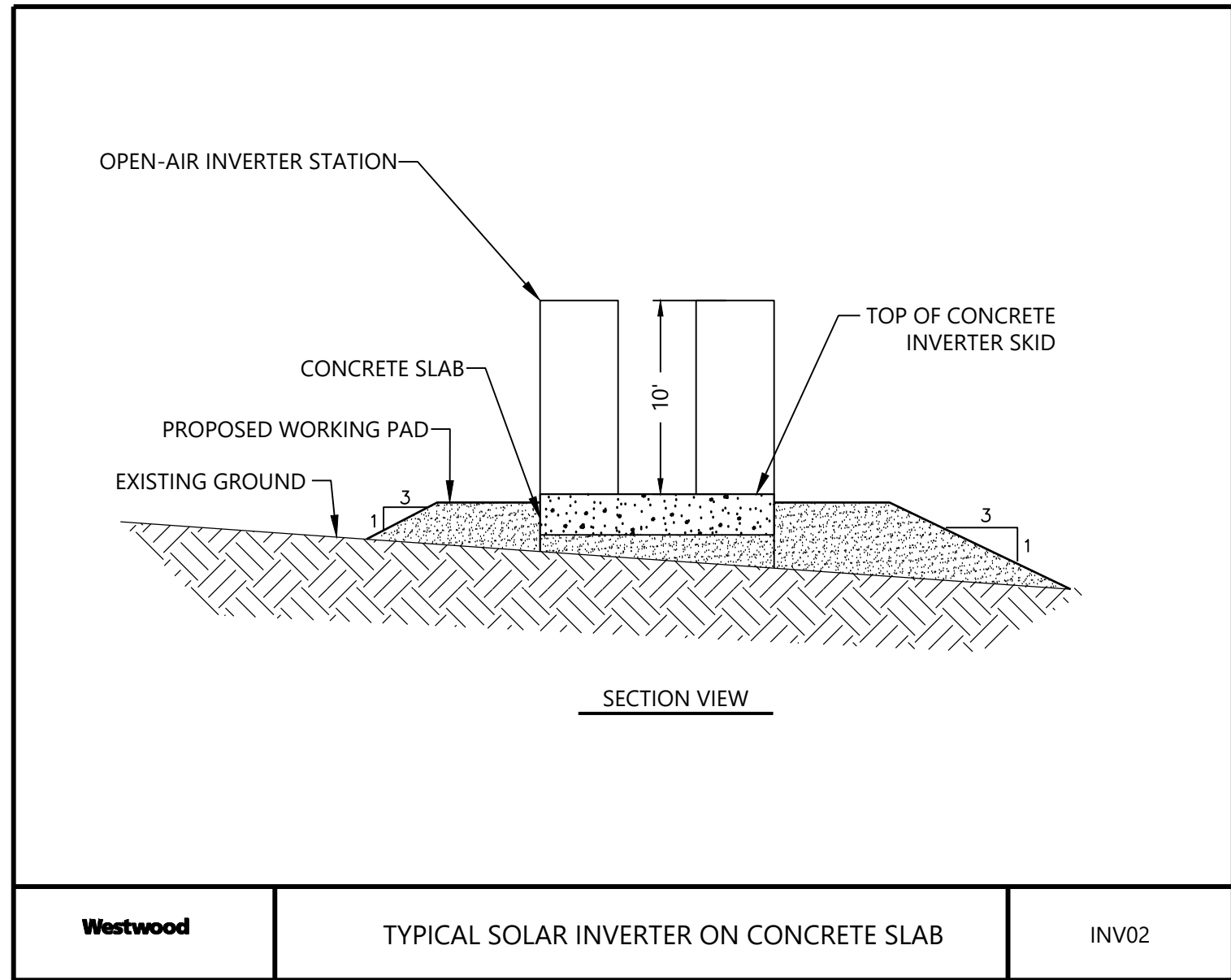
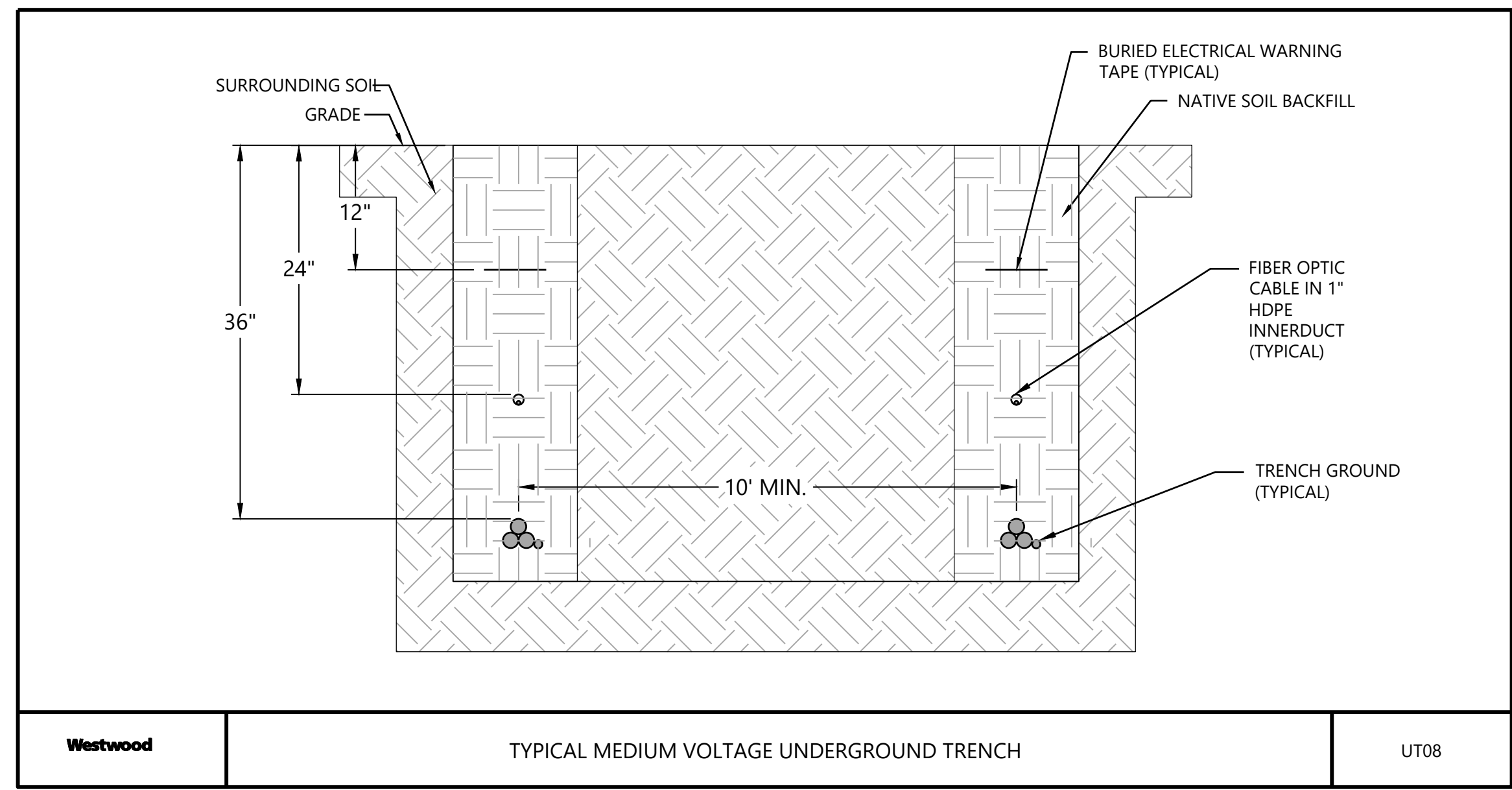


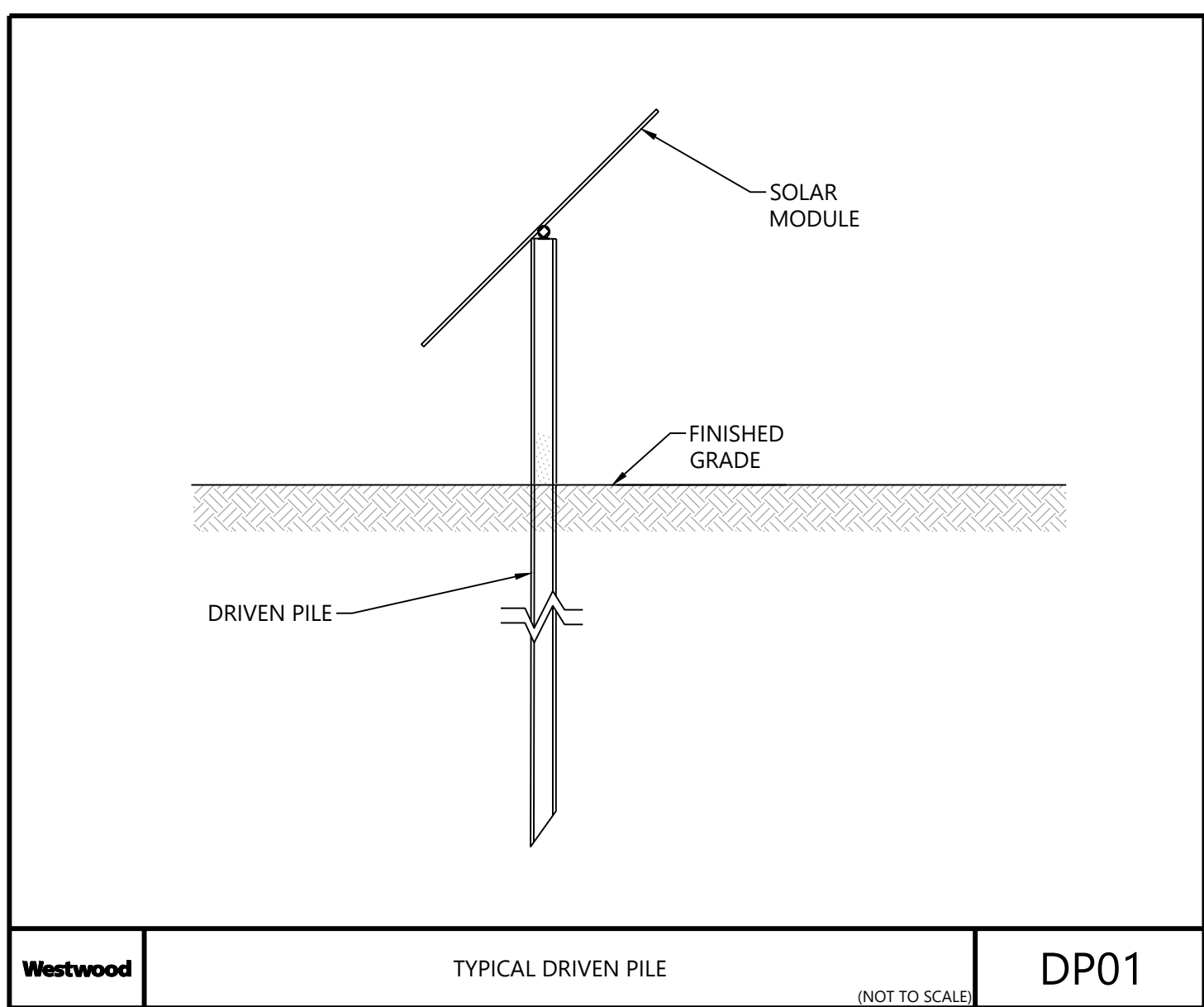
Westwood TYPICAL SOLAR INVERTER ON DRIVEN PILES INV01



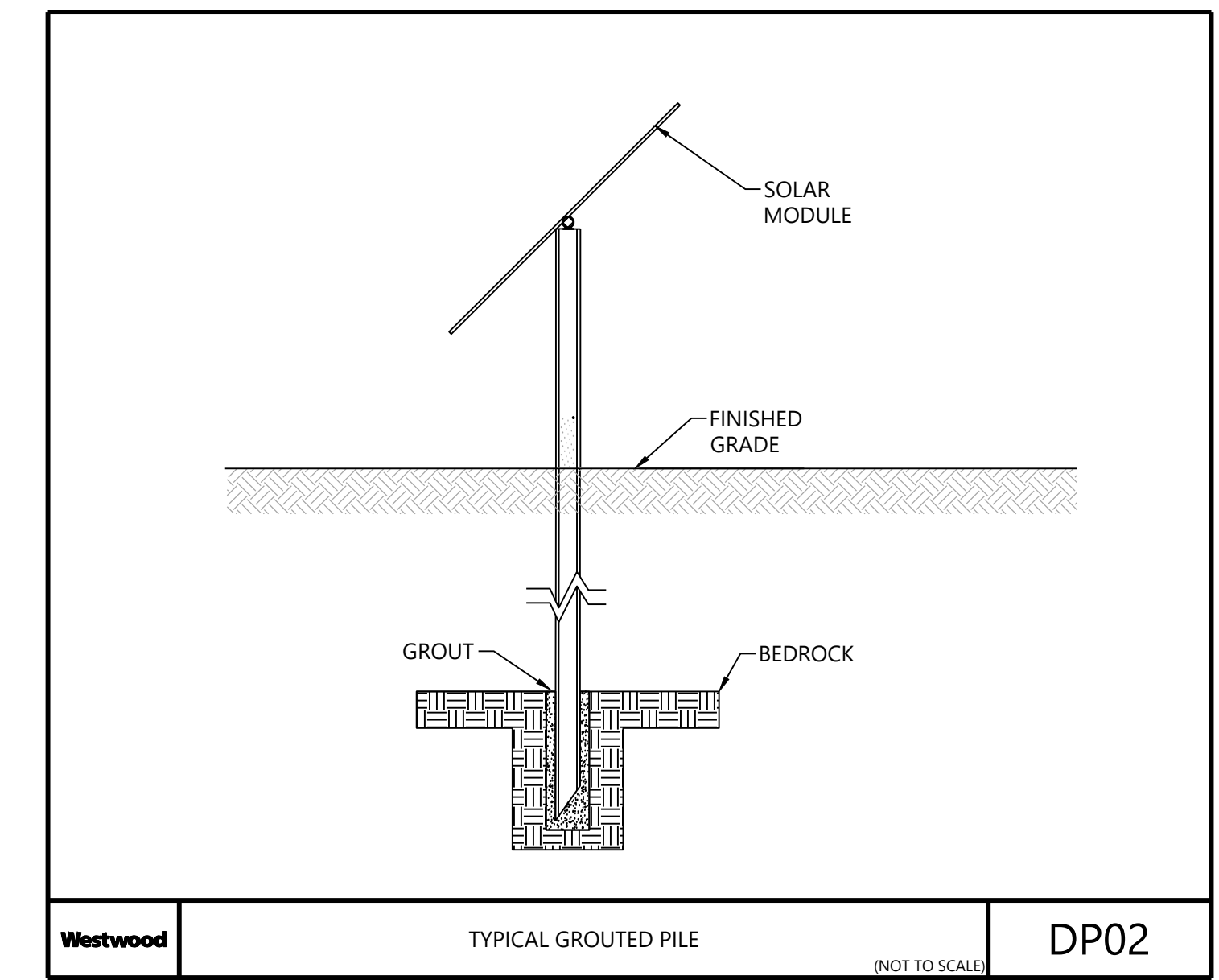
Westwood TYPICAL SOLAR INVERTER ON CONCRETE SLAB INV02



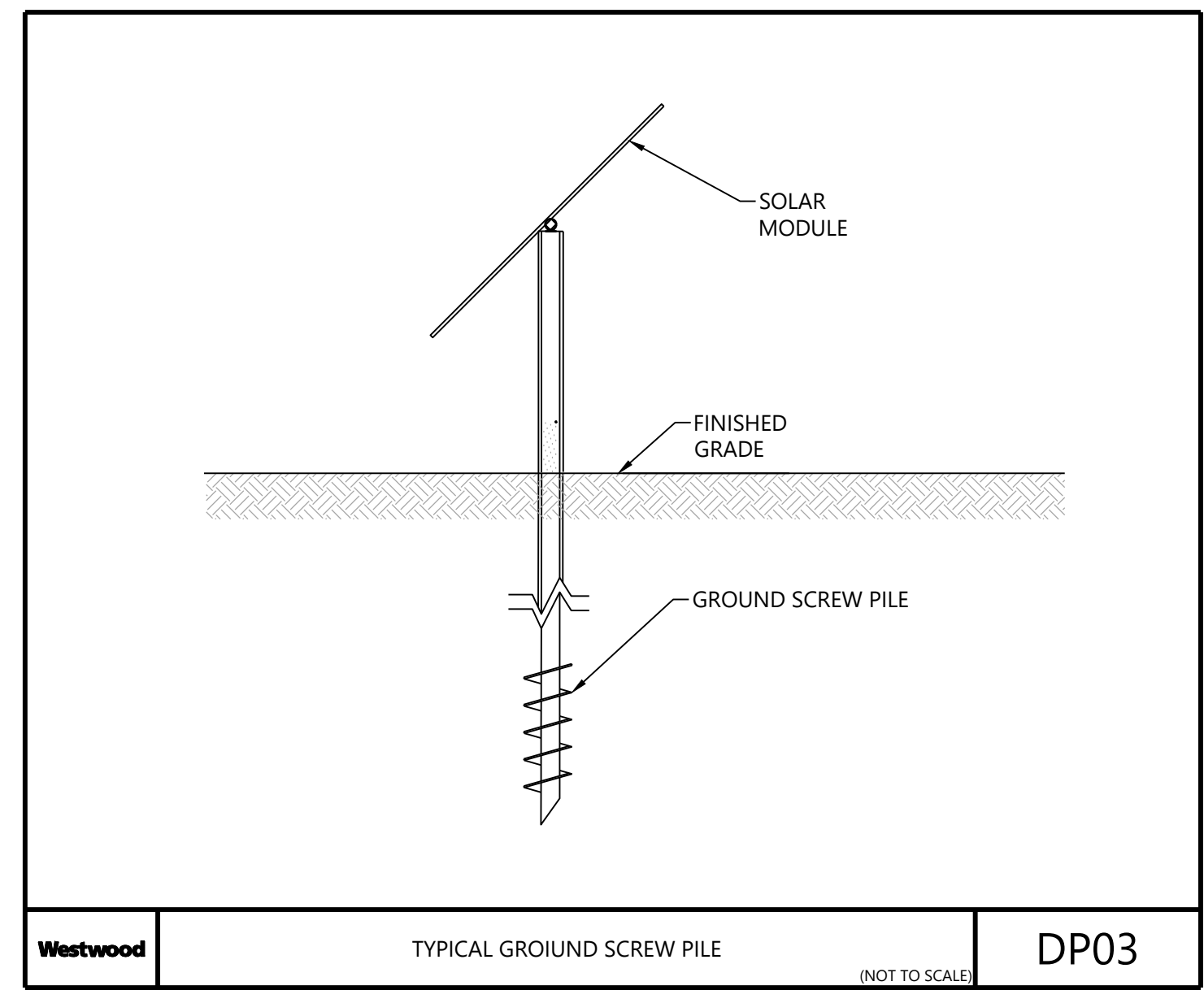
Westwood TYPICAL MEDIUM VOLTAGE UNDERGROUND TRENCH UT08



Westwood TYPICAL DRIVEN PILE (NOT TO SCALE) DP01



Westwood TYPICAL GROUDED PILE (NOT TO SCALE) DP02



Westwood TYPICAL GROUDED SCREW PILE (NOT TO SCALE) DP03

PREPARED FOR:



700 Universe Blvd,  
 Juno Beach, FL 33408

REVISIONS:

#	DATE	COMMENT
A	05/03/2021	ISSUED FOR REVIEW

## North Side Energy Center

Towns of Massena, Brasher, and Norfolk, St. Lawrence County

Construction Details - 4

PRELIMINARY  
 NOT FOR CONSTRUCTION

DATE: 05/03/2021

SHEET: C.603

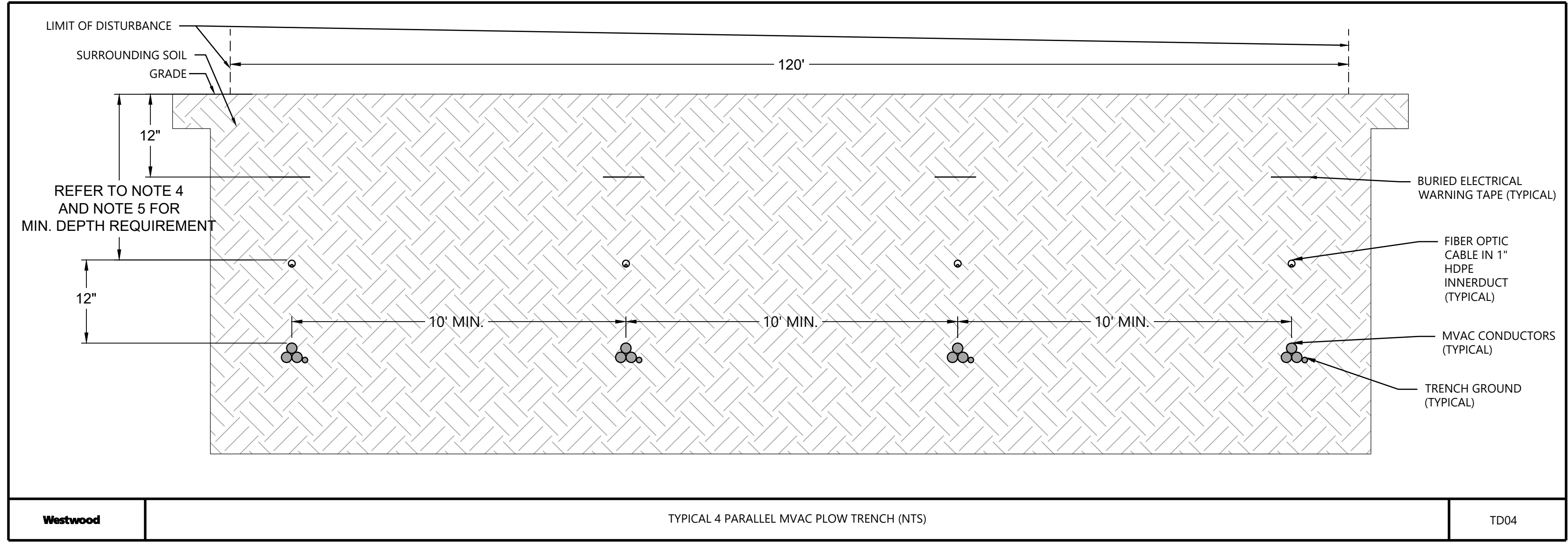
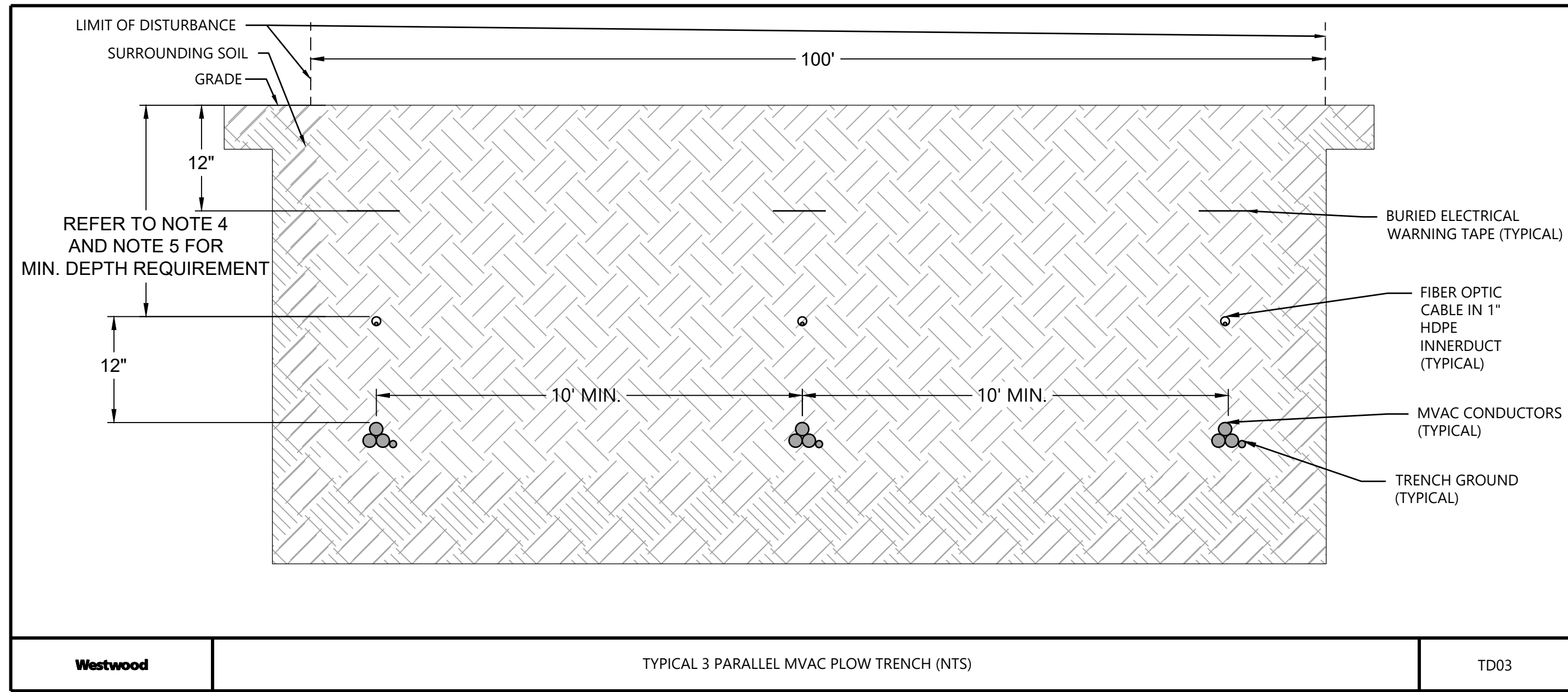
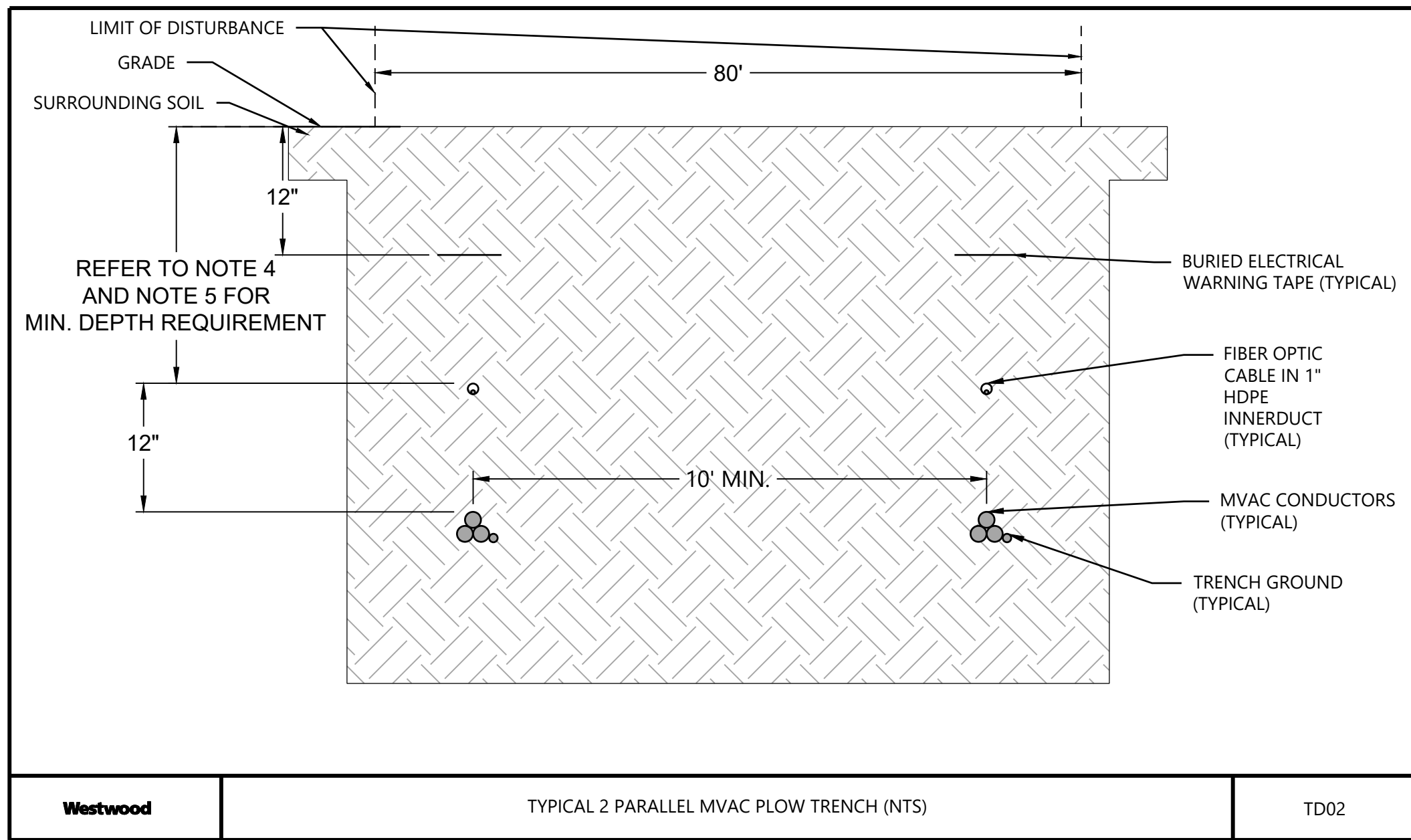
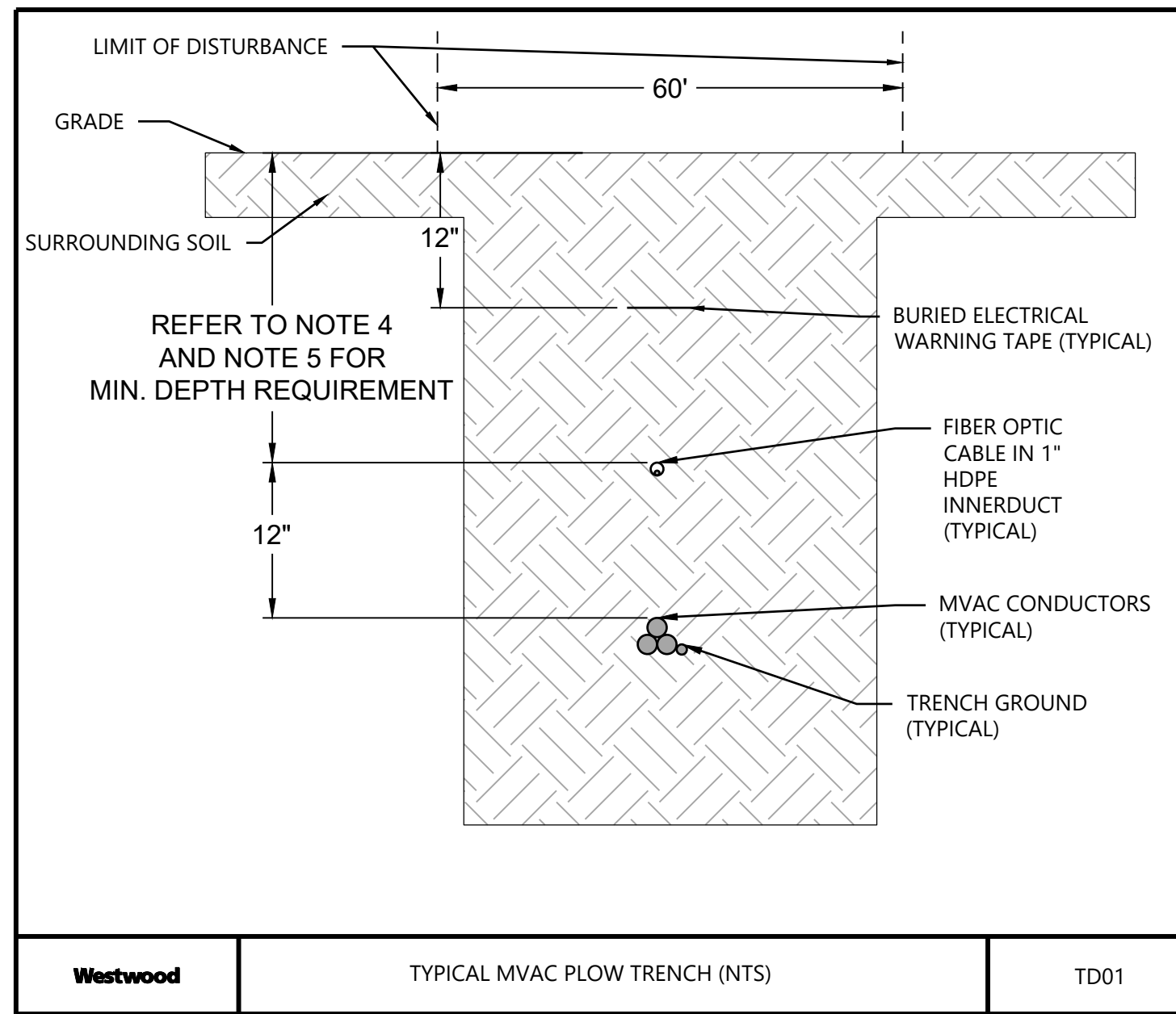
PREPARED FOR:



700 Universe Blvd,  
 Juno Beach, FL 33408

REVISIONS:

#	DATE	COMMENT
A	05/03/2021	ISSUED FOR REVIEW



**NOTES:**

- TRENCHES AND BACKFILL SHALL BE FREE OF ROCK, STUMPS, LARGE ROOTS OR ANY OTHER MATERIAL LARGER THAN 3/8" IN DIAMETER THAT CAN CAUSE DAMAGE TO CABLE JACKETS OR INSULATION.
- TYPICAL MVAC TRENCHES SHALL BE MINIMUM 2.5' AWAY FROM PILES. TRENCHES THAT ARE WITHIN 2.5' OF PILES SHALL BE COMPACTED TO 95%.
- BACKFILL LIFTS SHALL NOT EXCEED 12".
- ALL BURIED UTILITIES LOCATED WITHIN THE GENERATION FACILITY'S SECURITY FENCE MUST HAVE A MINIMUM DEPTH OF 36" IF DIRECT BURIED AND MINIMUM DEPTH OF 18" IF BURIED IN A CONDUIT.
- ALL BURIED UTILITIES LOCATED OUTSIDE OF THE GENERATION FACILITY SECURITY FENCE:
  - IN CROPLAND, HAYLAND, AND IMPROVED PASTURE BURIED ELECTRIC CONDUCTORS MUST HAVE A MINIMUM DEPTH OF 48" OF COVER, IN AREAS WHERE THE DEPTH OF SOIL BEDROCK IS LESS THAN 48", THE ELECTRIC CONDUCTORS MUST BE BURIED BELOW THE SURFACE OF THE BEDROCK IF FRIABLE/RIPPABLE, OR AS NEAR AS POSSIBLE TO THE SURFACE OF THE BEDROCK.
  - IN UNIMPROVED GRAZING AREAS OR ON LAND PERMANENTLY DEVOTED TO PASTURE THE MINIMUM DEPTH OF COVER MUST BE 36".
  - WHERE ELECTRICAL CONDUCTORS ARE BURIED DIRECTLY BELOW THE GENERATION FACILITY'S ACCESS ROAD OR IMMEDIATELY ADJACENT (AT ROAD EDGE) TO THE ACCESS ROAD, THE MINIMUM DEPTH OF COVER MUST BE 36" IF DIRECT BURIED AND 24" IF BURIED IN CONDUIT. CONDUCTORS MUST BE CLOSED ENOUGH TO THE ROAD EDGE AS TO BE NOT SUBJECT TO AGRICULTURAL CULTIVATION/SUB-SOILING.
- WHEN OPEN-CUT TRENCHING IS PROPOSED, TOPSOIL STRIPPING IS REQUIRED FROM THE WORK AREA ADJACENT TO THE TRENCH (INCLUDING SEGREGATED STOCKPILE AREAS AND EQUIPMENT ACCESS). TRENCHER OR ROAD SAW LIKE EQUIPMENT ARE NOT ALLOWED FOR TRENCH EXCAVATION IN AGRICULTURAL AREAS, AS THE EQUIPMENT DOES NOT SEGREGATE TOPSOIL FROM SUBSOIL. HORIZONTAL DIRECTIONAL DRILLING (HDD) OR EQUIVALENT INSTALLATION THAT DOES NOT DISRUPT THE SOIL PROFILE, MAY LIMIT AGRICULTURAL GROUND DISTURBANCES. ANY HDD DRILLING FLUID INADVERTENTLY DISCHARGED MUST BE REMOVED FROM AGRICULTURAL AREAS. NARROW OPEN TRENCHES LESS THAN 25 FEET LONG INVOLVING A SINGLE DIRECTLY BURIED CONDUCTOR OR CONDUIT (AS REQUIRED) TO CONNECT SHORT ROWS WITHIN THE ARRAY, ARE EXEMPT FROM TOPSOIL SEGREGATION.
- STRIPPED TOPSOIL SHOULD BE STOCKPILED FROM WORK AREAS (E.G. PARKING AREAS, ELECTRIC CONDUCTOR TRENCHES, ALONG ACCESS ROADS, EQUIPMENT PADS) AND KEPT SEPARATE FROM OTHER EXCAVATED MATERIAL (ROCK AND/OR SUB-SOIL) UNTIL THE COMPLETION OF THE FACILITY FOR FINAL RESTORATION. FOR PROPER TOPSOIL SEGREGATION, AT LEAST 25 FEET OF ADDITIONAL TEMPORARY WORKSPACE (ATWS) MAY BE NEEDED ALONG "OPEN-CUT" UNDERGROUND UTILITY TRENCHES. ALL TOPSOIL WILL BE STOCKPILED AS CLOSE AS IS REASONABLY PRACTICAL TO THE AREA WHERE STRIPPED/REMOVED AND SHALL BE USED FOR RESTORATION ON THAT PARTICULAR AREA. ANY TOPSOIL REMOVED FROM PERMANENTLY CONVERTED AGRICULTURAL AREAS (E.G. PERMANENT ROADS, ETC.) SHOULD BE TEMPORARILY STOCKPILED AND EVENTUALLY SPREAD EVENLY IN ADJACENT AGRICULTURAL AREAS WITHIN THE PROJECT LIMITS OF DISTURBANCE (LOD); HOWEVER NOT TO SIGNIFICANTLY ALTER THE HYDROLOGY OF THE AREA. CLEARLY DESIGNATE TOPSOIL STOCKPILE AREAS AND TOPSOIL DISPOSAL AREAS IN THE FIELD AND ON CONSTRUCTION DRAWINGS; CHANGES OR ADDITIONS TO THE DESIGNATED STOCKPILE AREAS MAY BE NEEDED BASED ON FIELD CONDITIONS IN CONSULTATION WITH THE EM. SUFFICIENT LOD (AS DESIGNATED ON THE SITE PLAN OR BY THE EM) AREA SHOULD BE ALLOTTED TO ALLOW ADEQUATE ACCESS TO THE STOCKPILE FOR TOPSOIL REPLACEMENT DURING RESTORATION.
  - TOPSOIL STOCKPILES ON AGRICULTURAL AREAS LEFT IN PLACE PRIOR TO OCTOBER 31ST SHOULD BE SEEDDED WITH AROOSTOOK WINTER RYE OR EQUIVALENT AT AN APPLICATION RATE OF THREE BUSHEL (168 LBS.) PER ACRE AND MULCHED WITH STRAW MULCH AT RATE OF TWO TO THREE BALES PER 1000 SQ. FT.
  - TOPSOIL STOCKPILES LEFT IN PLACE BETWEEN OCTOBER 31ST AND MAY 31ST SHOULD BE MULCHED WITH STRAW AT A RATE OF TWO TO THREE BALES PER 1000 SQ. FT. TO PREVENT SOIL LOSS.

**North Side Energy Center**

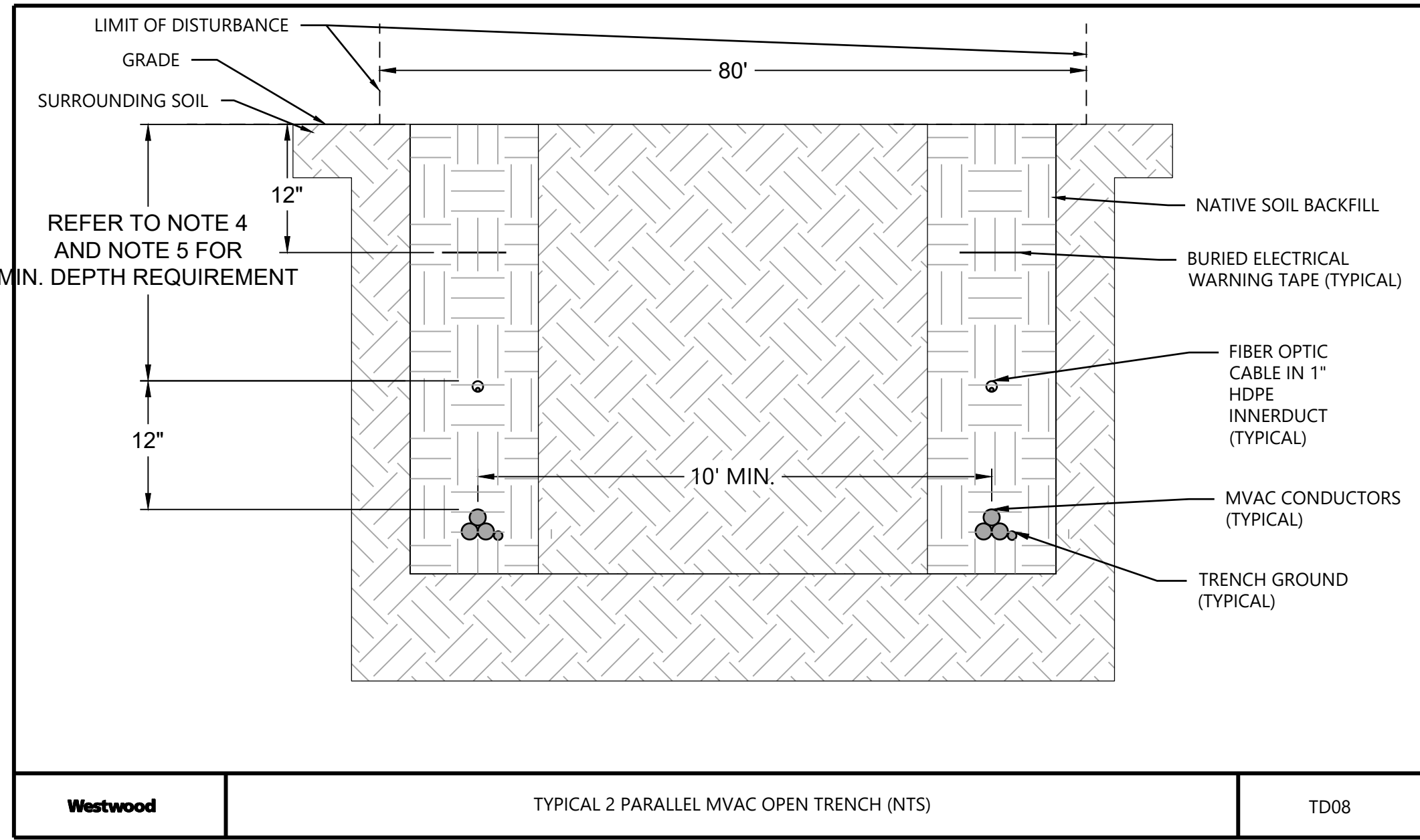
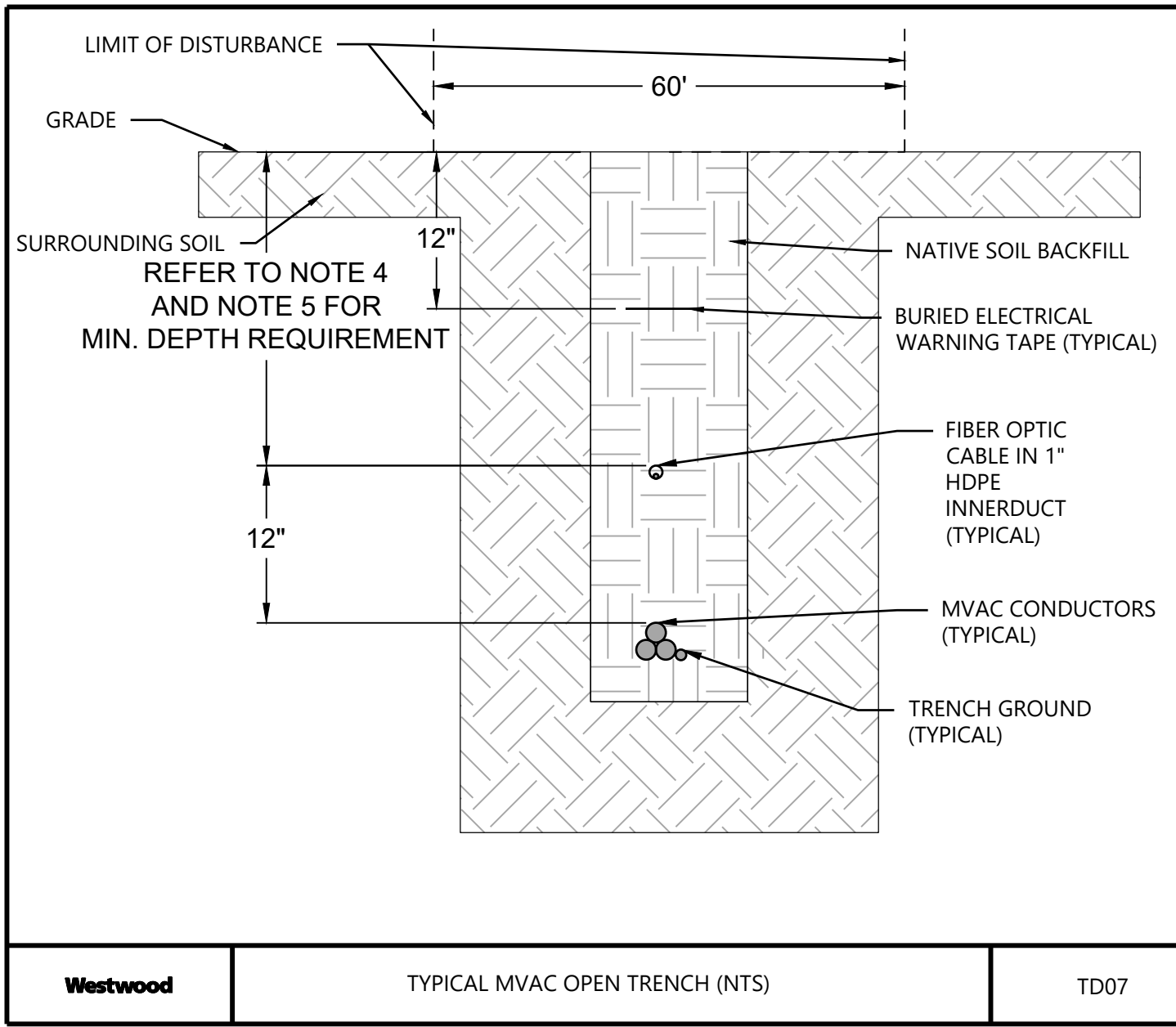
Towns of Massena, Brasher, and Norfolk, St. Lawrence County

Trench Details - 1

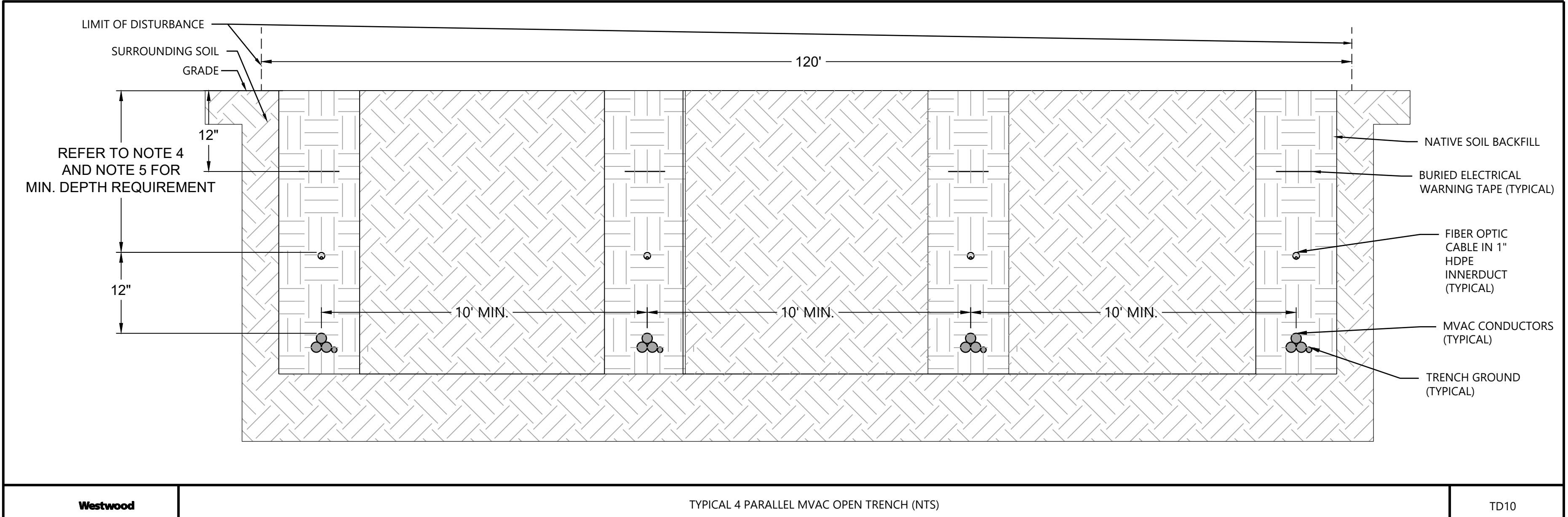
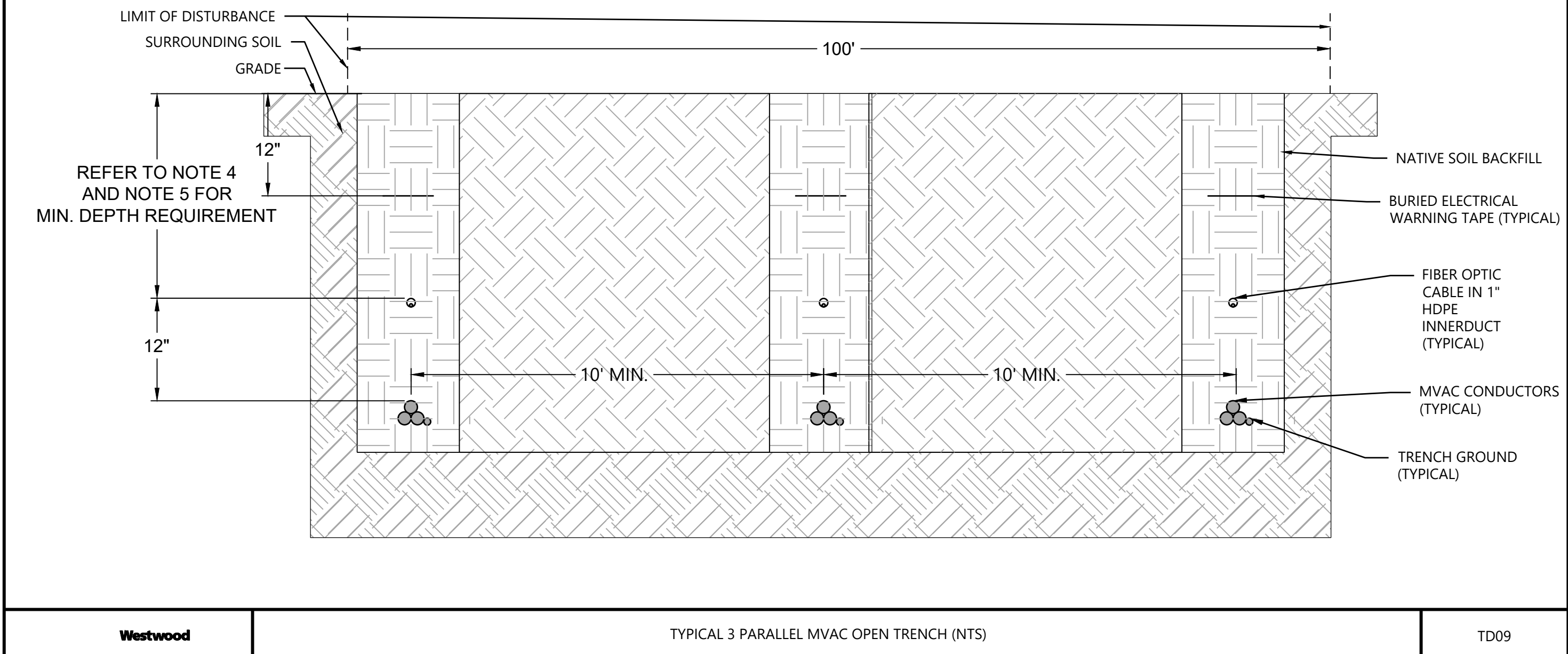
PRELIMINARY  
 NOT FOR CONSTRUCTION

DATE: 05/03/2021

SHEET: E.650



- TRENCHES AND BACKFILL SHALL BE FREE OF ROCK, STUMPS, LARGE ROOTS OR ANY OTHER MATERIAL LARGER THAN 3/8" IN DIAMETER THAT CAN CAUSE DAMAGE TO CABLE JACKETS OR INSULATION.
- TYPICAL MVAC TRENCHES SHALL BE MINIMUM 2.5' AWAY FROM PILES. TRENCHES THAT ARE WITHIN 2.5' OF PILES SHALL BE COMPACTED TO 95%.
- BACKFILL LIFTS SHALL NOT EXCEED 12".
- ALL BURIED UTILITIES LOCATED WITHIN THE GENERATION FACILITY'S SECURITY FENCE MUST HAVE A MINIMUM DEPTH OF 36" IF DIRECT BURIED AND MINIMUM DEPTH OF 18" IF BURIED IN A CONDUIT.
- ALL BURIED UTILITIES LOCATED OUTSIDE OF THE GENERATION FACILITY SECURITY FENCE:  
(a) IN CROPLAND, HAYLAND, AND IMPROVED PASTURE BURIED ELECTRIC CONDUCTORS MUST HAVE A MINIMUM DEPTH OF 48" OF COVER, IN AREAS WHERE THE DEPTH OF SOIL BEDROCK IS LESS THAN 48", THE ELECTRIC CONDUCTORS MUST BE BURIED BELOW THE SURFACE OF THE BEDROCK IF FRIABLE/RIPPABLE, OR AS NEAR AS POSSIBLE TO THE SURFACE OF THE BEDROCK.  
(b) IN UNIMPROVED GRAZING AREAS OR ON LAND PERMANENTLY DEVOTED TO PASTURE THE MINIMUM DEPTH OF COVER MUST BE 36".  
(c) WHERE ELECTRICAL CONDUCTORS ARE BURIED DIRECTLY BELOW THE GENERATION FACILITY'S ACCESS ROAD OR IMMEDIATELY ADJACENT (AT ROAD EDGE) TO THE ACCESS ROAD, THE MINIMUM DEPTH OF COVER MUST BE 36" IF DIRECT BURIED AND 24" IF BURIED IN CONDUIT. CONDUCTORS MUST BE CLOSED ENOUGH TO THE ROAD EDGE AS TO BE NOT SUBJECT TO AGRICULTURAL CULTIVATION/SUB-SOILING.
- WHEN OPEN-CUT TRENCHING IS PROPOSED, TOPSOIL STRIPPING IS REQUIRED FROM THE WORK AREA ADJACENT TO THE TRENCH (INCLUDING SEGREGATED STOCKPILE AREAS AND EQUIPMENT ACCESS). TRENCHER OR ROAD SAW LIKE EQUIPMENT ARE NOT ALLOWED FOR TRENCH EXCAVATION IN AGRICULTURAL AREAS, AS THE EQUIPMENT DOES NOT SEGREGATE TOPSOIL FROM SUBSOIL. HORIZONTAL DIRECTIONAL DRILLING (HDD) OR EQUIVALENT INSTALLATION THAT DOES NOT DISRUPT THE SOIL PROFILE, MAY LIMIT AGRICULTURAL GROUND DISTURBANCES. ANY HDD DRILLING FLUID INADVERTENTLY DISCHARGED MUST BE REMOVED FROM AGRICULTURAL AREAS. NARROW OPEN TRENCHES LESS THAN 25 FEET LONG INVOLVING A SINGLE DIRECTLY BURIED CONDUCTOR OR CONDUIT (AS REQUIRED) TO CONNECT SHORT ROWS WITHIN THE ARRAY, ARE EXEMPT FROM TOPSOIL SEGREGATION.
- STRIPPED TOPSOIL SHOULD BE STOCKPILED FROM WORK AREAS (E.G. PARKING AREAS, ELECTRIC CONDUCTOR TRENCHES, ALONG ACCESS ROADS, EQUIPMENT PADS) AND KEPT SEPARATE FROM OTHER EXCAVATED MATERIAL (ROCK AND/OR SUB-SOIL) UNTIL THE COMPLETION OF THE FACILITY FOR FINAL RESTORATION. FOR PROPER TOPSOIL SEGREGATION, AT LEAST 25 FEET OF ADDITIONAL TEMPORARY WORKSPACE (ATWS) MAY BE NEEDED ALONG "OPEN-CUT" UNDERGROUND UTILITY TRENCHES. ALL TOPSOIL WILL BE STOCKPILED AS CLOSE AS IS REASONABLY PRACTICAL TO THE AREA WHERE STRIPPED/REMOVED AND SHALL BE USED FOR RESTORATION ON THAT PARTICULAR AREA. ANY TOPSOIL REMOVED FROM PERMANENTLY CONVERTED AGRICULTURAL AREAS (E.G. PERMANENT ROADS, ETC.) SHOULD BE TEMPORARILY STOCKPILED AND EVENTUALLY SPREAD EVENLY IN ADJACENT AGRICULTURAL AREAS WITHIN THE PROJECT LIMITS OF DISTURBANCE (LOD); HOWEVER NOT TO SIGNIFICANTLY ALTER THE HYDROLOGY OF THE AREA. CLEARLY DESIGNATE TOPSOIL STOCKPILE AREAS AND TOPSOIL DISPOSAL AREAS IN THE FIELD AND ON CONSTRUCTION DRAWINGS; CHANGES OR ADDITIONS TO THE DESIGNATED STOCKPILE AREAS MAY BE NEEDED BASED ON FIELD CONDITIONS IN CONSULTATION WITH THE EM. SUFFICIENT LOD (AS DESIGNATED ON THE SITE PLAN OR BY THE EM) AREA SHOULD BE ALLOTTED TO ALLOW ADEQUATE ACCESS TO THE STOCKPILE FOR TOPSOIL REPLACEMENT DURING RESTORATION.  
(a) TOPSOIL STOCKPILES ON AGRICULTURAL AREAS LEFT IN PLACE PRIOR TO OCTOBER 31ST SHOULD BE SEEDED WITH AROOSTOOK WINTER RYE OR EQUIVALENT AT AN APPLICATION RATE OF THREE BUSHELS (168 LBS.) PER ACRE AND MULCHED WITH STRAW MULCH AT RATE OF TWO TO THREE BALES PER 1000 SQ. FT.  
(b) TOPSOIL STOCKPILES LEFT IN PLACE BETWEEN OCTOBER 31ST AND MAY 31ST SHOULD BE MULCHED WITH STRAW AT A RATE OF TWO TO THREE BALES PER 1000 SQ. FT. TO PREVENT SOIL LOSS.



PREPARED FOR:

700 Universe Blvd,  
Juno Beach, FL 33408

REVISIONS:

#	DATE	COMMENT
A	05/03/2021	ISSUED FOR REVIEW

## North Side Energy Center

Towns of Massena, Brasher, and Norfolk, St. Lawrence County

Trench Details - 3

PRELIMINARY  
NOT FOR CONSTRUCTION

DATE: 05/03/2021

SHEET: E.652

1:00:39:52.00.dwg, C:\Users\jordan\OneDrive\Documents\2021\05\03\2021\_0524\_Alt Jordan Box