

Exhibit X

Preliminary Inadvertent Return (Frac-Out) Plan

Nottingham Solar LLC: Preliminary Inadvertent Return (Frac Out) Plan

Township of Athens, Ohio

July 2021

C&A #5204.24



Crawford & Associates

Engineering & Land Surveying, PC

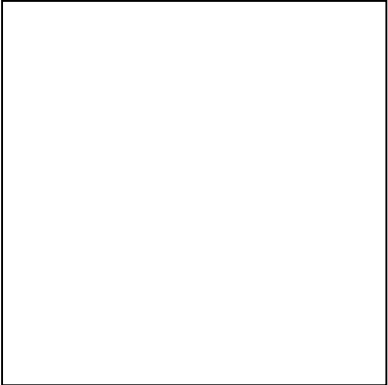
4411 Route 9, Suite 200 • Hudson, NY 12534

Tel: (518) 828-2700 • Fax: (518) 828-2723

www.crawfordandassociates.com

Report History

Rev #	Date	Prepared By	Checked By	Approved By	Description
0	7/21/21	CSJ	JSC		Preliminary, Not for Construction



IT IS A VIOLATION OF THE OHIO STATE EDUCATION LAW FOR ANY PERSON TO ALTER THESE PLANS, SPECIFICATIONS, OR REPORTS IN ANY WAY, UNLESS THEY ARE ACTING UNDER THE DIRECTION OF A LICENSED PROFESSIONAL ENGINEER.

TABLE OF CONTENTS

I.	Introduction and Purpose	1
II.	Description of Work	2
III.	HDD Site Supervisor and Environmental Monitor Responsibilities	2
IV.	Equipment and Containment Materials	3
V.	Training	4
VI.	Drilling Procedures	4
VII.	Vacuum Truck	5
VIII.	Field Response to Frac-out Occurrence	5
IX.	Response to Close-Out Procedures	6
X.	Construction Re-start	7
XI.	Bore Abandonment	7
XII.	Notification	7
XIII.	Documentation	8
XIV.	Project Completion and Clean-up	8

I. Introduction and Purpose

Nottingham Solar LLC (the "Applicant") is proposing to construct a photovoltaic (PV) solar energy facility (the "Facility") in Harrison County, Ohio. Crawford & Associates Engineering & Land Surveying, P.C. (C&A) was retained to develop the Preliminary Inadvertent Return Plan (the "Plan") for the Facility. This Plan has been prepared to minimize and mitigate potential environmental impacts that could arise during horizontal directional drilling (HDD) activities. The Plan is intended for use when drilling under or near a surface waterbody or wetland, or where otherwise required by the regulatory agencies.

HDD is a trenchless method of installing underground pipe, conduit, or cables along a prescribed underground path using a surface-launched drilling rig. The HDD method was chosen because it has proven to be a safe and efficient method to route electric collection lines under potential obstacles including existing wetlands, drainage courses, public roads, railroads, and other environmentally sensitive areas with minimal surface impact. The HDD process involves the use of water and bentonite (a naturally occurring clay) slurry as a coolant and lubricant for the advancing drill head. The slurry also helps to stabilize the bore and aids in the removal of cuttings during the drilling process.

In rocky and sandy soils, HDD operations have a potential to release drilling fluids into the surface environment through inadvertent releases, commonly known as "Frac-outs," which involve the release of drilling mud through fractured bedrock into the surrounding rock and sand that then travels toward the surface. In impervious, heavy clay soils, more typical of the Facility Site, drilling mud has limited ability to infiltrate through into surrounding soils. Further, because drilling mud consists largely of a bentonite clay water mixture, it is not classified as toxic or a hazardous substance. However, if bentonite clay water mixture is released into surface water bodies, bentonite has the potential to adversely impact fish, fish eggs, aquatic plants, and benthic invertebrates.

While drilling fluid seepage associated with a Frac-out is most likely to occur near the bore entry and exit points where the drill head is shallow, Frac-outs can occur in any location along a directional bore. This Preliminary Inadvertent Return Plan (Plan) establishes operational procedures and responsibilities for the prevention, containment, and cleanup of Frac-outs associated with the use of HDD in conjunction with the construction of the Facility. All personnel and sub-contractors responsible for the work must adhere to this Plan during the directional drilling process.

The specific objectives of this Plan are to:

- Minimize the potential for a Frac-out associated with directional drilling activities;
- Provide for the timely detection of Frac-outs;
- Protect environmentally sensitive areas including but not limited to water wells, surface water bodies, wetlands and wetland buffer areas, while responding to an inadvertent release;
- Ensure an organized, timely, and "minimum-impact" response in the event of a Frac-out and release of drilling bentonite; and

- Ensure that all appropriate notifications are made immediately to the appropriate management and safety personnel.

II. Description of Work

Drilling operations will be halted by the drill rig operators immediately upon detection of a drop in drilling pressure or other evidence of a Frac-out. The clean-up of all spills shall begin immediately. A spill kit shall be onsite and used if a Frac-out occurs. Containment materials, such as straw bales, shall also be onsite prior to and during all operations and a vacuum truck will be readily available nearby. In the event of a Frac-out, the HDD Site Supervisor will conduct an evaluation of the situation and direct recommended mitigation actions, based on the following guidelines:

- The Applicant's Administrative Manager (AM), Environmental Monitor (EM), and the HDD Site Supervisor's General Construction Manager (GCM) shall be notified immediately of any spills and shall be consulted regarding clean-up procedures.
- If the Frac-out is minor, easily contained, has not reached the surface and is not threatening sensitive resources, drilling operations may resume after use of a leak stopping compound or redirection of the bore;
- If the Frac-out has reached the surface, field response procedures shall be followed as defined in Section VIII.
- The Applicant's EM shall be responsible for any necessary follow-up response actions in coordination with the Ohio Environmental Protection Agency (OEPA) and Ohio Power Siting Board, as defined in Section XII. The HDD Site Supervisor will coordinate the mobilization of equipment stored nearby (e.g., vacuum trucks) on an as needed basis.

III. HDD Site Supervisor and Environmental Monitor Responsibilities

The HDD Site Supervisor shall be an employee of the drilling contractor and has overall responsibility for implementing this Plan. The HDD Site Supervisor will ensure that all employees involved in HDD activities are trained prior to commencing drilling. The HDD Site Supervisor shall be notified immediately when a Frac-out is detected. The HDD Site Supervisor will be responsible for informing the Applicant's AM & EM, and the appropriate GCM, about Frac-out incidents and coordinating personnel, response, cleanup, and disposal of recovered material. The Applicant's EM will be responsible for OEPA and ACOE notification. The HDD Site Supervisor shall ensure all waste materials are properly containerized, labeled, and removed from the site to an approved disposal facility by personnel experienced in the removal, transport and disposal of drilling mud.

The HDD Site Supervisor shall be familiar with all aspects of the drilling activity, the contents of this Inadvertent Return Plan and the conditions of approval under which the activity is permitted to take place. The HDD Site Supervisor shall have the authority to stop work and commit the resources (personnel and equipment) necessary to implement this Plan. The HDD Site Supervisor shall assure that a copy of this Plan is available onsite and accessible to all construction personnel. The HDD Site Supervisor shall ensure that

all workers engaged in drilling-related activities are properly trained and familiar with the necessary procedures for response to a Frac-out, prior to commencement of drilling operations.

The Applicant is committed to ensuring compliance with all applicable environmental requirements and will provide funding for an independent, third party Environmental Monitor (EM). The EM will closely supervise the progress and actions of the HDD Site Supervisor. The EM will be onsite and available during HDD operations to consult with HDD personnel and conduct inspections. The HDD Site Supervisor will promptly notify the EM when an inadvertent release is suspected or detected. In addition to the HDD Site Supervisor, the EM will also have the authority to stop work, evaluate the situation, and determine the appropriate measures necessary to address an inadvertent release.

IV. Equipment and Containment Materials

The HDD Site Supervisor shall ensure that the following equipment and containment material procedures are followed, and the EM shall have the authority to audit the implementation of these procedures at their discretion.

- All equipment and vehicles used for HDD are to be checked and maintained daily to prevent leaks of hazardous materials;
- Spill kits and spill containment materials are available on-site at all times and that the equipment is in good working order;
- Equipment required to contain and clean up a Frac-out release will either be available at the work site or readily available at an offsite location within 15 minutes of the bore site; and
- If equipment is required to be operated near a surface waterbody or wetland, absorbent pads and plastic sheeting for placement beneath motorized equipment shall be used to protect the riverbed from engine fluids.

At a minimum, the following containment, response, and clean-up equipment will be available at each HDD crossing location at the time such crossings occur for use in the event of an accidental release of drilling fluids:

- spill kit;
- straw bales;
- silt fence;
- plastic sheeting;
- turbidity barriers;
- sandbags;
- shovels;
- buckets;

- push brooms;
- squeegees;
- pumps and suction hose;
- discharge hose;
- storage tanks; and,
- vacuum truck readily available nearby

V. Training

Prior to the start of construction, the HDD Site Supervisor, shall ensure that the crew members engaged in HDD receive training in the following:

- The provisions of this Plan, equipment maintenance and site specific permit and monitoring requirements;
- Locations of sensitive environmental resources at the HDD site;
- Inspection procedures for release prevention and containment equipment and materials;
- Means of detecting the occurrence of a Frac-out;
- Contractor/crew obligation to immediately stop the drilling operation upon first evidence of the occurrence of a Frac-out and to immediately report any Frac-out releases to the HDD Site Supervisor;
- Contractor/crew member responsibilities in the event of a release;
- Operation of release prevention and control equipment and the location of release control materials, as necessary and appropriate; and
- Protocols for communication with the Applicant's EM and any appropriate regulatory agency representatives who might be on-site during the clean-up effort.

VI. Drilling Procedures

The Inadvertent Return Plan shall available on-site during all construction. The HDD Site Supervisor shall be on-site at any time that drilling is occurring or is planned to occur. The following procedures shall be followed each day, prior to the start of work. The HDD Site Supervisor shall ensure that a job briefing meeting is held at the start of each day of drilling to review the appropriate procedures to be followed in case of a Frac-out. Questions shall be answered and clarification given on any point over which the drilling crew or other Facility staff have concerns.

Drilling pressures shall be closely monitored so they do not exceed those needed to penetrate the formation. Pressure levels shall also be monitored by the operator. Pressure levels shall be set at a minimum level to prevent Frac-outs. During the pilot bore, maintain the drilled annulus. Cutters and reamers will be pulled back into previously drilled sections after each new joint of casing is added. Drilling fluid circulation

shall be maintained to the extent practical.

Exit and entry pits shall be enclosed by silt fences and straw. A spill kit shall be on-site and used if a Frac-out occurs. A vacuum truck shall be readily available nearby prior to and during all drilling operations. Containment materials (straw, silt fencing, sandbags, Frac-out spill kits, etc.) shall be staged on-site at a location where they are readily available and easily mobilized for immediate use in the event of an accidental Frac-out. If necessary, barriers (straw bales or sedimentation fences) between the bore site and the edge of the water source shall be constructed prior to drilling to prevent released bentonite material from reaching the water. Barriers should be used if the bore site grade is pitched directly to a surface waterbody or wetland. If it's reasonable that released bentonite won't flow into the waterbody, then no preventative barrier is needed.

Water containing mud, silt, bentonite, or other pollutants from equipment washing or other activities, shall not be allowed to enter a lake, flowing stream or any other water source. The bentonite used in the drilling process shall be either disposed of at an approved disposal facility or recycled in an approved manner. Other construction materials and wastes shall be recycled, or disposed of, as appropriate.

Once the drill rig is in place and drilling begins, the drill operator shall stop work whenever the pressure in the drill rig drops, or there is a lack of returns in the entrance pit. At this time, the HDD Site Supervisor shall be informed of the potential Frac-out. The HDD Site Supervisor and the drill rig operator(s) shall work to identify the likely location of the Frac-out. The location of the Frac-out shall be recorded and the Supervisor will note the measurements taken to address the concern. The following subsections shall be adhered to when addressing a Frac-out situation.

VII. Vacuum Truck

A vacuum truck shall be readily available nearby at a location from which it can be mobilized to contain the Frac-out before it enters either a surface waterbody or wetland. If working within the surface waterbody or wetland, the vacuum truck shall be staged such that it can be mobilized in enough time to ensure the Frac-out doesn't leave the HDD Site.

VIII. Field Response to Frac-out Occurrence

If an inadvertent release is suspected, the HDD Site Supervisor, as well as the Applicant's AM and EM, and the appropriate GCM, will be notified immediately to ensure appropriate response actions are taken and notifications are made. The HDD Site Supervisor and EM will conduct an evaluation of the situation. If no inadvertent release is detected, the driller will attempt to re-establish returns through standard HDD practice and continue HDD activity.

In the case where a Frac-out release occurs, the field crew shall act immediately in accordance with this Plan. All appropriate emergency actions that do not pose additional threats to sensitive resources will be taken as follows:

- Directional boring will stop immediately;
- The HDD Site Supervisor will be notified;

- The HDD Site Supervisor will notify the Applicant's AM and EM, and the responsible GCM;
- The bore stem will be pulled back to relieve pressure on Frac-out;
- The HDD Site Supervisor and EM shall evaluate the situation and recommend the type and level of response warranted, including the level of notification required;
- If inadvertent returns occur in upland areas, the fluids shall be immediately contained and collected;
- If the amount of drilling fluids released is not enough to allow practical collection, the affected area will be diluted with freshwater and allowed to dry and dissipate naturally;
- If the amount of surface return exceeds that which can be collected using small pumps, drilling operations shall be suspended until surface volumes can be brought under control;
- If inadvertent drilling fluids surface returns occur in an environmentally sensitive area (i.e. wetlands and water bodies) the returns shall be monitored and documented by the EM;
- Drilling operations must be suspended if the surface returns may result in a violation of water quality standards or Certificate Conditions;
- If the Frac-out is minor, easily contained, has not reached the surface and is not threatening sensitive resources, a leak stopping compound shall be used to block the Frac-out. If the use of leak stopping compound is not fully successful, the bore stem shall be redirected to a new location along the desired drill path where a Frac-out has not occurred;
- If the Frac-out has reached the surface, any material contaminated with bentonite shall be removed manually using shovels and other similar equipment to a depth of 2 feet, contained and properly disposed of, as required by law. A dike or berm may be constructed around the Frac-out to entrap released drilling fluid, if necessary. Clean sand shall be placed, and the area returned to pre-construction contours;
- Removal of released fluids from environmentally sensitive areas will take place only if the removal does not cause additional adverse impacts to the resource. Prior to the removal of fluids from environmentally sensitive areas OPSB and OEPA staff will be notified and consulted;
- Any drilling fluid inadvertently discharged must be removed from agricultural areas; and
- If a Frac-out reaches the surface and becomes widespread, the HDD Site Supervisor shall authorize a readily accessible vacuum truck to be mobilized. The vacuum truck may be positioned at either end of the line of the drill so that the Frac-out can be reached by crews on foot and the contaminated soils vacuumed up.

IX. Response to Close-Out Procedures

When the release has been contained and cleaned up, response closeout activities will be conducted at



the direction of the HDD Site Supervisor and approval of the EM, and shall include the following:

- The recovered drilling fluid will either be recycled or hauled to an approved facility for disposal. No recovered drilling fluids will be discharged into streams, storm drains or any other water source;
- All Frac-out excavation and clean-up sites will be returned to pre-construction contours using clean fill, as necessary; and
- All containment measures (fiber rolls, straw bales, etc.) will be removed, unless otherwise specified by the HDD Site Supervisor.

X. Construction Re-start

For small releases not requiring external notification, drilling may continue if 100 percent containment is achieved using a leak stopping compound or redirection of the bore and the clean-up crew remains at the Frac-out location throughout the construction period.

For releases requiring external notification and/or other agencies, construction activities will not restart without prior approval from the Applicant.

XI. Bore Abandonment

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

XII. Notification

In the event of a Frac-out that reaches a water source, the HDD Site Supervisor will notify the AM, EM, and the responsible GCM. The EM shall be responsible for notifying the appropriate resource agencies (i.e., the Ohio Environmental Protection Agency and/or the United States Army Corps of Engineers). All agency notifications will occur within 24 hours and proper documentation will be accomplished in a timely and complete manner. The following information will be provided to the agencies:

- Name and telephone number of person reporting;
- Location of the release;
- Date and time of release;
- Type and quantity, estimated size of release;
- How the release occurred;
- The type of activity that was occurring around the area of the Frac-out;
- Description of any sensitive areas and their location in relation to the Frac-out;
- Description of the methods used to clean up or secure the site;
- Plan for disposing of Frac-out residuals; and

- Listing of the current permits obtained for the Facility.

Prior to conducting HDD or other trenchless methods, typical material safety data sheets will be provided to the OPSB and OEPA staff.

If inadvertent drilling fluids surface returns occur in an environmentally sensitive area OPSB and OEPA Staff shall be notified immediately and a monitoring report summarizing the location of surface returns, estimated quantity of fluid and summary of cleanup efforts shall be submitted within 48 hours of the occurrence.

All employees and subcontractors will adhere to the following protocols when permitting regulatory agency personnel arrive on site. Regulatory agency personnel will be required to comply with appropriate safety rules. Only the Applicant's EM shall coordinate communication with regulatory agency personnel.

XIII. Documentation

The HDD Site Supervisor shall record the Frac-out event in his or her daily log. The log will include the information listed in Section XII above and shall be provided to the Applicant's AM at the completion of HDD work.

If inadvertent drilling fluids surface returns occur in an environmentally sensitive area (i.e. wetlands and water bodies) the returns shall be monitored and documented by the EM.

XIV. Project Completion and Clean-up

- All materials and any construction debris shall be removed from the construction zone at the end of each workday and recycled or disposed of at an appropriately permitted facility;
- 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 at the completion of HDD activities, unless otherwise specified by the HDD Site Supervisor;
- The HDD Site Supervisor will be responsible for ensuring that the recovered drilling fluid is either recycled or disposed of at an approved facility. No recovered drilling fluids will be discharged into streams, storm drains, or any other water source;
- All emergency excavation and clean-up sites will be returned to natural contours as necessary using clean fill;
- The EM will notify and coordinate any necessary follow-up response with agency representatives.



Crawford & Associates
Engineering & Land Surveying, PC
4411 Route 9, Suite 200 • Hudson, NY 12534
Tel: (518) 828-2700 • Fax: (518) 828-2723
www.crawfordandassociates.com