29 Policies for Development in State Parks, Wildlife Management Areas or Preserves
	§501.30 Policies for Alteration of Coastal Historic Areas
	§501.31 Policies for Transportation Projects
	§501.32 Policies for Emission of Air Pollutants
x	§501.33 Policies for Appropriations of Water
	§501.34 Policies for Levee and Flood Control Projects

Please explain how the proposed project is consistent with the applicable enforceable policies identified above. Please use additional sheets if necessary. *For example: If you are constructing a pier with a covered boathouse, then the applicable enforceable policy is: §501.24 Policies for Construction of Waterfront Facilities and Other Structures on Submerged Lands. The project is consistent because it will not interfere with navigation, natural coastal processes, and avoids/minimizes shading.*

**Please see Attachment 6.**

BY SIGNING THIS STATEMENT, THE APPLICANT IS STATING THAT THE PROPOSED ACTIVITY COMPLIES WITH THE TEXAS COASTAL MANAGEMENT PROGRAM AND WILL BE CONDUCTED IN A MANNER CONSISTENT WITH SUCH PROGRAM

DATE: 1/25/11

SIGNATURE: Marilyn Cray

*Any questions regarding the Texas Coastal Management Program should be referred to:*

Jesse Solis  
Permitting Assistance Coordinator  
6300 Ocean Drive  
TAMU-CC Natural Resource Center Ste. 2800  
Corpus Christi, Texas 78412-5599  
Phone: (361) 825-3050  
Fax: (361) 825-3465  
Toll Free: 1-866-894-3578  
[permitting.assistance@glo.state.tx.us](mailto:permitting.assistance@glo.state.tx.us)

Kate Zultner  
Texas General Land Office  
Coastal Resources Division  
1700 North Congress Avenue, Room 620  
Austin, Texas 78701-1495  
Phone: (512) 936-9581  
Fax: (512) 463-5233  
Toll Free: 1-800-998-4GLO  
[kate.zultner@glo.state.tx.us](mailto:kate.zultner@glo.state.tx.us)

## **Enclosure 1, Attachment 1**

Supporting Notes

## **ATTACHMENT 1**

### Supporting Notes

1. Note 1: The Nuclear Regulatory Commission's (NRC) decision on whether to grant an Early Site Permit (ESP) for the proposed Victoria County Station (VCS) site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a construction permit (CP) or Combined License (COL) to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

The proposed Victoria County Station (VCS) site is located outside of the Coastal Management Program (CMP) boundary. However, the facility's raw water makeup (RWMU) system intake canal and pumphouse, as well as a portion of the associated pipeline that would convey water to a cooling basin on the VCS site, would be located adjacent to the Guadalupe River within the coastal zone (see the figure provided as Attachment 3). Three potential routes for the RWMU system conveyance pipeline are evaluated in Environmental Report (ER) Subsection 2.2.2.4 and presented in ER Figure 2.2-5.

Additionally, as discussed in ER Section 3.7, several new transmission lines would be required in conjunction with the proposed VCS. The regional transmission service provider (TSP) would be expected to plan, permit, construct, and operate the new transmission lines, a portion of which are anticipated to be located within the coastal zone (see the ER Figure 3.7-1 for a general depiction of the required routes). As discussed in greater detail in the ER and in Note 3 below, the final routes of the transmission lines would likely not be known until the Combined License (COL) stage of the project. The TSP's obligation to obtain a certificate of convenience and necessity from the Public Utility Commission of Texas (PUCT) prior to constructing the new transmission lines is described in ER Subsection 2.2.2.1.

2. Note 2: The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

The total disturbed area associated with construction of the proposed VCS is presented in Subsection 4.1.1.1. The disturbed area resulting from construction of the makeup water conveyance pipeline is discussed in ER Subsections 2.2.2.4 and 4.1.2.4.

The potential land disturbance within the CMP boundary that could be realized if Exelon were to pursue construction of VCS in the future (after obtaining the applicable Federal, Texas, and local authorizations) was not summarized in the ESP application ER. Accordingly, the following general estimate of potential impacts associated with constructing the proposed VCS RWMU system infrastructure is provided in support of the CMP consistency determination request:

Temporarily disturbed area within the CMP boundary (intake canal, fish return sluiceway, intake basin, pumphouse): approximately 39 acres (ER Subsection 2.2.2.5). The permanent CMP disturbance associated with the RWMU system infrastructure would be less than or equal to 39 acres.

Temporary disturbance associated with the installation of the raw water conveyance pipeline within the CMP boundary: approximately 14.5 acres. The permanent pipeline easement within the CMP boundary would total approximately 6 acres.

Thus, the total temporarily disturbed area within the CMP boundary associated with RWMU system infrastructure construction is estimated to be approximately 53.5 acres. A portion of the disturbance associated with pipeline construction would be temporary, resulting in a total permanent disturbance of less than or equal to 45 acres.

Additionally, there would be linear bed and bank disturbance to the western shore of the Guadalupe River, immediately upstream of the existing Guadalupe Blanco River Authority (GBRA) saltwater barrier. The temporary and permanent disturbances are estimated to be approximately 400 and 350 linear feet, respectively.

3. Note 3: The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

The total disturbed area associated with construction of the proposed VCS is presented in ER Subsection 4.1.1.1. Transmission infrastructure anticipated to be required in conjunction with VCS is described in ER Section 3.7. Although the final locations of the proposed transmission lines will likely not be determined by the TSP until the COL stage of the project, Exelon used a macro-corridor methodology that considered land use and sensitive areas to identify a preferable corridor for transmission line construction (ER Subsection 2.2.2.1). Land uses and acreages associated with the identified 2-3 mile wide macro-corridor and a 200-ft wide representative corridor are discussed ER Subsections 2.2.2.4 and 4.1.2.4 and summarized in ER Table 2.2-2.

The potential land disturbance within the CMP boundary that could be realized if Exelon were to pursue construction of VCS in the future (after obtaining the applicable Federal, Texas, and local authorizations) was not summarized in the ESP application ER. Accordingly, the following paragraphs provide a general estimate of potential impacts associated with constructing the proposed transmission system infrastructure.

ER Figure 3.7-1 provides a general depiction of the new transmission infrastructure that is anticipated to be required to support VCS. ER Figure 2.2-3 presents the aforementioned 2-3 mile wide macro-corridor identified by Exelon as preferable for transmission line construction. From inspection of Figure 2.2-3 and the Texas Coastal Management Program Atlas (Middle Texas Coast), it can be seen that a portion of the identified macro-corridor overlaps the CMP boundary. Conservatively assuming that the final transmission line route would fall within the portion of the macro-corridor overlapping the CMP boundary, the following estimates are made for disturbed area within coastal zone:

VCS Site “WHY” Substation to Existing Blessing Substation / “WHY” Substation to Existing Hillje Substation: Approximately 1,820 acres over roughly 51 miles (assumes a 250-ft wide corridor shared by the referenced transmission lines);

VCS Site “WHY” Substation to Existing Whitepoint Substation: Approximately 75 acres over about 3 miles (assumes a 200-ft wide corridor).

Thus, the total disturbed area within the CMP boundary associated with transmission line construction is conservatively estimated to be approximately 1,900 acres. Recognizing that the land uses for the corridors would likely consist primarily of pasture and cropland (ER Table 2.2-2), which would be permanently affected mainly within the footprint of the transmission tower foundations, it is anticipated that

the permanent land disturbance associated with new transmission line construction would be considerably less than 1,900 acres. Additionally, as discussed earlier under Note 3, it is possible that the all or a portion of the transmission lines assumed to be constructed in the coastal zone to be conservative herein would be constructed beyond the CMP boundary.

4. Note 4: The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

Exelon has not made a decision to initiate construction activities at the VCS site, and is therefore not seeking Federal, Texas, or local authorizations beyond the ESP at this time. As indicated in ER Section 1.2, Table 1.2-1, Note "a", authorizations would be sought at the appropriate time to support the applicable work, which might not be until Exelon pursues a COL from the NRC to construct and operate nuclear facilities at the VCS site.

5. Note 5: The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

Exelon submitted an application to the TCEQ for a Clean Water Act (CWA) Section 401 Water Quality Certification on September 9, 2010. The TCEQ responded via letter dated October 20, 2010, waiving their authority under Title 30, Texas Administrative Code (TAC), Chapter 279.2(b)(4) to act on Exelon's request for a water quality certification in conjunction with the NRC's proposed federal action (i.e., the decision to grant Exelon an ESP for the VCS site).

6. Note 6: The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be

used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

As discussed in Note 1, the facility's RWMU system intake canal and pumphouse, as well as a portion of the associated pipeline that would convey water to the cooling basin on the VCS site, would be located adjacent to the Guadalupe River within the coastal zone (see the figure provided as Attachment 3). Although the Guadalupe River is subject to tidal influence, note that the proposed VCS intake canal would be located upstream of the Guadalupe Blanco River Authority (GBRA) Guadalupe River saltwater barrier, which affects the extent of tidal influence when inflated.

## **Enclosure 1, Attachment 2**

Project Description

**ATTACHMENT 2****Project Description**

Exelon submitted an Early Site Permit (ESP) application to the U.S. Nuclear Regulatory Commission (NRC) on March 25, 2010. The site referenced in the application, the Victoria County Station (VCS) site, is located approximately 13 miles south of the City of Victoria in Victoria County. If the ESP application were to be approved, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. As described in 10 CFR 52, Subpart A, the ESP could later be used to support an application for a construction permit (CP) or Combined License (COL) to construct and operate such a plant. An ESP is valid for 10 to 20 years from the date of issuance and can be renewed for up to an additional 20 years. Note that an ESP alone does not authorize the commencement of nuclear construction activities at the site.

The proposed VCS site is located outside of the CMP boundary. However, the facility's makeup water intake canal and pumphouse, as well as a portion of the associated conveyance pipeline, would be located within the coastal zone, as indicated in Attachment 3. Additionally, several new transmission lines would be required in conjunction with the proposed VCS. The regional transmission service provider (TSP) would be expected to plan, permit, construct, and operate the new transmission lines, a portion of which could be located within the coastal zone (see Attachment 1, Note 1). The final routes of the proposed new transmission lines would likely not be determined by the TSP until the COL stage of the project (see Attachment 1, Note 3).

In accordance with 31 TAC 506.30(b)(1), the ESP application (ESPA) submitted to the NRC is being provided (Enclosure 1, Attachment 4) in support of Exelon's CMP consistency determination request for the proposed VCS project. Part 3 of the VCS ESP application, the Environmental Report (ER), is of primary interest to the CMP consistency determination request. ER Chapter 1 provides a brief description of the proposed VCS project and the likely authorizations required to construct and operate the plant, satisfying the requirement at 31 TAC 506.30(b)(2). The remainder of the document describes the existing environment and the proposed project in detail and evaluates the potential impacts associated with the construction and operation of VCS, taking into account available alternatives and measures to avoid and / or mitigate reasonably foreseeable impacts. Attachment 5, the ER Table of Contents, has been included to facilitate the GLO's review. Attachment 6 directs the reviewer to the ER evaluations applicable to the CMP enforceable policies and demonstrates consistency with those policies (31 TAC 506.30(b)(3) and (4)).

**Authorizations Applicable to the Texas CMP**

The Nuclear Regulatory Commission's (NRC) decision on whether to grant an Early Site Permit (ESP) for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). Accordingly, the current application seeks a consistency

determination in association with NRC action of issuing the ESP; however, an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

As noted above, the ESP (if issued), could later be used to support an application for a CP or COL to construct and operate one or more nuclear facilities at the VCS site. A CP or COL, like an ESP, would constitute an NRC license issued under Section 103 of the Atomic Energy Act. As a result, it is apparent that a second NRC action listed at 31 TAC 506.12 would be required to authorize the construction of nuclear facilities at VCS, necessitating additional coordination with the GLO prior to commencing the applicable activities.

In addition to a future NRC approval, several of the non-NRC authorizations anticipated to be required to support facility construction and / or operation are included in either the list of federal actions requiring CMP consistency determinations located at 31 TAC 506.12 (e.g., U.S. Army Corps of Engineers (USACE) dredge / fill permit) or the list of applicable state agency actions found at 31 TAC 505.11 (e.g., Texas Commission on Environmental Quality (TCEQ) wastewater discharge permit). Note that Exelon is not currently seeking Federal, Texas, or local authorizations beyond the ESP.

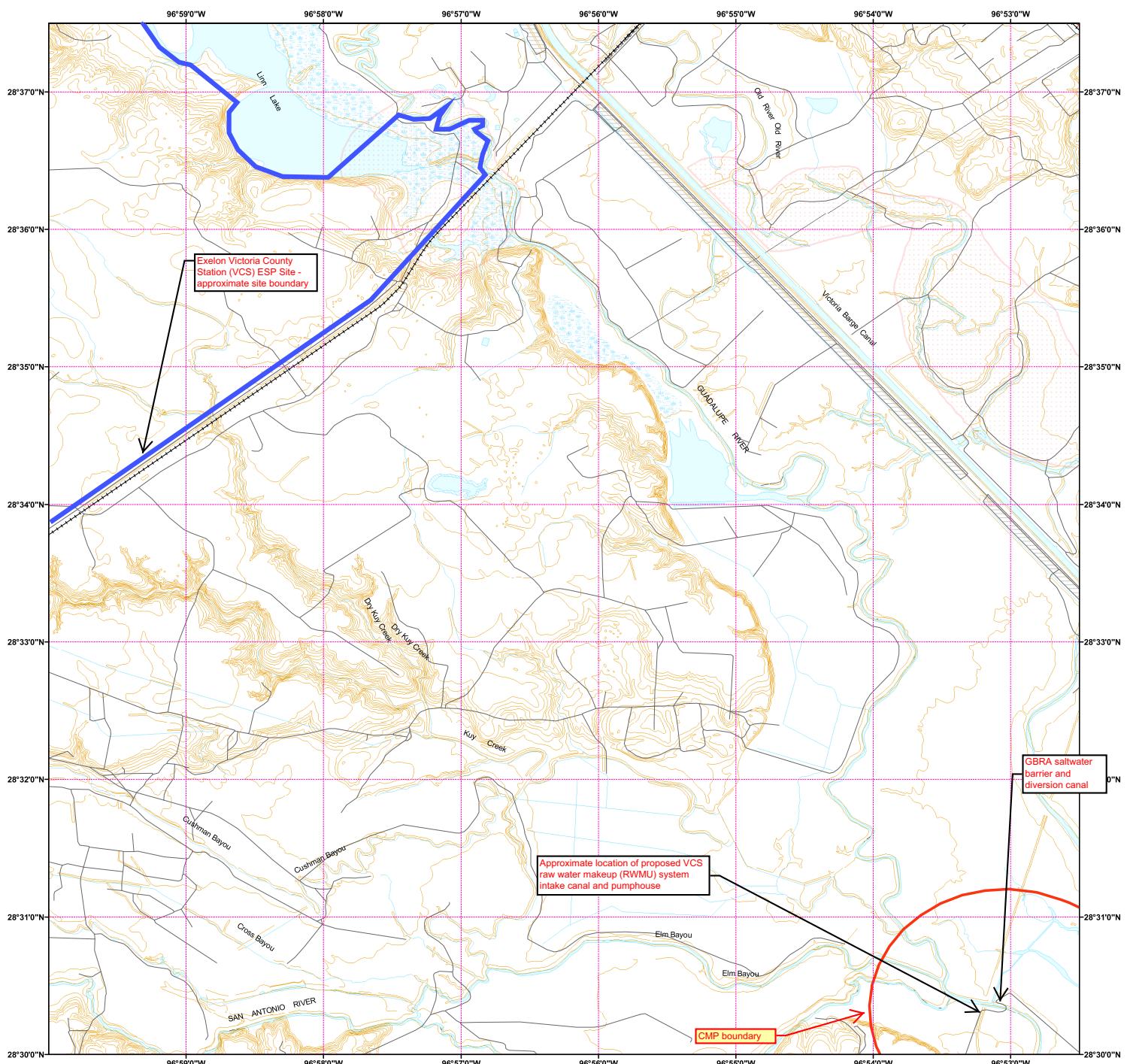
Although a CP or COL would be required to initiate nuclear construction activities, the NRC does not have authority to regulate all of the activities that could be required to develop the VCS site. The NRC regulations at 10 CFR 50.10(a)(2) identify activities (informally known as “preconstruction” activities) that are not related to nuclear safety and, therefore, fall beyond the scope of NRC jurisdiction. Examples of “pre-construction” activities include site grading, monitoring well installation, and the erection of support structures. While such activities may be undertaken by an applicant prior to issuance of an NRC license or permit, they are subject to compliance with other applicable laws and regulations. Thus, if Exelon were to choose to initiate “preconstruction” activities, Exelon would be required to obtain Federal, Texas, and / or local authorizations for applicable “preconstruction” activities. As discussed above, one or more of the non-NRC authorizations could require additional coordination with the GLO.

## **Enclosure 1, Attachment 3**

Annotated Figure  
Bloomington SW, CMP Atlas (Middle Texas Coast)

# BLOOMINGTON SW

CMP Atlas



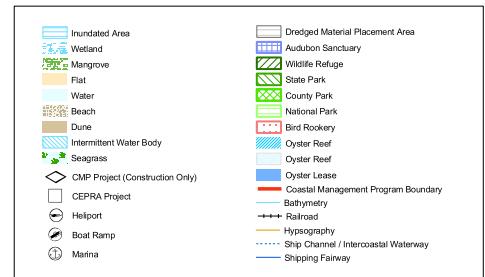
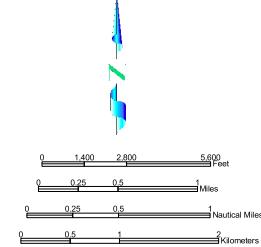
BLOOMINGTON	PLACEDO	KAMEY
BLOOMINGTON SW	GREEN LAKE	
TIVOLI	AUSTWELL	



Compiled by GIS Lab  
Financial & Technical Services  
Coastal Resources Program  
Texas General Land Office

Jul 09, 2003

The Texas General Land Office makes no representation or warranties regarding the accuracies or completeness of the information depicted on this map or the data from which it was produced. This map is NOT suitable for navigational purposes and does not purport to depict or establish boundaries between public and private land.



## **Enclosure 1, Attachment 4**

Parts 1 – 4 of the publicly available version of the VCS ESP application, as submitted to the NRC on March 25, 2010:

### Disc 1

PART 1 – Administrative Information  
PART 2 – Site Safety Analysis Report

### Disc 2

PART 3 – Environmental Report  
PART 4 – Emergency Plan (NRC Public Version)

# **Enclosure 1, Attachment 5**

## Table of Contents

### ESP Application Part 3 – Environmental Report

(See Enclosure 1, Attachment 4, Disc 2, for the full ESP Application ER)

## ESP ER Overall Table of Contents

<u>Section</u>	<u>Title</u>	<u>Page</u>
<b>Chapter 1 Introduction .....</b>		<b>1.1-1</b>
1.0 Introduction .....		1.1-1
1.1 The Proposed Project .....		1.1-1
1.1.1 The Applicant and Owner .....		1.1-1
1.1.2 Site Location .....		1.1-1
1.1.3 Reactor Information .....		1.1-2
1.1.4 Cooling System Information .....		1.1-2
1.1.5 Transmission System Information .....		1.1-3
1.1.6 Pre-application Public Involvement .....		1.1-3
1.1.7 Proposed Dates for Major Activities .....		1.1-4
1.1.8 References .....		1.1-4
1.2 Status of Reviews, Approvals, and Consultations .....		1.2-1
<b>Chapter 2 Environmental Description .....</b>		<b>2.1-1</b>
2.1 Site Location .....		2.1-1
2.1.1 References .....		2.1-3
2.2 Land Use and Transmission .....		2.2-1
2.2.1 The Site and Vicinity .....		2.2-1
2.2.1.1 The Site .....		2.2-1
2.2.1.2 The Vicinity .....		2.2-2
2.2.2 Transmission Corridors and Offsite Areas .....		2.2-3
2.2.2.1 Proposed Transmission Corridors .....		2.2-3
2.2.2.2 Cooling Basin Blowdown Line and VCND Transportation Corridor .....		2.2-5
2.2.2.3 Rail Spur Connection .....		2.2-6
2.2.2.4 Raw Water Makeup System and Intake Structure .....		2.2-6
2.2.2.5 Emergency Operations Facility .....		2.2-7
2.2.3 The Region .....		2.2-7
2.2.3.1 Victoria County .....		2.2-8
2.2.3.2 Calhoun County .....		2.2-9
2.2.3.3 DeWitt County .....		2.2-9
2.2.3.4 Goliad County .....		2.2-10
2.2.3.5 Jackson County .....		2.2-11
2.2.3.6 Refugio County .....		2.2-12
2.2.4 References .....		2.2-13
2.3 Water .....		2.3-1
2.3.1 Hydrology .....		2.3-1
2.3.1.1 Surface Water .....		2.3-2
2.3.1.2 Groundwater .....		2.3-40
2.3.2 Water Use .....		2.3-121
2.3.2.1 Water Resources Planning and Appropriation .....		2.3-121
2.3.2.2 Groundwater Use .....		2.3-123
2.3.2.3 Surface Water Use .....		2.3-127
2.3.2.4 References .....		2.3-135
2.3.3 Water Quality .....		2.3-160

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
2.3.3.1	Groundwater .....	2.3-160
2.3.3.2	Surface Water .....	2.3-162
2.3.3.3	References .....	2.3-167
2.4	Ecology .....	2.4-1
2.4.1	Terrestrial EcologyR .....	2.4-1
2.4.1.1	Regional Landscape .....	2.4-1
2.4.1.2	General Site Description .....	2.4-2
2.4.1.3	Offsite Areas .....	2.4-4
2.4.1.4	Terrestrial Wildlife .....	2.4-5
2.4.1.5	Threatened and Endangered Species .....	2.4-8
2.4.1.6	Other Important Species and Habitats .....	2.4-13
2.4.1.7	Transmission Line Corridor Habitats and Communities .....	2.4-15
2.4.2	Aquatic Ecology .....	2.4-16
2.4.2.1	Aquatic Communities .....	2.4-16
2.4.2.2	Important Aquatic Resources .....	2.4-31
2.4.2.3	Nuisance Species .....	2.4-36
2.4.2.4	Preexisting Environmental Stresses .....	2.4-37
2.4.2.5	References .....	2.4-38
2.5	Socioeconomics .....	2.5-1
2.5.1	Demography .....	2.5-1
2.5.1.1	Population Data by Sector .....	2.5-1
2.5.1.2	Population Data by Political Jurisdiction .....	2.5-3
2.5.1.3	Transient Populations .....	2.5-5
2.5.1.4	References .....	2.5-6
2.5.2	Community Characteristics .....	2.5-23
2.5.2.1	Economy .....	2.5-23
2.5.2.2	Transportation .....	2.5-26
2.5.2.3	Taxes .....	2.5-29
2.5.2.4	Land Use .....	2.5-37
2.5.2.5	Aesthetics and Recreation .....	2.5-42
2.5.2.6	Housing .....	2.5-47
2.5.2.7	Public Services and Community Infrastructure .....	2.5-49
2.5.2.8	Schools .....	2.5-54
2.5.2.9	References .....	2.5-62
2.5.3	Historic Properties .....	2.5-147
2.5.3.1	Applicable Federal and State Historic Preservation Regulations .....	2.5-147
2.5.3.2	Consultation with the Texas Historical Commission .....	2.5-147
2.5.3.3	Cultural Resource Investigations .....	2.5-148
2.5.3.4	Cultural Resources in the Two VCS Site APEs .....	2.5-151
2.5.3.5	Cultural Resources in the Offsite Areas .....	2.5-152
2.5.3.6	Native American Consultation .....	2.5-152
2.5.3.7	Significant Cultural Resources within 10 Miles of the VCS Site .....	2.5-152
2.5.3.8	Significant Cultural Resources within 1.2 Miles of the Offsite Areas ..	2.5-153
2.5.3.9	Cultural Resources in the Transmission Line Study Area .....	2.5-153
2.5.3.10	References .....	2.5-156

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
2.5.4 Environmental Justice .....	2.5-162	
2.5.4.1 Methodology .....	2.5-162	
2.5.4.2 Minority Populations .....	2.5-163	
2.5.4.3 Low-Income Populations .....	2.5-164	
2.5.4.4 Potential for Disproportionate Impacts .....	2.5-164	
2.5.4.5 References .....	2.5-165	
2.6 Geology .....	2.6-1	
2.6.1 Geological Conditions .....	2.6-1	
2.6.1.1 Physiography .....	2.6-1	
2.6.1.2 Stratigraphy .....	2.6-2	
2.6.2 Geological Impacts .....	2.6-2	
2.6.3 References .....	2.6-4	
2.7 Meteorology, Air Quality, and Noise .....	2.7-1	
2.7.1 Regional Climatology .....	2.7-1	
2.7.1.1 Data Sources .....	2.7-1	
2.7.1.2 General Climate .....	2.7-3	
2.7.1.3 Normal, Mean, and Extreme Climatological Conditions .....	2.7-5	
2.7.2 Air Quality .....	2.7-8	
2.7.2.1 Regional Air Quality Conditions .....	2.7-8	
2.7.2.2 Projected Air Quality Conditions .....	2.7-9	
2.7.2.3 Restrictive Dispersion Conditions .....	2.7-9	
2.7.3 Severe Weather .....	2.7-11	
2.7.3.1 Thunderstorms and Lightning .....	2.7-12	
2.7.3.2 Extreme Winds .....	2.7-12	
2.7.3.3 Tornadoes .....	2.7-13	
2.7.3.4 Hail, Snowstorms, and Ice Storms .....	2.7-15	
2.7.3.5 Tropical Cyclones .....	2.7-17	
2.7.3.6 Droughts and Dust (Sand) Storms .....	2.7-19	
2.7.4 Local Meteorology .....	2.7-19	
2.7.4.1 Normal, Mean, and Extreme Values .....	2.7-20	
2.7.4.2 Average Wind Direction and Wind Speed Conditions .....	2.7-23	
2.7.4.3 Wind Direction Persistence .....	2.7-25	
2.7.4.4 Atmospheric Stability .....	2.7-26	
2.7.4.5 Topographic Description and Potential Modifications to Meteorological Conditions .....	2.7-27	
2.7.5 Short-Term Diffusion Estimates .....	2.7-28	
2.7.5.1 Regulatory Basis and Technical Approach .....	2.7-28	
2.7.5.2 PAVAN Modeling Results .....	2.7-30	
2.7.6 Long-Term (Routine) Diffusion Estimates .....	2.7-31	
2.7.6.1 Regulatory Basis and Technical Approach .....	2.7-31	
2.7.6.2 XOQDOQ Modeling Results .....	2.7-33	
2.7.7 Noise .....	2.7-34	
2.7.8 References .....	2.7-36	
2.8 Related Federal Project Activities .....	2.8-1	
2.8.1 Overview .....	2.8-1	

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
2.8.2	Acquisition of Land and Use of Transmission Corridors .....	2.8-2
2.8.2.1	Federal Actions Associated With Land Acquisition and/or Use .....	2.8-2
2.8.2.2	Federal Actions Associated With Land Acquisition for Transmission Corridors .....	2.8-2
2.8.3	Cooling Water Source and Supply .....	2.8-3
2.8.4	Other Federal Actions Affecting Construction or Operation .....	2.8-3
2.8.5	Planned Federal Projects Contingent on Plant Construction or Operation ....	2.8-4
2.8.6	Cooperating Agencies .....	2.8-4
2.8.7	References .....	2.8-4
<b>Chapter 3</b>	<b>Plant Description .....</b>	<b>3.1-1</b>
3.1	External Appearance and Plant Layout .....	3.1-1
3.1.1	Site Description .....	3.1-1
3.1.2	Power Plant Design .....	3.1-1
3.1.3	ER Design Parameters .....	3.1-3
3.1.4	Plant Appearance .....	3.1-3
3.1.5	Site Development and Improvements .....	3.1-4
3.2	Reactor Power Conversion System .....	3.2-1
3.2.1	Reactor Description .....	3.2-1
3.2.2	Engineered Safety Features .....	3.2-2
3.2.3	Power Conversion Systems .....	3.2-2
3.3	Plant Water Use .....	3.3-1
3.3.1	Water Consumption .....	3.3-1
3.3.1.1	Plant Water Use .....	3.3-1
3.3.1.2	Plant Water Releases .....	3.3-2
3.3.2	Water Treatment .....	3.3-2
3.3.2.1	Surface Water .....	3.3-2
3.3.2.2	Groundwater .....	3.3-3
3.4	Cooling System .....	3.4-1
3.4.1	Description and Operational Modes .....	3.4-1
3.4.1.1	Normal Plant Condenser Cooling .....	3.4-1
3.4.1.2	Safety-Related and NonSafety-Related Service Water Systems .....	3.4-2
3.4.1.3	Other Operational Modes .....	3.4-3
3.4.2	Component Descriptions .....	3.4-4
3.4.2.1	RWMU System Intake Structure .....	3.4-4
3.4.2.2	Plant Discharge .....	3.4-5
3.4.2.3	Cooling Basin CWS Intake Structure and Discharge Outfall .....	3.4-7
3.4.2.4	Heat Dissipation System .....	3.4-7
3.4.3	References .....	3.4-13
3.5	Radioactive Waste Management System .....	3.5-1
3.5.1	Source Terms .....	3.5-1
3.5.2	Liquid Radioactive Waste Management System .....	3.5-1
3.5.3	Gaseous Radioactive Waste Management System .....	3.5-2
3.5.4	Solid Radioactive Waste Management System .....	3.5-2
3.6	Nonradioactive Waste Systems .....	3.6-1

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
3.6.1	Effluents Containing Chemicals or Biocides .....	3.6-1
3.6.2	Sanitary System Effluents .....	3.6-2
3.6.3	Other Effluents .....	3.6-2
3.6.3.1	Gaseous Effluents .....	3.6-3
3.6.3.2	Liquid Effluents .....	3.6-3
3.6.3.3	Solid Effluents .....	3.6-3
3.6.3.4	Hazardous Wastes .....	3.6-4
3.7	Power Transmission System .....	3.7-1
3.7.1	Switchyard and Substation Interfaces .....	3.7-1
3.7.2	Transmission System .....	3.7-2
3.7.3	Transmission Line Rights-of-Way (Corridors) .....	3.7-7
3.7.3.1	Transmission Line Rights-of-Way Ecological and Cultural Surveys .....	3.7-8
3.7.3.2	Transmission Corridor Maintenance .....	3.7-8
3.7.3.3	Transmission System Operation .....	3.7-8
3.7.3.4	Noise .....	3.7-9
3.7.3.5	Transmission Line Design and Methods of Construction .....	3.7-9
3.7.4	References .....	3.7-11
3.8	Transportation of Radioactive Materials .....	3.8-1
3.8.1	Transportation of Unirradiated Fuel .....	3.8-1
3.8.2	Transportation of Irradiated Fuel .....	3.8-1
3.8.3	Transportation of Radioactive Waste .....	3.8-2
3.8.4	References .....	3.8-2
3.9	Construction Activities .....	3.9-1
3.9.1	Preconstruction and Site Preparation Activities .....	3.9-1
3.9.1.1	Installation and Establishment of Environmental Controls .....	3.9-2
3.9.1.2	Clearing, Grubbing, and Grading .....	3.9-2
3.9.1.3	Road, Rail, and Barge Facility Construction .....	3.9-3
3.9.1.4	Construction Security Program Implementation .....	3.9-4
3.9.1.5	Temporary Utilities Construction .....	3.9-4
3.9.1.6	Temporary Construction Facilities Construction .....	3.9-5
3.9.1.7	Laydown, Fabrication, and Shop Area Preparation .....	3.9-5
3.9.1.8	Cooling Basin Construction .....	3.9-5
3.9.1.9	Cooling Basin Intake and Discharge Structure Installation .....	3.9-6
3.9.1.10	Blowdown Discharge Line Installation .....	3.9-6
3.9.1.11	Raw Water Makeup System Pump Station and Pipeline Installation .....	3.9-7
3.9.1.12	Power Block Area Excavation .....	3.9-8
3.9.1.13	Module Assembly .....	3.9-8
3.9.2	Construction Activities .....	3.9-9
3.9.2.1	Power Block Area Backfill .....	3.9-9
3.9.2.2	Reactor Building Basemat Foundation .....	3.9-9
3.9.2.3	Power Block Area Construction .....	3.9-10
3.9.2.4	Construction of Other Facilities .....	3.9-10
3.9.3	Other Activities Associated with Construction .....	3.9-11
3.9.4	Construction Procedures and Processes .....	3.9-11
3.9.5	Environmental Procedures .....	3.9-12

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
3.9.5.1	Noise and Vibration .....	3.9-12
3.9.5.2	Air Quality (Fugitive and Vehicular Emissions) .....	3.9-12
3.9.5.3	Erosion and Sediment Control .....	3.9-13
3.9.5.4	Construction Water Management .....	3.9-13
3.9.5.5	Protection of Sensitive Resources .....	3.9-14
3.9.5.6	Unanticipated Discoveries .....	3.9-16
3.9.5.7	Hazardous Materials and Petroleum Management .....	3.9-16
3.9.5.8	Solid Waste Management (Hazardous/Nonhazardous Wastes) .....	3.9-17
3.9.5.9	Asbestos and Lead-Based Paint .....	3.9-17
3.9.5.10	Spill Prevention and Response .....	3.9-17
3.9.5.11	Cleanup and Restoration .....	3.9-17
3.9.6	References .....	3.9-18
3.10	Workforce Characterization .....	3.10-1
3.10.1	Construction Workforce .....	3.10-1
3.10.2	Workers Relocation and Commuting .....	3.10-2
3.10.3	Operations Workforce .....	3.10-2
3.10.4	Total Construction and Operations Workforce .....	3.10-2
3.10.5	Outage Workforce .....	3.10-2
<b>Chapter 4 Impacts of Construction.....</b>		<b>4.1-1</b>
4.1	Land-Use Impacts .....	4.1-1
4.1.1	The Site and Vicinity .....	4.1-1
4.1.1.1	The Site .....	4.1-1
4.1.1.2	The Vicinity .....	4.1-3
4.1.2	Transmission Corridors and Offsite Areas .....	4.1-3
4.1.2.1	Proposed Transmission Corridors .....	4.1-3
4.1.2.2	Blowdown Piping .....	4.1-4
4.1.2.3	Rail Spur Connection .....	4.1-5
4.1.2.4	Raw Water Makeup System and Intake Structure .....	4.1-5
4.1.2.5	Emergency Operations Facilities .....	4.1-5
4.1.3	Historic Properties .....	4.1-6
4.1.4	References .....	4.1-8
4.2	Water-Related Impacts .....	4.2-1
4.2.1	Hydrologic Alterations .....	4.2-1
4.2.1.1	Surface Water .....	4.2-2
4.2.1.2	Groundwater .....	4.2-6
4.2.2	Water Use Impacts .....	4.2-8
4.2.2.1	Surface Water .....	4.2-8
4.2.2.2	Groundwater .....	4.2-9
4.2.3	Water Quality Impacts .....	4.2-10
4.2.3.1	Surface Water .....	4.2-10
4.2.3.2	Groundwater .....	4.2-11
4.2.4	References .....	4.2-12
4.3	Ecological Impacts .....	4.3-1
4.3.1	Terrestrial Ecosystems .....	4.3-1

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
4.3.1.1	The Site and Vicinity .....	4.3-1
4.3.1.2	RWMU System Pipeline .....	4.3-6
4.3.1.3	Transmission Corridors .....	4.3-7
4.3.2	Aquatic Ecosystems .....	4.3-9
4.3.2.1	Construction of Cooling Basin .....	4.3-11
4.3.2.2	Construction of Heavy Haul Road and Blowdown Line .....	4.3-12
4.3.2.3	Construction of RWMU Pump Station, Intake Canal, and RWMU Pipeline .....	4.3-13
4.3.2.4	Transmission Corridors .....	4.3-17
4.3.3	References .....	4.3-18
4.4	Socioeconomic Impacts .....	4.4-1
4.4.1	Physical Impacts of Station Construction .....	4.4-1
4.4.1.1	Groups or Physical Features Vulnerable to Physical Impacts .....	4.4-1
4.4.1.2	Predicted Noise Levels .....	4.4-4
4.4.1.3	Air Quality .....	4.4-5
4.4.1.4	Aesthetics .....	4.4-7
4.4.1.5	Occupational Health .....	4.4-8
4.4.1.6	Conclusion .....	4.4-9
4.4.2	Social and Economic Impacts .....	4.4-9
4.4.2.1	Demography .....	4.4-10
4.4.2.2	Impacts to the Community .....	4.4-14
4.4.3	Environmental Justice .....	4.4-63
4.4.3.1	Health and Environmental Impacts .....	4.4-64
4.4.3.2	Socioeconomic Impacts .....	4.4-65
4.4.4	References .....	4.4-68
4.5	Radiation Exposure to Construction Workers .....	4.5-1
4.5.1	Site Layout .....	4.5-1
4.5.2	Radiation Sources .....	4.5-1
4.5.3	Construction Worker Doses .....	4.5-2
4.5.3.1	Gaseous Effluent Doses .....	4.5-2
4.5.3.2	Direct Radiation Doses .....	4.5-2
4.5.3.3	Total Doses .....	4.5-3
4.5.4	References .....	4.5-3
4.6	Measures and Controls to Limit Adverse Impacts during Construction .....	4.6-1
4.7	Cumulative Impacts .....	4.7-1
4.7.1	Land Use .....	4.7-5
4.7.2	Hydrology and Water Use .....	4.7-7
4.7.2.1	Surface Water .....	4.7-7
4.7.2.2	Groundwater .....	4.7-9
4.7.2.3	Water Quality .....	4.7-9
4.7.3	Ecology (Terrestrial and Aquatic) .....	4.7-10
4.7.3.1	Terrestrial .....	4.7-10
4.7.3.2	Aquatic .....	4.7-10
4.7.4	Socioeconomic Resources .....	4.7-11
4.7.5	Summary .....	4.7-14

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
4.7.6 References .....		4.7-14
<b>Chapter 5 Environmental Impacts of Station Operation .....</b>		<b>5.0-1</b>
5.1 Land Use Impacts .....		5.1-1
5.1.1 The Site and Vicinity .....		5.1-1
5.1.1.1 The Site .....		5.1-1
5.1.1.2 The Vicinity .....		5.1-2
5.1.2 Transmission Corridors and Offsite Areas .....		5.1-2
5.1.2.1 Transmission Corridors .....		5.1-2
5.1.2.2 Cooling Basin Blowdown Line and Transportation Corridor .....		5.1-3
5.1.2.3 Rail Spur Connection .....		5.1-3
5.1.2.4 RWMU System and Intake Structure .....		5.1-4
5.1.2.5 Emergency Operations Facilities .....		5.1-4
5.1.2.6 Waste Disposal .....		5.1-4
5.1.3 Historic Properties and Cultural Resources .....		5.1-5
5.2 Water-Related Impacts .....		5.2-1
5.2.1 Hydrologic Alterations and Plant Water Supply .....		5.2-1
5.2.1.1 Surface Water .....		5.2-1
5.2.1.2 Groundwater .....		5.2-2
5.2.1.3 Summary of Hydrologic Alterations .....		5.2-9
5.2.2 Water-Use Impacts .....		5.2-10
5.2.2.1 Surface Water .....		5.2-10
5.2.2.2 Groundwater .....		5.2-14
5.2.3 Water Quality Impacts .....		5.2-16
5.2.3.1 Surface Water .....		5.2-16
5.2.3.2 Groundwater .....		5.2-18
5.2.4 References .....		5.2-19
5.3 Cooling System Impacts .....		5.3-1
5.3.1 Intake System .....		5.3-1
5.3.1.1 Hydrological Descriptions and Physical Impacts .....		5.3-1
5.3.1.2 Aquatic Ecosystems .....		5.3-2
5.3.1.3 References .....		5.3-12
5.3.2 Discharge Systems .....		5.3-19
5.3.2.1 Thermal Discharges and Other Physical Impacts .....		5.3-20
5.3.2.2 Aquatic Ecosystems .....		5.3-22
5.3.2.3 References .....		5.3-25
5.3.3 Heat Dissipation Systems .....		5.3-30
5.3.3.1 Heat Dissipation to the Atmosphere .....		5.3-30
5.3.3.2 Terrestrial Ecosystems .....		5.3-36
5.3.3.3 References .....		5.3-38
5.3.4 Impacts to Members of the Public .....		5.3-40
5.3.4.1 Etiological Agent Impacts .....		5.3-40
5.3.4.2 Noise Impacts .....		5.3-42
5.3.4.3 References .....		5.3-43
5.4 Radiological Impacts of Normal Operation .....		5.4-1

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
5.4.1	Exposure Pathways .....	5.4-1
5.4.1.1	Liquid Pathways .....	5.4-1
5.4.1.2	Gaseous Pathways .....	5.4-2
5.4.1.3	Direct Radiation .....	5.4-3
5.4.2	Radiation Doses to Members of the Public .....	5.4-3
5.4.2.1	Liquid Pathway Doses .....	5.4-3
5.4.2.2	Gaseous Pathway Doses .....	5.4-3
5.4.3	Impacts to Members of the Public .....	5.4-4
5.4.4	Impacts to Biota Other than Members of the Public .....	5.4-4
5.4.4.1	Liquid Pathway .....	5.4-4
5.4.4.2	Gaseous Pathway .....	5.4-5
5.4.4.3	Biota Doses .....	5.4-5
5.4.5	Occupational Doses .....	5.4-6
5.4.6	References .....	5.4-6
5.5	Environmental Impacts of Waste .....	5.5-1
5.5.1	Nonradioactive Waste System Impacts .....	5.5-1
5.5.1.1	Impacts of Discharges to Water .....	5.5-2
5.5.1.2	Impacts of Discharges to Land .....	5.5-2
5.5.1.3	Impacts of Discharges to Air .....	5.5-4
5.5.1.4	Sanitary Waste Impacts .....	5.5-4
5.5.1.5	Impacts of Dredging and Disposal .....	5.5-4
5.5.2	Mixed Waste Impacts .....	5.5-5
5.5.2.1	Plant Systems Producing Mixed Waste .....	5.5-5
5.5.2.2	Mixed Waste Storage and Disposal Plans .....	5.5-6
5.5.2.3	Waste Minimization Plan .....	5.5-6
5.5.2.4	Environmental Impacts of Mixed Waste .....	5.5-7
5.5.3	Conclusions .....	5.5-8
5.5.4	References .....	5.5-8
5.6	Environmental Impacts of Transmission Systems .....	5.6-1
5.6.1	Terrestrial Ecosystems .....	5.6-1
5.6.2	Aquatic Ecosystems .....	5.6-3
5.6.2.1	Important Habitats .....	5.6-3
5.6.2.2	Important Species .....	5.6-4
5.6.3	Impacts to Members of the Public .....	5.6-5
5.6.3.1	Visual Impacts .....	5.6-6
5.6.3.2	Electric Shock .....	5.6-6
5.6.3.3	Electromagnetic Field Exposure .....	5.6-7
5.6.3.4	Noise .....	5.6-8
5.6.3.5	Radio and Television Interference .....	5.6-9
5.6.4	References .....	5.6-9
5.7	Uranium Fuel Cycle and Transportation Impacts .....	5.7-1
5.7.1	Uranium Fuel Cycle Impacts .....	5.7-1
5.7.1.1	Land Use .....	5.7-3
5.7.1.2	Water Use .....	5.7-3
5.7.1.3	Fossil Fuel Impacts .....	5.7-4

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
5.7.1.4	Chemical Effluents .....	5.7-4
5.7.1.5	Radioactive Effluents .....	5.7-5
5.7.1.6	Radioactive Waste .....	5.7-7
5.7.1.7	Occupational Dose .....	5.7-7
5.7.1.8	Transportation .....	5.7-7
5.7.1.9	Summary .....	5.7-8
5.7.2	Transportation of Radioactive Materials .....	5.7-8
5.7.2.1	Transportation Assessment .....	5.7-8
5.7.2.2	Incident-Free Transportation Impacts Analysis .....	5.7-14
5.7.2.3	Conclusion .....	5.7-19
5.7.2.4	References .....	5.7-20
5.8	Socioeconomic Impacts .....	5.8-1
5.8.1	Physical Impacts of Station Operation .....	5.8-1
5.8.1.1	Noise .....	5.8-1
5.8.1.2	Air Quality .....	5.8-2
5.8.1.3	Aesthetics .....	5.8-4
5.8.1.4	Traffic .....	5.8-4
5.8.1.5	Occupational Health .....	5.8-5
5.8.1.6	Other Impacts .....	5.8-6
5.8.1.7	Conclusion .....	5.8-6
5.8.2	Social and Economic Impacts .....	5.8-6
5.8.2.1	Demography .....	5.8-7
5.8.2.2	Impacts to the Community .....	5.8-10
5.8.3	Environmental Justice .....	5.8-41
5.8.3.1	Health and Environmental Impacts .....	5.8-42
5.8.3.2	Socioeconomic Impacts .....	5.8-44
5.8.3.3	References .....	5.8-46
5.9	Decommissioning .....	5.9-1
5.9.1	NRC GEIS Regarding Decommissioning .....	5.9-1
5.9.2	DOE-Funded Study on Decommissioning Costs .....	5.9-3
5.9.3	Plant Design Features for Decommissioning .....	5.9-5
5.9.4	Conclusions .....	5.9-5
5.9.5	References .....	5.9-6
5.10	Measures and Controls to Limit Adverse Impacts During Operations .....	5.10-1
5.11	Cumulative Impacts .....	5.11-1
5.11.1	Land Use .....	5.11-3
5.11.2	Hydrology and Water Use .....	5.11-3
5.11.2.1	Groundwater .....	5.11-5
5.11.3	Ecology (Terrestrial and Aquatic) .....	5.11-5
5.11.3.1	Terrestrial .....	5.11-5
5.11.3.2	Aquatic .....	5.11-8
5.11.4	Socioeconomic Resources .....	5.11-11
5.11.5	Atmospheric and Meteorological .....	5.11-12
5.11.6	Radiological .....	5.11-12
5.11.7	Summary .....	5.11-13

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
5.11.8 References .....		5.11-13
<b>Chapter 6 Environmental Measurements and Monitoring Programs ..... 6.0-1</b>		
6.1 Thermal Monitoring .....		6.1-1
6.1.1 Pre-Application Monitoring .....		6.1-1
6.1.2 Construction Monitoring .....		6.1-1
6.1.3 Preoperational and Operational Monitoring .....		6.1-2
6.2 Radiological Monitoring .....		6.2-1
6.2.1 Radiological Environmental Monitoring Program Basis .....		6.2-1
6.2.2 Radiological Environmental Monitoring Program Contents .....		6.2-1
6.2.2.1 Pathways Monitored .....		6.2-2
6.2.2.2 Land Use Census .....		6.2-3
6.2.2.3 Quality Assurance Program .....		6.2-4
6.2.3 References .....		6.2-4
6.3 Hydrological Monitoring .....		6.3-1
6.3.1 Pre-Application Monitoring .....		6.3-1
6.3.1.1 Surface Water .....		6.3-2
6.3.1.2 Groundwater .....		6.3-2
6.3.2 Construction and Preoperational Monitoring .....		6.3-3
6.3.2.1 Surface Water .....		6.3-3
6.3.2.2 Groundwater .....		6.3-3
6.3.3 Operational Monitoring .....		6.3-4
6.3.3.1 Surface Water Hydrologic Monitoring .....		6.3-4
6.3.3.2 Groundwater Hydrologic Monitoring .....		6.3-4
6.3.4 References .....		6.3-4
6.4 Meteorological Monitoring .....		6.4-1
6.4.1 General Monitoring Program Description .....		6.4-2
6.4.2 Meteorological Tower and Instrument Siting .....		6.4-3
6.4.2.1 Site Description and Topographic Features of the Site Area .....		6.4-3
6.4.2.2 Meteorological Tower Exposure .....		6.4-4
6.4.2.3 Potential Airflow Alteration .....		6.4-4
6.4.2.4 Heat and Moisture Sources Influence .....		6.4-5
6.4.2.5 Potential Changes on Site Diffusion Climate .....		6.4-6
6.4.2.6 Instrument Siting .....		6.4-7
6.4.3 Pre-Application Monitoring Phase .....		6.4-7
6.4.3.1 Meteorological Parameters Measured .....		6.4-8
6.4.3.2 Meteorological Sensors Used .....		6.4-9
6.4.3.3 Data Recording and Storage .....		6.4-9
6.4.3.4 Data Reduction and Reporting .....		6.4-10
6.4.3.5 Instrumentation Surveillance .....		6.4-13
6.4.3.6 System Accuracy .....		6.4-14
6.4.4 Preoperational Monitoring Phase .....		6.4-15
6.4.4.1 Meteorological Parameters Measured .....		6.4-15
6.4.4.2 Data Collection System .....		6.4-15
6.4.5 Operational Monitoring Phase .....		6.4-15

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
6.4.5.1	Description of Monitoring Program .....	6.4-16
6.4.5.2	Emergency Preparedness Support .....	6.4-17
6.4.6	Meteorological Data .....	6.4-17
6.4.6.1	Representativeness and Adequacy of Meteorological Data .....	6.4-17
6.4.6.2	Long-Term and Climatological Conditions .....	6.4-18
6.4.6.3	Need for Additional Data Sources for Airflow Trajectories .....	6.4-22
6.4.6.4	Supplemental Data for Environmental Impact Evaluation .....	6.4-23
6.4.6.5	Period of Data and Data Used to Support the Application .....	6.4-23
6.4.7	References .....	6.4-24
6.5	Ecological Monitoring .....	6.5-1
6.5.1	Terrestrial Ecology and Land Use .....	6.5-1
6.5.1.1	Pre-Application Terrestrial Ecological Monitoring .....	6.5-1
6.5.1.2	Construction, Preoperational, and Operational Monitoring .....	6.5-2
6.5.2	Aquatic Ecology .....	6.5-4
6.5.2.1	Pre-Application Monitoring .....	6.5-4
6.5.2.2	Construction Monitoring .....	6.5-7
6.5.2.3	Preoperational and Operational Monitoring .....	6.5-8
6.5.3	References .....	6.5-8
6.6	Chemical Monitoring .....	6.6-1
6.6.1	Pre-Application Monitoring .....	6.6-1
6.6.1.1	Surface Water Monitoring .....	6.6-2
6.6.1.2	Groundwater Monitoring .....	6.6-3
6.6.2	Construction and Preoperational Monitoring .....	6.6-3
6.6.2.1	Surface Water Monitoring .....	6.6-3
6.6.2.2	Groundwater Monitoring .....	6.6-4
6.6.3	Operational Monitoring .....	6.6-4
6.6.3.1	Surface Water Monitoring .....	6.6-5
6.6.3.2	Groundwater Monitoring .....	6.6-5
6.6.4	References .....	6.6-6
6.7	Summary of Monitoring Programs .....	6.7-1
6.7.1	Pre-Application Monitoring .....	6.7-1
6.7.2	Preconstruction/Construction Monitoring .....	6.7-1
6.7.3	Preoperational Monitoring .....	6.7-2
6.7.4	Operational Monitoring .....	6.7-2
<b>Chapter 7</b>	<b>Environmental Impacts of Postulated Accidents Involving Radioactive Materials .....</b>	<b>7.1-1</b>
7.1	Design Basis Accidents .....	7.1-1
7.1.1	Selection of Accidents .....	7.1-1
7.1.2	Evaluation Methodology .....	7.1-2
7.1.3	Source Terms .....	7.1-3
7.1.4	Radiological Consequences .....	7.1-3
7.1.5	References .....	7.1-4
7.2	Severe Accidents .....	7.2-1
7.2.1	ESBWR and ABWR Reactor Vendor Methodology .....	7.2-2

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
7.2.2	Exelon Methodology .....	7.2-5
7.2.3	Consequences to Population Groups .....	7.2-7
7.2.3.1	Air Pathways .....	7.2-7
7.2.3.2	Surface Water Pathways .....	7.2-8
7.2.3.3	Groundwater Pathways .....	7.2-8
7.2.4	Comparison to NRC Safety Goals .....	7.2-9
7.2.4.1	Individual Risk Goal .....	7.2-9
7.2.4.2	Societal Risk Goal .....	7.2-9
7.2.5	Conclusions .....	7.2-10
7.2.6	References .....	7.2-11
7.3	Severe Accident Mitigation Alternatives .....	7.3-1
7.4	Transportation Accidents .....	7.4-1
7.4.1	Radiological Impacts of Transportation Accidents .....	7.4-1
7.4.1.1	Transportation of Unirradiated Fuel .....	7.4-1
7.4.1.2	Transportation of Spent Fuel .....	7.4-1
7.4.2	Nonradiological Impacts of Transportation Accidents .....	7.4-4
7.4.2.1	Transportation of Unirradiated Fuel .....	7.4-4
7.4.2.2	Transportation of Spent Fuel .....	7.4-4
7.4.2.3	Transportation of Radioactive Waste .....	7.4-5
7.4.3	Conclusion .....	7.4-5
7.4.4	References .....	7.4-5
<b>Chapter 8</b>	<b>Need for Power .....</b>	<b>8.0-1</b>
<b>Chapter 9</b>	<b>Alternatives to the Proposed Action .....</b>	<b>9.0-1</b>
9.0.1	References .....	9.0-1
9.1	No-Action Alternative .....	9.1-1
9.2	Energy Alternatives .....	9.2-1
9.3	Site Selection Process .....	9.3-1
9.3.1	Introduction .....	9.3-1
9.3.2	Overview of Site Selection Process .....	9.3-1
9.3.2.1	Region of Interest .....	9.3-2
9.3.2.2	Process for Identifying Candidate Areas .....	9.3-2
9.3.2.3	Identification and Screening of Potential Sites .....	9.3-3
9.3.2.4	Screening Process to Identify Candidate Sites .....	9.3-5
9.3.2.5	Candidate Site Evaluation and Conclusion .....	9.3-10
9.3.3	Alternative Site Review .....	9.3-12
9.3.3.1	Evaluation of the Matagorda County Site .....	9.3-13
9.3.3.2	Evaluation of the Buckeye Site .....	9.3-34
9.3.3.3	Evaluation of the Alpha Site .....	9.3-53
9.3.3.4	Evaluation of the Bravo Site .....	9.3-70
9.3.4	Summary and Conclusions .....	9.3-86
9.3.5	References .....	9.3-87
9.4	Alternative Plant and Transmission Systems .....	9.4-1
9.4.1	Heat Dissipation Systems .....	9.4-1

**ESP ER Overall Table of Contents (Cont.)**

<u>Section</u>	<u>Title</u>	<u>Page</u>
9.4.1.1	Screening of Alternative Heat Dissipation Systems .....	9.4-1
9.4.1.2	Analysis of Recommended Cooling Tower Alternative .....	9.4-4
9.4.1.3	Summary .....	9.4-7
9.4.2	Circulating Water Systems .....	9.4-7
9.4.2.1	Intake Systems .....	9.4-8
9.4.2.2	Discharge Systems .....	9.4-12
9.4.2.3	Water Supply .....	9.4-14
9.4.2.4	Water Treatment .....	9.4-21
9.4.3	Transmission Systems .....	9.4-22
9.4.3.1	Alternative Corridor Routes .....	9.4-22
9.4.3.2	Alternatives to the Proposed Transmission System Design .....	9.4-23
9.4.4	References .....	9.4-24
<b>Chapter 10 Proposed Action Consequences.....</b>		<b>10.0-1</b>
10.0	Environmental Consequences of the Proposed Action .....	10.0-1
10.1	Unavoidable Adverse Environmental Impacts .....	10.1-1
10.1.1	Unavoidable Adverse Environmental Impacts of VCS Construction .....	10.1-1
10.1.2	Unavoidable Adverse Environmental Impacts of VCS Operation .....	10.1-3
10.2	Irreversible and Irretrievable Commitments of Resources .....	10.2-1
10.2.1	Irreversible Commitments of Environmental Resources .....	10.2-1
10.2.1.1	Land Use Commitments .....	10.2-1
10.2.1.2	Hydrology and Water Use Commitments .....	10.2-2
10.2.1.3	Ecological Commitments (Terrestrial and Aquatic) .....	10.2-2
10.2.1.4	Socioeconomics .....	10.2-3
10.2.1.5	Radiological Releases .....	10.2-3
10.2.1.6	Air Emissions and Meteorological Changes .....	10.2-3
10.2.2	Irretrievable Commitments of Material Resources .....	10.2-4
10.2.3	References .....	10.2-5
10.3	Relationship Between Short-Term Uses and Long-Term Productivity of the Human Environment .....	10.3-1
10.3.1	Construction of VCS and Short-Term Uses .....	10.3-1
10.3.2	Operation of VCS and Long-Term Productivity .....	10.3-2
10.3.3	Summary of Relationship Between Short-Term Uses and Long-Term Productivity .....	10.3-3
10.4	Benefit-Cost Balance .....	10.4-1
<b>Appendix A Consultation Letters.....</b>		<b>1</b>

## **Enclosure 1, Attachment 6**

Explanation of Consistency with the Enforceable Policies at  
31 TAC 501

## **ATTACHMENT 6**

### Explanation of Consistency with Enforceable Policies at 31 TAC 501

- Notes:
- (1) Attachment 6, in concert with the ESPA ER, is provided to address the requirements at 31 TAC 506.30(b)(3) and (4).
  - (2) Only those policies identified as applicable to the proposed VCS project on the form titled “Consistency with the Texas Coastal Management Program” are discussed below.

#### **§501.15 Policy for Major Actions**

**Applicability:** The Nuclear Regulatory Commission’s (NRC) decision on whether to grant an Early Site Permit (ESP) for the proposed Victoria County Station (VCS) site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a construction permit (CP) or Combined License (COL) to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

**Consistency:** In accordance with 31 TAC 506.30(b)(1), the ESP application (ESPA) submitted to the NRC is being provided (Enclosure 1, Attachment 4) in support of Exelon’s Coastal Management Program (CMP) consistency determination request for the proposed VCS project. Part 3 of the ESP application (ESPA), the Environmental Report (ER), describes the existing environment and the proposed project in detail and evaluates the potential impacts associated with the construction and operation of VCS, taking into account available alternatives and measures to avoid and / or mitigate reasonably foreseeable impacts.

As summarized in ER Section 9.3, Tables 9.3-2 and 9.3-3, with the exception of potential construction impacts to terrestrial ecosystems, the evaluations presented in the ER conclude that the reasonably foreseeable VCS construction and operation impacts would result in SMALL impacts in the areas of land use, water-related impacts, and terrestrial and aquatic ecology. The MODERATE determination for potential construction impacts to terrestrial ecosystems is associated with construction of the proposed 4,900-acre onsite cooling basin, which is located approximately 6 miles outside of the CMP boundary. Accordingly, based on the results of the referenced ER evaluations, the proposed VCS project would be

consistent with the CMP policy at 31 TAC 501.15 and the other applicable enforceable policies of the CMP.

The potential for the proposed project to affect coastal natural resource areas (CNRAs) is discussed in greater detail the following paragraphs. The discussion identifies relevant ESPA ER impact evaluations (31 TAC 506.30(b)(3)), the results of which demonstrate that the VCS project would be consistent with the applicable CMP policies (31 TAC 506.30(b)(4)). In general, the ER impact evaluations adequately discuss impacts that could be realized both within and beyond the CMP boundary; however, where applicable, additional detail has been provided to address potential impacts specific to the coastal zone.

#### **§501.16 Policies for Construction of Electric Generating and Transmission Facilities**

**Applicability:** The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

The proposed VCS site is located outside of the CMP boundary; however, the facility's raw water makeup (RWMU) system intake canal, the intake pumphouse, and a portion of the conveyance pipeline would be located within the coastal zone, as indicated on the figure provided as Attachment 3. Additionally, new transmission lines are anticipated to be required in conjunction with VCS, a portion of which could potentially be located within the coastal zone.

**Consistency:** (a)(1): A detailed discussion of the site selection process is presented in ESPA ER Section 9.3. The evaluation presented in ER Section 9.3.3 concludes that none of the identified alternative sites would be environmentally preferable to the VCS site.

(a)(2) and (3): The proposed facility cooling system is described in ER Subsection 3.4.2. Potential impacts to aquatic species and habitats associated with construction and operation of the proposed intake infrastructure are discussed in ER Subsections 4.3.2.3 and 5.3.1, respectively.

The potential land disturbance within the CMP boundary was not summarized in the ER. As described in additional detail in Attachment 1, Note 2, it is estimated that approximately 53.5 acres within the CMP

boundary would be disturbed to accommodate the construction of the cooling water intake canal, pumphouse, and conveyance pipeline. A portion of the disturbance associated with pipeline construction would be temporary, resulting in permanent impacts estimated to be equal or less than 45 acres. Additionally, there would be linear bed and bank disturbance to the western shore of the Guadalupe River, immediately upstream of the Guadalupe Blanco River Authority (GBRA) Guadalupe River saltwater barrier. The temporary and permanent disturbances are estimated to be approximately 400 and 350 linear feet, respectively (i.e., the estimated 350 linear feet of permanent disturbance is a subset of the potential 400 linear feet of temporary impacts).

Considering the best management practices (BMP) for impact avoidance and mitigation described in ER Subsections 4.3.2.3 and 5.3.1, and consistent with the results of the impact evaluations presented in those sections, potential impacts associated with constructing cooling system intake and conveyance infrastructure within the CMP boundary would be SMALL.

(a)(4): Transmission lines are described in ER Subsection 2.2.2.1 and Section 3.7. As noted therein, the final locations of transmission corridors will be determined by the regional transmission service provider (TSP) in coordination with the Public Utility Commission of Texas (PUCT) at the COL stage of the project. Accordingly, Exelon utilized a macro-corridor approach to identify and evaluate likely transmission corridors. Potential impacts to terrestrial and aquatic species / habitats associated with construction of transmission infrastructure are discussed in ER Subsections 4.3.1.3 and 4.3.2.4, respectively. Potential impacts associated with transmission line operation are described in ER Section 5.6.

The potential land disturbance within the CMP boundary was not summarized in the ER. As described in additional detail in Attachment 1, Note 3, it is estimated that approximately 1,900 acres could be temporarily impacted within the coastal zone for new transmission line construction. Recognizing that the land uses for the corridors would likely consist primarily of pasture and cropland (ER Table 2.2-2), which would be permanently affected mainly within the footprint of the transmission tower foundations, it is anticipated that the permanent land disturbance associated with new transmission line construction would be significantly less than 1,900 acres. Additionally, as discussed under Attachment 1, Note 3, it is possible that the all or a portion of the transmission lines assumed to be constructed in the coastal zone to be conservative herein would be constructed beyond the CMP boundary. Considering the best management practices (BMP) for impact avoidance and mitigation described in ER Subsections 4.3.1.3, 4.3.2.4, and 5.6, and consistent with the results of the impact evaluations presented in those sections, potential

impacts from new transmission line construction within the CMP boundary would be SMALL.

Based on the results of the referenced ER evaluations and the additional information provided above, the proposed VCS project would be consistent with the CMP policy at 31 TAC 501.16.

### **§501.22 Policies for Nonpoint Source (NPS) Water Pollution**

**Applicability:** The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

Stormwater runoff and / or potential leaks or spills from construction activities within and beyond the CMP boundary could potentially affect water quality and ecosystems within the coastal zone.

**Consistency:** Potential impacts to water quality and aquatic / terrestrial ecosystems resulting from facility construction are evaluated in ER Sections 4.2 and 4.3, respectively. Potential water-related impacts derived from facility operation are discussed in ER Section 5.2. Environmental controls and measures to limit the adverse impacts of construction are discussed in Subsection 3.9.5 and Section 4.6, respectively.

As presented in ER Section 1.2, Table 1.2-1, Item 1.17, it is anticipated that a Texas Pollutant Discharge Elimination System (TPDES) General Permit for Stormwater Discharges Associated with Construction Activities would be required prior to the initiation of earth disturbing project activities. Additionally, coverage would be sought under the TPDES multi-sector general permit for stormwater discharges associated with industrial activity (Table 1.2-2, Item 2.10). Note that Exelon is not currently pursuing Federal, Texas, or local authorizations beyond the ESP; such approvals would be sought prior to initiating the applicable activities, potentially not until the COL stage of the project.

Based on the results of the referenced ER evaluations and the additional information provided above, the proposed VCS project would be consistent with the CMP policy at 31 TAC 501.22.

**§501.24 Policies for Construction of Waterfront Facilities and Other Structures on Submerged Lands**

**Applicability:** The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

The proposed VCS site is located outside of the CMP boundary; however, the facility's RWMU system intake canal, the intake pumphouse, and a portion of the conveyance pipeline would be located adjacent to the Guadalupe River within the coastal zone, as indicated on the figure provided as Attachment 3. Additionally, new transmission lines are anticipated to be required in conjunction with VCS, a portion of which could potentially be located within the coastal zone.

**Consistency:** (a)(7) and (8): The proposed RWMU intake canal, pumphouse, and conveyance pipeline and the associated construction activities are described in ER Subsections 3.4.2.1, 3.9.1.11, 4.2.3.1, 4.3.1.2, and 4.3.2.3. Environmental controls and measures to limit the adverse impacts of construction are discussed in ER Subsection 3.9.5 and Section 4.6, respectively.

As discussed previously, the potential land disturbance within the CMP boundary was not summarized in the ER. As described in additional detail in Attachment 1, Note 2, it is estimated that approximately 53.5 acres within the CMP boundary would be disturbed to accommodate the construction of the cooling water intake canal, pumphouse, and conveyance pipeline. A portion of the disturbance associated with pipeline construction would be temporary, resulting in permanent impacts estimated to be equal or less than 45 acres. Additionally, there would be linear bed and bank disturbance to the western shore of the Guadalupe River, immediately upstream of the Guadalupe Blanco River Authority (GBRA) Guadalupe River saltwater barrier. The temporary and permanent disturbances are estimated to be approximately 400 and 350 linear feet, respectively (i.e., the estimated 350 linear feet of permanent disturbance is a subset of the potential 400 linear feet of temporary impacts).

Considering the best management practices (BMP) for impact avoidance and mitigation described in ER Subsections 4.3.2.3 and 5.3.1, and consistent with the results of the impact evaluations presented in those

sections, potential impacts associated with constructing cooling system intake and conveyance infrastructure within the CMP boundary would be SMALL.

Based on the results of the referenced ER evaluations and the additional information provided above, the proposed VCS project would be consistent with the CMP policy at 31 TAC 501.24.

### **§501.25 Policies for Dredging and Dredged Material Disposal and Placement**

**Applicability:** The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

The proposed VCS site is located outside of the CMP boundary; however, the facility's RWMU system intake canal, the intake pumphouse, and a portion of the conveyance pipeline would be located within the coastal zone, as indicated on the figure provided as Attachment 3. Minor Guadalupe River bed and bank impacts would result during construction of the proposed intake canal.

**Consistency:** The proposed RWMU intake canal, pumphouse, and conveyance pipeline and the associated construction activities are described in ER Subsections 3.4.2.1, 3.9.1.11, 4.2.3.1, 4.3.1.2, and 4.3.2.3. Environmental controls and measures to limit the adverse impacts of construction are discussed in ER Subsection 3.9.5 and Section 4.6, respectively.

Additionally, as presented in ER Section 1.2, Table 1.2-1, Item 1.7, it is anticipated that a Department of Army permit (Clean Water Act Section 404 / Rivers and Harbors Act Section 10) would be required from the US Army Corps of Engineers to authorize applicable activities, including the potential Guadalupe River bed / bank impacts and dredge spoils disposal associated with construction of the proposed RWMU intake canal.

Based on the results of the referenced ER evaluations and the additional information provided above, the proposed VCS project would be consistent with the CMP policy at 31 TAC 501.25.

**§501.33 Policies for Appropriations of Water**

Applicability: The NRC's decision on whether to grant an ESP for the proposed VCS site constitutes an NRC License, as identified at 31 TAC 506.12(a)(2)(F). By issuing an ESP for the VCS site, the NRC would be concluding that the VCS site satisfies its criteria for certain site safety considerations, environmental impacts, and emergency planning. The ESP could later be used to support an application for a CP or COL to construct and operate such a plant. Note that an ESP alone would not authorize nuclear construction activities at the VCS site or within the CMP boundary.

As discussed in ER Subsection 5.2.2, the Guadalupe River would be the source of makeup cooling water to an approximately 4,900-acre onsite cooling water reservoir (a closed-cycle cooling system). Up to 75,000 acre-feet would be withdrawn from the river annually to makeup for water lost to evaporation, seepage, and blowdown. The water would be withdrawn under new or existing water rights, which would be obtained via acquisition or contract.

Consistency: Evaluations of the potential individual and cumulative impacts associated with the proposed VCS water withdrawals are presented in ER Sections 4.2, 5.2, and 5.11.

Based on the results of the referenced ER evaluations, the proposed VCS project would be consistent with the CMP policy at 31 TAC 501.33.



# Coastal Coordination Council

P.O. Box 12873 ♦ Austin, Texas 78711-2873 ♦ (800) 998-4GLO ♦ FAX (512) 475-0680

## Chairman

**Jerry Patterson**

Texas Land Commissioner



## Members

**Karen Hixon**

Parks & Wildlife Commission  
of Texas

**Jose Dodier**

Texas State Soil & Water  
Conservation Board

**Edward G. Vaughan**

Texas Water Development Board

**Ned Holmes**

Texas Transportation Commission

**Elizabeth Jones**

Railroad Commission of Texas

**H. S. Buddy Garcia**

Texas Commission on  
Environmental Quality

**Robert R. Stickney**

Sea Grant College Program

**Robert "Bob" Jones**

Coastal Resident Representative

**Jerry Mohn**

Coastal Business Representative

**George Deshotels**

Coastal Government  
Representative

**Bob McCan**

Agriculture Representative



**Kate Zultner**

Council Secretary

**Jesse Solis, Jr.**

Permit Service Center  
Corpus Christi  
1-866-894-3578

Permit Service Center

Galveston

1-866-894-7664

June 1, 2011

Exelon Corporation  
PO Box 805398  
Chicago, IL 60680-5398

**Re: Exelon Victoria County Station Site – Early Site Permit  
NP-09-0013  
CMP#: 11-0270-F1**

Dear Applicant:

Pursuant to Section 506.30 of 31 TAC of the Coastal Coordination Act, the intake structure and associated diversion canal, located within the coastal zone boundary, have been reviewed for consistency with the Texas Coastal Management Program (CMP).

The project was reviewed for impacts to coastal natural resource areas within the CMP boundary. No unavoidable adverse impacts were found. Therefore, this project is consistent with the CMP goals and policies.

Please note that this letter does not authorize the use of Coastal Public Land. No work may be conducted or structures placed on State-owned land until you have obtained all necessary authorizations, including any required by the General Land Office and the U.S. Army Corps of Engineers.

Sincerely,

A handwritten signature in black ink that reads "Kate Zultner".

Kate Zultner  
Consistency Review Coordinator  
Texas General Land Office

email cc: Jeff Davis, GLO Field Service  
GLO PSC Upper Coast

NP-08-0002

April 11, 2008

Mr. James Bruseth, Ph.D.  
Director, Archeology Division  
Texas Historical Commission  
P.O. Box 12276  
Austin, Texas 78711-2276

SUBJECT: Transmittal of Phase 1a Investigations Report for the Exelon Victoria County Site

Dear Mr. Bruseth:

As discussed previously, Exelon Generation Company, LLC (Exelon) is preparing a combined construction and operating license (COL) application for submittal to the Nuclear Regulatory Commission (NRC) for a proposed nuclear power plant at a site in Victoria County, Texas. Although Exelon is preparing a COL application, no decision or commitment has been made at this time to move forward with construction of a nuclear power plant.

Exelon met with you and Mr. Martin on December 17, 2007, to discuss cultural resource surveys at the Victoria County site. During that meeting, Exelon indicated that it would perform screening activities (referred to as Phase 1a Investigations) to help define the Areas of Potential Effect for the proposed project and aid in determining an appropriate scope for subsequent, more detailed resource surveys.

The Phase 1a Investigations, which included geoarchaeological surveys, historical context research, and regional screening for historic resources, were completed by Geo-Marine, Inc. (Geo-Marine) of Plano, Texas in February and March 2008. The enclosed report summarizes the findings of those investigations.

During the meeting scheduled for April 17, Exelon would like to review the findings of the Phase 1a Investigations and discuss the definition of the Areas of Potential Effect and proposed methodologies for Phase 1b studies. Together, these items will guide Exelon's approach for more detailed cultural resource investigations at the proposed Victoria County site. In order to facilitate your preliminary review of the report findings prior to the meeting, a Management Summary capturing the scope and results of the investigations has been provided at the beginning of the report.

April 11, 2008  
Mr. James Bruseth, Ph.D.  
Page 2

If you have any questions about the project or the Phase 1a report prior to the meeting, please contact Mr. Joshua Trembley at 610-765-5345.

Respectfully,



For L. AINGER

Kenneth A. Ainger  
Director, New Plant Licensing

Enclosure: Phase 1A Investigations of the Proposed Site for the Victoria County Station, Units 1 and 2, Victoria County, Texas: Preliminary Analysis of Historic Property and Impact Potential

cc: William Martin, Texas Historical Commission



**TEXAS  
HISTORICAL  
COMMISSION**

*The State Agency for Historic Preservation*

RICK PERRY, GOVERNOR

JOHN L. NAU, III, CHAIRMAN

F. LAWERENCE OAKS, EXECUTIVE DIRECTOR

May 8, 2008

Kenneth A. Ainger  
 Director, New Plant Licensing  
 Exelon Generation  
 200 Extension Way  
 KSA-3N, Suite 320  
 Kennett Square, PA 19348

Re: Project review under Section 106 of the National Historic Preservation Act  
*Draft report: Phase IA Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria County Texas: Preliminary Analysis of Historic Property and Impact Potential.*  
 (NRC)

Dear Mr. Ainger:

This letter serves as comment on the undertaking referenced above from the State Historic Preservation Officer, the Executive Director of the Texas Historical Commission.

The review staff, led by Bill Martin, has examined the document referenced above. After reviewing the documentation and recommendations for further survey for prehistoric and historic resources, we concur with all of the authors' recommendations. If intensive survey proceeds as described in this document, we believe it will demonstrate a good faith effort to identify historic properties.

The report contains a few typographical errors, but our review found nothing substantive that needs to be addressed. We look forward to further consultation with your office and hope to maintain a partnership that will foster effective historic preservation. Thank you for your cooperation in this federal review process, and for your efforts to preserve the irreplaceable heritage of Texas. **If you have any questions concerning our review or if we can be of further assistance, please contact Bill Martin at 512/463-5867.**

Sincerely,

*William F. Martin*  
 for  
**F. Lawerence Oaks; State Historic Preservation Officer**

FLO/wam



NP-08-0006

May 13, 2008

Mr. James Bruseth, Ph.D.  
 Director, Archeology Division  
 Texas Historical Commission  
 P.O. Box 12276  
 Austin, Texas 78711-2276



- Subject:
- 1) Addition of Victoria County Project Site to Section 106 Consultation for the Proposed Exelon Nuclear Power Generation Project; and
  - 2) Consultation on Proposed APE and Investigation Methodology for Phase Ib at the Proposed Exelon Victoria County Project Site

Dear Mr. Bruseth:

Exelon Generation Company, LLC (Exelon) previously notified you, via letter dated September 5, 2008, that it is preparing a combined construction and operating license (COL) application for submittal to the Nuclear Regulatory Commission (NRC) for a proposed nuclear power plant. As part of the COL application, Exelon is preparing an environmental report that will be used by the NRC to prepare an environmental impact statement for the proposed action under the *National Environmental Policy Act*. The decision by the NRC on whether to issue the license for construction and operation of the power plant meets the definition of an "undertaking" under the *National Historic Preservation Act* (NHPA).

#### **Addition of Victoria County Project Site**

The previous notification was focused on the proposed Exelon Matagorda County Site. Exelon has since determined that it will study a proposed site location in Victoria County, Texas. This letter is to notify you of the Victoria County site as part of consultation with the Texas State Historic Preservation Officer and the Texas Historical Commission (THC) under Section 106 of the NHPA. Please note that although Exelon is preparing a COL application, no decision or commitment has been made at this time to move forward with construction of a nuclear power plant at either the Matagorda County or Victoria County site.

Attached Figure 1 shows the proposed location for the project in Victoria County. The proposed undertaking would occur approximately 13 miles south of Victoria and 1 mile north of McFaddin. To the west of the site is U.S. Highway 77 and to the east are Linn Lake and the Guadalupe River. The proposed project site can be found on the United States Geological Survey (USGS) 7.5 minute McFaddin, Raisin, Bloomington, and Bloomington SW, Texas (all 1995) topographic quadrangles.

May 13, 2008  
Mr. James Bruseth, Ph.D.  
Page 2

The proposed undertaking would include construction and operation of a nuclear power generation plant with two reactors and associated plant facilities, all co-located in the northern portion of the project site. A large portion of the project site would be used for an approximately 6,100-acre cooling basin and reservoir. The proposed project site is located on private land that has been used for cattle grazing since the late nineteenth century. It has continued in that use to the present day, with the addition of limited development of wells for natural gas and petroleum production.

Included in the proposed power plant would be a heavy haul road extending east from U.S. Highway 77, passing north of the proposed plant to the Victoria Barge Canal, and running north along the levee to the existing barge loading facility at the barge turnaround in Pickering Basin. The haul road would facilitate delivery of construction materials and equipment and would likely remain in place after construction of the proposed nuclear plant is completed. The proposed power plant would also require an intake pipeline for water used by the plant cooling basin and the Guadalupe-Blanco River Authority (GBRA) reservoir. This underground pipeline would extend from the southern portion of the cooling basin and reservoir south and east to an intake and pumphouse located on the GBRA canal system near North Seadrift. The final locations of these two project features have not yet been defined.

#### **Consultation on Project Site Phase Ib APE and Methodology**

Exelon met with you and Mr. William Martin, also of THC, on December 17, 2008, to discuss the proposed Victoria County site. At that time, you recommended that Exelon conduct Phase Ia investigations to help in determining the Area of Potential Effect (APE) for the proposed undertaking and the methodology for conducting investigations in Phase Ib. Exelon acquired the services of Geo-Marine, Inc. to conduct Phase Ia studies of the project site, which included geoarchaeological studies, development of the prehistoric and historic cultural contexts, GIS studies to identify the visual impact assessment area, and a windshield survey to initiate identification of historic properties within the visual impact assessment area. A report was prepared describing the methodology and results of the Phase Ia work, which Exelon has provided to you for your review. The report also contained recommendations for Phase Ib investigations. Exelon has adopted these recommendations, as described below.

Exelon has identified the area within the overall project site that would be required for use during the construction and operation of the proposed nuclear power plant. This area includes not only the location of project infrastructure, but also temporary use areas during construction for storage, material laydown, parking, maneuvering of equipment, and other such uses. This area also includes an additional 100-foot buffer zone along the Guadalupe River valley margin, due to the probability for cultural resources along the valley margin. Exelon proposes this area as the APE for potential direct and indirect physical impacts to historic properties. Within this APE, Exelon proposes the following Phase Ib methodology to determine potential effects to historic properties. The recommendations below correspond to those found in the Phase Ia report, and are shown on attached Figure 2.

May 13, 2008  
Mr. James Bruseth, Ph.D.  
Page 3

- Conduct a 10-percent sample survey of the upland terrace. Thirteen "quadrats," each measuring 500 x 500 meters (62 acres), would comprise the sample area, represented by the black-hatched squares on Figure 2. Within each quadrat, survey will include a shovel test at least every two acres.
- Conduct survey of four contiguous quadrats (248 acres) surrounding a wetland on the upland terrace, represented by the yellow area on Figure 2. Survey will include shovel testing at 30 meter intervals.
- Conduct survey of four contiguous quadrats (248 acres) surrounding the lower incised portion of Dry Kuy Creek, represented by the yellow area on Figure 2. Survey will include shovel testing at 30 meter intervals.
- Conduct survey of four separate quadrats (each 62 acres) at the locations of four historic homesteads, represented by the blue squares on the Figure 2. Survey will include shovel testing at 30 meter intervals. It will also include geophysical survey for metal artifacts using a Time Domain Electromagnetic Induction Meter and a Fluxgate Gradiometer.
- Conduct survey of the Guadalupe River valley margin, represented by the yellow area on Figure 2, west of the black APE boundary. Survey will include shovel testing at 30 meter intervals with targeted backhoe trenching at those locations where shovel testing identifies intact deep deposits.
- Conduct survey of the portion of the heavy haul road (200 foot corridor) and the water intake pipeline (100 foot corridor) located within the proposed project site boundaries, as labeled on Figure 2. Survey will include shovel testing at 30 meter intervals.

Positive shovel tests will have additional shovel tests placed at 6 meter intervals in a radial pattern extending out from the discovery to determine site boundaries. Isolated discoveries and defined sites will be recorded using forms from the Texas Archeological Research Laboratory. Archaeological survey and recording will be conducted in accordance with the guidelines promulgated by the Council of Texas Archeologists. Recorded resources will be evaluated for eligibility to the National Register of Historic Places. Eligible and potentially eligible properties will be assessed to determine the potential for impacts from the proposed undertaking.

The proposed nuclear power plant would include structures that are up to approximately 180 feet above the current site elevation. During the Phase Ia investigations, GIS analysis coupled with field confirmation were used to define the area surrounding the proposed project site within which there could possibly be visual impacts to the settings of historic properties. Based on this analysis, Exelon proposes that the APE for potential visual impacts to historic properties be a 10-mile radius surrounding the proposed project site. Within this APE, Exelon proposes to identify and record historic structures and evaluate them for eligibility to the National Register. For those properties that are evaluated as eligible or potentially eligible, the potential visual impacts to the properties will be assessed. The determination of visual impacts will take into account elevation,

May 13, 2008  
Mr. James Bruseth, Ph.D.  
Page 4

topography, vegetation, distance, and orientation in relation to the proposed project. This proposed methodology corresponds to that found in the Phase Ia report.

The proposed project site is part of a potentially significant rural historic landscape. Exelon proposes that the Phase Ib methodology include definition of the boundaries, themes, and significance of this landscape, in accordance with the National Park Service's *Guidelines for Evaluating and Documenting Rural Historic Landscapes*. Potential impacts to this landscape will be determined. This proposed methodology corresponds to that found in the Phase Ia report.

The methodology and results of the Phase Ib identification, evaluation, and determination of potential effects within the APEs defined above will be presented in reports and submitted to the THC for review.

Exelon respectfully requests concurrence by THC that the definition of APE and the proposed Phase Ib methodology, as described herein, are suitable and sufficient to determine the potential effects of the proposed undertaking on historic properties. If you have any questions, please contact Mr. Joshua Trembley at 610-765-5345.

Respectfully,

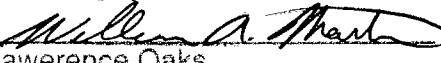


For KAA

Kenneth A. Ainger  
Director, New Plant Licensing

Enclosures: Figure 1 - Map of Proposed Victoria County Site  
Figure 2 - Map of Proposed Archaeological Survey Areas

cc: William Martin, Texas Historical Commission

CONCUR	
by	
for F. Lawrence Oaks	
State Historic Preservation Officer	
Date	5/29/08
Track#	

NP-08-0006

May 13, 2008

Mr. James Bruseth, Ph.D.  
Director, Archeology Division  
Texas Historical Commission  
P.O. Box 12276  
Austin, Texas 78711-2276

Subject:      1) Addition of Victoria County Project Site to Section 106 Consultation for the Proposed Exelon Nuclear Power Generation Project; and  
  
                  2) Consultation on Proposed APE and Investigation Methodology for Phase Ib at the Proposed Exelon Victoria County Project Site

Dear Mr. Bruseth:

Exelon Generation Company, LLC (Exelon) previously notified you, via letter dated September 5, 2008, that it is preparing a combined construction and operating license (COL) application for submittal to the Nuclear Regulatory Commission (NRC) for a proposed nuclear power plant. As part of the COL application, Exelon is preparing an environmental report that will be used by the NRC to prepare an environmental impact statement for the proposed action under the *National Environmental Policy Act*. The decision by the NRC on whether to issue the license for construction and operation of the power plant meets the definition of an "undertaking" under the *National Historic Preservation Act* (NHPA).

#### **Addition of Victoria County Project Site**

The previous notification was focused on the proposed Exelon Matagorda County Site. Exelon has since determined that it will study a proposed site location in Victoria County, Texas. This letter is to notify you of the Victoria County site as part of consultation with the Texas State Historic Preservation Officer and the Texas Historical Commission (THC) under Section 106 of the NHPA. Please note that although Exelon is preparing a COL application, no decision or commitment has been made at this time to move forward with construction of a nuclear power plant at either the Matagorda County or Victoria County site.

Attached Figure 1 shows the proposed location for the project in Victoria County. The proposed undertaking would occur approximately 13 miles south of Victoria and 1 mile north of McFaddin. To the west of the site is U.S. Highway 77 and to the east are Linn Lake and the Guadalupe River. The proposed project site can be found on the United States Geological Survey (USGS) 7.5 minute McFaddin, Raisin, Bloomington, and Bloomington SW, Texas (all 1995) topographic quadrangles.

The proposed undertaking would include construction and operation of a nuclear power generation plant with two reactors and associated plant facilities, all co-located in the northern portion of the project site. A large portion of the project site would be used for an approximately 6,100-acre cooling basin and reservoir. The proposed project site is located on private land that has been used for cattle grazing since the late nineteenth century. It has continued in that use to the present day, with the addition of limited development of wells for natural gas and petroleum production.

Included in the proposed power plant would be a heavy haul road extending east from U.S. Highway 77, passing north of the proposed plant to the Victoria Barge Canal, and running north along the levee to the existing barge loading facility at the barge turnaround in Pickering Basin. The haul road would facilitate delivery of construction materials and equipment and would likely remain in place after construction of the proposed nuclear plant is completed. The proposed power plant would also require an intake pipeline for water used by the plant cooling basin and the Guadalupe-Blanco River Authority (GBRA) reservoir. This underground pipeline would extend from the southern portion of the cooling basin and reservoir south and east to an intake and pumphouse located on the GBRA canal system near North Seadrift. The final locations of these two project features have not yet been defined.

#### **Consultation on Project Site Phase Ib APE and Methodology**

Exelon met with you and Mr. William Martin, also of THC, on December 17, 2008, to discuss the proposed Victoria County site. At that time, you recommended that Exelon conduct Phase Ia investigations to help in determining the Area of Potential Effect (APE) for the proposed undertaking and the methodology for conducting investigations in Phase Ib. Exelon acquired the services of Geo-Marine, Inc. to conduct Phase Ia studies of the project site, which included geoarchaeological studies, development of the prehistoric and historic cultural contexts, GIS studies to identify the visual impact assessment area, and a windshield survey to initiate identification of historic properties within the visual impact assessment area. A report was prepared describing the methodology and results of the Phase Ia work, which Exelon has provided to you for your review. The report also contained recommendations for Phase Ib investigations. Exelon has adopted these recommendations, as described below.

Exelon has identified the area within the overall project site that would be required for use during the construction and operation of the proposed nuclear power plant. This area includes not only the location of project infrastructure, but also temporary use areas during construction for storage, material laydown, parking, maneuvering of equipment, and other such uses. This area also includes an additional 100-foot buffer zone along the Guadalupe River valley margin, due to the probability for cultural resources along the valley margin. Exelon proposes this area as the APE for potential direct and indirect physical impacts to historic properties. Within this APE, Exelon proposes the following Phase Ib methodology to determine potential effects to historic properties. The recommendations below correspond to those found in the Phase Ia report, and are shown on attached Figure 2.

- Conduct a 10-percent sample survey of the upland terrace. Thirteen “quadrats,” each measuring 500 x 500 meters (62 acres), would comprise the sample area, represented by the black-hatched squares on Figure 2. Within each quadrat, survey will include a shovel test at least every two acres.
- Conduct survey of four contiguous quadrats (248 acres) surrounding a wetland on the upland terrace, represented by the yellow area on Figure 2. Survey will include shovel testing at 30 meter intervals.
- Conduct survey of four contiguous quadrats (248 acres) surrounding the lower incised portion of Dry Kuy Creek, represented by the yellow area on Figure 2. Survey will include shovel testing at 30 meter intervals.
- Conduct survey of four separate quadrats (each 62 acres) at the locations of four historic homesteads, represented by the blue squares on the Figure 2. Survey will include shovel testing at 30 meter intervals. It will also include geophysical survey for metal artifacts using a Time Domain Electromagnetic Induction Meter and a Fluxgate Gradiometer.
- Conduct survey of the Guadalupe River valley margin, represented by the yellow area on Figure 2, west of the black APE boundary. Survey will include shovel testing at 30 meter intervals with targeted backhoe trenching at those locations where shovel testing identifies intact deep deposits.
- Conduct survey of the portion of the heavy haul road (200 foot corridor) and the water intake pipeline (100 foot corridor) located within the proposed project site boundaries, as labeled on Figure 2. Survey will include shovel testing at 30 meter intervals.

Positive shovel tests will have additional shovel tests placed at 6 meter intervals in a radial pattern extending out from the discovery to determine site boundaries. Isolated discoveries and defined sites will be recorded using forms from the Texas Archeological Research Laboratory. Archaeological survey and recording will be conducted in accordance with the guidelines promulgated by the Council of Texas Archeologists. Recorded resources will be evaluated for eligibility to the National Register of Historic Places. Eligible and potentially eligible properties will be assessed to determine the potential for impacts from the proposed undertaking.

The proposed nuclear power plant would include structures that are up to approximately 180 feet above the current site elevation. During the Phase Ia investigations, GIS analysis coupled with field confirmation were used to define the area surrounding the proposed project site within which there could possibly be visual impacts to the settings of historic properties. Based on this analysis, Exelon proposes that the APE for potential visual impacts to historic properties be a 10-mile radius surrounding the proposed project site. Within this APE, Exelon proposes to identify and record historic structures and evaluate them for eligibility to the National Register. For those properties that are evaluated as eligible or potentially eligible, the potential visual impacts to the properties will be assessed. The determination of visual impacts will take into account elevation,

May 13, 2008  
Mr. James Bruseth, Ph.D.  
Page 4

topography, vegetation, distance, and orientation in relation to the proposed project. This proposed methodology corresponds to that found in the Phase Ia report.

The proposed project site is part of a potentially significant rural historic landscape. Exelon proposes that the Phase Ib methodology include definition of the boundaries, themes, and significance of this landscape, in accordance with the National Park Service's *Guidelines for Evaluating and Documenting Rural Historic Landscapes*. Potential impacts to this landscape will be determined. This proposed methodology corresponds to that found in the Phase Ia report.

The methodology and results of the Phase Ib identification, evaluation, and determination of potential effects within the APEs defined above will be presented in reports and submitted to the THC for review.

Exelon respectfully requests concurrence by THC that the definition of APE and the proposed Phase Ib methodology, as described herein, are suitable and sufficient to determine the potential effects of the proposed undertaking on historic properties. If you have any questions, please contact Mr. Joshua Trembley at 610-765-5345.

Respectfully,



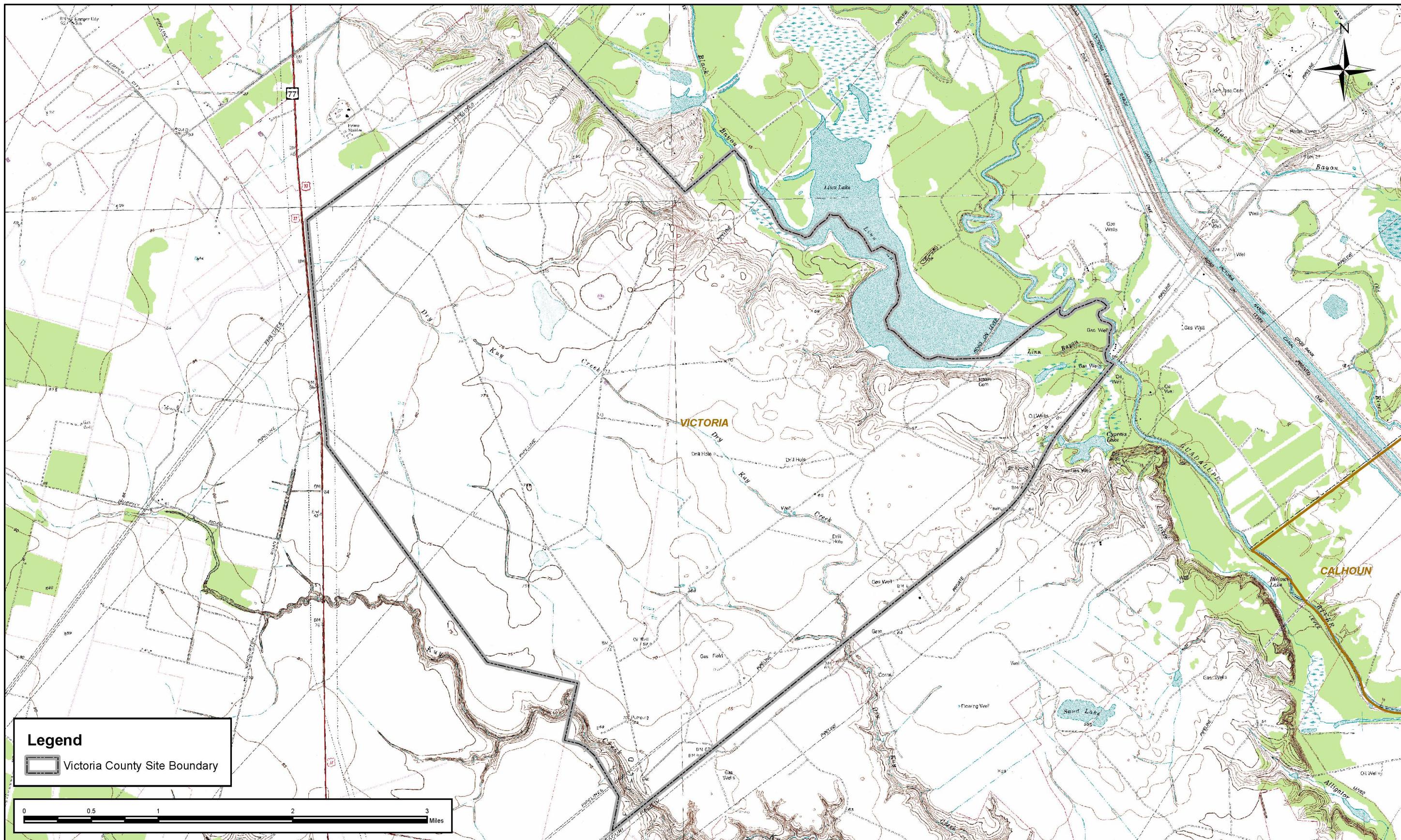
FOR KAA

Kenneth A. Ainger  
Director, New Plant Licensing

Enclosures: Figure 1 - Map of Proposed Victoria County Site  
Figure 2 - Map of Proposed Archaeological Survey Areas

cc: William Martin, Texas Historical Commission

Figure 1 - Map of Proposed Victoria County Site



Confidential and Proprietary - Not for Public Release. All locations are preliminary and subject to change.

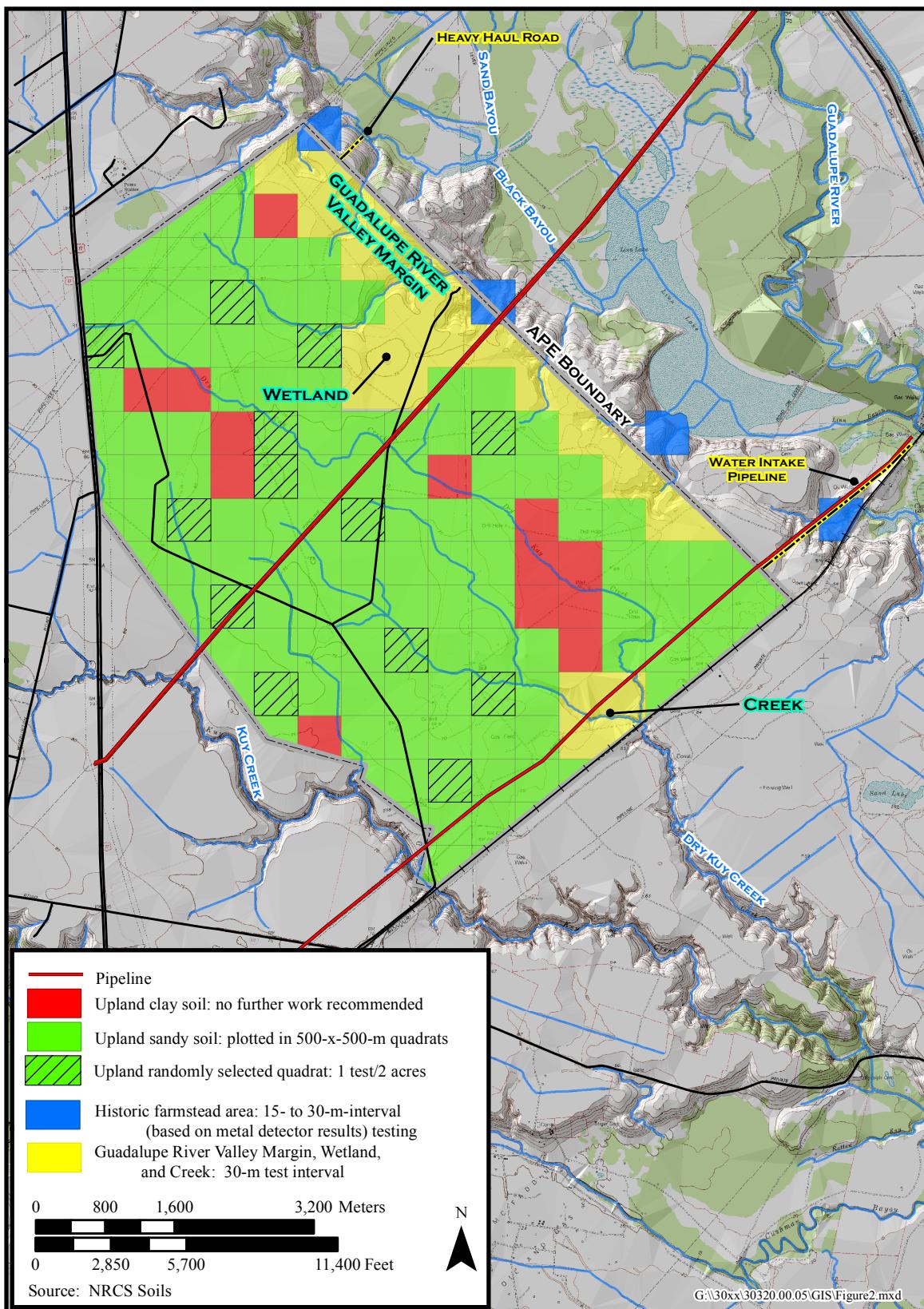


Figure 2 - Map of Proposed Archaeological Survey Areas.



NP-09-0002

February 13, 2009

Mr. James Bruseth, Ph.D.  
Director, Archeology Division  
Texas Historical Commission  
P.O. Box 12276  
Austin, Texas 78711-2276

**SUBJECT:** Transmittal of Phase Ib Investigations Report for the Exelon Victoria County Station Site and Request for Consultation

Dear Dr. Bruseth:

As discussed previously, Exelon Generation Company, LLC (Exelon) submitted a combined operating license (COL) application to the Nuclear Regulatory Commission (NRC) seeking authorization to construct and operate a proposed nuclear power plant at a site in Victoria County, Texas. Although Exelon submitted a license application and is working to obtain additional federal and state approvals, no decision or commitment has been made at this time to move forward with construction of a nuclear power plant.

Exelon has met and exchanged letters with you and Mr. William Martin of your staff several times over the past year to discuss and plan cultural resource investigations at the Victoria County Station (VCS) site. Of particular note, Exelon submitted a report of Phase Ia investigations conducted at the site to you on April 11, 2008, for your review. This report included a description of proposed Phase Ib investigations to be conducted at the site to identify historic properties. Mr. Martin responded with a letter on May 8, 2008, stating that the Area of Potential Effect (APE) definition and Phase Ib methodology as described in the report would demonstrate a good faith effort to identify historic properties for the proposed undertaking. Exelon submitted a letter to you on May 13, 2008, reiterating the proposed application of the Phase Ib methodology to the project APE and requesting concurrence from the Texas Historical Commission that the definition of the APE and proposed methodology would be suitable and sufficient to determine the potential effects of the proposed undertaking on historic properties, in accordance with Section 106 of the National Historic Preservation Act and 36 CFR Part 800. Mr. Martin responded on May 29, 2008, with concurrence.

The Phase Ib investigations, which included archaeological and geoarchaeological investigations, architectural survey, and definition of a rural historic landscape, were completed for the VCS site in May and June 2008.

The enclosed report (three volumes, two full copies of each) summarizes the findings of those investigations.

### **Definition of the Proposed Undertaking**

The proposed undertaking is defined as the construction and operation of Exelon's VCS nuclear power plant. This current consultation is for all portions of the undertaking to be conducted on the VCS site, which includes the main plant facility and the cooling water basin. Portions of the associated infrastructure that are located offsite have not yet been defined sufficiently to enable consultation regarding potential effects to historic properties. When the associated offsite infrastructure has been defined, Exelon will continue consultation with the Texas Historical Commission to identify potential effects to historic properties arising from that infrastructure.

### **Evaluation of Eligibility**

The Phase Ib archaeological and geoarchaeological investigations resulted in the identification of five archaeological sites and three localities within the defined APE for potential physical disturbance. Two of the sites (41VT145 and 41VT146) were recorded as having exclusively historic components and three sites (41VT147, 41VT148, and 41VT149) were identified as exclusively prehistoric. All three localities are exclusively prehistoric in nature. Applying National Register of Historic Places criteria (36 CFR 60.4), all five sites encountered are recommended as not eligible for listing on the National Register. Both of the historic sites lack contextual integrity and verifiable historical documentation. The three prehistoric sites all lack artifact assemblages or feature complexes that would retain sufficient data to contribute to our understanding of regional research questions. Each of the three localities was represented by a single artifact and thus was determined to not meet the definition of a site. All three are recommended as not eligible for listing on the National Register (see attached Table 1).

The Phase Ib architectural survey identified 473 historic resources within the 10-mile radius surrounding the project site that was defined as the APE for potential visual impacts. Applying National Register of Historic Places criteria (36 CFR 60.4), 404 resources are recommended as not eligible for listing on the National Register due to loss of integrity and defining architectural characteristics. Applying the same criteria, 69 of the resources are recommended as eligible for listing on the National Register, either: 1) individually; 2) as contributing resources to a proposed Town of McFaddin Historic District; or 3) both individually and as part of the proposed district. These eligible resources retain the majority of the seven aspects of integrity and are significant for their history (Criterion A) or architecture (Criterion C) or both (see attached Table 2).

The Phase Ib investigation defined a rural historic landscape for the entire APE defined for potential physical disturbance. Applying National Register of Historic Places criteria (36 CFR 60.4), this landscape is recommended as eligible for listing on the National Register under Criterion A for its associations with the cattle ranching and petroleum industries and under Criterion B for its associations with prominent local ranchers. The period of significance is defined as 1878 through 1968. The landscape is recommended as having exceptional significance in the history of cattle ranching and breeding, in accordance with Criterion Consideration G for properties that continue to achieve significance into a period less than 50 years before evaluation.

February 13, 2009  
Mr. James Bruseth, Ph.D.  
Page 3

The individual features associated with cattle ranching and the petroleum industries and elements of the natural landscape are recommended as contributing elements to this National Register-eligible rural historic landscape.

**Assessment of Effect**

Exelon considers that the proposed undertaking would have an adverse effect on 30 of the 69 recorded National Register-eligible architectural properties through visual impacts to the properties' integrity of setting and feeling. Twenty-eight of these properties are contributing resources to the proposed Town of McFaddin Historic District; thus, there would be an adverse effect to this proposed historic district.

Exelon also considers that the rural historic landscape would be adversely affected by the proposed undertaking through construction-related physical impacts to much of the recorded landscape and its contributing elements. Also, the introduction of a generating plant and associated infrastructure would not be in keeping with the ranch's historic setting, feeling, and association.

Exelon requests concurrence from the Texas State Historic Preservation Officer on Exelon's recommendations of eligibility for the identified resources, and on Exelon's assessment of the effect of the proposed undertaking as defined above on historic properties.

As described above, when associated offsite infrastructure has been defined, Exelon will continue consultation with the Texas Historical Commission to identify potential effects to historic properties arising from that infrastructure. Once agreement is reached on the assessment of effect to historic properties from the VCS project, Exelon will work with the Texas Historical Commission, State Historic Preservation Officer, and other consulting parties to develop measures, to the extent practicable, to mitigate adverse effects to historic properties that would arise from the proposed undertaking. If you have any questions, please contact Mr. Joshua Trembley at 610-765-5345.

Respectfully,



Kenneth A. Ainger  
Director, New Plant Licensing

Enclosures: *Phase Ib Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria County, Texas, Volumes I, II, and III* (2 full copies)

cc: William Martin, Texas Historical Commission (w/o enclosures)

Table 1  
 NRHP Eligibility Recommendations for Recorded Sites and Localities  
 Within the Victoria County Station Project Area

Site Identifier	Size (m <sup>2</sup> )	Number of Artifacts	Temporal Affiliation	NRHP Eligibility
41VT145	7,225	724	Historic 19 <sup>th</sup> century	Ineligible
41VT146	2,700	262	Historic 19 <sup>th</sup> century	Ineligible
41VT147	10	3	Unspecified Prehistoric	Ineligible
41VT148	100	4	Unspecified Prehistoric	Ineligible
41VT149	200	4	Unspecified Prehistoric	Ineligible
Locality 1	10	1	Unspecified Prehistoric	Ineligible
Locality 2	10	1	Unspecified Prehistoric	Ineligible
Locality 3	20	1	Unspecified Prehistoric	Ineligible

Table 2  
Recommended Eligible Properties Within the 10-Mile APE Radius and Assessment of Effect

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
83	Second Street	Domestic, single dwelling	Ca. 1940	Community Development	Retains integrity	Eligible	C	No Effect	Bloomington	Victoria
86	Grand Avenue	Domestic, single dwelling and concrete cistern	1920	Community Development, Agriculture	Retains integrity	Eligible	C	No Effect	Guadalupe	Victoria
117	Fifth Street	Domestic, single dwelling	Ca. 1930	Community Development	Lacks integrity of materials, but modifications are reversible	Eligible	C	No Effect	Bloomington	Victoria
175	SH 239	Domestic, single dwelling	Ca. 1920	Agriculture	Retains integrity	Eligible	C	No Effect	SH 239	Victoria
302	Scott Street	Domestic, single dwelling	1950	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
303	Scott Street	Domestic, single dwelling	Ca. 1930	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
414	Illinois Street	Domestic, multiple dwelling	1930	Community Development	Lacks integrity of design, but modifications are reversible	Eligible	C	No Effect	Bloomington	Victoria
508	SH 239	Domestic, single dwelling, secondary structure (2 barns, 2 shed)	1940	Community Development, Agriculture	Lacks integrity of materials	Eligible	A & C	No Effect	SH 239	Refugio
844	Guadalupe Road	Domestic, single dwelling, secondary structure (shed, water tank), agricultural outbuildings (barn)	1920	Community Development, Agriculture	Retains integrity	Eligible	C	No Effect	Guadalupe	Victoria

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
901	Guadalupe Road	Domestic, single dwelling, secondary structure (detached garage)	1950	Community Development, Agriculture	Lacks integrity of materials, but modifications are reversible	Eligible	C	No Effect	Guadalupe	Victoria
901	South Laurent Street (SH 185)	Domestic, single dwelling, secondary structure (detached garage)	1939	Community Development	Lacks integrity of materials	Eligible	C	No Effect	Victoria	Victoria
917	Indiana Street	Domestic, single dwelling	Ca. 1930	Community Development	Lacks integrity of materials, but modifications are reversible	Eligible	C	No Effect	Bloomington	Victoria
1163	SH 239	Domestic, single dwelling	1945	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
1165	SH 239	Domestic, single dwelling	1950	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
1167	SH 239	Domestic, single dwelling	1955	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
1172	SH 239	Domestic, single dwelling, secondary structure (detached garage)	1920	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
1349	Guadalupe Road	Domestic, single dwelling, secondary structures (shed), agricultural outbuilding (barn), windmill	1945	Community Development, Agriculture	Retains integrity	Eligible	C	No Effect	Guadalupe	Victoria
1409	South Laurent Street (SH 185)	Domestic, single dwelling, secondary structure (detached garage, 1 shed)	1956	Community Development	Retains integrity	Eligible	C	No Effect	Victoria	Victoria

Table 2 (Page 2)

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
1505	Hand Road	Domestic, single dwelling	1930	Community Development	Lacks integrity of materials	Eligible	C	No Effect	Victoria	Victoria
1607	Old Refugio Road	Domestic, single dwelling, secondary structure (3 shed), agricultural outbuilding (barn), windmill	1914	Agriculture (Farming)	Lacks integrity of materials, but modifications reversible	Eligible	C	Adverse	US 77	Victoria
1805	Hand Street	Domestic, single dwelling	1934	Community Development	Lacks integrity of materials, but modifications reversible	Eligible	C	No Effect	Victoria	Victoria
1901	Hand Street	Domestic, single dwelling, detached garage	1940	Community Development	Lacks integrity of materials, but modifications reversible	Eligible	C	No Effect	Victoria	Victoria
1907	Ben Jordan Street	Domestic, single dwelling	1904	Community Development	Retains integrity	Eligible	C	No Effect	Victoria	Victoria
2303	Guadalupe Road	Domestic, single dwelling, agricultural outbuilding (4 barns), concrete cistern	1948	Community Development, Agriculture	Retains integrity	Eligible	C	No Effect	Guadalupe	Victoria
2405	Dudley Street	Religious facility (Church)	Ca. 1940	Community Development	Lacks integrity of materials, but modifications are reversible	Eligible	A & C	No Effect	Victoria	Victoria
2500	Ellis Street	Domestic, single dwelling	Ca. 1950	Community Development	Lacks integrity of materials	Eligible	C	No Effect	Victoria	Victoria
2514	Odem Street	Domestic, multiple dwelling, secondary structure (detached garage)	1940	Community Development	Retains integrity	Eligible	C	No Effect	Victoria	Victoria
2614	Callis Street	Domestic single dwelling	1940	Community Development	Lacks integrity of material	Eligible	C	No Effect	Victoria	Victoria

Table 2 (Page 3)

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
4853	SH 185	Domestic, single dwelling; three agricultural outbuildings	1945	Agriculture (Ranching)	Retains integrity	Eligible	A & C	No Effect	Victoria	Victoria
7220	US 87	Domestic, single dwelling, secondary structure (2 shed, 1 carport, 1 water tank), agricultural outbuilding (barn),	1949	Community Development, Agriculture	Residence retains integrity, 2 outbuildings lack integrity of design	Eligible	A & C	No Effect	Guadalupe/ Dacosta	Victoria
8780	US 77	Domestic, single dwelling, secondary structure (3 sheds), agricultural outbuilding (2 barns), windmill	1910	Agriculture	Retains integrity, (except barn lacks integrity of materials)	Eligible	A & C	Adverse	US 77	Victoria
9178	US 87	Non-historic domestic, single dwelling, historic agricultural outbuildings (1barn, 1 corral)	Ca. 1940	Agriculture	Retains integrity	Eligible	A & C	No Effect	Guadalupe/ Dacosta	Victoria
9900	Kemper City Road	Domestic, single dwelling, secondary structure (shed)	1950	Community Development	Lacks integrity of materials	Eligible	C	No Effect	Victoria	Victoria
12716	San Antonio River Road	Domestic, single dwelling, agricultural outbuilding (barn)	1940/1978	Agriculture	Retains integrity	Eligible	C	No Effect	San Antonio River Road	Victoria
7658 (875) (a)	US 87	Commerce, business	Ca. 1935	Community Development	Retains integrity	Eligible	C	No Effect	Guadalupe	Victoria

Table 2 (Page 4)

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
7658 (875) (b)	US 87	Domestic, single dwelling	Ca. 1940	Community Development	Retains integrity	Eligible	C	No Effect	Guadalupe	Victoria
DuPont/ Invista Plant	Old Bloomington Road	Industry, processing	Ca. 1950	Community Development	Retains integrity (inaccessible, architectural integrity assumed)	Eligible	A & C	No Effect	Victoria	Victoria
First Presbyterian Church	Main Street (SH 35)	Religious facility (church)	Ca. 1920	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio
Street Number Unavailable, Intersection of US 77 and SH 239	O'Connor Brothers Ranch Property	Religious facility (church)	Ca. 1890	Religion/ Agriculture	Retains integrity	Eligible	A & C	No Effect	O'Connor Ranch	Refugio
Street Number Unavailable (Barn 1)	FM 445	Agricultural outbuilding (barn)	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Barn 3)	FM 445	Agricultural outbuilding (barn)	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Historic Post Office)	FM 445	Government, Post Office; RTHL	Ca. 1900	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria
Street Number Unavailable (Infant Jesus of Prague Catholic Church)	FM 445	Religious facility (church); RTHL	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district). A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria

Table 2 (Page 5)

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
Street Number Unavailable (McFaddin Mercantile and Café)	FM 445	Commerce, department store and restaurant; RTHL	Ca. 1905	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria
Street Number Unavailable (Residence 1)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria
Street Number Unavailable (Residence 10)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 11)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 12)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 13)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 14)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria

Table 2 (Page 6)

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
Street Number Unavailable (Residence 15)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 18)	Cushman Road	Domestic, single dwelling	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria
Street Number Unavailable (Residence 19)	Cushman Road	Domestic, single dwelling	1950	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria
Street Number Unavailable (Residence 20)	Cushman Road	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 21)	Cushman Road	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 22)	Cushman Road	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 23)	Cushman Road	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, individually eligible	A & C (district), A & C (individually)	Adverse (district), Adverse (individually)	McFaddin	Victoria

Table 2 (Page 7)

Table 2 (cont'd)

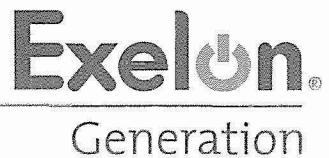
Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
Street Number Unavailable (Residence 3)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 4)	FM 445	Domestic, single dwelling	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 5)	FM 445	Domestic, single dwelling	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 6)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 7)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Residence 9)	FM 445	Domestic, single dwelling	Ca. 1920	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Tivoli Presbyterian Church)	Williams Street	Religious facility (church)	Ca. 1920	Community Development	Retains integrity	Eligible	C	No Effect	Tivoli	Refugio

Table 2 (Page 8)

Table 2 (cont'd)

Number	Address	Property Type	Construction Date	Historic Context	Integrity	NRHP Eligibility Recommendation	Eligibility Criteria	Assessment of Effect	Community	County
Street Number Unavailable (Barn 5)	Cushman Road	Agricultural outbuilding (barn)	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Barn 7)	Cushman Road	Agricultural outbuilding (barn)	Ca. 1915	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Barn 8)	Cushman Road	Agricultural outbuilding (barn)	Ca. 1910	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A & C (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Windmill)	Cushman Road	Agriculture, extraction (windmill)	Ca. 1935	Agriculture (Ranching)	Retains integrity	Contributing, not eligible for individual listing	A (district)	Adverse (district)	McFaddin	Victoria
Street Number Unavailable (Union Pacific Railroad Building)	First Street	Commerce (other)	Ca. 1915	Community Development	Retains integrity	Eligible	A & C	No Effect	Bloomington	Victoria

Table 2 (Page 9)



NP-09-0005

April 1, 2009

Mr. James Bruseth, Ph.D.  
Director, Archeology Division  
Texas Historical Commission  
P.O. Box 12276  
Austin, Texas 78711-2276

SUBJECT: Transmittal of Additional Copies of Volumes II and III of the Phase Ib Investigations Report for the Exelon Victoria County Station Site

Dear Dr. Bruseth:

As discussed previously, Exelon Nuclear Texas Holdings, LLC (Exelon) submitted a combined operating license (COL) application to the Nuclear Regulatory Commission (NRC) seeking authorization to construct and operate a proposed nuclear power plant at a site in Victoria County, Texas. Although Exelon submitted a license application and is working to obtain additional federal and state approvals, no decision or commitment has been made at this time to move forward with construction of a nuclear power plant.

Exelon submitted two full copies of the Phase 1b Investigations Report for the Exelon Victoria County Station Site to your office under letter dated February 13, 2009 (NP-09-0002). In accordance with Mr. Bill Martin's recent phone request, please find enclosed an additional copy each of Volumes II and III to facilitate your review. Exelon is also agreeable to an extension of the review time to benefit the Texas Historical Commission's (THC) evaluation of the report. Accordingly, Exelon requests that the results of the THC's review be provided by May 15, 2009.

As described in previous correspondence, when associated offsite infrastructure has been defined, Exelon will continue consultation with the Texas Historical Commission to identify potential effects to historic properties arising from that infrastructure. Once agreement is reached on the assessment of effect to historic properties from the VCS project, Exelon will work with the Texas Historical Commission, State Historic Preservation Officer, and other consulting parties to develop measures, to the extent practicable, to mitigate adverse effects to historic properties that could arise from the proposed undertaking.

April 1, 2009  
Mr. James Bruseth, Ph.D.  
Page 2

If you have any questions, please contact Mr. Joshua Trembley at 610-765-5345.

Respectfully,



Kenneth A. Ainger  
Director – New Plant Licensing

Enclosures: *Phase Ib Investigations of the Proposed Site for Victoria County Station,  
Units 1 and 2, Victoria County, Texas, Volumes II and III*

cc: Bill Martin, Texas Historical Commission (w/o enclosures)



---

NP-10-0003

March 8, 2010

Mr. James Bruseth, Ph.D.  
Director, Archeology Division  
Texas Historical Commission  
P.O. Box 12276  
Austin, Texas 78711-2276

SUBJECT: Transmittal of the Phase Ib Investigations Report for the Exelon Victoria County Station Site

Dear Dr. Bruseth:

As discussed previously, Exelon Nuclear Texas Holdings, LLC (Exelon) submitted a combined license (COL) application to the Nuclear Regulatory Commission (NRC) seeking authorization to construct and operate a proposed nuclear power plant at a site in Victoria County, Texas, in September 2008. On October 15, 2009, Exelon notified the THC via teleconference of its intent to seek an Early Site Permit (ESP) in lieu of a COL.

Exelon intends to submit the ESP application in the first quarter of 2010. If the ESP application were to be approved, the NRC would be certifying that the VCS site satisfies its criteria for site safety, environmental impacts, and emergency planning. If granted, the ESP would be valid for incorporation in a subsequent COL application for up to 20 years, subject to renewal. Although Exelon is not seeking near term authorization to construct and operate a nuclear facility in Victoria County, the NRC will consider potential impacts to cultural resources in its assessment of the site's suitability for future nuclear construction and operation activities. The decision by the NRC on whether to issue the ESP meets the definition of an "undertaking" under the *National Historic Preservation Act* (NHPA).

Exelon submitted two full copies of the Phase 1b Investigations Report for the Exelon Victoria County Station (VCS) site to your office under letter dated February 13, 2009 (NP-09-0002). At the THC's request, additional copies of Volume II and Volume III were submitted on April 1, 2009, to facilitate the agency's review. The THC responded via letter dated April 30, 2009, with the following findings:

1. The THC concurred with Exelon's recommendations regarding the eligibility of archaeological sites in Volume I;

2. The THC concurred with the resources recommended as contributing to a potential Town of McFaddin Historic District and the eligibility recommendations for several specific resources;
3. The THC did not concur with the recommendation of eligibility of several specific resources, determining that they are individually ineligible;
4. The THC requested additional information for several resources to aid in the agency's determinations of eligibility.

Volumes II and III have been revised to provide the additional information requested by the THC in its April 30, 2009 letter. Additionally, as discussed during the October 15, 2009 teleconference, the ESP application will reference a maximum building height of approximately 230 feet, increased from the height of 166 feet referenced in the COL application. Accordingly, the revisions to Volumes II and III include changes to address this increase in height. As requested by the THC, Exelon also reevaluated the visual effects APE and concluded that a 10-mile radius around the site remains a conservative APE when the greater (i.e., 230 feet above grade) building height is considered. The techniques used in the APE reevaluation are documented in Volume II.

The following VCS Phase Ib Investigations Report documents are being transmitted to the THC: one bound and one unbound copy of Volume I; one bound copy each of Volume II and Volume III; a tagged compact disc (CD) containing Volumes I, II, and III; and the abstract form for Volume I.

The final locations of offsite infrastructure will not be determined until the COL application stage. When the offsite infrastructure locations have been defined, Exelon will continue consultation with the THC to identify potential effects to historic properties arising from that infrastructure. Once agreement is reached on the assessment of effect to historic properties from the VCS project, Exelon will work with the Texas Historical Commission, State Historic Preservation Officer, and other consulting parties to develop measures, to the extent practicable, to mitigate adverse effects to historic properties that could arise from the proposed undertaking.

If you have any questions, please contact Mr. Joshua Trembley at 610-765-5345.

Respectfully,



Marilyn C.Kray  
Vice President, Nuclear Project Development

March 8, 2010  
Mr. James Bruseth, Ph.D.  
Page 3

Enclosures: *Phase Ib Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria County, Texas, Volume I*  
(one bound and one unbound copy)

*Phase Ib Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria County, Texas, Volume II*  
(one bound copy)

*Phase Ib Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria County, Texas, Volumes III*  
(one bound copy)

Compact Disc containing Volume I, Volume II, and Volume III

Abstract Form for Volume I

cc: Bill Martin, Texas Historical Commission (w/o enclosures)

NP-10-0013  
June 15, 2010

10 CFR 52, Subpart A

U. S. Nuclear Regulatory Commission  
ATTN: Document Control Desk  
Washington, DC 20555-0001

Subject: Exelon Nuclear Texas Holdings, LLC  
Victoria County Station  
Early Site Permit Application  
Transmittal of Texas Historical Commission Concurrence Letters for  
Phase Ia and Ib Investigations of the VCS Site  
Docket No. 52-042

References: (1) Exelon Nuclear Texas Holdings, LLC letter to USNRC, Application for Early Site Permit for Victoria County Station, dated March 25, 2010

Exelon Nuclear Texas Holdings, LLC (Exelon) submitted an application for an early site permit (ESP) in Reference 1 for the Victoria County Station (VCS) site. That submittal consisted of six parts as described in the referenced letter.

As discussed in Part 3, Environmental Report (ER), of the VCS ESP Application (ESPA), Exelon initiated informal consultation with the Texas Historical Commission (THC) for the VCS site in December 2007 and subsequently completed Phase Ia and Phase Ib cultural resource investigations. The THC concurred with the findings of the Phase Ia investigation by way of letter dated May 29, 2008 (ER, Appendix A). In February 2009, Exelon submitted to the THC the Phase 1b Investigations Report for the VCS site. The THC responded via letter dated April 30, 2009 (Enclosure 1), with the following findings:

1. The THC concurred with Exelon's recommendations regarding the eligibility of archaeological sites;
2. The THC concurred with the resources recommended as contributing to a potential Town of McFaddin Historic District and the eligibility recommendations for several specific resources;
3. The THC did not concur with the recommendation of eligibility of several specific resources, determining that they are individually ineligible;
4. The THC requested additional information for several resources to aid in the agency's determinations of eligibility.

In addition, the SPA references a maximum building height of approximately 230 feet, increased from the height of 166 feet referenced in the VCS Combined License (COL) application. Accordingly, the revisions to the Phase Ib Investigations Report included

changes to address this increase in height. As requested by the THC, Exelon also reevaluated the visual effects Area of Potential Effect (APE) and concluded that a 10-mile radius around the site remains a conservative APE when the greater (i.e., 230 feet above grade) building height is considered.

Exelon submitted the revised Phase 1b Investigations Report to the THC in March 2010, and the THC responded with concurrence of the report findings via letter dated April 6, 2010 (Enclosure 2). As noted in Exelon's correspondence with the THC and stated in ER Subsection 2.5.3.5, the final locations of offsite infrastructure will be determined at the COL application stage. When the offsite infrastructure locations have been defined, Exelon will continue consultation with the THC to identify potential effects to historic resources arising from that infrastructure.

ER Appendix A will be revised to include the THC letters provided in Enclosure 1 and Enclosure 2. This ER revision will be included in the next periodic ESPA update.

Regulatory commitments established in this submittal are identified in Enclosure 3. If additional information is required, please contact Joshua Trembley at (610) 765-5345.

I declare under penalty of perjury that the foregoing is true and correct. Executed on the 15<sup>th</sup> day of June, 2010.

Respectfully,



Marilyn C. Kray  
Vice President, Nuclear Project Development

Enclosures: (1) THC Letter to Exelon, dated April 30, 2009  
(2) THC Letter to Exelon, dated April 6, 2010  
(3) Summary of Regulatory Commitments

cc: USNRC, Director, Office of New Reactors/NRLPO (w/enclosures)  
USNRC, Project Manager, VCS, Division of New Reactor Licensing  
(w/enclosures)  
USNRC, Environmental Project Manager, VCS, Division of New Reactor  
Licensing (w/enclosures)  
USNRC Region IV, Regional Administrator (w/enclosures)

**ENCLOSURE 1**

**THC Letter to Exelon, dated April 30, 2009**

TEXAS HISTORICAL COMMISSION  
*real places telling real stories*

April 30, 2009

Kenneth A. Ainger  
Director – New Plant Licensing  
Exelon Generation  
200 Extension Way  
KSA-3N, Suite 320  
Kennett Square, PA 19348

Re: *Project review under Section 106 of the National Historic Preservation Act of 1966, as amended, Draft Phase IB Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria , Refugio and Calhoun Counties, Texas (NRC, 200906587)*

Dear Mr. Ainger:

Thank you for your correspondence describing the above referenced project. This letter serves as comment on the proposed undertaking from the State Historic Preservation Officer, the Executive Director of the Texas Historical Commission.

The review staff, led by Bill Martin, has completed its review of the draft report and has the following comments. We look forward to receiving the revised documents for review.

The Archeology Division staff has reviewed the survey data reported in *Volume I: Archaeological, Geoarchaeological, and Geophysical Investigations*. This office concurs with all determinations of eligibility for archeological sites as listed in **Table 8 of the report**. Specifically, we consider sites 41VT145, 41VT146, 41VT147, 41VT148, and 41VT149 to be ineligible for inclusion in the National Register of Historic Places because they are unlikely to yield information important to our understanding of history or prehistory. We also consider the isolated finds to be ineligible. Additional editorial comments related to *Volume I* may be found in the attachment to this letter and should be corrected in the final report.

The History Programs Division staff has reviewed the survey report in *Volume II: Cultural Landscape, Historic Resources, and Visual Impact Investigations* and the survey forms and information provided in *Volume III* and has the following comments listed below. Additional comments related to the format and content of *Volumes II & III* may be found in the attachment to this letter and should be corrected in the final report.

In *Volume II*, on page 268, Figure 182, is a Pratt truss railroad bridge on US 59, in the Northwest Quadrant, for which there has been no determination of eligibility made by Geo-Marine. THC review staff has determined that this Pratt truss railroad bridge is eligible for listing in the NRHP, at the local level of significance, under Criterion A for Transportation, and under Criterion C for Engineering.



Staff concurs that the McFaddin Ranch is eligible under Criteria A and B at the state level of significance with a period of significance spanning 1878-1968. However, staff does not concur with the list of contributing features included in Appendix A pages A-4-A-26; no resources beyond the date of 1968 are considered contributing.

Staff concurs that the following resources are individually eligible for listing in the NRHP:

- 035 1607 Old Refugio Road, Victoria, Victoria Co
- 060 86 Grand Avenue, Victoria, Victoria Co
- 129 1163 Hwy 239 East, Tivoli, Refugio Co
- 414 Union Pacific Building, First Street, Bloomington, Victoria Co
- 490 1901 Hand Road, Victoria, Victoria Co
- 491 1907 Ben Jordan Street, Victoria, Victoria Co
- 500a Ruddock's Grocery Building, 7658 (875) US 87, Victoria, Victoria Co
- 501 8780 US 77, Victoria, Victoria Co (as farmstead complex of multiple buildings/structures/objects)
- 506 Mission Church, O'Connor Brothers Ranch, intersection of US 77 and Hwy 239, Victoria, Victoria Co
- 508 First Lutheran Church, Main Street (Hwy 35), Tivoli, Refugio Co

Staff concurs with the recommendation to consider the following resources as contributing to a potential Town of McFaddin Historic District, McFaddin, Victoria County:

- 415 Barn 1, FM 445
- 416 Barn 3, FM 445
- 417 Historic McFaddin Post Office Building, FM 445
- 418 Infant Jesus of Prague Catholic Church, FM 445
- 420 Historic McFaddin Mercantile Building, FM 445
- 421 Residence 1, FM 445
- 422 Residence 10, FM 445
- 423 Residence 11, FM 445
- 424 Residence 12, FM 445
- 425 Residence 13, FM 445
- 426 Residence 14, FM 445
- 427 Residence 15, FM 445
- 428 Residence 18, Cushman Road
- 429 Residence 19, "The Mansion," Cushman Road
- 430 Residence 20, Cushman Road
- 431 Residence 21, Cushman Road
- 432 Residence 22, Cushman Road
- 433 Residence 23, Cushman Road
- 435 Residence 3, FM 445
- 436 Residence 4, FM 445
- 437 Residence 5, FM 445
- 438 Residence 6, FM 445
- 439 Residence 7, FM 445
- 440 Residence 9, FM 445
- 511 Barn 4, FM 445
- 512 Barn 5, Cushman Road
- 513 Barn 6, Cushman Road
- 514 Barn 7, Cushman Road
- 515 Barn 8, Cushman Road

- 516 Residence 2, FM 445
- 517 Residence 8, FM 445
- 518 Residence 16, FM 445
- 519 Residence 17, FM 445
- 520 Historic McFadden School, FM 445

Staff does not concur with the recommendations of eligibility for the following resources; rather, THC has determined these resources to be individually ineligible:

- 002 1165 Hwy 239 East, Tivoli, Refugio Co
- 006 414 Illinois Street, Bloomington, Victoria Co
- 025 1167 Hwy 239 East, Tivoli, Refugio Co
- 026 302 Scott Street, Tivoli, Refugio Co
- 029 1172 Hwy 239 East, Tivoli, Refugio Co
- 043 1349 Guadalupe Road, Victoria, Victoria Co
- 045 901 Guadalupe Road, Victoria, Victoria Co
- 053 7220 US Hwy 87 South, Victoria, Victoria Co
- 245 117 Fifth Street, Victoria, Victoria Co
- 246 175 Hwy 239, Victoria, Victoria Co
- 248 303 Scott Street, Victoria, Victoria Co
- 483 83 Second Street, Bloomington, Victoria Co
- 485 917 Indiana Street, Bloomington, Victoria Co
- 486 1409 South Laurent Street (Hwy 185), Victoria, Victoria Co
- 487 1505 Hand Road, Victoria, Victoria Co
- 489 1805 Hand Road, Victoria, Victoria Co
- 494 2405 Dudley Street, Victoria, Victoria Co
- 495 2500 Ellis Street, Victoria, Victoria Co
- 496 2514 Odem Drive, Victoria, Victoria Co
- 497 2614 Callis Street, Victoria, Victoria Co
- 500b 7658 (875) US 87, Victoria, Victoria Co
- 507 Tivoli Presbyterian Church, Williams Street, Tivoli, Refugio Co
- 509 DuPont-Invista Plant, Old Bloomington Road, Victoria, Victoria Co
- 527 901 South Laurent Street (Hwy 185), Victoria, Victoria Co

Staff requests more information on the following resources in order to make determinations of eligibility; if the property is a complex of multiple structures, then a photograph of each structure and dates of construction are needed):

- 036 2303 Guadalupe Road, Victoria, Victoria Co
- 044 844 Guadalupe Road, Victoria, Victoria Co
- 066 12716 San Antonio River Road, Victoria, Victoria Co
- 071 508 Hwy 239 East, Tivoli, Refugio Co
- 407 corner of Fourth Street and Shepley Street, Bloomington, Victoria Co (Why is this recommended ineligible?)
- 454 Austwell Road and Main Street (Hwy 35), Tivoli, Refugio Co (Why is this recommended ineligible?)
- 499 4853 Hwy 185, Victoria, Victoria Co (Why is this recommended eligible? The façade is proportioned like a recently-constructed house.)
- 502 9178 US 87, Victoria, Victoria Co (Why is this recommended eligible, when the house is "modern"? Please provide photos and date for "modern" dwelling.)

504 9900 Kemper City Road, Victoria, Victoria Co (Why is this recommended eligible? Is it a kit house? What is in the vicinity of this house?)

Staff concurs with the recommendation that the remainder of the resources surveyed are individually ineligible for listing in the NRHP.

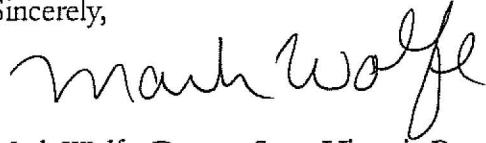
The Division of Architecture staff has reviewed the draft report for a determination of effect. It is our understanding that construction of the Victoria County Station generating plant and associated cooling water basin and reservoir will physically impact a portion of the historically significant McFaddin Ranch, including almost all of the recorded rural historic landscape and its contributing elements. Staff concurs that the physical impact constitutes an adverse effect and that visual impacts will further adversely affect the historic setting, feeling, and association of the NR eligible McFaddin Ranch.

Additionally, the proposed project, consisting of a building approximately 166 feet in height as well as a steam plume that would range in height from 160 feet in summer to 544 feet in winter, will have a visual impact to resources within a 10-mile radius of the project site. However, we do not have adequate information to concur with the effect determinations at this time. Staff requests more information, including properly keyed plans and rationale for the proposed determinations of effect for all historic resources determined eligible for listing in the NRHP. For example, we will need to know what of the three criteria (topography, vegetation, and height) are present to make a determination of no adverse effect for each historic resource determined eligible for listing in the NRHP.

Section 106 regulations note that the federal agency must seek methods to avoid, minimize, or mitigate the adverse effect. Once we have concurred with the effects of the proposed undertaking on eligible resources, it must be demonstrated that efforts have been made to avoid and minimize any adverse effects. If we find this information to be sufficient, we will request that the Nuclear Regulatory Commission create a Memorandum of Agreement (MOA) and agree to mitigation efforts.

We look forward to further consultation with your office and hope to maintain a partnership that will foster effective historic preservation. Thank you for your cooperation in this federal review process, and for your efforts to preserve the irreplaceable heritage of Texas. If you have any questions concerning our review of this report, or if we can be of further assistance, please contact Bill Martin at (512) 463-5867 or bill.martin@thc.state.tx.us; historian Rachel Leibowitz at (512) 463-6046 or rachel.leibowitz@thc.state.tx.us; or Kim Barker at (512) 463-8952 or kim.barker@thc.state.tx.us.

Sincerely,



Mark Wolfe, Deputy State Historic Preservation Officer

cc: Dennis Riedesel, Victoria County Historical Commission  
C. Herndon Williams, Ph.D., Refugio County Historical Commission  
Cherre Cain, Calhoun County Historical Commission

FLO/KAB

## Additional SHPO Comments to be Addressed in Revisions to the Draft Reports.

The Archeology Division has the following editorial comments related to *Volume I* that should be corrected in the final report:

- Sketch maps of sites: While sketch maps help reviewers to see the distribution of shovel tests in relation to topography, vegetation and man-made features such as pipelines and roads (as in Figures 17 and 20), they are of little use for small sites with no discernable topography or features (as in Figures 23-26). Future reports do not need to include sketch maps if they only illustrate evenly spaced dots on a white background.
- p. 14. Missing word in last paragraph. “... expected observations that may associated with” should read, “... expected observations that may be associated with.”
- p. 41. Typographical error. “Kawankawa” should read “Karankawa.”
- p. 57. Geophysical Survey. The introductory paragraph should specify why these techniques were used for this project and where they were used. The reader does not know until several pages into the discussion how this is relevant to the survey. Given the nature of what was found, the author should address why a simple metal detector was not used instead of the more complicated and sensitive equipment that was employed.
- p. 60. Typographical errors. “remnant magnetism” should read, “remanent magnetism.” Similarly, “thermoremnant magnetism” should read, “thermoremanent magnetism.”
- p. 79. Typographical error. “December of 1828” cannot be correct if Thomas Babcock was listed as 27 years old in 1870. One of these dates is incorrect.
- p. 82. Site 41VT145. The authors argue that the site lacks integrity because of cracks in the soil, and disturbance demonstrated by a mixture of manure and leaf litter at depth. While we concur that this site is ineligible, we object to the reasoning used by the authors. The site is not ineligible because of a lack of integrity, but rather, because it simply cannot yield significant information. Since the site appears to be a single component historic occupation with no subsequent mixing of later material, it does not matter that there has been disturbance that has caused artifacts to move down through the soil. The artifacts still relate to the period of occupation, which could be interpreted if there was anything to be gained by such an exercise.

The History Programs Division staff has reviewed the survey report in *Volume II: Cultural Landscape, Historic Resources, and Visual Impact Investigations* and the survey forms and information provided in *Volume III* and has the following comments:

- All survey forms should include the National Register criteria of eligibility and the level of significance for each resource.
- All survey forms should include the seven areas of historic integrity (location, design, setting, materials, workmanship, feeling, and association).
- When dealing with a resource that has multiple structures or buildings, like a farmstead, the survey form should include supplemental pages so that photographs of all components can clearly be seen. Generally, it

is not possible to evaluate a farmstead or other resource with potentially-contributing components if only one building is photographed.

- The fold-out maps of each quadrant of the 10-mile viewing radius should be labeled so that each surveyed resource number can appear next to its appropriate keyed symbol. If this means that the quadrant maps need to be enlarged and reproduced on multiple pages, that is acceptable. It is difficult for our reviewers to understand the spatial relationship between resources if they are not keyed to a map.

**ENCLOSURE 2**

**THC Letter to Exelon, dated April 6, 2010**

**TEXAS HISTORICAL COMMISSION**  
*real places telling real stories*

April 6, 2010

Joshua Trembley  
Exelon Generation Company  
200 Exelon Way, KSA1-E  
Kennett Square PA 19348

*Re: Project review under Section 106 of the National Historic Preservation Act of 1966, as amended,  
Phase IB Investigations of the Proposed Site for Victoria County Station, Units 1 and 2, Victoria,  
Refugio and Calhoun Counties, Texas  
NRC/106 (THC Track #201008503; see also #200906587)*

Dear Mr. Trembley:

Thank you for your correspondence providing additional information regarding the above referenced project which was received on March 9, 2010. This letter serves as comment on the proposed undertaking from the State Historic Preservation Officer, the Executive Director of the Texas Historical Commission.

The review staff, led by Kim Barker, has completed its review of the project documentation provided. As noted in your letter, The Archeology Division concurred with all of your contractor's recommendations regarding archeological sites within the Exelon APE. Specifically, we concurred that sites 41VT145, 41VT146, 41VT147, 41VT148, and 41VT149 are ineligible for inclusion in the National Register of Historic Places, as are the three isolated finds. We consider Volume I to be the final report for this project. No further consultation is required with the Archeology Division.

Our History Programs Division staff has reviewed the survey forms submitted in *Volume II: Texas Historical Commission Forms*. Regarding eligibility of historic resources, our letter dated April 30, 2009 stands. With this letter we will address only the properties for which we requested additional information.

For the following resources, we **concur** that they are **eligible** for listing in the National Register of Historic Places:

- 036 2303 Guadalupe Road, Victoria, Victoria County (as intact mid-century farmstead)
- 044 844 Guadalupe Road, Victoria, Victoria County (as intact 1920s farmstead)
- 066 12716 San Antonio River Road, Victoria, Victoria County (as intact 1940s farmstead)
- 071 508 Hwy 239 East, Tivoli, Refugio County (as intact 1940s farmstead)
- 504 9900 Kemper City Road, Victoria, Victoria County (as intact possible kit house)

For the following resource, we **concur** that the property is not eligible:

- 499 4853 Hwy 185, Victoria, Victoria County

For the following resources, we **do not concur** and have determined the properties **eligible** for NRHP listing:



407 corner of Fourth Street and Shepley Street, Bloomington, Victoria County  
454 Austwell Road and Main Street (Hwy 35), Tivoli, Refugio County

For the following resource, we **do not concur** and have determined the properties **ineligible** for NRHP listing:

502 9178 US 87, Victoria, Victoria County

In our letter of April 30, 2009, Division of Architecture staff concurred that the proposed project would have **adverse direct and indirect effects on the McFaddin Ranch**, and requested additional information to determine potential visual effects on other eligible resources within the 10-mile APE. At that time, the project consisted of a building approximately 166 feet in height as well as a steam plume that would range in height from 160 feet in summer to 544 feet in winter. The proposal has since been revised to accommodate a potential building height of 230 feet; the APE remains the same.

We **concur** that the project will have **adverse visual effects** on the proposed Town of McFaddin Historic District, and each of its individual contributing resources. Further, we **concur** that the proposed project will have **adverse visual effects** on the following individually eligible resources:

035 1607 Old Refugio Road, Victoria, Victoria County  
501 8780 US 77, Victoria, Victoria County

We have **determined** that the project will have **no adverse effects** on the following eligible resources for which no recommendations of effect were provided:

407 corner of Fourth Street and Shepley Street, Bloomington, Victoria County  
454 Austwell Road and Main Street (Hwy 35), Tivoli, Refugio County

We **concur** that the project as proposed will have **no adverse effects** on all other eligible resources.

Section 106 regulations note that the federal agency must seek methods to avoid, minimize, or mitigate the adverse effects. The Nuclear Regulatory Commission must now show efforts to avoid and minimize the adverse effects as noted above. If we find this information to be sufficient, we will request that the Nuclear Regulatory Commission create a Memorandum of Agreement (MOA) and agree to mitigation efforts.

We look forward to further consultation with your office and hope to maintain a partnership that will foster effective historic preservation. Thank you for your cooperation in this federal review process, and for your efforts to preserve the irreplaceable heritage of Texas. If you have any questions concerning our review of this report, or if we can be of further assistance, please Kim Barker at (512) 463-8952 or [kim.barker@thc.state.tx.us](mailto:kim.barker@thc.state.tx.us).

Sincerely,



Kim Barker, Project Reviewer  
for: Mark Wolfe, State Historic Preservation Officer

cc: Dennis Riedesel, Chair, Victoria County Historical Commission  
C. Herndon Williams, Ph.D., Chair, Refugio County Historical Commission  
Larry Nichols, Chair, Calhoun County Historical Commission

MW/KB

### **ENCLOSURE 3**

#### **SUMMARY OF REGULATORY COMMITMENTS**

**(Exelon Letter to USNRC No. NP-10-0013, dated June 15, 2010)**

The following table identifies commitments made in this document. (Any other actions discussed in the submittal represent intended or planned actions. They are described to the NRC for the NRC's information and are not regulatory commitments.)

<b>COMMITMENT</b>	<b>COMMITTED DATE</b>	<b>COMMITMENT TYPE</b>	
		<b>ONE-TIME ACTION (Yes/No)</b>	<b>Programmatic (Yes/No)</b>
ER Appendix A will be revised to include the THC letters provided in Enclosure 1 and Enclosure 2. This ER revision will be included in the next periodic ESPA update.	Revision 1 of the ESPA Environmental Report planned for March 25, 2011	Yes	No