



Bricker Graydon LLP
100 South Third Street
Columbus, Ohio 43215
614.227.2300
www.brickergraydon.com

Kara H. Herrnstein
Partner
DirectPhone 614.227.4908
kherrnstein@brickergraydon.com

October 2, 2023

Via Electronic Filing

Ms. Tanowa Troupe
Administration/Docketing
Public Utilities Commission of Ohio
180 East Broad Street, 11th Floor
Columbus, OH 43215-3793

**Re: Powell Creek Solar, LLC,
OPSB Case No. 20-1084-EL-BGN**

Dear Ms. Troupe:

The July 15, 2021 Opinion, Order, and Certificate (“Certificate”) approving Powell Creek Solar, LLC (“Powell Creek”) Certificate of Environmental Compatibility and Public Need to Construct a solar-powered electric generation facility approved a Stipulation which set forth a number of conditions as part of the Certificate. Below is a list of documents that have been provided to Staff prior to the September 26, 2023 preconstruction meeting.

Attachment	Subject	Status
A	Collection substation drawings showing the general layout, grading, and erosion control.	Emailed to Staff on 09/14/2023
B	Map of wetlands, streams, and locations of threatened or endangered species (Condition No. 18).	Emailed to Staff on 09/22/2023
C	Powell Creek’s Emergency Action and Response Plan (¶66 of the Certificate)	Emailed to Staff on 09/21/2023
D	Inadvertent Release Plan dated September 2023	Emailed to Staff on 09/22/2023
E	Landscape Mitigation Plan & Lighting Strategy dated September 2023 (Condition No. 12)	Emailed to Staff on 09/22/2023



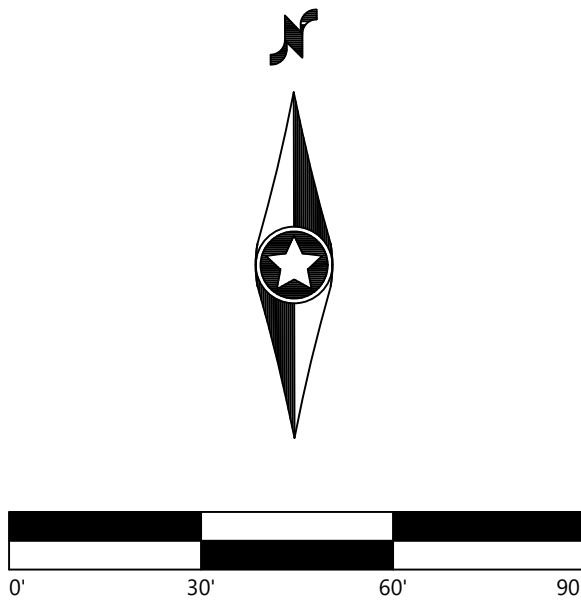
Attachment	Subject	Status
F	Safety Manuals in response to Staff's September 15, 2023 request.	Emailed to Staff on 09/21/2023
G	Spill Prevention, Control, and Countermeasure (SPCC) Plan for Construction Activities	Provided to Staff on 09/22/2023
H	Driveway Permits (Condition No. 25)	Emailed to Staff on 09/22/2023
I	Grading Plan	Provided to Staff on 09/22/2023
J	Pre-Construction Road Evaluation	Provided to Staff on 09/22/2023
K	Driveway Details and Sections	Provided to Staff on 09/22/2023
L	Engineering Drawings	Provided to Staff on 08/25/2023 and 08/29/2023

Please contact me if you have any questions.

Sincerely,

Kara H. Herrnstein

Cc: Andrew Conway



GENERAL NOTES:

1. COORDINATE SYSTEM: NAD83 OHIO STATE PLANE, NORTH ZONE, US FOOT.

PROJECT NOTES:

1. CONTRACTOR SHALL FURNISH ALL LABOR, MATERIALS, TOOLS AND EQUIPMENT REQUIRED FOR GRADING, DRAINAGE, EROSION CONTROL, ETC. IN ACCORDANCE WITH THESE PLANS AND NOTES.
2. CONTRACTOR SHALL BE RESPONSIBLE FOR THE LAYOUT OF THE PROPOSED EARTHWORK AND CONSTRUCTION AS SHOWN ON THE SUBSTATION GRADING PLANS.
3. PRIOR TO DISTURBING EARTH, THE CONTRACTOR SHALL INSTALL SILT FENCING AND OTHER REQUIRED TEMPORARY EROSION CONTROL MEASURES TO PREVENT SEDIMENT FROM MIGRATING OFF SITE.
4. THE CONTRACTOR SHALL PHYSICALLY LOCATE AND VERIFY ALL UTILITY LOCATIONS PRIOR TO STARTING ANY DIGGING. CONTRACTOR SHALL CALL OHIO 811 FOR UTILITY LOCATE.
5. THE GEOTECHNICAL REPORT "PCS-G-070-12-RA" WAS PREPARED BY WESTWOOD PROFESSIONAL SERVICES, AUGUST 2023.
6. THE CONTRACTOR SHALL EMPLOY THE SERVICES OF A GEOTECHNICAL ENGINEER/TESTING COMPANY AND SHALL PAY FOR ALL REQUIRED TESTING. ALL TEST RESULTS SHALL BE PROVIDED TO THE OWNER FOR APPROVAL PRIOR TO BRINGING SOIL MATERIAL ON SITE AND/OR BEGINNING ADDITIONAL LIFTS OF FILL MATERIAL.
7. CONTRACTOR SHALL PROVIDE ALL PROJECT CONSTRUCTION MATERIAL SUBMITTALS IN TRIPLICATE FORMAT TO THE OWNER, OR THE OWNER'S REPRESENTATIVE. SUBMITTALS SHALL INCLUDE, AT A MINIMUM, THE FOLLOWING:
- 7.1. GEOTECHNICAL LAB TEST REPORTS FOR REQUIRED PROPOSED ENGINEERED FILL MATERIAL
- 7.2. GEOTECHNICAL MATERIAL FIELD COMPACTION TEST REPORTS
- 7.3. CRUSHED STONE AGGREGATE PRODUCT SHEET
- 7.4. GEOTEXTILE FABRIC REINFORCEMENT UNDERLAY PRODUCT SHEET
- 7.5. TURF REINFORCEMENT MAT PRODUCT SHEET
- 7.6. SEED MIX PRODUCT SHEET

LEGEND:

- PROPOSED SECURITY FENCE
- PROPOSED SUBSTATION PAD EDGE
- - - - - PROPOSED SUBSTATION ACCESS EDGE
- - - - - PROPOSED MEADOW LIMITS
- >>—— PROPOSED CULVERT
- PROPOSED SUBSTATION SURFACE AGGREGATE
- PARCEL LINE
- RIGHT-OF-WAY
- >>>—— FUTURE DRAIN PIPE (BY OTHERS)
- >>>—— PROPOSED OUTLET PIPE
- ⊕ PROPOSED INLET STRUCTURE
- B-1
 BORING LOCATIONS

PRELIMINARY - NOT FOR CONSTRUCTION

NO.	REVISIONS	DATE	BY	CHK	APR	NO.	REVISIONS	DATE	BY	CHK	APR
D	30% SUBMITTAL - ISSUED FOR REVIEW	08/19/22	S&L	S&L	S&L						
E	30% SUBMITTAL - ISSUED FOR REVIEW	06/29/23	SB	BM	JD						
F	90% SUBMITTAL - ISSUED FOR REVIEW	09/01/23	SB	BM	JD						

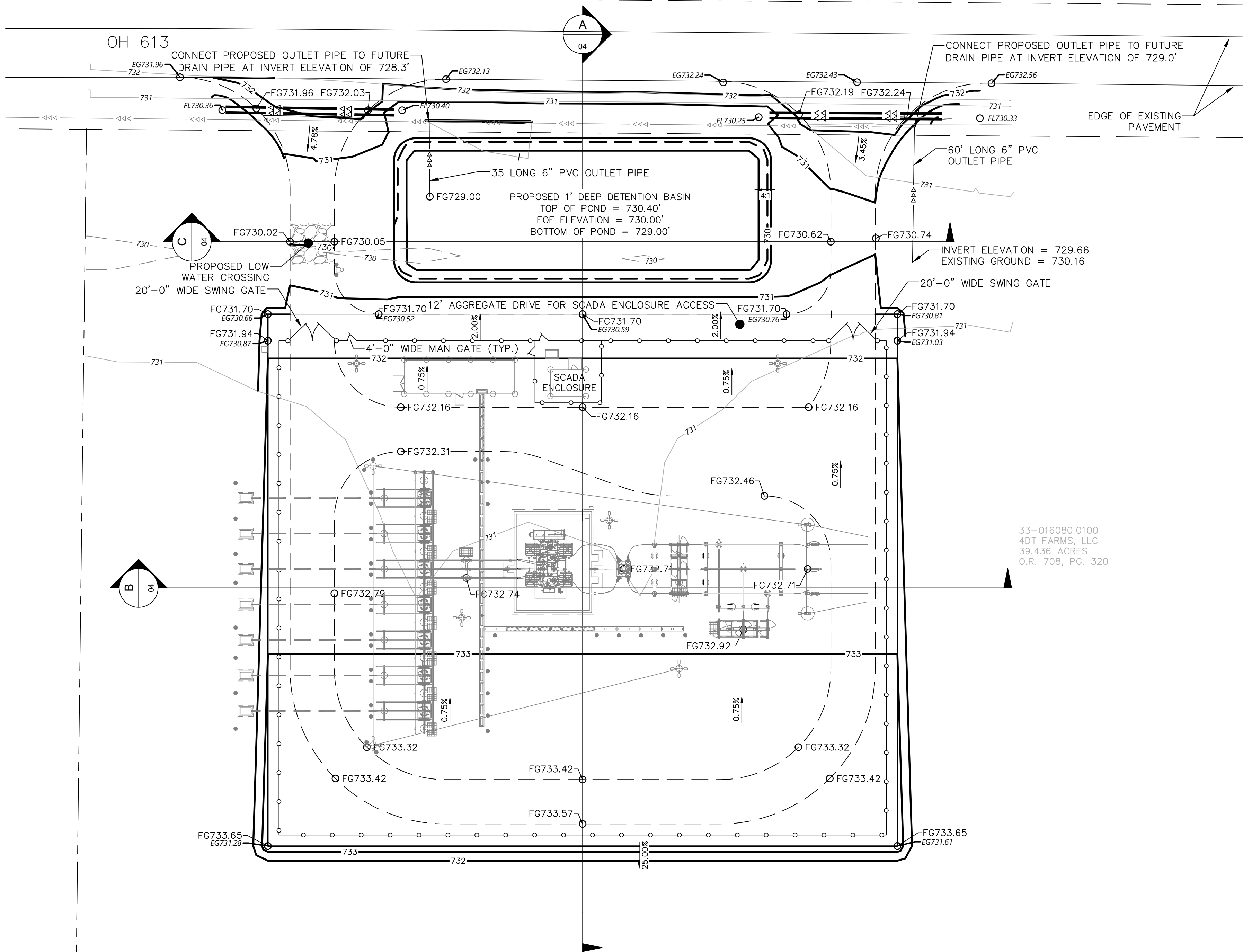
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Fax (952) 937-5822 Minnetonka, MN 55343
Toll Free (888) 937-5150 westwoodpcs.com
Westwood Professional Services, Inc.

**AVANGRID
RENEWABLES**

ENGINEERING RECORD	DATE
DRAWN: SB	09/01/23
DESIGNED: SB	09/01/23
CHECKED: BM	09/01/23
APPROVED: JD	09/01/23

POWELL CREEK SOLAR PROJECT
138-34.5kV COLLECTOR SUBSTATION
SITE LAYOUT & DIMENSION PLAN



CALCULATED EARTHWORK QUANTITIES

TOTAL SITE VOLUME	
TOTAL DISTURBED AREA	2.3 ACRES
RAW SOIL CUT VOLUME:	597 CUBIC YARDS
RAW SOIL FILL VOLUME:	4,537 CUBIC YARDS
RAW NET SOIL VOLUME:	3,940 CUBIC YARDS (FILL)
STONE AGGREGATE VOLUME	
14" TOPSOIL VOLUME:	3,228 CUBIC YARDS (CUT)
6" HIGH VOLTAGE YARD STONE:	1,225 CUBIC YARDS (FILL)
6" AGGREGATE BASE:	1,225 CUBIC YARDS (FILL)
12" ROAD AGGREGATE:	316 CUBIC YARDS (FILL)

(14" TOPSOIL) 3,228 CY - (6" YARD STONE) 1,225 CY - (6" BASE) 1,225 CY - (12" ROAD AGG) 316 CY = 462 CY DIRT NEEDED

(RAW NET) 3,940 CY + (DIRT NEEDED) 462 CY = 4,402 CY IMPORTED FILL

NOTES:

- EXISTING TOPOGRAPHY PROVIDED BY WESTWOOD PROFESSIONAL SERVICES ON 08/04/2023.
- COORDINATE SYSTEM: NAD 83 OHIO STATE PLANES, NORTH ZONE, US FOOT.
- THE SITE SHALL BE CLEARED AND GRUBBED TO REMOVE ALL DEBRIS, TOPSOIL, AND ORGANIC MATERIAL. ALL TRASH SHALL BE REMOVED.
- TOPSOIL, OR OTHER SOIL ENCOUNTERED, THAT PROMOTES VEGETATIVE GROWTH SHALL BE STOCKPILED AND USED IN AREA THAT WILL BE GRASSED.
- AFTER COMPLETION OF CLEARING AND GRUBBING OPERATIONS, ALL AREAS SHOWN TO SUPPORT FILL MATERIAL, TRAFFIC, AND/OR STRUCTURES, SHALL BE PROOF ROLLED WITH A LOADED DUMP TRUCK WITH A MINIMUM GROSS WEIGHT OF 25 TONS. PROOF ROLLING SHALL BE OBSERVED BY THE GEOTECHNICAL ENGINEER. IDENTIFIED WEAK OR SOFT AREAS SHALL BE RECTIFIED IN ACCORDANCE WITH THE GEOTECHNICAL REPORT RECOMMENDATIONS, AND ANY GUIDANCE PROVIDED BY THE GEOTECHNICAL ENGINEER.
- SOIL MATERIALS FINER THAN THE NO. 200 SIEVE SHALL BE NON-PLASTIC. STRUCTURAL FILL SHALL BE INSPECTED AND ACCEPTED FOR USE BY THE OWNER. PER GEOTECH REPORT STRUCTURAL FILL MATERIAL SHOULD BE PLACED IN LOOSE LIFTS NOT EXCEEDING 8" IN HEIGHT AND BE COMPACTED TO AT LEAST 95% OF ITS MODIFIED PROCTOR DENSITY IN ACCORDANCE WITH ASTM D1557.
- IN-PLACE DENSITY TESTS SHALL BE PERFORMED IN THE FIELD BY AN EXPERIENCED GEOTECHNICAL ENGINEERING TECHNICIAN TO EVALUATE THE PERFORMANCE OF THE CONTRACTOR'S COMPACTION EFFORTS. COMPACTION TESTING SHALL BE PERFORMED AT A TESTING FREQUENCY OF ONE TEST PER 2,500 SQUARE FEET, PER LIFT, AND DIRECT TESTING IN ANY AREA WHERE SOFT OR QUESTIONABLE MATERIAL MAY BE IDENTIFIED THE TECHNICIAN SHALL ALSO BE EMPLOYED TO ASSIST THE GRADING CONTRACTOR IN MOISTURE CONTROL BY PERFORMING ON-SITE FILL MOISTURE TESTS.
- SOIL FERTILIZATION, AMENDMENTS, AND SEEDING SHALL BE PERFORMED AS NEEDED AND BY RECOMMENDATION OF THE SEED MANUFACTURER/DISTRIBUTOR. SEED MIX SHALL BE A MIX AS LISTED IN PROJECT SWPPP, OR AS RECOMMENDED BY SEED MANUFACTURER/DISTRIBUTOR.
- PROPOSED CONTOURS AND SPOT GRADES WITHIN SUBSTATION PAD ARE TOP OF FINISHED GRADE WHICH IS ALSO TOP OF YARD ROCK OR RAD AGGREGATE SURFACING.
- PAD GRADING TO BE 1.25% MAX. FIELD ADJUST IF NECESSARY AND CONTACT ENGINEER OR OWNER IF ANY ELEVATIONS HAVE CHANGED.
- TESTING SPECIFICATIONS FOR SUBSTATION FILL SHOWN ARE PRELIMINARY. FINAL TESTING AND FREQUENCY TO BE APPROVED BY THE GEOTECHNICAL ENGINEER.
- SEE WESTWOOD HYDROLOGY REPORT FOR DETENTION POND, DRAINAGE SWALES, AND CULVERT CALCULATIONS.
- BENCHMARKS MUST BE ESTABLISHED BEFORE COMMENCEMENT OF CONSTRUCTION ACTIVITIES.
- IF EXISTING DRAINAGE TILE IS ENCOUNTERED, THE TILING SYSTEM SHOULD BE REROUTED AROUND THE NEW CONSTRUCTION AREA.
- FUTURE DRAIN PIPE TO BE FURNISHED AND INSTALLED BY OTHERS. FUTURE DRAIN PIPE TIE IN ELEVATIONS ARE BASED OFF OF THE DRAIN PIPE OUTLETING TO THE DRAINAGE DITCH PARALLELING OH 108 AT THE INTERSECTION OF OH 613 AT AN ELEVATION OF 715.00'

LEGEND:

- PROPOSED SECURITY FENCE
- PROPOSED SUBSTATION PAD EDGE
- PROPOSED SUBSTATION ACCESS EDGE
- PROPOSED CULVERT
- APPROXIMATE PARCEL LINE
- EXISTING MAJOR CONTOUR
- EXISTING MINOR CONTOUR
- PROPOSED MAJOR CONTOUR
- PROPOSED MINOR CONTOUR
- FUTURE DRAIN PIPE (BY OTHERS)
- PROPOSED OUTLET PIPE
- RIGHT-OF-WAY

PRELIMINARY - NOT FOR CONSTRUCTION

NO.	REVISIONS	DATE	BY	CHK	APR	NO.	REVISIONS	DATE	BY	CHK	APR
D	30% SUBMITTAL - ISSUED FOR REVIEW	08/19/22	S&L	S&L	S&L						
E	30% SUBMITTAL - ISSUED FOR REVIEW	06/29/23	SB	BM	JD						
F	90% SUBMITTAL - ISSUED FOR REVIEW	09/01/23	SB	BM	JD						

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Fax (952) 937-5822

Toll Free (888) 937-5150

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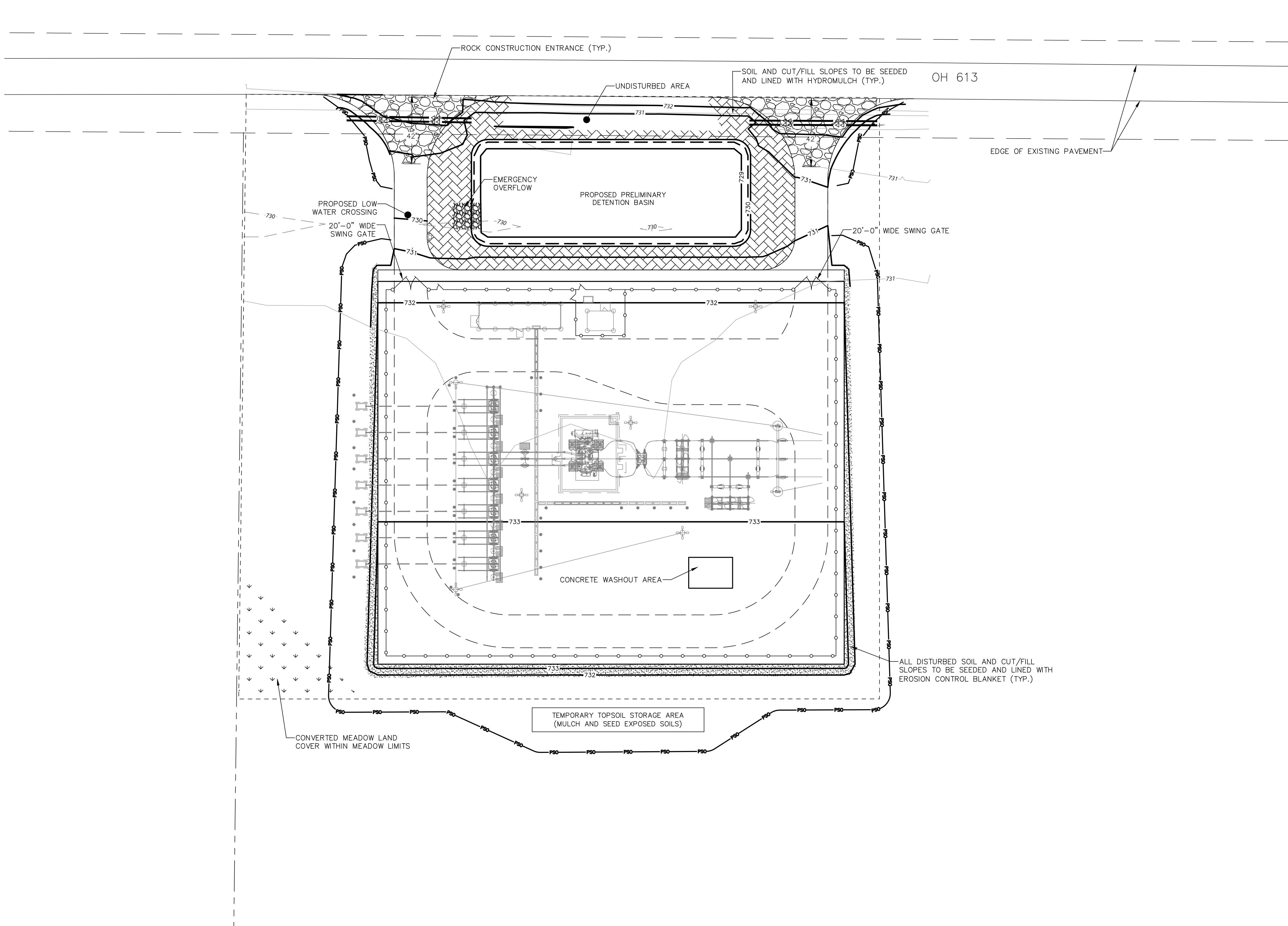
Minnetonka, MN 55343

westwoodps.com

Westwood Professional Services, Inc.

AVANGRID
RENEWABLES

ENGINEERING RECORD		DATE	POWELL CREEK SOLAR PROJECT		
DRAWN: SB		09/01/23	138-34.5kV COLLECTOR SUBSTATION		
DESIGNED: SB		09/01/23	GRADING PLAN		
CHECKED: BM		09/01/23			
APPROVED: JD		09/01/23			
CADFILE: PCS-C-111-02-RF.DWG		SCALE: 1" = 30'	DWG.NO. PCS-C-111	SHEET 2 OF 6	
				REV F	



EROSION AND SEDIMENT CONTROL NOTES:

1. PRIOR TO DISTURBING EARTH, THE CONTRACTOR SHALL INSTALL PERIMETER SILT FENCING AND OTHER REQUIRED EROSION AND SEDIMENT CONTROL MEASURES TO PREVENT SEDIMENT FROM MIGRATING OFF SITE.
2. CONTRACTOR SHALL BE RESPONSIBLE FOR CONSTRUCTION AND MAINTENANCE OF ALL EROSION AND SEDIMENT CONTROLS THROUGHOUT PROJECT CONSTRUCTION FOR THE PROTECTION OF ADJACENT PROPERTIES, ROADWAYS, AND WATERWAYS.
3. CONTRACTOR SHALL GRADE SITE UNIFORMLY TO PREVENT EROSION FROM OCCURRING. ERODED AREAS SHALL BE RESTORED IMMEDIATELY TO MINIMIZE DAMAGE AND SHALL BE RE-GRADED TO A SLIGHTLY HIGHER ELEVATION TO PREVENT RUN-OFF FROM FOLLOWING THE SAME PATH.
4. ALL TEMPORARY EROSION AND SEDIMENT CONTROL DEVICES USED BY THE CONTRACTOR SHALL BE REMOVED BY THE CONTRACTOR UPON COMPLETION OF THE PROJECT AND THE SITE SHALL BE CLEANED UP AND RESTORED TO THE SATISFACTION OF THE OWNER
5. ALL DISTURBED AREAS, INCLUDING SOIL STOCKPILES, WHERE WORK IS TEMPORARILY HALTED SUCH THAT THE AREA WILL NOT BE GRADED AGAIN WITHIN THE NEXT 14 CALENDAR DAYS, SHALL BE TEMPORARILY STABILIZED BY PLACING STRAW MULCH, MECHANICALLY CRIMPED INTO THE SOIL. ALL STOCKPILES SHALL ADDITIONALLY BE SURROUNDED BY A REINFORCED SILT FENCE BARRIER.
6. FINAL STABILIZATION SHALL BEGIN WITHIN 48 HOURS AFTER FINAL GRADING AND TOPSOIL PLACEMENT IN ANY FINISHED AREA OF THE PROJECT SITE. FINAL STABILIZATION SHALL INCLUDE ANY/ALL FERTILIZATION, CHEMICAL STABILIZATION, SEEDING, AND INSTALLATION OF TURF REINFORCEMENT MAT. THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR THE ESTABLISHMENT OF A GRASS SURFACE ON ALL DISTURBED AREAS OF THE PROJECT SITE. NOT RECEIVING A CRUSHED AGGREGATE OR PAVED SURFACE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR COVERING, WATERING AND ENSURING GROWTH OF SEED IN ORDER TO OBTAIN A SUITABLE STAND OF GRASS.
8. SOIL FERTILIZATION, AMENDMENTS, AND SEEDING SHALL BE PERFORMED AS NEEDED AND BY RECOMMENDATION OF THE SEED MANUFACTURER/DISTRIBUTOR.
9. AREAS NOT STABILIZED WITH PERMANENT FEATURES WILL BE REVEGETATED.
10. IF EXISTING DRAINAGE TILE IS ENCOUNTERED, THE TILING SYSTEM SHOULD BE REROUTED AROUND THE NEW CONSTRUCTION AREA.

LEGEND:

- PROPOSED SECURITY FENCE
- PROPOSED SUBSTATION ACCESS EDGE
- PROPOSED CULVERT
- APPROXIMATE PARCEL LINE
- PERIMETER SEDIMENT CONTROL
- ROCK CONSTRUCTION ENTRANCE
- HYDROMULCH AND SEEDED AREAS
- EROSION CONTROL BLANKET AND SEEDED AREAS
- ROCK RIP RAP
- EXISTING MAJOR CONTOUR
- EXISTING MINOR CONTOUR
- PROPOSED MAJOR CONTOUR
- PROPOSED MINOR CONTOUR
- RIGHT-OF-WAY

PRELIMINARY - NOT FOR CONSTRUCTION

NO.	REVISIONS	DATE	BY	CHK	APR
B	30% SUBMITTAL - ISSUED FOR REVIEW	08/19/22	S&L	S&L	S&L
C	30% SUBMITTAL - ISSUED FOR REVIEW	06/29/23	SB	BM	JD
D	90% SUBMITTAL - ISSUED FOR REVIEW	09/01/23	SB	BM	JD

NO.	REVISIONS	DATE	BY	CHK	APR

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Toll Free (888) 937-5150 westwoodps.com
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AVANGRID
RENEWABLES

ENGINEERING RECORD	DATE
DRAWN: SB	09/01/23
DESIGNED: SB	09/01/23
CHECKED: BM	09/01/23
APPROVED: JD	09/01/23

POWELL CREEK SOLAR PROJECT
138-34.5kV COLLECTOR SUBSTATION
SUBSTATION EROSION CONTROL PLAN

Prepared September 22, 2023
Basemap: Esri "World Imagery" map service

**BLACK & VEATCH****MEMORANDUM**

Avangrid
Powell Creek Solar
EMS Outreach Efforts

B&V Project 415878
B&V File 31.0000
09/24/23

To: OPSB Board

From: Anastasia Urbanik

On September 5th, 2023, I reached out to the following individuals: Brian Hilvers (EMS/Medical), Ryan Barlage (Fire Chief), and Brian Siefker (Putnam County Sherriff). All were aware of the Powell Creek Solar project starting, the location, and were looking forward to our arrival. I informed them when we mobilize on the project, we will hold an in-person meeting to further review our Emergency Action Plan, Site Specific Safety Plan, and share any SDS sheets for chemicals contained on site.

After this meeting they will be invited to visit periodically to understand access/egress at all work locations and obtain updates to our progress.

They were complimentary of the previous outreach meetings in which B&V had been a participant.

Anastasia Urbanik, CSP, CHST

ESH&S Manager, Solutions Lead, Renewables

Black & Veatch

11401 Lamar Ave., Overland Park, KS 66211

📞 913-458-7221 📠 269-370-7844

✉ UrbanikAA@bv.com



Powell Creek Solar PV Project Miller City, OH

Emergency Action Plan Reference Manual

Date: 8/7/23

An *electronic* copy of each office location-specific Emergency Action Plan (EAP) should be sent to the Business Unit Environmental, Safety, Health & Security (ESH&S) Manager.

Professionals in each building/location shall observe the following:

- The department head shall initially train each professional on the content of the EAP and how to access the current version. Any material changes, as defined by the EAP designated manager, shall be communicated to all professionals.
- An EAP shall be developed for each Black & Veatch (BV) building and permanently occupied location.
- The EAP shall be reviewed and updated at least annually and as appropriate to reflect any changes that have occurred.
- Responsibility for the content of this manual has been assigned to the EAP designated manager.
- If you have any questions regarding the implementation of this EAP, please contact Corporate ESH&S at 913-458-4100.

Proprietary Statement

The information contained in this manual is proprietary and its contents may not be copied, disclosed to other parties, or used for other than the express purpose for which it was provided without the written consent of BV.

Emergency Action Plan

Quick Reference*

IN CASE OF EMERGENCY

Medical Emergency	1. Call <u>911</u> to report the emergency or to request an ambulance. 2. Provide the following address: 13267 SR 613, Miller City, Ohio 3. Do not move the affected person unless necessary to prevent further injury.
Fire If you see fire or smoke and the alarm has not sounded ... If the alarm has sounded ...	1. Activate the fire alarm as you exit the area. 2. Call <u>911</u>. 3. Leave the area and go to the designated evacuation assembly area. Use the stairs, NOT the elevator. 4. Account for all building occupants. NOTE: Use portable fire extinguishers only if trained to do so.
Tornado, Weather Disaster	1. Listen for weather alerts and announcements. 2. Go to the area directed by the announcement or take shelter under a sturdy object. 3. Move away from any glass area.
Earthquake, Natural Disaster	1. Listen for announcements. 2. Go to the area directed by the announcement. 3. Move away from any glass area. 4. Account for all building occupants if building is evacuated.
Bomb Threat	1. Call <u>911</u> with the information and notify supervisor. 2. Leave the area only if directed to do so by an announcement. 3. Refer to the list of Black & Veatch emergency coordinators listed in the section "Other Important Phone Numbers."
Suspicious Items	1. Call the Global Security Operations & Intelligence Center at 913-458-1145. 2. Isolate the suspicious item and keep others away.
Evolving Threat	1. If there is an accessible escape path Evacuate. 2. If unable to do above, Hide Out. 3. If all else fails, Take Action against the intruder. 4. Call 911 (or emergency number) when safe.
Workplace Violence, Missing Professionals, or other Security Threats	1. Call <u>911</u> to report the situation. 2. Do not intervene while violence is in progress if there is any likelihood of further violence or personal injury. 3. Notify the Department Head, Employee Relations Director at 913-458-4219 and Global Security Operations & Intelligence Center at 913-458-1145. 4. For missing professionals or other threats, contact the Global Security Operations & Intelligence Center at 913-458-1145.
Building Disruptions: (power, water, sewer, fire, smoke damage, flooding, etc.)	1. Office lead reports the condition to Building Services, the landlord (if applicable), and the Business Unit ESH&S Manager. 2. Specific condition is evaluated to determine health, safety, security impacts on professionals as well as estimated length of disruption. 3. Office lead, Building Services (landlord), and ESH&S determine the proper course of action. If the condition is expected to last over 8 hours, refer to Business Unit/Building Business Continuity Plan and inform the VP of ESH&S.
Bloodborne Pathogen Exposure	1. Call the building switchboard at <u>ESH&S</u> to page for Emergency Responders. After normal business hours, contact Security at <u>ESH&S</u>. 2. Limit access to exposure areas and victims. 3. Define and isolate the hazard area. 4. Use protective equipment and containers.

*Refer to the *Emergency Action Plan Reference Manual* for detailed information regarding these emergencies.

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Emergency Phone Numbers

Ambulance	<u>911</u>
Fire	<u>911</u>
Police	<u>911</u>
Poison Control	<u>800-222-1222</u>
	<u> </u>
	<u> </u>
Global Security Operations & Intelligence Center (GSOIC)	<u>913-458-1145</u>

MEDICAL TREATMENT

Preferred, if Non-Emergency*

WorkPartners 800-359-5020

24/7/365 Virtual Occupational Medical Physician evaluation for work related illness or injury

Facility	<u>Well at Work Occupational Health Services</u>
Address	<u>3949 N Main St., Ste D, Findlay, OH 45840</u>
Phone	<u>419-425-5121</u>
Hours of Operation	<u>M- F 8AM-5PM</u>

Non-Emergency* After Normal Work Hours

Facility	<u>See below, hospital is nearest facility</u>
Address	<u> </u>
Phone	<u> </u>
Hours of Operation	<u> </u>

Local Emergency Health Care Facilities

Lima Memorial Hospital
1001 Franklin St.
Lima, OH 45804

*Non-emergency refers to a situation where skilled medical care is not needed immediately.

Other Important Phone Numbers*

	Office	Cell
Business Unit ESH&S Manager – Anastasia Urbanik	913-458-7221	269-370-7844
Director and VP of Corporate ESH&S – John H. Johnson	913-458-8225	913-221-4837
ESH&S Admin – Kristy Beland	913-458-7104	-
Resource Line – Julie Lauck	913-458-4100	
Global Security Director – John Kendall	913-458-6597	913-523-4164
Global Security Operations & Intelligence Center (GSOIC)	913-458-1145	-
Workers' Compensation Coordinator – Susanne Moranville	816-960-9841	
Employee Relations – Katie Johnson	913-458-8243	-
Director of Media Relations – Patrick Hogan	913-458-4979	516-477-0914
Business Unit HR Contact – Tom LaPlaca	770-754-0316	
Highway Patrol	614-466-1660	
FBI	216-522-1400	
County Sheriff	419-335-4010	
Highway Conditions		

Black & Veatch Office Emergency Coordinators (Start at most senior and work down.)

Anastasia Urbanik	913-458-7221
Jeremy Dart	913-458-2591
Sean Borst	314-210-0443

Introduction

This Emergency Action Plan (EAP) provides information necessary to ensure the health and safety of building occupants in case of an emergency. This manual can also be used for providing new employees with basic emergency information and as a reference manual for emergency procedures. The EAP may be used by BV corporate officers to aid in emergency planning, by office administrators and specialists who need full details on their plan, and by individual professionals to help with initial reaction to an emergency situation. The manual will tell you the following:

- What to do during an emergency involving illness or injury; fire, tornado, earthquake, or other natural disasters; bomb threats; and workplace violence.
- Emergency escape routes and procedures for your building/location.
- Procedure to account for all personnel after an emergency evacuation has been completed.
- Names or job titles, locations, and phone numbers of persons or organizations to be contacted during an emergency situation.
- Emergency and important telephone numbers.
- Routes and transit time to emergency care facilities.

For major emergency events, please refer to Section 40 of the BV Crisis Communication Policy of the Personnel Policies & Procedures Manual on iNET.

EAP TRAINING

All professionals shall be made aware of the EAP for their building/location or for areas they visit frequently, and know how to access it. The responsible BV supervisor shall review the plan with all professionals as they are assigned to BV, and periodically thereafter, to ensure that they understand and remain current on emergency procedures. All occupants should familiarize themselves with the locations of applicable medical facilities, building exits, assembly areas, and fire alarm pull stations.

Further information on BV's Environmental, Safety, Health & Security Program can be found on the ESH&S portal)
<https://blackandveatch.sharepoint.com/sites/CESHS/Safety%20Program%20ProceduresFORMS/Forms/AllItems.aspx>.

Medical Emergencies Procedures

QUICK REFERENCE

1. Call 911 to report the emergency or request an ambulance.
2. Provide the following address: 13267 SR 613, Miller City, Ohio.
3. Do not move the affected person unless necessary to prevent further injury.

IN MORE DETAIL

EMERGENCY RESPONDERS

Emergency Responders are BV professionals who have been specially trained to provide first aid and adult CPR in emergency situations. These responders are BV volunteers who are trained and certified through a nationally recognized certifying agency. Lists containing the names of Emergency Responders can be found on the ESH&S portal <https://blackandveatch.sharepoint.com/sites/CESHS/Pages/Contacts.aspx> and updated regularly. First aid kits are available from all Emergency Responders. Some of these responders may have additional duties, such as ensuring that all professionals in their areas have left during an evacuation.

Critical Emergencies*

1. If the injury or illness is severe or critical, call 911 immediately and give your location. Be prepared to answer the operator's questions. Emergency Responders should try to stabilize the injured or ill employee until medical assistance arrives (refer to the section "Request for Ambulance").
2. Emergency Responders should be contacted to treat minor medical emergencies onsite. Render first aid or CPR if qualified to do so, or have the building security/switchboard page for Emergency Responders. Instant messaging is also encouraged for all trained responders.
3. Do not move the affected person unless he or she is in danger of further injury.
4. Direct the emergency personnel to the affected person if an ambulance has been called. Designate one or more persons to do the following:
 - Hold an elevator on the first floor for ambulance personnel.
 - Meet the ambulance personnel at the appropriate doorway and direct them accordingly.
5. Following the emergency assistance, the senior responsible person should contact the Business Unit ESH&S Manager and the Workers' Compensation Coordinator (refer to the section "Other Important Phone Numbers").

*A critical emergency is one where life or limb may be in jeopardy. Emergency Responders may aid in making this distinction if it is not obvious.

6. If the injury or illness requires emergency transportation assistance, the BV Emergency Responders should arrange for transportation to the appropriate medical facility. If time allows, they should complete the form in the section "Request for Ambulance."
7. In some cases, the injury or illness may require the use of an Automatic External Defibrillator (AED). The AED is a device that defibrillates a victim of sudden cardiac arrest in an attempt to restore the normal heart rhythm. AEDs are located at the receptionists' desks in all major Kansas City buildings as well as in many Regional offices. AEDs should be used only by those trained in their use.

Non-Critical Medical Emergencies*

1. Render first aid if qualified to do so. Contact the building security or switchboard to page for Emergency Responders.
2. Contact the BV individual responsible for the injured or ill person.
3. If injury or illness is serious, but not life threatening, the supervisor or Emergency Responder should arrange transportation for the individual to the BV-approved medical facility. During regular work hours (8 a.m. to 5 p.m.), the approved medical facility for non-emergency medical care is the Well at Work Occupational Health Services.
4. If the injury involves exposure to a chemical and is a non-emergency situation, the appropriate Safety Data Sheet should be sent with the injured employee to the medical facility. Safety Data Sheets are available from Corporate ESH&S.
5. Report all incidents to the Business Unit ESH&S Manager and the Workers' Compensation Coordinator.

Emergency Automatic External Defibrillator (AED) Protocol

Do the following in the event of an emergency requiring the use of the AED:

1. Call 911. The trained First Aid/CPR Responders should inform the dispatcher of the emergency, the exact building/location and address, name, phone number, type of emergency, number of persons affected, care being given to those affected (including use of the AED), etc.
2. If during normal business hours, call building security/switchboard with the same information as above.
3. When the first Emergency Responders who arrive at the scene, one should be designated to be in charge of the emergency situation. This responder will then designate an individual to get the AED at the reception area, and another to wait at the appropriate door to direct incoming ambulance personnel to the scene. The responder in charge should also designate someone to hold the elevator on the ground floor if the emergency is on any of the upper floors.

*A non-critical medical emergency is one where life or limb is not in immediate danger, and skilled medical care is not needed immediately.

4. Only first aid/CPR trained personnel who have been trained in the proper use of the AED should operate the equipment.
5. After the emergency, the responder in charge should call the AED Program Coordinator at 913-458-8574 for proper restocking and battery check for the AED.
6. During an evacuation, the AED should be removed from the building by an Emergency Responder.

Bloodborne Pathogen Exposure Procedures

QUICK REFERENCE

1. Limit access to exposure areas and victims.
2. Define and isolate the hazard area.
3. Use protective equipment and containers.

IN MORE DETAIL

This section provides precautions necessary for professionals to use during treatment of emergencies when exposed to blood, body fluids, and other potentially infectious materials. All professionals who administer first aid and CPR as a part of their job duties are required to attend training on bloodborne pathogens and must be offered the Hepatitis B vaccination prior to accepting duties that may expose the individual to potentially infectious materials. For additional information, please contact your Business Unit ESH&S Manager.

Implementation of the Bloodborne Pathogen Exposure Control Plan is the responsibility of the Business Unit ESH&S Manager, and further information can be found in the BV Safety Procedures on the ESH&S portal (<https://blackandveatch.sharepoint.com/sites/CESHS/Lists/Safety%20Procedures/AllItems.aspx>).

Work Practice Controls

The primary methods used to reduce bloodborne pathogen exposure during emergencies include the following:

- Isolate or contain the hazard.
- Use disposable, puncture-resistant containers that are closeable and leak proof on the sides and bottoms, and properly labeled with the “biohazard” symbol, for used needles, blades, implements of treatment, and/or other regulated waste (blood or other potentially infectious materials in a liquid or semi-liquid state). These containers must be easily accessible, kept upright, replaced routinely and not allowed to be overfilled. When containers of regulated waste are moved, the containers must be securely closed to prevent spillage or leakage. For disposal of biohazard waste, contact your Business Unit ESH&S Manager.
- Use appropriate personal protective equipment, including disposable gloves, surgical masks, protective eyewear, etc.
- Limit access to potential exposure areas.
- Have a bloodborne pathogen exposure kit available and easily accessible. Kits are available for OCI at 678-806-1057 and for BV/BVCI at 913-458-2027.
- Have available germicide hand wipes or hand washing fluid facilities with soap and running water.
- Prohibit storage or consumption of food, drink, tobacco, etc., or the application of contact lenses, cosmetics, lotions or chap-stick in areas of potential exposure.
- Observe universal precautions, all blood and other potentially infectious materials are treated as though they are infectious.

Request for Ambulance Procedures

HAS AN AMBULANCE BEEN CALLED? Yes ☐ No ☐

IF NO, DIAL 911 AND ASK FOR AN AMBULANCE.

1. Name of person calling and extension: _____
2. Are you an Emergency Responder? Yes ☐ No ☐
If No, is there one on the scene? Yes ☐ No ☐
3. Victim's exact location: _____
Example: 10950 Grandview, Overland Park, KS, southeast corner of the third floor.
4. Nature of problem and care being given: _____
(Example: chest pains)
5. Victim's name: _____
Approximate age: _____

The BV Emergency Responder will designate someone to meet the emergency vehicle and, if necessary, someone else to hold the elevator. The assigned designee will escort the emergency personnel to the injured/ill individual.

Emergency Facility Map

Name of Facility Lima Memorial Hospital

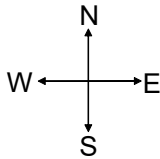
Hours of Operation 24/7

Phone 419-228-3335

Address 1001 Franklin St., Lima, OH 45804

Distance:
30 miles

Travel Time:
40 minutes



Fire Emergency Procedures

QUICK REFERENCE

If you see fire or smoke and the alarm has not sounded...	1. Activate the fire alarm as you exit the area.
	2. Call <u>911</u> .
	3. Leave the area and go to the designated evacuation assembly area at <u>TBD</u> .
If the alarm has sounded...	4. Account for all building occupants.
NOTE: Use portable fire extinguishers only if trained to do so.	

IN MORE DETAIL

If a fire occurs, the BV coordinator or designated alternate will determine if emergency assistance is required (refer to the sections titled “Emergency Phone Numbers” and “Other Important Phone Numbers”). In the event of a fire alarm, all building occupants should evacuate the premises and assemble in their designated areas. Please note the map at the end of this manual that shows the assembly areas.

If an individual cannot evacuate the building due to a medical condition or limited mobility, that individual should shelter in place within a stairwell that is fire rated. The building sweeper shall report the shelter in place condition to the incident commander upon exit of the building. The incident commander shall report the shelter in place condition to responding emergency personnel (fire/police). If shelter in place is not feasible or safe, sweepers/responders are to solicit assistance to escort the individual from the building as safely as possible.

Major Emergency

Anyone who discovers a fire or smoke should call 911. The BV coordinator or designated alternate will attempt to determine that all occupants have evacuated safely.

When calling the fire department, be prepared to relay as much of the following information as possible:

- Type of emergency.
- Location (Address).
- Severity of emergency.
- Number of personnel onsite.
- Name and telephone number of the person making the call.

Minor Emergency

If trained to do so, and if the fire is in a beginning stage, the professional may attempt to extinguish the fire. **Use the portable fire extinguishers only if you have been trained to use them.**

In all cases of major or minor fire emergency, the BV office coordinator or designated alternate should report the incident to Corporate ESH&S.

Evacuation Procedures

QUICK REFERENCE

When an evacuation is ordered:

1. Immediately stop what you are doing.
2. Leave the building through the nearest exit.
3. Report to your assembly area.
4. Remain in the assembly area until instructed otherwise.

IN MORE DETAIL

1. Upon hearing an alarm or if instructed to exit a building, all building occupants must immediately leave the building using the nearest stairway or exit and go directly to the designated evacuation assembly area. Do not use the elevators. Individuals needing assistance should wait inside the stairwells.
2. Designated Emergency Responders will attempt to account for all building occupants by sweeping their areas and stairwells to ensure that all professionals have evacuated or are waiting inside stairwells for assistance. Emergency Responders can be identified by orange vests.
3. Designated Emergency Responders will report to the BV emergency coordinator on the status of the evacuation in their sectors and the placement of disabled professionals in stairwells.
4. Upon the arrival of the fire department, the coordinator will report any missing persons or any disabled persons waiting for assistance.
5. Occupants will remain in the evacuation assembly area until released by the BV emergency coordinator or designated alternate.
6. Your location at the time of the evacuation orders will determine your route to the evacuation assembly areas. Take the nearest stairwell or exit to the exterior of the building, and then go to your designated evacuation assembly area for further instructions. Do not cross a fire to get to an exit; choose an alternate exit. Do not prop fire doors open.
7. Familiarize yourself with the position of all exits and the flow pattern on the evacuation route map located on the last page of this section and the last page of this manual.
8. First Aid/CPR Responders should evacuate with their emergency equipment.
9. The BV emergency coordinator will be stationed at the BVCI construction trailer.
10. Be alert for arriving emergency vehicles and give them the right-of-way.

Tornado and Weather Disaster Procedures

QUICK REFERENCE

A **tornado warning** means that a tornado has been detected and may be approaching the area. A **tornado watch** indicates that weather conditions are right for a tornado to form. The basic response to a tornado **warning or watch** is as follows:

Tornado/Severe Weather

1. Listen for announcements.
2. Go immediately to the area directed by the announcements.
3. Move away from any glass area.

IN MORE DETAIL

The BV supervisor or designated alternate will attempt to make the decision for an evacuation in any natural disaster event if time is available. When alerted to an impending tornado or other severe weather, the BV coordinator or designated alternate will relocate all employees and visitors to the designated shelter area and, with the assistance of the department heads, attempt to account for all building occupants.

Typical severe weather shelter areas are located in the stairwells, restrooms, and interior conference rooms.

The following will occur for any severe weather:

1. Impending emergency will be announced over the intercom if information and time permit.
2. Move out of offices on the building's perimeter and close the doors.
3. Go to the designated shelter area (stairwells or interior conference rooms). Wait for further instructions.
4. Do not leave the building unless instructed to do so.
5. If no advanced warning has been given, take shelter under a sturdy object such as a desk.
6. Stay away from windows, potential falling objects, and open areas.
7. If building damage occurs, leave the building when safe to do so and assemble in designated areas. Do NOT use matches or lighters for light. Avoid all electrical use.

Earthquake Emergency Procedures

QUICK REFERENCE

Earthquake, Natural Disaster	1. Immediately drop to hands and knees, cover your head and neck underneath a sturdy table or desk, and hold on to your shelter until the shaking stops. 2. Move away from any glass area. 3. Listen for announcements and account for all building occupants if building is evacuated.
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IN MORE DETAIL

An earthquake may hit without warning. There may be no siren, alarm or radio tone signals to alert you. All occupants should be familiar with the workspaces in their office so they can find shelter without hesitation. When time allows, do the following:

1. Do not use the elevators.
2. Move away from windows, shelves, bookcases, cabinets, or other potential falling hazards.
3. Take cover under desks or strong tables. Do not shelter in doorways as they typically do not provide protection.
4. Drop to your knees or sit with your upper torso bent forward.
5. Put head down toward knees, hands clasped behind neck, arms against ears, and eyes closed. Hold that position for a minimum of 60 seconds after shaking stops.
6. Use jackets or other materials for head protection.
7. Be silent and listen for additional directions.
8. Stay calm, and be prepared for aftershocks.
9. Avoid all exposed electric lines.
10. DO NOT smoke or use matches or open flames.
11. DO NOT attempt to leave the building until you are advised to do so by management or emergency personnel or the tremors stop. Most injuries occur from falling objects during a panic evacuation.
12. As soon as practical after the event, assess conditions and further required actions.

Hurricane and Tropical Storm Preparedness

QUICK REFERENCE

Hurricane/Tropical Storm Preparedness	1. Monitor weather patterns of impending storm. 2. Utilize the preparedness guidelines and discuss with staff (accountability, office/project closure procedures, etc.) 3. Report status/updates to your Business Unit ESH&S Manager 4. If impacted by the storm, follow other applicable procedures outlined in the EAP.
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IN MORE DETAIL

As tropical storms and hurricanes develop, it is important to be aware of impending landfall and prepare the office or project accordingly. The predictive nature of such storms allows opportunity to prepare impacted locations well in advance of actual land-fall. Be sure to track the storm's path at the [National Hurricane Center website](#) and sign up to receive the center's email updates if in the United States (insert appropriate government agency if not in the United State). If a hurricane watch is issued for your area, refer to itemized actions below to help prepare your property from damage, as well as prepare our professionals. Division ESH&S Managers will assist offices and projects along the way. It is critical that we not only account for our property, but also set up systems and processes to account for our professionals and their families. The following guidelines will assist in an orderly account of actions to take in preparing for storms.

Actions to begin 48 hours before hurricane arrival

- Review your office or project EAP with all involved personnel.
- Review Business Unit/Office Business Continuity Plans.
- Check building roofs. Make repairs to coverings and flashing as time allows.
- Remove all loose items from the roof, secure equipment doors and covers, and remove debris.
- Verify roof drains are clear of trash and other obstructions.
- Fill fuel tanks serving emergency generators and other vital services.
- Verify dewatering pumps are in service and working.
- Verify outside storm drains and catch basins are clean.
- Remove debris from outdoor areas that may become "missiles."
- Remove loose, outdoor, inactive equipment.
- Contact IT and plan actions (server outage, back-up systems, etc.)
- For new construction projects:
 - Remove loose equipment.
 - Secure and protect material storage.
 - Temporarily brace new construction.
 - Secure roofing and items on the roof.
- For heavy industry:
 - Inventory tanks and vessels with enough material to secure them against the forces of buoyancy should they be exposed to flooding, surface water runoff or storm surge.

- Maintain contact with suppliers of pipeline delivered materials. Those suppliers may also be making shutdown preparations. Verify you will have the necessary supplies to safely shut down your process. This is especially important for processes such as olefins units, which take several days to bring down. Natural gas and oxygen are just two pipeline supplied materials to consider.
- Verify compressed air supplies needed for control purposes.
- Remove any accumulated rain water from storage tank spill containment areas.
- Allow time for Emergency Response Team members who will remain on site to go home and take care of their personal needs.

Actions to begin 36 hours before hurricane arrival

- Protect or relocate vital business records.
- Remove all loose outdoor storage or equipment.
- Anchor portable buildings or trailers to the ground.
- Secure outdoor storage or equipment that cannot be moved.
- Install manual protection systems (e.g. shutters, plywood covers and flood gates).
- Raise critical equipment off floors (e.g. PC towers).
- Move critical equipment from basement and other below ground areas.
- Cover critical stock and equipment with waterproof tarpaulins.
- Initiate an orderly shutdown of production equipment and systems that rely upon normal power.
- Turn off fuel gas services.
- Turn off non-essential electrical systems.
- Verify all fire protection systems are in service (e.g. water supplies, fire pumps, sprinklers, fire alarms and special extinguishing systems).
- Remove or secure scaffolding.
- Discuss alternate work plans, work locations, and schedules before the situation worsens.
- Devise and communicate a plan to all staff on when the office or project will be closed and what provisions are in place to account for everyone. Expectations on when to re-open the building or project should also be shared based on the severity of the storm.
- Validate communication methods with staff. Share the Emergency Phone Line number and develop reporting procedures (texting, e-mail, phone calls) to account for people.

Actions that need more time

- Set up flood barriers at all first floor doors and entrances.
- Temporarily close up buildings under construction to avoid entry of wind-driven rain.
- Install manual shutters on multi-story buildings.

If the storm hits

If the storm (hurricane, tropical storm, etc.) does affect your area, please plan for the following:

- The office coordinator or his/her designee has responsibility to make the call when the office or project will be closed. Business Unit leadership, along with ESH&S are to be contacted when these decisions are made. DO NOT WAIT TOO LONG to make a decision. Professionals will also need time to take care of personal matters to protect their families and property.
- Insure that a method to account for all professionals is in place.
- AFTER THE STORM PASSES, and you have accounted for your family's safety, please report to your Business Unit ESH&S Manager:
 - The operational status of your building or project location

- Status of professionals (based on accounting procedures)
 - Any injuries
 - Any significant damage that will impact business for an extended period of time (greater than 2 days)
 - Any other information of significance
- Before re-opening the office, determine the local condition of roads, power supply, potable water availability, status of sewer systems, etc. We do not want to put professionals in danger by trying to get to the office when conditions are not stable.
- Verify alternate work plans, work locations, and/or schedules as appropriate.
- If there is extensive damage to the building or project, report immediately and start to implement elements of the applicable Business Continuity Plan.

Elevator/Lift Emergency Procedures

QUICK REFERENCE

Elevator Emergency	1. Call the operator. 2. Give all information possible. 3. Call the GSOIC at 913-458-1145 (if in the United States) 4. Wait calmly.
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IN MORE DETAIL

Elevators and lifts are among the fastest, safest, and most reliable modes of transportation within an office building. However, they occasionally malfunction, leaving their passengers temporarily unable to exit.

In most cases, someone will assist you as soon as possible. In the interim, do the following:

1. Use the elevator or lift phone, or press the emergency button and wait for the operator to answer.
2. When the operator answers, do the following:
 - a. Give the building number.
 - b. Give the floor location if possible.
 - c. Give the elevator/lift number, if available (usually identified in the upper right corner).
 - d. Describe the problem.
3. Remain calm.
4. Answer the telephone when the operator calls.
5. **DO NOT** try to force open an elevator or lift door.
6. **DO NOT** crawl out of the elevator/lift or unless directed to do so by emergency personnel.

Note: If you have a cell phone in the elevator cab, call the GSOIC (913-458-1145) and inform them that you are stuck in the elevator. Let them know if you or someone in the elevator needs medical assistance.

Workplace Violence Procedures

QUICK REFERENCE

Threat of Violence	1. Call <u>911</u> to report the situation. 2. Assess the situation before intervening. 3. Do not become a victim yourself.
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IN MORE DETAIL

Black & Veatch's goal is to provide a working environment for its professionals and visitors that is free from violence. Verbal or physical aggression and threats of violence, whether directed at a department head, supervisor, coworker, client, vendor, or visitor, are prohibited.

A professional who threatens, initiates, or participates in any act of violence while on the company's or a client's premises, including parking lots, will be subject to disciplinary action up to and including termination of employment, arrest and prosecution. Any non-employee who instigates or performs an act of violence or intimidation on company property, including parking lots, will be subject to arrest and prosecution.

Act of Violence in Progress

1. Call 911 and report the situation.
2. Be prepared to direct the police to the incident.
3. Do not attempt to intervene physically or verbally.
4. If the situation merits it, advise those nearby to move away from the area.
5. Follow directions of law enforcement officials when they arrive.
6. Do not evacuate the building unless directed to do so.

Threat of Violence

1. If you hear, observe or receive a threat, contact Human Resources Employee Relations and the GSOIC after business hours, 8 a.m. to 5 p.m., at 913-458-1145. During normal business hours, call BV Global Security for your building.
2. Take all threats seriously.

Evolving Threat Procedures

QUICK REFERENCE

Evolving Threat Situation	1. If there is an accessible escape path Evacuate 2. If unable to do above, Hide Out 3. If all else fails, Take Action against the intruder 4. Call 911 (or emergency number) when safe
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IN MORE DETAIL

An evolving threat is an individual actively engaged in killing or attempting to kill people in a confined and populated area; in most cases evolving threats use firearm(s) and there is no pattern or method to their selection of victims. In other cases, the intended victim(s) are co-workers, ex-co-workers, or intimate partners.

Evolving threat situations are unpredictable and evolve quickly. Typically, the immediate deployment of law enforcement is required to stop the shooting and mitigate harm to the victims. Because evolving threat situations are often over within 10 to 15 minutes, before law enforcement arrives at the scene, professionals must be prepared both mentally and physically to deal with an evolving threat situation.

Best Practices in an Evolving Threat situation

1. Be aware of your environment and any possible dangers.
2. Take note of the two nearest exits in any facility or location you are in or visit.
3. Place your cell phones on vibrate or silent to not give away your location.
4. If you are in an office or restroom, stay there and secure the door. Try to barricade the door with furniture, boxes, chairs, etc. If you are in a room that the door opens out try to secure it by using a belt around the door knob and tie it to something or hold tight to it. Wrap the belt around the closer arm to prevent it from being opened.
5. If you are in a hallway, get into a room and secure the door.
6. As a last resort, attempt to take the evolving threat down. When the intruder is at close range and you cannot flee, your chance of survival is much greater if you try to incapacitate him/her. Use everything as a weapon and throw anything you can at their face/head. This will distract the person and break their concentration.
7. CALL 911 WHEN IT IS SAFE TO DO SO! Stay calm give as much detail as possible location of where you are and the location of the intruder if known, what the person was wearing if known, who it is if known.

How to react when law enforcement arrives

1. Remain calm and follow officers' instructions.
2. Put down any items in your hands, immediately raise your hands and spread your fingers, keeping hands visible at all times.
3. Avoid making quick movements toward officers, pointing, screaming or yelling.
4. Do not stop to ask officers for help or direction if evacuating.
5. If you secure a weapon from the intruder place it in a trash can and carry the trash can over your head with your hands visible to law enforcement.

When safe

Contact the Global Security Operations & Intelligence Center or the appropriate Regional Security Manager.

		Office #	Cell #	
Global Security Director	John Kendall	+1 913-458-6597	+1 913-523-4164	KendallJR@bv.com
Regional Security Manager- Americas	Colin Dobeson	+1 913-458-4810	+1 778-215-0550	DobesonCG@bv.com
Intelligence/Counter Intelligence Analyst	Phil Lantz	+1 913-458-4527	+1 913-207-8488	LantzP@bv.com
Global Security Operations & Intelligence Center (GSOIC)	Duty Officer	+1 913-458-1145		GSOIC@bv.com

Remember in most of these situations the person that is doing the shooting has come to do HARM! They are not planning on going home. Time and distance is in your favor, attempt to get both when possible. When you cannot escape create mass chaos, create sounds, sights, and touches that will increase the skill level required to harm people. Hitting a passive, static target is easy. Chaos and movement will increase the skill required to do harm.

A.L.i.C.E.

- ✓ Alert! - get the word out!
- ✓ Lockdown - if you can't get out, hide out (barricade, impede access, etc.)
- ✓ inform - communicate with others and inform authorities
- ✓ Counter - apply skills to distract, confuse, and gain control
- ✓ Evacuate - reduce the number of potential targets for the intruder, and reduce the chances of victims resulting from friendly fire when help arrives

Bomb Threat Procedures

QUICK REFERENCE

Bomb Threat	1. Call ____ with the information. 2. Signal others if possible to aid you in monitoring the call. 3. Fill out the bomb threat checklist as much as possible. 4. If you were/are not the person receiving the call, leave the area as directed by the announcement.
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IN MORE DETAIL

Report call immediately to: local emergency number

Phone No.: 911

A majority of bomb threats to businesses are hoaxes that result in nothing more than a disrupted work routine. The threat **must be taken** seriously, however, and appropriate action taken.

Personnel who are likely to receive bomb threats should follow the sequence of actions below and have on hand a copy of the Bomb Threat Checklist, which follows:

1. If the threat is received by phone, keep the caller on the line as long as possible and get as much information as possible (refer to checklist).
2. Immediately inform the appropriate BV emergency coordinator or designated alternate (refer to the list in the section titled "Other Important Phone Numbers") who will determine with the fire and police departments whether the building should be evacuated. Tell no one else.
3. All bomb threats are to be reported to the GSOIC at 913-458-1145.

Bomb Threat Checklist

Note: Print this sheet and provide the most complete information possible.

Name of person receiving threat:		
Department:	Phone No.:	Location:

Sex of Caller:	Race:
Age:	Length of call:
Number at which call is received:	
Time:	Date:

ASK THE CALLER:

1. When is the bomb going to explode?
2. Where is it right now?
3. What does it look like?
4. What kind of bomb is it?
5. What will cause it to explode?
6. Did you place the bomb?
7. Why?
8. What is your address?
9. What is your name?

WORDING OF THREAT:

WAS THE CALLER'S VOICE:

- | | |
|-----------------------------------|--|
| ☐ Calm | ☐ Nasal |
| ☐ Angry | ☐ Stuttering |
| ☐ Excited | ☐ Lisp |
| ☐ Slow | ☐ Raspy |
| ☐ Rapid | ☐ Deep |
| ☐ Soft | ☐ Ragged |
| ☐ Loud | ☐ Clearing Throat |
| ☐ Laughing | ☐ Deep Breathing |
| ☐ Crying | ☐ Crackling Voice |
| ☐ Normal | ☐ Disguised |
| ☐ Distinct | ☐ Accented |
| ☐ Slurred | ☐ Familiar |

If voice is familiar, whom did it sound like?

WERE THERE BACKGROUND SOUNDS?

- | | |
|--|--|
| ☐ Street Noises | ☐ Animal Noises |
| ☐ Dishes | ☐ Clear |
| ☐ Voices | ☐ Static |
| ☐ PA System | ☐ Local |
| ☐ Music | ☐ Long Distance |
| ☐ House Noises | ☐ Booth |
| ☐ Motor | ☐ Other |
| ☐ Factory Machinery | _____ |

THREAT LANGUAGE:

- | | |
|--|---------------------------------------|
| ☐ Well Spoken | ☐ Incoherent |
| ☐ Foul Language | ☐ Taped |
| ☐ Irrational | ☐ Message Read |

Remarks: _____

Suspicious Items Procedures (Packages and Letters)

QUICK REFERENCE

Suspicious Items, Packages, and Letters	1. Do not panic; call the GSOIC at <u>913-458-1145</u>. 2. Contact your supervisor. 3. Isolate the suspicious item, do not move it, and keep others away. 4. Be prepared to remain at location.
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IN MORE DETAIL

If an improvised explosive device (IED) or biological or chemical weapon is left in any Black & Veatch building or mailed via the postal or delivery system, professionals must be protected. Plans and training must be put into place to detect such items prior to their use or to mitigate their results upon discovery or opening.

Detection of a suspicious item (such as a backpack, briefcase, etc.) in an unusual location

1. Do not panic.
2. Contact your supervisor.
3. Attempt to determine ownership among other professionals present.
4. If directed or if in doubt, call 911 (or local emergency number).
5. Contact GSOIC:
 - For the United States: 913-458-1145
 - For Asia: 66 (0) 81-752-2692 (mobile) or 66 (0) 29-37-0113 ext. 208
6. Contact the 24x7 BV news media information line at 866-496-9149.

Delivery of a suspicious package or letter

1. Do not panic.
2. Contact your supervisor.
3. Isolate the package or letter.
4. Leave the package or letter sealed; only emergency personnel should open or touch it.
5. Leave the package or letter in place.
6. Protect the package or letter in a plastic bag and/or cover it up.
7. Keep others away.
8. Consider shutting down the HVAC systems.
9. If directed or if in doubt, call 911 (or local emergency number).
10. Contact GSOIC:
 - For the United States: 913-458-1145
 - For Asia: 66 (0) 81-752-2692 (mobile) or 66 (0) 29-37-0113 ext. 208
11. Contact the 24x7 Black & Veatch new media information line at 866-496-9149

Other Security Threat Procedures

QUICK REFERENCE

1. Immediately call the GSOIC at 913-458-1145.
2. Notify the GSOIC before notifying any police or government agencies.

IN MORE DETAIL

1. Threats of violent acts toward BV professionals, visitors, vendors, or subcontractors should be reported to the GSOIC immediately.
2. Call the GSOIC at the following phone number:
913-458-1145
3. Call the GSOIC before notifying any police or government agencies.
4. Threats include bomb threats; telephone threats; threats via the mail or communicated electronically or verbally; threats to commit acts of violence upon any BV professional or property; threats against any visitors, vendors, or subcontractors associated with BV; and threats to extract money or assets from BV in lieu of committing any act of violence or other criminal acts (e.g., criminal vandalism or destruction). In the case of bomb threats, this notification may take place after you have followed your EAP (refer to Bomb Threat section).

Missing Professionals Procedures

QUICK REFERENCE

- | |
|--------------------------------------|
| 1. Notify the GSOIC at 913-458-1145. |
|--------------------------------------|

IN MORE DETAIL

1. If any person, professional, visitor, vendor, or subcontractor does not report at the arranged time or you are unable to contact these persons, and reasonable efforts have been undertaken to determine the location and status of these individuals, you are to immediately notify the GSOIC.
2. Call the GSOIC at the following phone number:
913-458-1145
3. Call the GSOIC before notifying any police or government agencies.

Building Disruptions

QUICK REFERENCE

1. When an office or building experiences a disruption such as: power failure, potable water supply impact, sewer problem, fire, smoke damage, flooding, or other event that impacts professional's ability to perform work in a safe and healthy environment, the following procedures are to be followed.
2. Office lead reports the condition to Building Services, the landlord (if applicable), and the Business Unit ESH&S Manager.
3. Specific condition is evaluated to determine (health, safety, security) impacts on professionals as well as estimated length of disruption.
4. Office lead, Building Services (landlord), and ESH&S determine the proper course of action. If the condition is expected to last over 8 hours, refer to Business Unit/Building Business Continuity Plan and inform the VP of ESH&S.

IN MORE DETAIL

Purpose

Unplanned building disruptions impact our professionals' ability to work productively. In many cases the health and well-being of professionals may also be compromised due to lack of lighting, potable water, working sewer systems, temperature extremes, etc. In these rare cases, office leaders need to make informed decisions and communicate information to our professionals in a timely fashion.

Items to Consider When Assessing Building Disruptions

If building occupants are in imminent danger, the building is to be evacuated in accordance with procedures outlined in this EAP. Building Services and/or landlords that have maintenance responsibilities are to be informed of the event.

The office leader(s), along with Building Services, and ESH&S are to meet and discuss the event to determine impacts on the health, safety, or security of professionals along with the expected duration of the impact. Based on the current facts, a determination shall be made on proper actions to take.

If impacts are expected to last greater than 8 hours, Business Unit/office specific Business Continuity Plans are to be referenced and the VP of ESH&S shall be informed.

Office Emergency Phone Line Procedures

QUICK REFERENCE

1. When it has been determined to close an office, the office/safety manager should inform his/her business's leadership and corporate ESH&S. Then, the manager should contact the Global Security Operations & Intelligence Center (GSOIC) at +1 913-458-1145 to update the Emergency Phone Line.
2. The GSOIC will need contact information, information on the affected office and the date of closure, and any other details you want relayed on the messaging system.
3. The office/safety manager should communicate the Emergency Phone Line number to his/her professionals: **+1 913-458-9898 or 1-888-577-2595**. This number will be updated with new information only when the GSOIC is prompted to do so.

IN MORE DETAIL

Purpose

Black & Veatch has numerous offices located across the United States. At any time, natural disasters or other emergencies can impact the ability of professionals to safely arrive at their respective office locations. Should any of these locations need to be closed, Black & Veatch has an Emergency Phone Line that provides professionals information regarding office operating status.

Process For Updating Regional Phone Lines

Once an office/safety manager a Black & Veatch office will close due to severe weather, natural disaster or other unforeseen circumstances, he/she should:

1. Inform his/her business leadership and corporate ESH&S. Then, that manager should contact the Global Security Operations & Intelligence Center (GSOIC) at +1 913-458-1145 with information and status change. Only individuals with the authority to make office closure decisions (or their designee) should contact the GSOIC.
2. The office/safety manager should direct affected office professionals to check the Emergency Phone Line by calling **+1 913-458-9898 or 1-888-577-2595**.
3. The office/safety manager **must** update the GSOIC every morning the office is closed until the office reopens and normal operations resume. The phone line will be updated each morning during the closure until normal operations resume. At that time, the phone line will be updated to reflect normal operating status.

Inadvertent Release Plan

Powell Creek Solar Project

Palmer and Liberty Townships,
Putman County, Ohio

Prepared for:



Powell Creek Solar, LLC
a subsidiary of Avangrid Renewables, Inc.
2701 NW Vaughn St, Suite 300
Portland, OR 97210

Prepared by:



Environmental Design & Research,
Landscape Architecture, Engineering & Environmental Services, D.P.C.
5 E Long St, Suite 700
Columbus, OH 43215
www.edrdpc.com

September 2023

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LIST OF FIGURES

Figure 1. HDD Bore Locations

1 PURPOSE

Construction of the Powell Creek Solar Project (the Project) will include the use of horizontal directional drilling (HDD). The planned locations of HDD bores are displayed on Figure 1. This widely used technique accomplishes the installation of buried infrastructure by routing the equipment under sensitive features such as streams and wetlands. The HDD procedure may sometimes use a lubricant, most commonly a bentonite slurry, which is a fine clay material referred to as "drilling mud" or "drilling fluid." Although bentonite is non-toxic and non-hazardous, it can introduce a potential environmental risk when it emerges during construction. This emergence of drilling lubricant at the ground surface or within a sensitive feature is referred to as an inadvertent release (IR) or frac-out.

Seepage of drilling fluid is most likely to occur near the bore entry and exit points where the drill head is shallow. Frac-outs can occur, however, in any location along a directional bore. This plan establishes operational procedures and responsibilities for the prevention, containment, and remediation of any of frac-outs that may occur in connection with the construction of the Project. The objectives of this Plan are to:

1. Minimize the potential for an IR associated with HDD activities
2. Provide for the timely detection of an IR
3. Protect sensitive waterways and associated riparian vegetation
4. Facilitate an efficient response in the event an IR occurs
5. Ensure that all appropriate notifications are made immediately following each IR event

2 RESPONSIBILITIES

The construction Site Supervisor has ultimate responsibility for implementing this plan. The construction Environmental Specialist will observe HDD activities and monitor the response to each IR event in order to support the Site Supervisor in the protection of environmentally sensitive areas.

2.1 Site Supervisor

The Site Supervisor will be familiar with all aspects of the drilling activity, the contents of this plan, and the conditions of approval under which the HDD is authorized. Prior to commencement of drilling operations, the Site Supervisor will ensure that all relevant employees are trained and familiar with the necessary procedures for response to an IR, and that a copy of this plan is available and accessible to all construction personnel. The Site Supervisor will have the authority to stop work and commit the resources (personnel and equipment) necessary to implement this plan. The Site Supervisor will be responsible for ensuring that environmental personnel are notified in advance of planned HDD activities that require monitoring.

2.2 Environmental Specialist

The Environmental Specialist will be familiar with all aspects of the contents of this plan and the conditions of approval under which the HDD is authorized. In addition, the Environmental Specialist will be present during HDD activities that may impact environmentally sensitive areas. The Environmental Specialist will

have the authority to stop HDD activities if needed to avoid impacts to sensitive resources resulting from any IR.

3 HDD PROCEDURES

The following procedures will be followed in preparation for and during HDD work. This plan will be available on-site during all construction activities.

3.1 HDD Personnel and Briefing

The Site Supervisor will be on-site at any time that HDD is occurring or is planned to occur. The Environmental Specialist will be present during HDD activities that may impact environmentally sensitive areas. The Site Supervisor will ensure that a briefing is held at the start of each day of HDD to review the appropriate procedures to be followed in case of an IR.

3.2 HDD Site Preparation

Exit and entry pits will be enclosed by silt fences, straw rolls or bales, or similar material. A spill kit and vacuum truck will be readily available prior to and during all HDD operations. Containment materials (straw, silt fencing, sand bags, frac-out spill kits, etc.) will be staged on-site at locations where they are readily available and easily mobilized for immediate use in the event of an IR. If necessary, barriers between the bore site and the edge of down-slope sensitive resources will be installed prior to drilling to prevent released material from reaching the resource.

If necessary, a relief pit may be excavated within the Project limits in an upland area adjacent to the drill path. Relief pits are intended to alleviate pressure during drilling and provide a suitable containment area for drilling fluid returns to occur. Relief pits will not be permitted for installation in sensitive resources. The contractor installing the relief pit will be required to coordinate with the Environmental Specialist prior to installation to ensure impacts to sensitive resources are avoided.

3.3 HDD Operation and Monitoring

During the pilot bore, the drilled annulus will be maintained. Cutters and reamers will be pulled back into previously-drilled sections after each new joint of pipe is added. When possible, HDD operations that occur beneath sensitive resources will be completed in one continuous operation to avoid collapses that may cause an IR.

In an effort to identify IRs quickly and reduce adverse impacts to sensitive resources, the bore path will be constantly monitored by the contractor, in addition to oversight by the Environmental Specialist. Drilling pressures will be closely monitored so they do not exceed those needed to penetrate the target formation. The drill operator will stop work whenever the drill pressure significantly drops or there is a lack of returns in the entrance pit. If either of these occur, the Site Supervisor will be informed that a possible IR has occurred.

3.4 HDD Completion and Clean-Up

Water containing mud, silt, bentonite, or other materials from equipment washing or other HDD activities will not be allowed to enter any environmentally sensitive area. The drilling fluid used in the drilling process will be either disposed of at an approved disposal facility or recycled in an approved manner. All materials and any construction debris will be removed from the HDD construction zone at the end of each work day. Sump pits at bore entry and exits will be filled and returned to natural grade, and all protective measures (fiber rolls, straw bale, silt fence, etc.) will be removed unless otherwise specified by the Site Supervisor.

4 RESPONSE TO INADVERTENT RETURNS

The Site Supervisor will be notified immediately when a potential IR is detected. The Site Supervisor and the drill rig operator(s) will work to identify the likely location of the IR. If an IR is confirmed, the Site Supervisor will be responsible for ensuring that the Environmental Specialist is aware of the IR, and will coordinate the subsequent notification, control and remediation, resolution, and documentation.

4.1 Notification

In the event of an IR, the Project will notify the appropriate agencies, including the following:

- Ohio Power Siting Board (OPSB)
- Ohio Environmental Protection Agency (Ohio EPA)
- Ohio Department of Natural Resources (ODNR)

Points of contact, preferred contact methods, and protocol for notification are included in the following table. Only the Site Supervisor, Environmental Specialist, and safety personnel should notify regulatory agency personnel.

Agency	Point(s) of Contact	Preferred Contact Method	Protocol for Notification
OPSB	OPSB Hotline	866-270-6772	Call as soon as possible, describing the type and location of IR
OPSB	Compliance Investigator (Shawn Rowley)	614-965-4184	Call as soon as possible and coordinate a site visit, if requested
OPSB	Email	ContactOPSB@puco.ohio.gov	Email with information describing the type and location of IR and related notifications that have occurred
Ohio EPA	Spill Hotline (24/7)	800-282-9378	Call within 30 minutes, describing the type of IR
ODNR	Division of Wildlife (Mike Pettegrew)	614-265-6387	Notify as soon as possible if IR occurred within an area where listed species are known to occur

4.2 Control and Remediation

The response of the field crew to an IR will be immediate and in accordance with procedures set forth in this plan. All appropriate emergency actions that do not pose additional threats to sensitive resources will be taken, as follows:

1. Boring will stop immediately upon detection of a significant decline in drilling pressure or other evidence that an IR may be occurring.
2. The bore stem will be pulled back to relieve pressure on the IR.
3. The Site Supervisor will be notified to ensure that management and environmental personnel are notified, adequate response actions are taken, and required notifications are made.
4. The Site Supervisor and Environmental Specialist will evaluate the situation and recommend the type and level of response warranted, including the level of notification required.
5. If the IR is minor, easily contained, has not reached the surface, and is not threatening any sensitive resources, then a leak-stopping compound will be employed to block the frac-out. If the use of leak-stopping compound is not fully successful, then the bore stem will be redirected to a new location along the desired drill path (i.e., where an IR has not occurred).
6. If the IR has reached the surface, any hazardous materials within the drilling fluid will be removed to a depth of 48 inches, contained, and properly disposed of, as required by law. Containment will be installed around the IR (fiber rolls, straw bales, sandbags, as necessary) to entrap released drilling fluid. IRs that occur within waterways will be controlled using a sandbag containment structure to ensure sediment releases remain at the point of discharge. All IR containments will be continually monitored to ensure releases remain within the affected areas.
7. If the IR reaches the surface and becomes widespread, the Site Supervisor will authorize mobilization of a vacuum truck and bulldozer. The vacuum truck may be positioned at either end of the line of the drill so that the IR can be reached by crews on foot, or may be pulled by a bulldozer so that contaminated soils can be vacuumed up.

4.3 Resolution

When the release has been contained and remediated, response close-out activities will be conducted at the direction of the Site Supervisor. These activities will include:

1. The recovered drilling fluid will either be recycled or transported to an approved facility for disposal. No recovered drilling fluids may be discharged into streams, storm drains, or any other water source.
2. All IR excavation and remediation sites will be returned to pre-project contours using clean fill and re-vegetated, as necessary.
3. All containment measures (fiber rolls, straw bales, sandbags, etc.) will be removed, unless otherwise specified by the Site Supervisor.

4.3.1 Resumption of HDD

For minor releases outside of sensitive areas, HDD may continue after full containment is achieved through the use of a leak-stopping compound or redirection of the bore. For releases that reach the surface, HDD activities will not restart without prior approval from the Site Supervisor. For releases that occur near sensitive areas, HDD will not be permitted to resume until containment and soil stabilization measures are installed and functioning to the Environmental Specialist's satisfaction.

4.3.2 Bore Abandonment

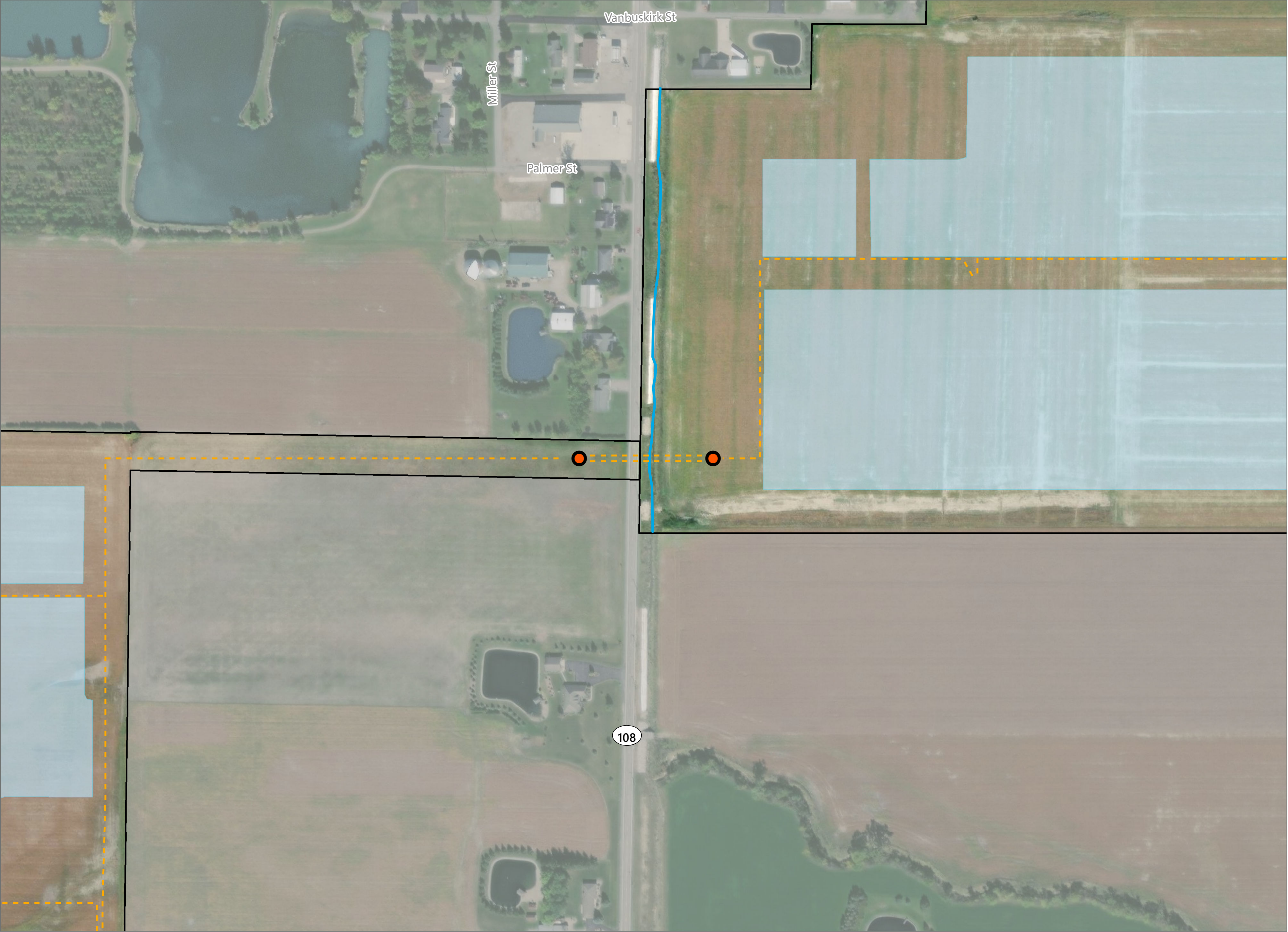
Abandonment of the bore will only be required when all efforts to control the IR within the existing directional bore have failed.

4.4 **Documentation**

The Site Supervisor will record the IR event in the daily log. The log will include the following:

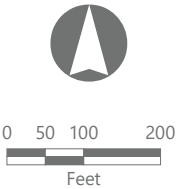
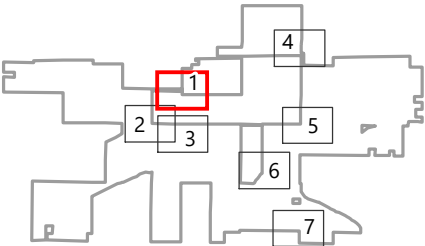
1. Name and telephone number of person reporting the IR
2. The location, date, and time of IR
3. An estimate of the amount of drilling fluid released and the size of the area impacted
4. The type of activity that was occurring around the area of the IR and
5. An evaluation of why the IR occurred
6. Description of the methods used to remediate the site and the success of the remediation action
7. Description of any nearby sensitive areas and their location in relation to the IR

This information will be shared with the Environmental Specialist when available for inclusion in subsequent environmental monitoring reports to the relevant regulatory agencies.



Powell Creek Solar Project
Palmer and Liberty Townships,
Putman County, Ohio
Inadvertent Release Plan

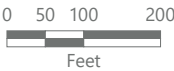
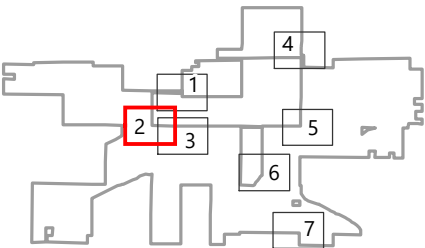
- HDD Location
- Collection Line
- Delineated Stream
- PV Panel Area
- Project Area



Prepared September 22, 2023
Basemap: Esri "World Imagery" map service

Powell Creek Solar Project
Palmer and Liberty Townships,
Putnam County, Ohio
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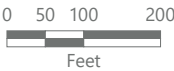
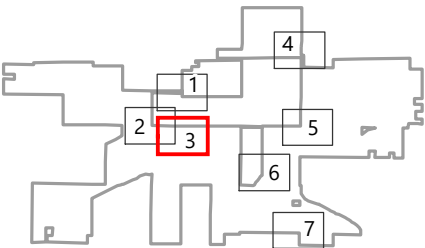
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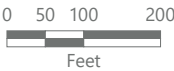
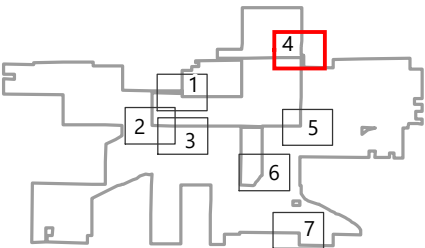
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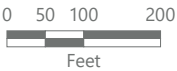
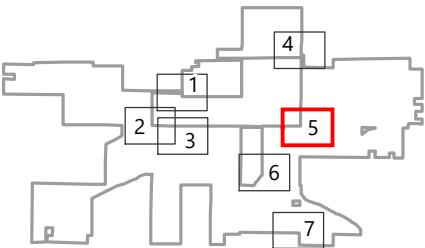
-  HDD Location
-  Collection Line
-  Delineated Stream
-  Delineated Wetland
-  PV Panel Area
-  Project Area



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-  Collection Line
-  Delineated Stream
-  PV Panel Area
-  Project Area



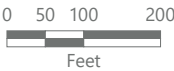
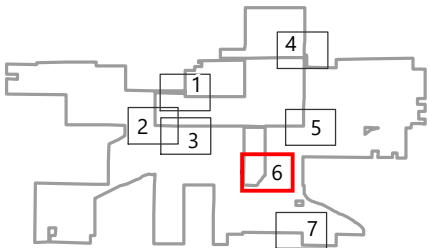
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Figure 1. HDD Locations

Powell Creek Solar Project
Palmer and Liberty Townships,
Putnam County, Ohio
Inadvertent Release Plan

-  HDD Location
-  Collection Line
-  Delineated Stream
-  Delineated Wetland
-  PV Panel Area
-  Project Area

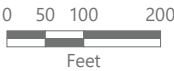
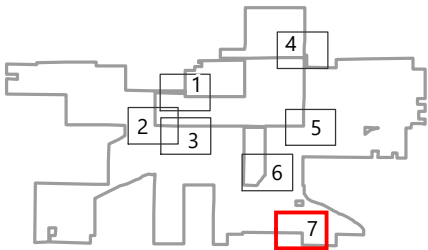


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-  HDD Location
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Powell Creek Solar |

Landscape Mitigation Plan & Lighting Strategy

September 2023

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Section I | Introduction

Powell Creek Solar is proposing an up to 150 MW solar energy facility spanning approximately 2,000 acres of land in Putnam County, Ohio (the Project or Facility). Powell Creek Solar, in consultation with Environmental Design and Research, Landscape Architecture, Engineering & Environmental Services, D.P.C. (EDR), has developed this conceptual landscape mitigation plan (plan) to provide visual mitigation for specific locations around the Facility. This plan proposes a flexible conceptual planting module designed to prioritize the use of native and/or naturalized shrubs for the purpose of complementing the existing vegetation within and adjacent to the Project area. While not necessarily providing complete screening of the entire Facility, the mitigation is intended to provide intermittent screening and softening of the view, and will be supplemented with ecological buffer areas comprised of a mix of native and naturalized grasses and forbs, which will contribute ecological benefits through the creation of habitat areas and forage for local wildlife. The plan includes a concept planting module plan diagram and module location plan, which are designed to accomplish the Project goals as they relate to the visual mitigation for adjacent, non-participating parcels.

Section II | Design Methodology

The proposed landscape mitigation is designed with the intent of softening the hard edges often introduced in the landscape by solar arrays, supporting Project infrastructure, and the associated solar panel perimeter fence. The concept planting module was developed utilizing the following strategies:

- Analysis of the existing landscape character and climatic conditions.
- Research of the regional flora native and/or common to the surrounding area.
- Preservation of the existing long-distance views and important vistas where possible.
- Preservation of the existing vegetation where possible.
- Reduction of visual contrast of the Project to the greatest extent feasible.
- Utilization of a native and/or naturalized plant palette to assimilate the Facility into its surroundings and provide ecological benefit.

VISUAL SCREENING

Selecting the appropriate visual barrier is dependent on the context of the surroundings. While opaque fencing may be well suited to a suburban setting, it would not be visually compatible with a rural landscape. Vegetative buffers, on the other hand, have precedent in agricultural and rural landscapes and would not appear out of place in most instances. The use of vegetation for screening ties in visually with natural vegetation buffering provided by stream corridors and forested areas within and surrounding the greater Project area.

NATIVE PLANT MATERIALS

Selecting plant materials native to a specific site or region provides the opportunity for greatest success. Native species are well suited for their site-specific climate, will require minimal maintenance over time and will have

the greatest likelihood to thrive. Planting native species allows the Facility to become visually integrated into its surrounding vegetation, while providing habitat, food, and shelter for other native species of insects, birds, and wildlife.

In addition to the buffer areas reserved for landscape mitigation, Powell Creek Solar intends to implement approximately 47.5 acres of meadow buffers throughout the Project area by planting a native seed mix comprised of native and naturalized grasses and forbs. Utilizing a native seed mix is a method to introduce a large amount of biodiversity to the site in a way that complements the existing landscape. Creating habitat for insects, birds, butterflies, and bees provides an ecological benefit to the surrounding monoculture of agricultural crops. These plantings provide cover, food, breeding, and feeding grounds for a variety of species. The meadow buffers will be strategically located throughout the site to meet the following objectives: to buffer a natural stream corridor within the Project area; to buffer areas between existing woodlots and the photovoltaic (PV) panel array area; and to convert a former agricultural field to a meadow. In addition to the ecological benefits, these areas help to soften the views of the solar facility while maintaining open views and vistas. The grasses and forbs included in the native seed mix can provide visual interest both while in bloom and when left to stand over winter.

Section III | Plant Material Selection & Maintenance

Existing vegetation in and around the site consists of mainly agricultural crops. Minimal forested areas, small stream banks, and a few sparse hedgerows also occur within the area. These areas consist mainly of deciduous vegetation with a mixture of evergreen species. The stands of existing vegetation provide key information in the plant palette species selection process.

PLANT MATERIAL MAINTENANCE

While the native and/or naturalized plant material outlined in this plan has been selected for its ability to blend into the existing landscape and reduce the need for prolonged maintenance, Powell Creek Solar has developed a strategy to assess the plant material health after initial installation to ensure the mitigation functions and ecological benefits outlined in this plan are achieved.

For shrub plantings, Powell Creek Solar will inspect the landscape mitigation plantings to identify plant materials that did not survive, appear unhealthy, and/or otherwise needs to be replaced. Powell Creek Solar will remove and replace plantings as necessary.

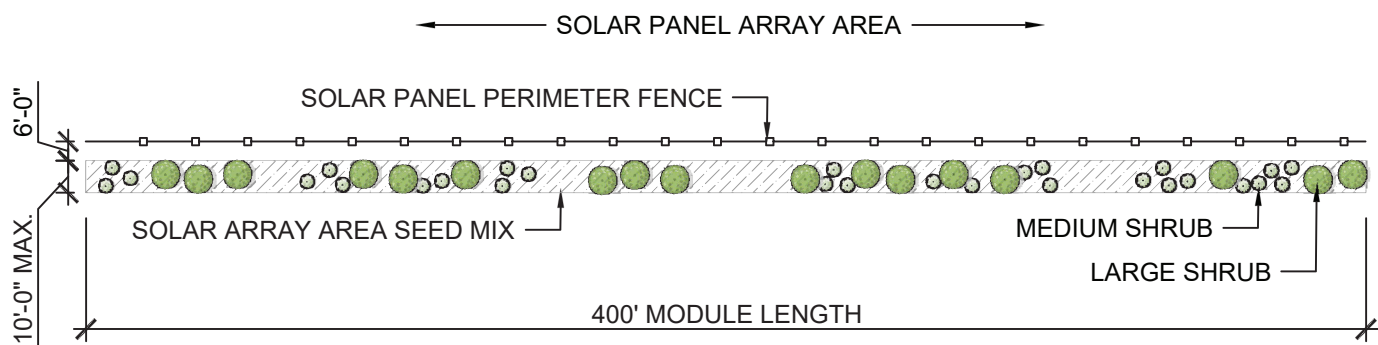
Powell Creek Solar will periodically evaluate and determine if the landscape mitigation planting is accomplishing the goals outlined in this plan. If the existing vegetation accomplishes these goals, no further action will be taken. If deemed insufficient, new planting or others means of screening will be installed. Maintenance may be performed to limit vegetation exceeding the height of the PV panels where Facility performance may be affected.

For all seed mix plantings, Powell Creek Solar will conduct periodic mowing to assist in the establishment and promote re-propagation, while eliminating successional growth.

Section IV | Concept Planting Module

Consisting of native and/or naturalized shrubs of varying scale and form, the concept planting module shown below has the ability to visually break up the horizontal line of the Facility infrastructure, and to provide partial to full screening of the fence line and PV array from certain vantage points. The proposed shrubs help visually integrate the Facility into its surrounding context, and may be maintained to meet, but not exceed, the height of the PV panels. Long views and open sky over the top of the solar facility will be retained, preserving important vistas. The low-growing solar array grass and clover mix will provide texture interest, offering additional ground plane softening.

If excess soil is generated during Facility construction, some of that soil may be used to create earthen berms within proposed landscape mitigation areas. In response to this possibility, the sample plant schedules presented below offer two types of planting palettes: one for plants installed at exisitng grade and another for plants to be installed on berms.

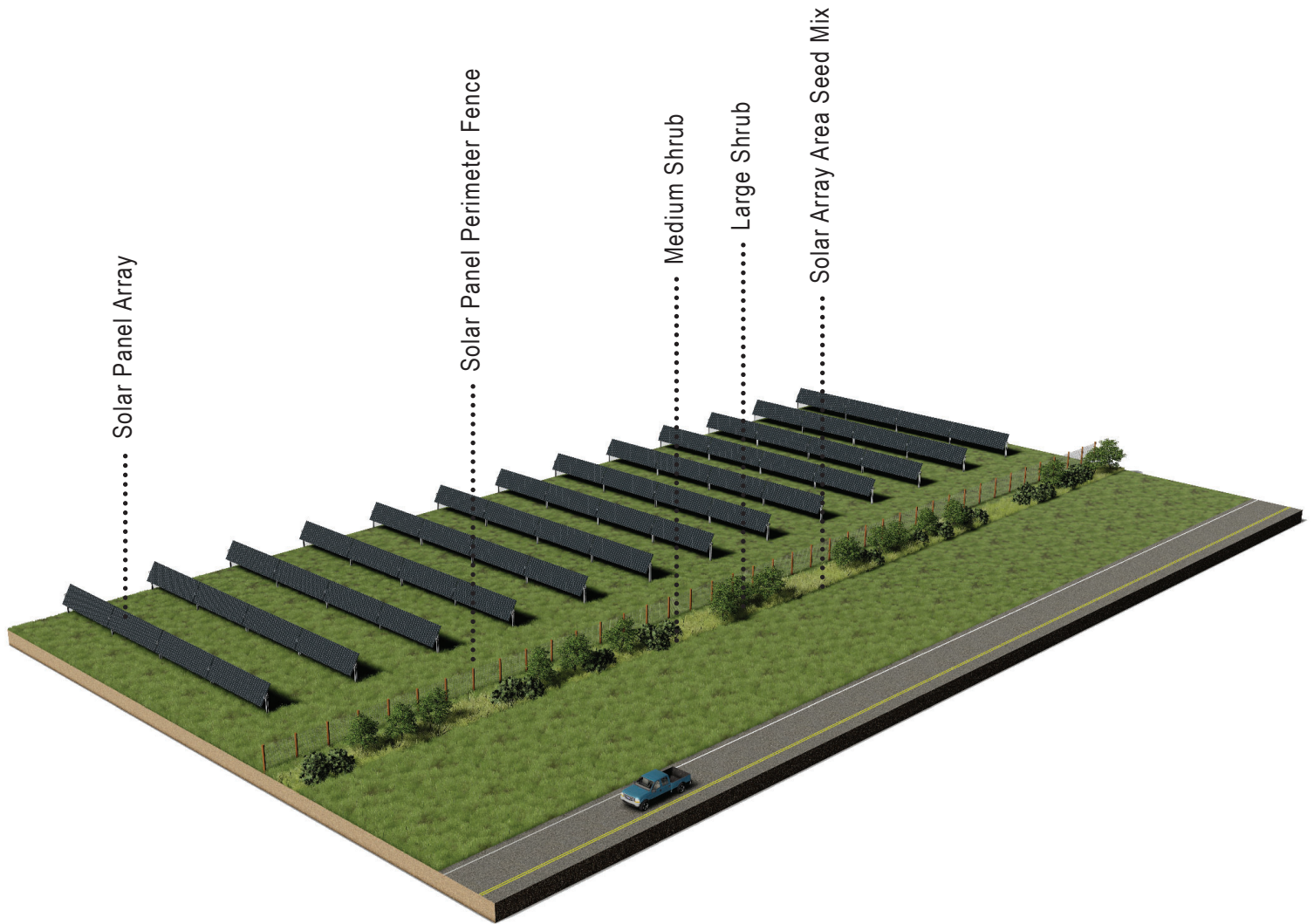


-  **LARGE SHRUBS (AT GRADE)**
 - Cornus racemosa* / Gray Dogwood
 - Cornus amomum* / Silky Dogwood
 - Sambucas canadensis* / American Elderberry
 - Viburnum lentago* / Nannyberry

-  **MEDIUM SHRUBS (AT GRADE)**
 - Aronia melanocarpa* / Black Chokeberry
 - Cornus sericea* / Red Twig Dogwood
 - Corylus americana* / American Hazelnut
 - Physocarpus opulifolius* / Ninebark

- LARGE SHRUBS (ON BERM)**
 - Cornus racemosa* / Gray Dogwood
 - Rhus copallina* / Flameleaf Sumac
 - Viburnum dentatum* / Arrowwood

- MEDIUM SHRUBS (ON BERM)**
 - Cephalanthus occidentalis* / Buttonbush
 - Myrica pensylvanica* / Bayberry
 - Rhus aromatica* / Fragrant Sumac

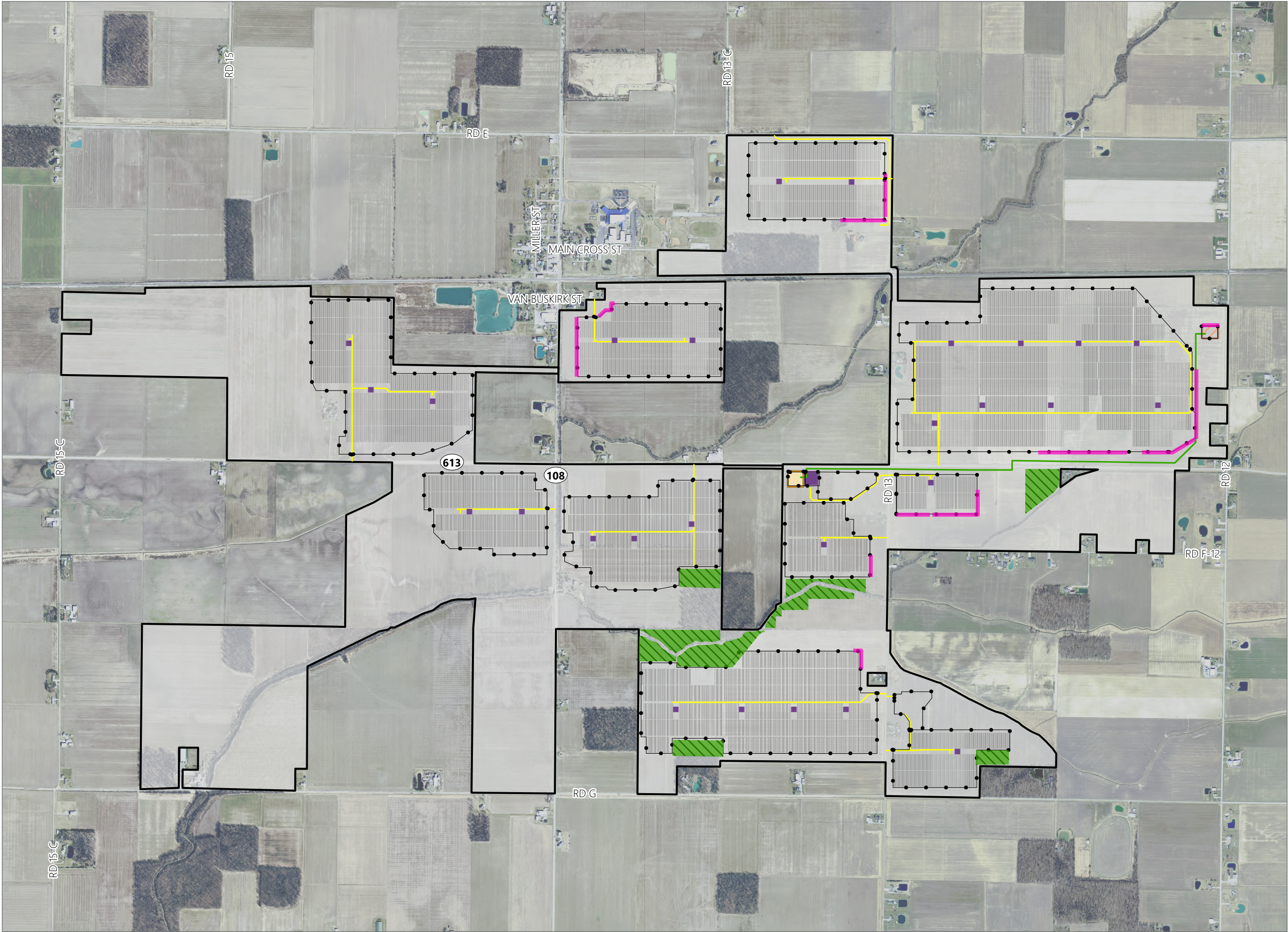


Concept Planting Module | Sample Illustration (shown at approximately 5 years after installation, for plant massing purposes only)

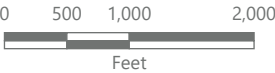
Section V | Landscape Module Location Plan

Powell Creek Solar

Liberty and Palmer Townships,
Putnam County, Ohio



- Landscape Mitigation Planting
- Native Seeding Area
- Inverter
- Fenceline
- Access Road
- Transmission Line
- Collection Substation
- O&M Building
- POI Substation
- PV Panel Area
- Project Area



Prepared August 28, 2023
Basemap: OSIP "Best Available 1 ft" orthoimagery map service

Section VI | Lighting Strategy

Powell Creek Solar intends to provide sufficient lighting for the safety and security of the Facility and its operation, while minimizing light pollution (glare, skyglow, clutter, and light trespass). All lighting appurtenances will be selected for the purposes of conserving energy, limiting excessive lighting levels, preserving community character, and consistency with local lighting ordinances. The Facility will follow International Dark-Sky Association (IDA) recommendations when practicable.

CONSTRUCTION LIGHTING

Construction lighting will be required where necessary for the safety of standard equipment operation and will be regularly maintained as required for worker safety. Fixed light poles will be installed to service laydown yards and the material receiving area along State Route 613, and may remain in use during Facility operation. Facility construction will typically occur between the hours of 7:00 a.m. and 5:30 p.m. but may extend from dawn to dusk. Supplemental lighting will be required to illuminate active work sites during limited periods of low-light or night-time construction work and will include standard equipment lighting such as illuminated controls, headlights, affixed floodlights, and portable floodlights mounted on temporary structures. Non-essential lighting will be powered down at dusk. Where practicable, lights will be directed inwards toward the site, away from adjacent roads and residences.

Security lighting will also be required to enhance security measures for temporary construction trailers, equipment, and laydown yards. Solar powered light and security units may be used. Where practicable, lights will be directed inwards toward the site, away from adjacent roads and residences.

OPERATIONAL LIGHTING

Minimal lighting is required for the general operation of the Facility. Site plans will be developed by the Applicant showing the final locations of the Facility lighting, which is expected to include permanent fixtures at the Facility substation and the on-site O&M building. Lighting fixtures will utilize motion sensors and/or will be automatically timed for illumination from dusk till dawn to prevent excess lighting beyond the time for which it is required. To the extent practicable, lighting fixtures will be directed inward toward the Facility. All outdoor lighting will be maintained in good working order and in a manner that serves the original design intent of the system.

Inverter Lighting

Permanent lighting will not be installed at Facility inverters; however, the units will feature illuminated controls for the purpose of status monitoring. The impacts of this lighting are not anticipated to be visible off-site.

Substation Lighting

The Facility will utilize two main zones of lights that are controlled electronically from the substation control house. One set of lights allows employees to transit from the access gate to the control house. These lights are temporarily turned on outside the substation via a push button that electrically starts a timer, and will allow time for employees to get to the control house. The second set of lights are for the substation area, and will allow movement through the substation and work to be completed on equipment. These lights are turned on electrically from the control house by employees and turned off when work is completed. As an additional precaution, the lights will automatically turn off the following day if inadvertently left on overnight. There are small motion activated lights located above doorways to provide safe ingress and egress of buildings. All lights are positioned throughout the substation to provide illumination near equipment and walkways. The two zones of lights will be mounted on light poles or steel structures and will be tilted downward. Lights near fence lines will utilize visors to direct light into the substation.

Section VII | Conclusions

LANDSCAPE MITIGATION

Mitigation of visual impacts is an important component of the development of a solar facility. Providing a vegetative buffer helps to mitigate contrast in forms, color, and texture and to preserve the overall scenic quality and integrity of the site. The concept planting module demonstrates potential landscape mitigation to be incorporated into the Project. In addition to the visual mitigation provided, the incorporation of native seed mix buffer areas further enhances ecological benefits through habitat creation and increased biodiversity.

It is anticipated that the concepts included in this plan would result in successful intermittent screening and softening of views of the project. However, appropriate site soils, the presence of utilities, material availability, and input from the Project stakeholders may result in alterations or substitutions to the proposed planting modules.

LIGHTING

Lighting will be limited in terms of quantity of fixtures and lighting levels to the minimum operational standards required for safety and regular operation. While Powell Creek Solar aims to reduce impacts of lighting outside the Facility, some light sources may be visible from neighboring properties during Facility construction, operation, and/or decommissioning. Any and all complaints from the surrounding community will be addressed immediately by the Site Manager or Construction Manager to discover a solution that resolves issues or concerns, while not sacrificing worker safety by removing lighting that reduces visibility for the trade/craft professionals. Powell Creek Solar will provide a means to receive and promptly respond to complaints regarding potential lighting impacts over the life of the Facility, as outlined in the Facility's Complaint Resolution Plan.

**This foregoing document was electronically filed with the Public Utilities
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Summary: Notice of Compliance - Part 1 electronically filed by Teresa Orahod on
behalf of Herrnstein, Kara.