**Appendix A – Previous Documentation** 



#### Graceland 2 Solar Project Desktop Critical Issues Analysis Report

July 2, 2020

#### Prepared for:

RWE Solar Development, LLC 701 Brazos Street, Suite 1400 Austin, Texas 78701

#### Prepared by:

Stantec Consulting Services Inc. 601 Grassmere Park Road, Suite 22 Nashville, Tennessee 37211 Appendix B – Public Involvement

Appendix C – Ecology Survey Reports



Wetland and Stream Delineation Report, WR Graceland Solar LLC, Shelby County, Tennessee

November 30, 2022

Prepared for:

WR Graceland LLC, Solar 353 N. Clark Street, 30th Floor Chicago, IL 60654

Prepared by:

Stantec Consulting Services Inc. 601 Grassmere Park Road, Suite 22 Nashville, TN 37211



### Threatened and Endangered Species Report

WR Graceland Solar LLC, Shelby County, Tennessee

January 6, 2022

#### Prepared for:

WR Graceland Solar LLC 353 N. Clark Street, 30th Floor Chicago, IL 60654

#### Prepared by:

Stantec Consulting Services Inc. 601 Grassmere Park Road, Suite 22 Nashville, TN 37211





Bat Mist Net Survey for Graceland 2 Solar Project, Shelby County, Tennessee

August 30, 2021



Prepared for:

WR Graceland Solar, LLC 353 North Clark Street, 30th Floor Chicago, IL 60654 Appendix D - Glare Hazard Analysis



Glare Hazard Analysis WR Graceland Solar, LLC Shelby County, Tennessee

February 11, 2022

Prepared for:

WR Graceland Solar, LLC 353 N. Clark Street, 30th Floor Chicago, IL 60654

Prepared by:

Stantec Consulting Services Inc. 601 Grassmere Park Suite 22 Nashville, TN 37211

WR Graceland Solar Project	Appendix E -	- Cultural Survey Reports and Addendums
	_	
Appendix E – Cultural Su	rvey Repo	orts and Addendums

## PHASE I ARCHAEOLOGICAL SURVEY FOR THE PROPOSED WR GRACELAND SOLAR LLC PROJECT IN SHELBY COUNTY, TENNESSEE

by:

Jason Ross
Andrew P. Bradbury, MA
Desiree Marcel
Dustin Lawson
Tracy Jenkins, PhD
Victoria Swenson, MA
William Joseph, MA

Submitted to:

Amy Tolley
Stantec Consulting Services, Inc.
601 Grassmere Park Road
Suite 22
Nashville, Tennessee 37211

Submitted by:

Cultural Resource Analysts, Inc. 119 West Summit Hill Drive Knoxville, Tennessee 37902 CRA Project No.: T210176

Andrew P. Bradbury, RPA Principal Investigator

**Draft Report** 

November 5, 2021

Revised December 17, 2021

Lead Federal Agency: Tennessee Valley Authority

## ADDENDUM PHASE I ARCHAEOLOGICAL SURVEY FOR THE PROPOSED WR GRACELAND SOLAR LLC PROJECT IN SHELBY COUNTY, TENNESSEE

by:

Jason Ross and Desiree Marcel

#### Submitted to:

Amy M. Willoughby
Principal/Business Center Practice Lead, Environmental Services
Stantec Consulting Services Inc.
601 Grassmere Park Road Suite 22
Nashville, Tennessee 37211-3681 US
Direct: 615 829-5461
Amy.Willoughby@stantec.com

Submitted by:

Cultural Resource Analysts, Inc. 119 West Summit Hill Drive Knoxville, Tennessee 37902 CRA Project No.: T210176

Andrew P. Bradbury, RPA Principal Investigator

**Draft Report** 

December 22, 2021

Lead Federal Agency: Tennessee Valley Authority

### HISTORIC ARCHITECTURAL RESOURCE SURVEY FOR THE PROPOSED WR GRACELAND SOLAR LLC PROJECT IN SHELBY COUNTY, TENNESSEE

By John P. Dickerson, MA

#### Submitted to:

Amy M. Tolley
Principal/Business Center Practice Lead, Environmental Services
Stantec Consulting Services, Inc.
601 Grassmere Park Road Suite 22
Nashville, Tennessee 37211-3681 US
Direct: 615 829-5461
Amy.Tolley@stantec.com

#### Submitted by:

Cultural Resource Analysts, Inc. 119 West Summit Hill Drive Knoxville, Tennessee 37902 Phone: (865) 249-6035 Email: twhurdle@crai-ky.com CRA Project No.: T210178

Elizabeth Heavrin, M.H.P. Principal Investigator

Egoeth Heari

October 19, 2021

# ADDENDUM TO THE HISTORIC ARCHITECTURAL RESOURCE SURVEY FOR THE PROPOSED WR GRACELAND SOLAR LLC PROJECT IN SHELBY COUNTY, TENNESSEE

Ву

Chelsey Johnson, MA; Jenny Andrews, MA; and Elizabeth Heavrin, MHP

#### Submitted to:

Amy M. Willoughby
Principal/Business Center Practice Lead, Environmental Services
Stantec Consulting Services Inc.
601 Grassmere Park Road Suite 22
Nashville, Tennessee 37211-3681 US
Direct: 615 829-5461
Amy.Willoughby@stantec.com

#### Submitted by:

Cultural Resource Analysts, Inc. 119 West Summit Hill Drive Knoxville, Tennessee 37902 Phone: (865) 249-6035 Email: twhurdle@crai-ky.com CRA Project No.: T210178

> Elizabeth Heavrin, MHP Principal Investigator

Egoeth Heavi

December 22, 2021

WR Graceland Solar Project	Appendix F – Phase I Environmental Site Assessment (ESA)
Appendix F – Phase	I Environmental Site Assessment (ESA)



#### GRACELAND 2 SOLAR SITE Phase I Environmental Site Assessment

January 12, 2020

Prepared for:

RWE Renewables Americas, LLC 353 N. Clark Street, 30th Floor Chicago, IL 60654

Prepared by:

Stantec Consulting Services Inc. 601 Grassmere Park Suite 22 Nashville, TN 37211

Project No.: 172677409

Appendix G – Agency Coordination



400 West Summit Hill Drive, Knoxville, Tennessee 37902

April 16, 2021

Mr. E. Patrick McIntyre, Jr.
Executive Director
and State Historic Preservation Officer
Tennessee Historical Commission
2941 Lebanon Road
Nashville, Tennessee 37243-0442

Dear Mr. McIntyre:

TENNESSEE VALLEY AUTHORITY (TVA), POWER PURCHASE AGREEMENT (PPA) GRACELAND SOLAR, SHELBY COUNTY, TENNESSEE (35.299106, -89.898419) TVA TRACKING NUMBER – CID 80006)

TVA proposes to enter into a PPA with Graceland Solar, LLC for a 150-megawatt solar photovoltaic (PV) generating facility in Shelby County, TennesseeThe facility would be located on an assemblage of parcels making up approximately1740-acres (Figure 1 in the enclosed proposal). TVA proposes that the area of potential effects (APE) should be considered to be the footprint where ground disturbance could occur as a result of the undertaking including the proposed solar arrays and any supporting infrastructure as well as the 0.5 mile radius of the project area and within the visual line of site that may have a visual effect to historic properties.

For your review, please find the research design for the Phase I Cultural Resources survey by Cultural Resources Analysts, Inc. enclosed. Pursuant to 36 CFR § 800.4(b)(1), TVA finds that the survey design presented here is a reasonable and good faith effort to carry out identification efforts. By this letter, TVA is initiating consultation regarding the proposed undertaking.

Pursuant to 36 CFR Part 800.3(f)(2), TVA is consulting with federally recognized Indian tribes regarding historic properties within the proposed project's APE that may be of religious and cultural significance and are eligible for the National Register of Historic Places.

If you have any questions or comments, please contact Michaelyn Harle by email at <a href="mailto:mharle@tva.gov">mharle@tva.gov</a>.

Sincerely,

Clinton E. Jones

Manager

**Cultural Compliance** 

Mr. E. Patrick McIntyre, Jr. Page 2 April 16, 2021

MSH:ABM Enclosures cc (Enclosures):

Ms. Jennifer Barnett Tennessee Division of Archaeology 1216 Foster Avenue, Cole Bldg. #3 Nashville, Tennessee 37210

#### INTERNAL COPIES NOT TO BE INCLUDED WITH OUTGOING LETTER:

S. Dawn Booker, BR 2C-C Michael C. Easley, BR 2C-C Michaelyn S. Harle, WT 11C-K Brandon J. Hartline, BR 2C-C Susan R. Jacks, WT 11C-K Dana M. Nelson, WT 11C-K Elizabeth Smith, WT 11C-K Rebecca C. Tolene, WT 7B-K William B. Wells, BR 2C-C W. Douglas White, WT 11C-K ECM, ENVRecords



#### TENNESSEE HISTORICAL COMMISSION

#### STATE HISTORIC PRESERVATION OFFICE 2941 LEBANON PIKE NASHVILLE, TENNESSEE 37243-0442 OFFICE: (615) 532-1550

www.tnhistoricalcommission.org

April 19, 2021

Mr. Clinton E. Jones Tennessee Valley Authority 400 West Summit Hill Drive Knoxville, TN 37902

RE: TVA / Tennessee Valley Authority, Power Purchase Agreement, Graceland Solar/CID 80006, Shelby County, TN

Dear Mr. Jones:

At your request, our office has reviewed the above-referenced Archaeological Survey Work Plan. This review is a requirement of Section 106 of the National Historic Preservation Act for compliance by the participating federal agency or applicant for federal assistance. Procedures for implementing Section 106 of the Act are codified at 36 CFR 800 (Federal Register, December 12, 2000, 77698-77739).

Based on the information provided, we find that the Archaeological Survey Work Plan is sufficient to identify and survey potential archaeological resources. However, you did not include an Architectural Survey Work Plan. We do agree with your letter that a half-mile Area of Potential Effects is sufficient to assess visual effects, but since there is no Architectural Survey Work Plan, we cannot comment on the proposed survey's methodology.

Your continued cooperation is appreciated.

Sincerely.

for: E. Patrick McIntyre, Jr.

State Historic Preservation Officer

Casey Lee

Historic Preservation Specialist/Coordinator Section 106 Review and Compliance Program Tennessee State Historic Preservation Office Ms. Marianne Shuler, Senior Specialist,
Archaeologist & Tribal Liaison
Cultural Compliance
Tennessee Valley Authority
400 W. Summit Hill Drive
460 WT 7D-K
Knoxville, TN 37902

Dear Ms. Shuler:

Thank you for the research design and letter initiating consultation on a proposed power purchase agreement with Graceland Solar, LLC for a solar photovoltaic generating facility in Shelby County, Tennessee (CID 80006). We accept the invitation to consult under Section 106 of the National Historic Preservation Act.

The Chickasaw Nation concurs that the procedures outlined in the research design should adequately test the area to locate any potential cultural resources in the project area of potential effects. We wish to review the cultural resource report once it is available. In the event the agency becomes aware of the need to enforce other statutes we request to be notified under ARPA, AIRFA, NEPA, NAGPRA, NHPA and Professional Standards.

Your efforts to preserve and protect significant historic properties are appreciated. If you have any questions, please contact Ms. Karen Brunso, tribal historic preservation officer, at (580) 272-1106, or by email at <a href="mailto:karen.brunso@chickasaw.net">karen.brunso@chickasaw.net</a>.

Sincerely,

Lisa John, Secretary

Department of Culture and Humanities

Cc: mmshuler@tva.gov



### CHEROKEE NATION®

P.O. Box 948 • Tahlequah, OK 74465-0948 918-453-5000 • www.cherokee.org Office of the Chief

Chuck Hoskin Jr.

Principal Chief

**Bryan Warner**Deputy Principal Chief

May 19, 2021

Marianne Shuler Tennessee Valley Authority 400 West Summit Hill Drive Knoxville, TN 37902

Re: CID 80006, Proposed Power Purchase Agreement for Graceland Solar

Ms. Marianne Shuler:

The Cherokee Nation (Nation) is in receipt of your correspondence about **CID 80006**, and appreciates the opportunity to provide comment upon this project. Please allow this letter to serve as the Nation's interest in acting as a consulting party to this proposed project.

The Nation maintains databases and records of cultural, historic, and pre-historic resources in this area. Our Historic Preservation Office reviewed this project, cross referenced the project's legal description against our information, and found no instances where this project intersects or adjoins such resources. Thus, the Nation does not foresee this project imparting impacts to Cherokee cultural resources at this time.

However, the Nation requests that the Tennessee Valley Authority (TVA) halt all project activities immediately and re-contact our Offices for further consultation if items of cultural significance are discovered during the course of this project.

Additionally, the Nation requests that TVA conduct appropriate inquiries with other pertinent Tribal and Historic Preservation Offices regarding historic and prehistoric resources not included in the Nation's databases or records.

If you require additional information or have any questions, please contact me at your convenience. Thank you for your time and attention to this matter.

Wado,

Elizabeth Toombs, Tribal Historic Preservation Officer Cherokee Nation Tribal Historic Preservation Office From: Pelren, David

To: Williams, Michael (Nashville)

Cc: Kiser, James; Willoughby, Amy; Adams, Joshua

Subject: RE: [EXTERNAL] Bat Survey Plan - Shelby County, TN

**Date:** Friday, July 23, 2021 9:51:25 AM

Mike (and crew) -

Thank you for providing a description of your study plan for netting at the proposed Graceland 2 solar project site in Shelby County, Tennessee. We concur with your proposed methodology and level of effort for the sampling effort, and we authorize its implementation in accordance with section 10 of the Endangered Species Act. Good luck with your survey.

David Pelren
Fish and Wildlife Biologist
Ecological Services
U.S. Fish and Wildlife Service
446 Neal St.
Cookeville, TN 38501

office phone: 931-525-4974 mobile phone: 931-261-5844

NOTE: This email correspondence and any attachments to and from this sender are subject to the Freedom of Information Act (FOIA) and may be disclosed to third parties.

From: Williams, Michael (Nashville) < Michael. Williams@stantec.com>

**Sent:** Thursday, July 22, 2021 4:34 PM **To:** Pelren, David <david\_pelren@fws.gov>

**Cc:** Kiser, James <James.Kiser@stantec.com>; Tolley, Amy <Amy.Tolley@stantec.com>; Adams,

Joshua < Joshua. Adams@stantec.com>

Subject: [EXTERNAL] Bat Survey Plan - Shelby County, TN

This email has been received from outside of DOI - Use caution before clicking on links, opening attachments, or responding.

Dave,

For your review, please find attached a bat survey plan for a proposed solar site near Millington, Shelby County, Tennessee.

Please let me know if you have any questions or need any additional information.

Thank you,

#### Mike

#### **Michael Williams**

Natural Resource Team Lead, Associate Stantec 601 Grassmere Park, Suite 22, Nashville, TN 37211 Office: (615) 829-5451 Cell: (615) 585-4125 Main: (615) 885-1144 Michael.Williams@stantec.com

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Please consider the environment before printing this email.

From: Pelren, David
To: Willoughby, Amy

Cc: <u>Tennessee ES, FWS</u>; <u>Sikula, Nicole R</u>

Subject: FWS #2021-CPA-0746 / TA-1258 Graceland 2 solar bat netting survey Shelby Co

**Date:** Friday, October 1, 2021 3:03:47 PM

Ms. Amy Tolley Stantec 601 Grassmere Park Road, Suite 22 Nashville, Tennessee 37211-3681

Ms. Tolley –

The Fish and Wildlife Service (Service) has reviewed your report of a bat mist net survey that was conducted during summer 2021 in an effort to document the presence/likely absence of Indiana bat and northern long-eared bat in conjunction with the Graceland 2 solar project proposed for construction on 1,797 acres of property near Millington, Shelby County, Tennessee (FWS #2021-CPA-0746 / TA-1258). Stantec staff conducted 19 net-nights of survey effort to sample 150 acres of forested habitat. The project did not result in capture of any federally listed species. Therefore, you concluded that both the Indiana bat and northern long-eared bat are presumed to be absent from the proposed project site, as depicted on a map provided with the survey report.

Based on the survey results, we concur with your conclusion that both the Indiana bat and northern long-eared bat are considered absent from the entirety of the proposed project site. We consider the survey results to be valid for a period of five years after completion of the survey. We understand that WR Graceland Solar, LLC may consult with the Service regarding the proposed solar project and potential impacts to federally listed species, including the two addressed here. We would welcome such coordination. We ask that future consultation efforts regarding this proposal be directed to the email address, *TennesseeES@fws.gov*, and that the FWS consultation # indicated in the subject line of this message be referenced.

Please contact me at *david\_pelren@fws.gov* or 931-261-5844 if you have questions about these comments.

David Pelren
Fish and Wildlife Biologist
Ecological Services
U.S. Fish and Wildlife Service
446 Neal St.
Cookeville, TN 38501

office phone: 931-525-4974 mobile phone: 931-261-5844

NOTE: This email correspondence and any attachments to and from this sender are subject to the Freedom of Information Act (FOIA) and may be disclosed to third parties

**From:** Tolley, Amy <Amy.Tolley@stantec.com> **Sent:** Monday, September 20, 2021 4:58 PM **To:** Pelren, David <david\_pelren@fws.gov>

**Cc:** Kiser, James <James.Kiser@stantec.com>; Adams, Joshua <Joshua.Adams@stantec.com>;

Williams, Michael (Nashville) < Michael. Williams@stantec.com>; Fitzpatrick, Caitlin

<Caitlin.Fitzpatrick@stantec.com>

Subject: RE: [EXTERNAL] Bat Survey Plan - Shelby County, TN

David, please see attached Bat Mist Net Survey report for the proposed Graceland 2 solar site in Shelby County, Tennessee. Please let us know if you concur with the findings. Thank you,

#### Amy M. Tolley

Principal/Business Center Practice Lead, Environmental Services

Direct: 615 829-5461 Mobile: 615 582-9240 Fax: 615 885-1102 Amy.Tolley@stantec.com

Stantec

601 Grassmere Park Road Suite 22 Nashville TN 37211-3681 US

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From: Pelren, David < david\_pelren@fws.gov>

**Sent:** Friday, July 23, 2021 8:51 AM

**To:** Williams, Michael (Nashville) < <u>Michael. Williams@stantec.com</u>>

Cc: Kiser, James < <u>James.Kiser@stantec.com</u>>; Tolley, Amy < <u>Amy.Tolley@stantec.com</u>>; Adams,

Joshua < <u>Joshua. Adams@stantec.com</u>>

Subject: RE: [EXTERNAL] Bat Survey Plan - Shelby County, TN

Mike (and crew) -

Thank you for providing a description of your study plan for netting at the proposed Graceland 2 solar project site in Shelby County, Tennessee. We concur with your proposed methodology and level of effort for the sampling effort, and we authorize its implementation in accordance with section 10 of the Endangered Species Act. Good luck with your survey.

David Pelren
Fish and Wildlife Biologist
Ecological Services
U.S. Fish and Wildlife Service
446 Neal St.
Cookeville, TN 38501

office phone: 931-525-4974

mobile phone: 931-261-5844

NOTE: This email correspondence and any attachments to and from this sender are subject to the Freedom of Information Act (FOIA) and may be disclosed to third parties.

**From:** Williams, Michael (Nashville) < <u>Michael.Williams@stantec.com</u>>

**Sent:** Thursday, July 22, 2021 4:34 PM **To:** Pelren, David < <u>david\_pelren@fws.gov</u>>

Cc: Kiser, James < <u>James.Kiser@stantec.com</u>>; Tolley, Amy < <u>Amy.Tolley@stantec.com</u>>; Adams,

Joshua < Joshua. Adams@stantec.com >

Subject: [EXTERNAL] Bat Survey Plan - Shelby County, TN

This email has been received from outside of DOI - Use caution before clicking on links, opening attachments, or responding.

Dave,

For your review, please find attached a bat survey plan for a proposed solar site near Millington, Shelby County, Tennessee.

Please let me know if you have any questions or need any additional information.

Thank you,

Mike

#### **Michael Williams**

Natural Resource Team Lead, Associate Stantec 601 Grassmere Park, Suite 22, Nashville, TN 37211

Office: (615) 829-5451 Cell: (615) 585-4125 Main: (615) 885-1144

Michael.Williams@stantec.com

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#### TENNESSEE HISTORICAL COMMISSION

#### STATE HISTORIC PRESERVATION OFFICE 2941 LEBANON PIKE NASHVILLE, TENNESSEE 37243-0442 OFFICE: (615) 532-1550

www.tnhistoricalcommission.org

January 5, 2022

Mr. James W. Osborne Jr. Tennessee Valley Authority 400 West Summit Hill Drive Knoxville, TN 37902

RE: TVA / Tennessee Valley Authority, Architecture Review, Power Purchase Agreement, Graceland Solar Farm CID 80006, Shelby County, TN

Dear Mr. Osborne:

In response to your request, we have reviewed the architectural survey report and accompanying documentation submitted by you regarding the above-referenced undertaking. Our review of and comment on your proposed undertaking are among the requirements of Section 106 of the National Historic Preservation Act. This Act requires federal agencies or applicants for federal assistance to consult with the appropriate State Historic Preservation Office before they carry out their proposed undertakings. The Advisory Council on Historic Preservation has codified procedures for carrying out Section 106 review in 36 CFR 800 (Federal Register, December 12, 2000, 77698-77739).

Considering the information provided, we concur that no architectural resources eligible for listing in the National Register of Historic Places will be affected by this undertaking. If project plans are changed please contact this office to determine what further action, if any, will be necessary to comply with Section 106 of the National Historic Preservation Act. Questions or comments may be directed to Casey Lee (615 253-3163).

Your cooperation is appreciated.

Sincerely,

for: E. Patrick McIntyre, Jr.

State Historic Preservation Officer

Casey Lee

Historic Preservation Specialist/Coordinator Section 106 Review and Compliance Program Tennessee State Historic Preservation Office



400 West Summit Hill Drive, Knoxville, Tennessee 37902

February 16, 2022

Mr. E. Patrick McIntyre, Jr. Executive Director and State Historic Preservation Officer Tennessee Historical Commission 2941 Lebanon Road Nashville, Tennessee 37243-0442

Dear Mr. McIntyre:

TENNESSEE VALLEY AUTHORITY (TVA), POWER PURCHASE AGREEMENT (PPA), GRACELAND SOLAR, ARCHAEOLOGICAL SURVEY AND ARCHITECTURAL ADDENDUM, SHELBY COUNTY, TENNESSEE (TVA TRACKING NUMBER – CID 80006) (35.299106, -89.898419)

In a letter dated April 16, 2021, TVA initiated consultation with your office regarding TVA's proposal to enter into a PPA with Graceland Solar, LLC for a 150-megawatt solar photovoltaic (PV) generating facility in Shelby County, Tennessee. As originally proposed, the facility would be located on an assemblage of parcels making up approximately 1740 acres.

TVA, in consultation, determined that the area of potential effects (APE) to be the footprint where ground disturbance could occur as a result of the undertaking including the proposed solar arrays and any supporting infrastructure as well as areas within the 0.5-mile radius of the project area within the visual line of site. After completion of the Phase I Archaeological survey, an additional property was included by Graceland Solar, LLC. An additional 165-acre parcel was added to the proposed solar facility that will include a new substation, TVA is revising the APE to include the footprint and viewshed of this additional parcel.

Graceland Solar, LLC contracted with Cultural Resources Analysist, Inc (CRA) to conduct a Phase I Cultural Resources survey. The results of the architectural survey for the original 1740 acres were previously provided to your office. The archeological report for the 1740-acre archaeological survey titled *Phase I Archaeological Survey for the Proposed WR Graceland Solar LLC Project in Shelby County, Tennessee* can be downloaded at <a href="https://docume.com/21-188/ev/3-Jan 13.pdf">21-188 ev/3-Jan 13.pdf</a>
- <a href="Google Drive">Google Drive</a>. The addendum archaeological report can be downloaded at <a href="Addendum Archaeology">Addendum Archaeology</a>. The architectural addendum report can be downloaded at <a href="Archaeology">Architecture Addendum</a>

During the current survey, CRA revisited seven previously recorded archaeological sites including three precontact sites (40SY304, 40SY305, and 40SY344), two historic sites (40SY347 and 40SY784), and two multicomponent sites (40SY343 and 40SY345). In addition, CRA identified 50 previously unrecorded sites including 14 precontact sites (40SY863, 40SY867, 40SY868, 40SY883, 40SY885, 40SY877, 40SY888, 40SY879, 40SY889, 40SY890, 40SY895, 40SY898, and 40SY899), 24 historic sites (40SY850, 40SY852, 40SY855,

Mr. E. Patrick McIntyre, Jr. Page 2 February 16, 2022

40SY860, 40SY861, 40SY862, 40SY865, 40SY866, 40SY869, 40SY870, 40SY871, 40SY872, 40SY873, 40SY874, 40SY875, 40SY880, 40SY881, 40SY884, 40SY886, 40SY887,40SY891, 40SY892, 40SY893, and 40SY894), and 12 multicomponent sites (40SY851,40SY853, 40SY854, 40SY856, 40SY857, 40SY858, 40SY859, 40SY864, 40SY878, 40SY882, 40SY896, and 40SY897). The majority of the archaeological survey area is characterized by highly eroded soils with the majority of the materials recovered from the surface or within the plowzone. CRA recommends that two of the precontact sites (40SY877 and 40SY879), the precontact component at site 40SY856, and the precontact and historic component at sites 40SY344, 40SY854, and 40SY878) should be considered unassessed for the National Register of Historic Places (NRHP) based on the potential for intact deposits. CRA recommends the remaining archeological sites ineligible based on lack of stratigraphic integrity and low density of artifacts.

Singleton

Parkway appears to have destroyed the site as no archaeological material was documented during the addendum survey in its mapped location. As a result of the additional survey, CRA identified six archaeological sites. Sites 40SY900, 40SY901, and 40SY903 represent historic rural domestic sites that date to the twentieth century. Sites 40SY902 and 40SY905 represent indeterminate precontact sites. Site 40SY904 represents a multicomponent rural domestic and indeterminate precontact site. All cultural material was recovered from the surface or from plow zone context. Due to the lack of stratigraphic integrity and low density of artifacts, CRA recommends the sites documented during the addendum survey not eligible for inclusion on the NRHP.

Eight resources located in the revised APE were addressed by the August 2021 survey. In the letter dated January 5, 2022, your office concurred with our findings and recommendations. The APE for the additional parcel overlaps the previously surveyed area addressed in our previous consultation. The APE for the additional parcel intersects a parcel associated with Jones Orchard, containing Sites 13 (SY-32797A; non-extant), 14 (SY-32809A; extant), 15 (SY-32808A, extant), and 16 (SY-32798A, nonextant). Seven properties (Sites 22-28) containing previously unrecorded historic architectural resources were identified within the survey area for the additional parcel. CRA recommends that Jones Orchard should be associated with Site 14 (SY-32809A) and Site 15 (SY-32808), would require additional archival research to better situate the property and landscape within the local agricultural history of the region and therefore, both should be considered unassessed. However, the vast majority of the historic orchard is outside the 0.5 mi buffer and viewshed for both the solar installation and the additional parcel. In addition, a portion of the property has been bisected by Singleton Parkway, and a new interchange was built to its immediate northeast, altering the larger setting of the property. Even if the Jones Orchard were to be determined eligible for the NRHP, TVA finds that proposed undertaking would not result in an adverse effect to the property. In addition, a portion of the parcel also extends onto the property of the Naval Support Activity Mid-South base, no buildings associated with the base are within the APE, and the Naval Support Activity

Mr. E. Patrick McIntyre, Jr. Page 3 February 16, 2022

Mid-South base is separated from the project area by a modern highway (Paul Barret Parkway) and forested land, and therefore, the proposed undertaking would have no effect to base.

TVA has read the enclosed report and agrees with the recommendations of the authors. To avoid adverse

In order to ensure avoidance

of these sites during the life of the project, Graceland Solar, LLC and TVA will sign the attached draft legal agreement. TVA finds that, with the proposed avoidance plan, the undertaking will have no adverse effect to historic properties.

Pursuant to 36 CFR Part 800.3(f)(2), TVA is consulting with federally recognized Indian tribes regarding properties within the survey area that may be of religious and cultural significance to them and eligible for the NRHP.

Pursuant to 36 CFR Part 800.5(c) we are notifying you of TVA's finding of no adverse effect, providing the documentation specified in § 800.11(e); and inviting you to review the finding. Also, we are seeking your agreement with TVA's eligibility determinations and finding that the undertaking as currently planned will have no adverse effects on historic properties.

If you have any questions, please contact Michaelyn Harle by email, mharle@tva.gov.

Sincerely,

James W. Osborne, Jr.

Jan W. Os\_,

Manager

**Cultural Compliance** 

MSH:ABM Enclosures cc (Enclosures):

> Ms. Jennifer Barnett Tennessee Division of Archaeology 1216 Foster Avenue, Cole Bldg. #3 Nashville, Tennessee 37210

#### INTERNAL COPIES NOT TO BE INCLUDED WITH OUTGOING LETTER:

S. Dawn Booker, BR 2C-C Michael C. Easley, BR 2C-C Brandon J. Hartline, BR 2C-C Susan R. Jacks, WT 11C-K Dana Nelson, WT 11C-K Rebecca C. Tolene, WT 7B-K Michaelyn Harle, 11C-K Elizabeth Smith, 11C-K William B. Wells, III BR 2C-C W. Douglas White, WT 11C-K ECM, ENVRecords



#### TENNESSEE HISTORICAL COMMISSION

#### STATE HISTORIC PRESERVATION OFFICE 2941 LEBANON PIKE NASHVILLE, TENNESSEE 37243-0442 OFFICE: (615) 532-1550

www.tnhistoricalcommission.org

February 17, 2022

Mr. James W. Osborne Jr. Tennessee Valley Authority 400 West Summit Hill Drive Knoxville, TN 37902

RE: TVA / Tennessee Valley Authority, Power Purchase Agreement, Graceland Solar Farm CID 80006, Shelby County, TN

Dear Mr. Osborne:

In response to your request, we have reviewed the archaeological report of investigations, survey report addendum, and accompanying documentation submitted by you regarding the above-referenced undertaking. Our review of and comment on your proposed undertaking are among the requirements of Section 106 of the National Historic Preservation Act. This Act requires federal agencies or applicants for federal assistance to consult with the appropriate State Historic Preservation Office before they carry out their proposed undertakings. The Advisory Council on Historic Preservation has codified procedures for carrying out Section 106 review in 36 CFR 800 (Federal Register, December 12, 2000, 77698-77739).

Our review for the undertaking's potential effects to architectural historic properties will be provided under separate correspondence.

Considering the information provided in the signed agreement to avoid potentially eligible archaeological sites 40SY877, 40SY879, 40SY856, 40SY344, 40SY854, and 40SY878, we concur that no archaeological resources eligible for listing in the National Register of Historic Places will be affected by this undertaking. If project plans are changed or archaeological remains are discovered during project construction, please contact this office to determine what further action, if any, will be necessary to comply with Section 106 of the National Historic Preservation Act. Complete and/or updated Tennessee Site Records should be submitted to the Tennessee Division of Archaeology for all sites recorded and/or revisited during the current investigation. Questions or comments may be directed to Jennifer M. Barnett ((615) 687-4780, Jennifer.Barnett@tn.gov).

Your cooperation is appreciated.

Sincerely,

E. Patrick McIntyre, Jr. Executive Director and

State Historic Preservation Officer

E. Patrick M. Latyre, J.

EPM/jmb



#### TENNESSEE HISTORICAL COMMISSION

#### STATE HISTORIC PRESERVATION OFFICE 2941 LEBANON PIKE NASHVILLE, TENNESSEE 37243-0442

OFFICE: (615) 532-1550 www.tnhistoricalcommission.org

February 18, 2022

Mr. James W. Osborne Jr. Tennessee Valley Authority 400 West Summit Hill Drive Knoxville, TN 37902

RE: TVA / Tennessee Valley Authority, Architecture Review, Power Purchase Agreement, Graceland Solar Addendum, CID 80006, Shelby County, TN

Dear Mr. Osborne:

We have reviewed the documents you submitted regarding the architecture review for your proposed undertaking. Our review of and comment on your proposed undertaking are among the requirements of Section 106 of the National Historic Preservation Act. You have submitted documents that are insufficient for us to complete our review. To continue the Tennessee State Historic Preservation Office review of this undertaking, please provide us with the following information:

- 1. Jones Orchard needs to be evaluated for eligibility. This should include a map that shows the location of the different buildings and structures associated with the Jones Orchard as well as a proposed National Register boundary if the resource is recommended eligible.
- 2. If Jones Orchard is determined eligible, you should assess effects to the resource in accordance with 36 CFR 800.5 and assess effects to the resource as a whole.
- 3. You need to provide more information about the substation such as its height. We cannot determine if your APE is appropriate without knowing the details about the height of the components of the substation.

Upon receipt of this additional documentation, we will continue our review of this undertaking as quickly as possible. Please be advised that until this office has provided you a final written comment on this undertaking, you have not met your Section 106 obligation under federal law. Questions and comments may be directed to Casey Lee (615 253-3163). We appreciate your cooperation.

Sincerely,

for: E. Patrick McIntyre, Jr.

State Historic Preservation Officer

Casey Lee

Historic Preservation Specialist/Coordinator Section 106 Review and Compliance Program Tennessee State Historic Preservation Office



400 West Summit Hill Drive, Knoxville, Tennessee 37902

March 29, 2022

Mr. E. Patrick McIntyre, Jr. Executive Director and State Historic Preservation Officer Tennessee Historical Commission 2941 Lebanon Road Nashville, Tennessee 37243-0442

Dear Mr. McIntyre:

REPLY: TENNESSEE VALLEY AUTHORITY (TVA), POWER PURCHASE AGREEMENT (PPA), GRACELAND SOLAR, ARCHITECTURAL ADDENDUM REPORT, SHELBY COUNTY, TENNESSEE (35.299106, -89.898419) (TVA TRACKING NUMBER – CID 80006)

By this letter, TVA is responding to your February 17, 2022 and our subsequent telecom regarding the subject undertaking. Specifically, your office requested that:

- 1. Jones Orchard needs to be evaluated for eligibility. This should include a map that shows the location of the different buildings and structures associated with the Jones Orchard as well as a proposed National Register boundary if the resource is recommended eligible.
- 2. If Jones Orchard is determined eligible, you should assess effects to the resource in accordance with 36 CFR 800.5 and assess effects to the resource as a whole.
- 3. You need to provide more information about the substation such as its height. We cannot determine if your APE is appropriate without knowing the details about the height of the components of the substation.

The area of potential effects (APE) was determined, in consultation with your office in a letter dated April 16, 2021, to be the 0.5-mile radius of the project area within the visual line of sight. As stated previously, only a small portion of the entire property boundary of Jones Orchard falls within the 0.5-mi radius. In order to account for potential effects, CRA completed viewshed analysis for the entire Jones Orchard property, as depicted in Figure 1. The viewshed analysis is based on the most current project layout and reflects an anticipated maximum height of 8-feet for the solar panels and 32-feet for the substation and switching station. Figure 1 depicts the switchyard as 4-acres and the substation as 2-acres, which is the anticipated maximum size. This does not account for any new poles associated with the substation or switching station, but they would be near and no taller than the existing transmission line.

As Figure 1 shows, most of the visibility would be within the northern part of the Jones Orchard property. This portion of the property is already impacted by the existing transmission line, Raleigh Millington Road, and the interchange. There are no historic architectural resources in

Mr. E. Patrick McIntyre, Jr. Page 2 March 29,2022

this location. There may be some very minimal spotty visibility within the southern part of the orchard. However, the project would be over a half mile away and would be a distant feature in the viewshed, not an immediate intrusion on the setting.

Additional analysis would be necessary to determine if Jones Orchard is eligible for listing in the National Registry of History Places (NRHP), and if the open land in the northern part of the property contributes to the historic landscape and should be included in the NRHP boundary. However, given that this portion of the property and its viewshed have already been impacted by modern infrastructure projects within the orchard boundary and between the orchard and the project area, TVA maintains that the proposed project would result in no adverse effects to the Jones Orchard, if it were determined eligible for listing in the NRHP.

Pursuant to 36 CFR Part 800.5(c) we are notifying you of TVA's finding of no adverse effect, providing the documentation specified in § 800.11(e); and inviting you to review the finding. Also, we are seeking your agreement with TVA's eligibility determinations and finding that the undertaking as currently planned will have no adverse effects on historic properties.

If you have any questions, please contact Michaelyn Harle by email, mharle@tva.gov.

Sincerely,

James W. Osborne, Jr.

gan W. Os., Jr.

Manager

Cultural Compliance

MSH:ERB Enclosure

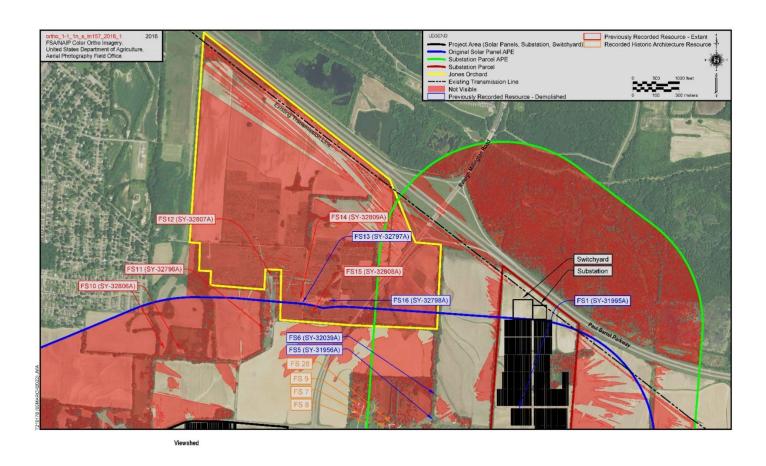


Figure 1: Viewshed model depicting the Jones orchard parcel (outlined in yellow) with the individual properties Sites 13 (SY-32797A; non-extant), 14 (SY-32809A; extant), 15 (SY-32808A, extant), and 16 (SY-32798A, non-extant).

#### INTERNAL COPIES NOT TO BE INCLUDED WITH OUTGOING LETTER:

S. Dawn Booker, BR 2C-C Michael C. Easley, BR 2C-C Michaelyn S. Harle, 11C-K Brandon J. Hartline, BR 2C-C Susan R. Jacks, WT 11C-K Dana M. Nelson, WT 11C-K Rebecca C. Tolene, WT 7B-K Elizabeth Smith, 11C-K William B. Wells, BR 2C-C W. Douglas White, WT 11C-K ECM, ENVRecords



#### TENNESSEE HISTORICAL COMMISSION

#### STATE HISTORIC PRESERVATION OFFICE 2941 LEBANON PIKE

NASHVILLE, TENNESSEE 37243-0442 OFFICE: (615) 532-1550 www.tnhistoricalcommission.org

April 1, 2022

Mr. James W. Osborne Jr. Tennessee Valley Authority 400 West Summit Hill Drive Knoxville, TN 37902

RE: TVA / Tennessee Valley Authority, Architecture Review, Power Purchase Agreement, Graceland Solar Addendum, CID 80006, Shelby County, TN

Dear Mr. Osborne:

In response to your request, we have reviewed the additional documentation submitted by you regarding the above-referenced undertaking. Our review of and comment on your proposed undertaking are among the requirements of Section 106 of the National Historic Preservation Act. This Act requires federal agencies or applicants for federal assistance to consult with the appropriate State Historic Preservation Office before they carry out their proposed undertakings. The Advisory Council on Historic Preservation has codified procedures for carrying out Section 106 review in 36 CFR 800 (Federal Register, December 12, 2000, 77698-77739).

Based on the additional information provided, we concur that even if the Jones Orchard were to be eligible for listing in the National Register of Historic Places it would not be adversely affected by your undertaking.

This office has no objection to the implementation of this project as currently planned. If project plans are changed, please contact this office to determine what further action, if any, will be necessary to comply with Section 106 of the National Historic Preservation Act. Questions and comments may be directed to Casey Lee (615) 253-3163. We appreciate your cooperation.

Sincerely,

for: E. Patrick McIntyre, Jr.

State Historic Preservation Officer

Casey Lee

Historic Preservation Specialist/Coordinator Section 106 Review and Compliance Program Tennessee State Historic Preservation Office