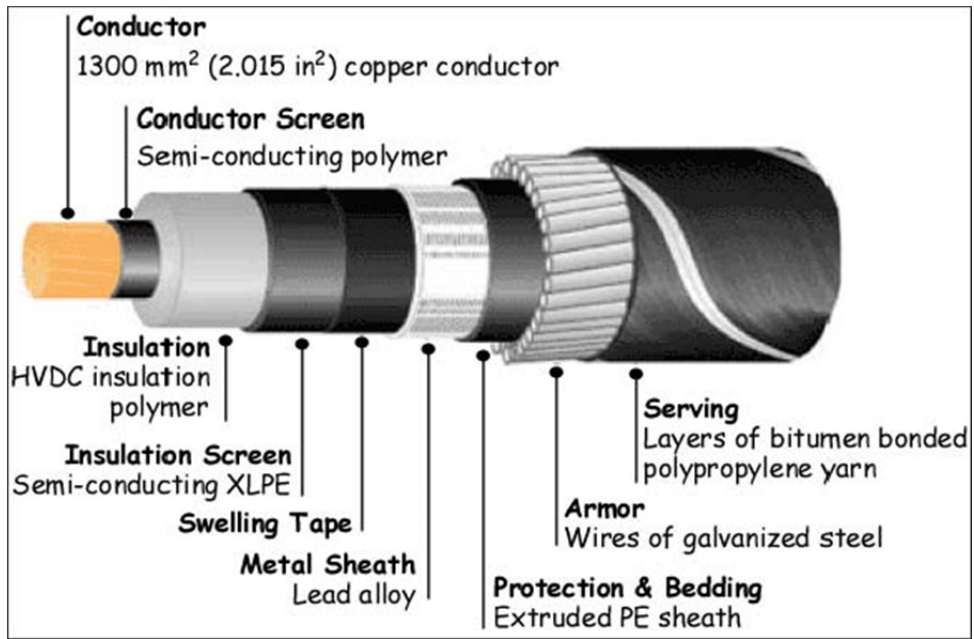
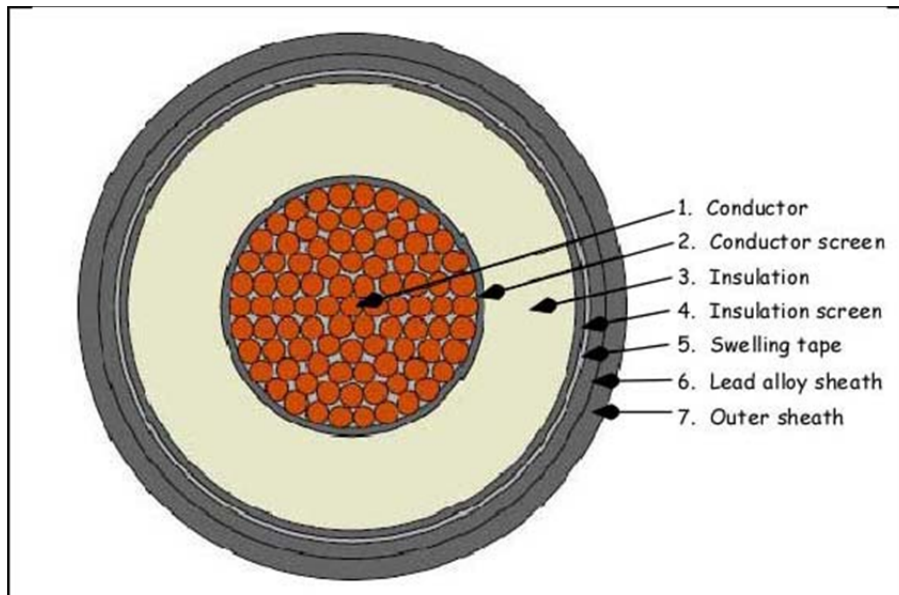


ILLUSTRATIVE CROSS-SECTION OF HVDC CABLE (AQUATIC)

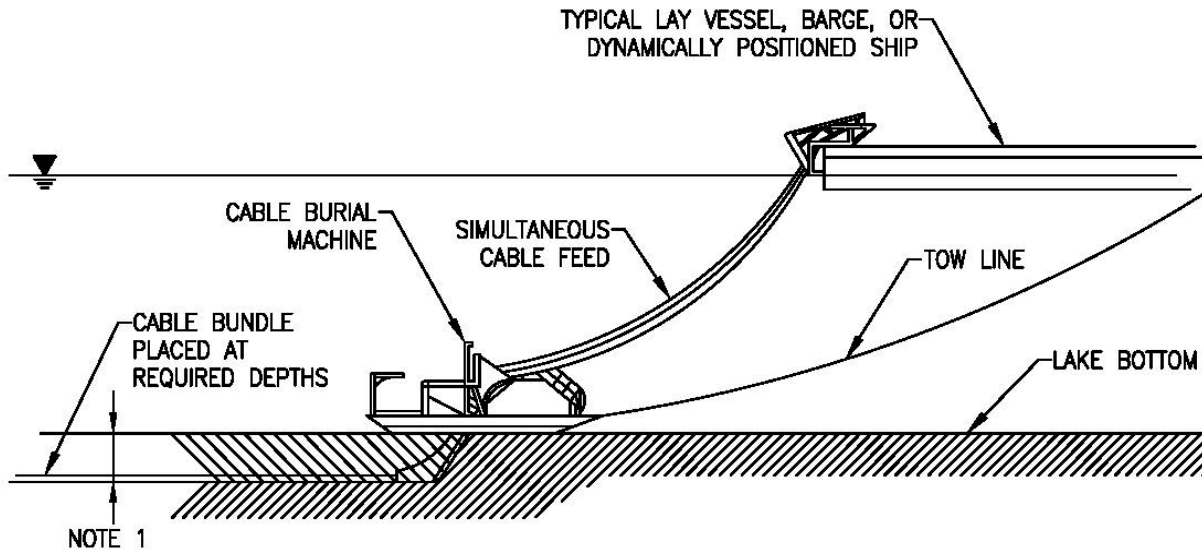


Source: Cross-Sound Cable Company 2012

ILLUSTRATIVE CROSS-SECTION OF HVDC CABLE (TERRESTRIAL)



TYPICAL AQUATIC TRANSMISSION CABLE INSTALLATION PROCESS



NOTES:

1. BURIAL DEPTH SHALL BE APPROXIMATELY 4 FEET ON LAKE BOTTOM.
2. CABLE LAY MACHINE IS TYPICAL OF EQUIPMENT THAT MAY BE EMPLOYED.

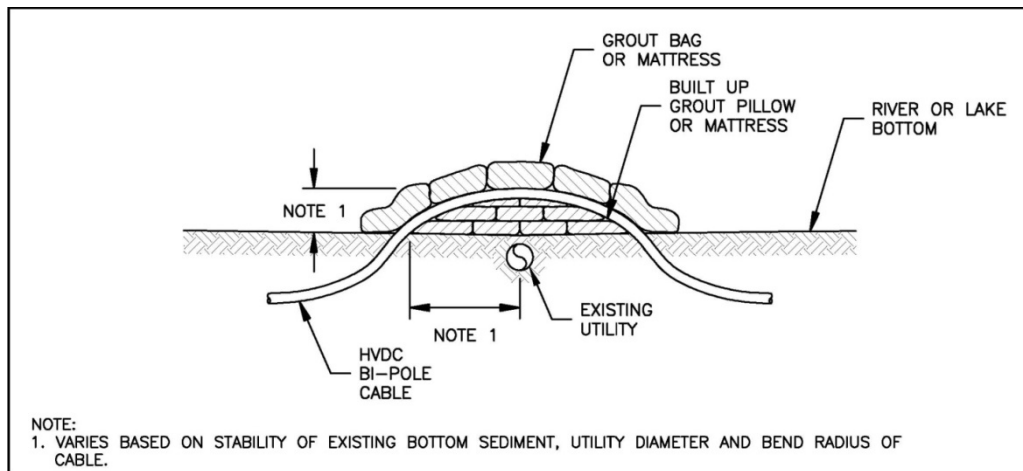


Example of a Jet Plow



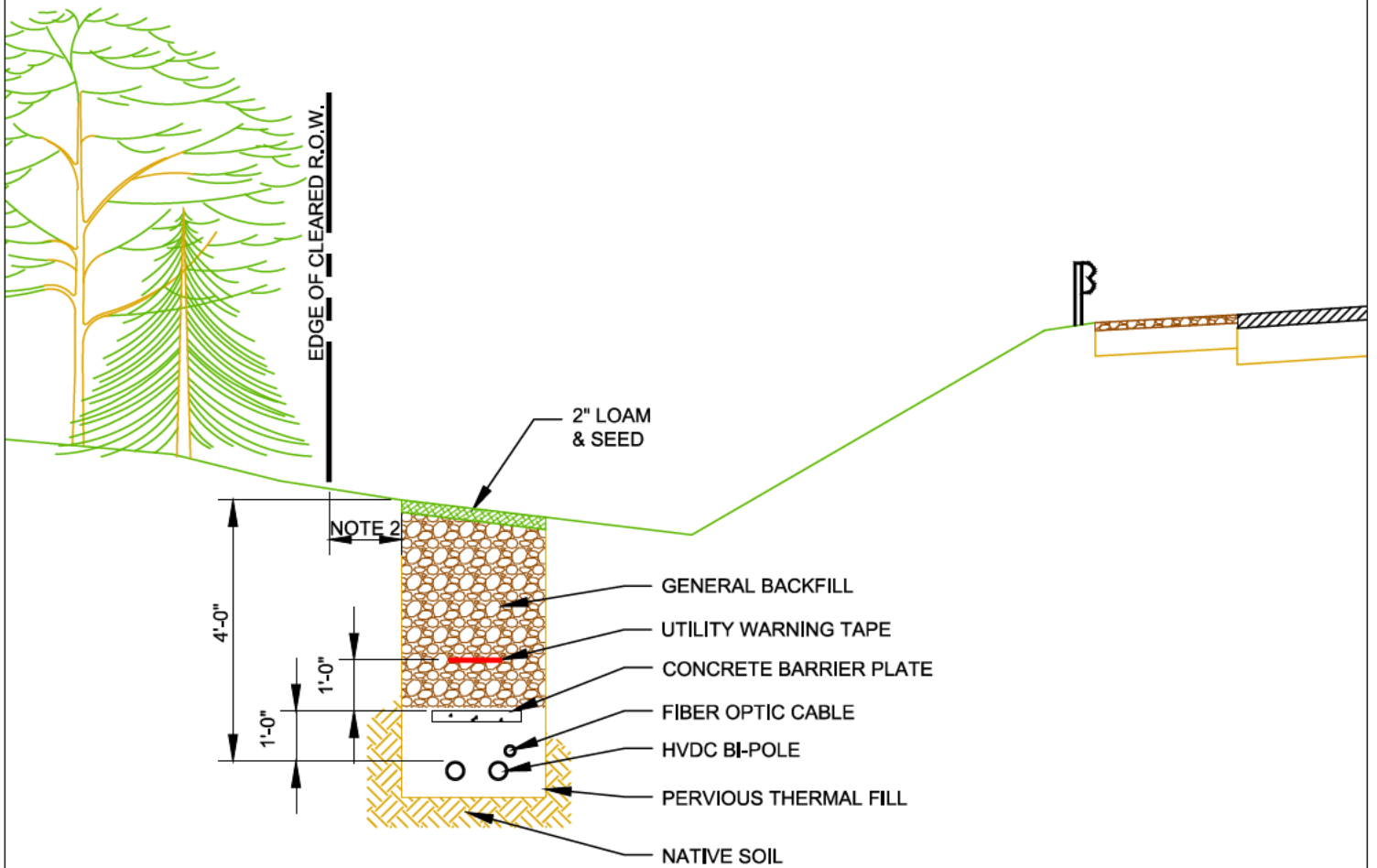
Example of a Shear Plow

REPRESENTATIVE SCHEMATIC OF A PROTECTION MEASURE FOR AQUATIC TRANSMISSION CABLES



Example of a Concrete Mattress

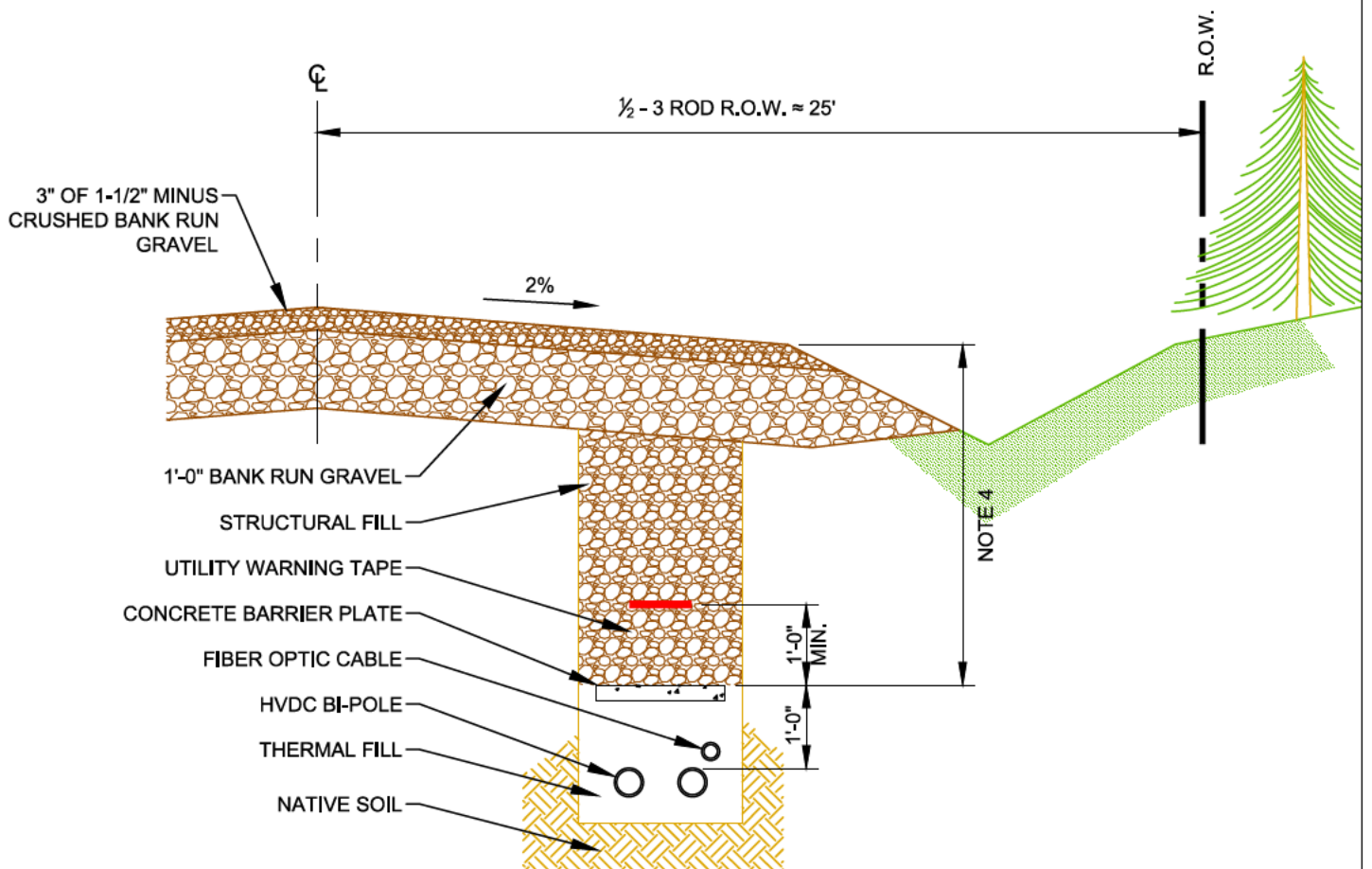
TYPICAL ROADWAY TRENCH SECTION IN TURF AREA



NOTES:

1. DIMENSIONS AND DETAILS ARE CONCEPT ONLY AND SUBJECT TO MODIFICATION TO MEET MUNICIPAL, STATE AND FEDERAL REQUIREMENTS.
2. CABLE TO BE LOCATED AT EDGE OF CLEARED R.O.W. WITH SUFFICIENT SPACE TO ERECT REQUIRED SAFETY AND ENVIRONMENTAL CONTROLS, UNLESS OTHERWISE APPROVED BY VTRANS.
3. PROVIDE EROSION, SEDIMENTATION AND INVASIVE SPECIES CONTROL IN ACCORDANCE WITH ESTABLISHED BMP MEASURES AND ISSUED PERMITS.
4. TREE REMOVAL AND TRIMMING SHALL BE LIMITED TO VTRANS R.O.W. AND THE MINIMUM NECESSARY FOR PERFORMANCE OF THE WORK.
5. PROVIDE THERMAL FILL AS SPECIFIED.
6. TRENCH GENERAL BACKFILL SHALL BE NATIVE SOIL COMPACTED TO MATCH IN-SITU SOIL DENSITY UNLESS OTHERWISE SPECIFIED.
7. AT COMPLETION OF THE WORK, RESTORE CONSTRUCTION SITE TO MATCH SURROUNDING TURFED SURFACES.

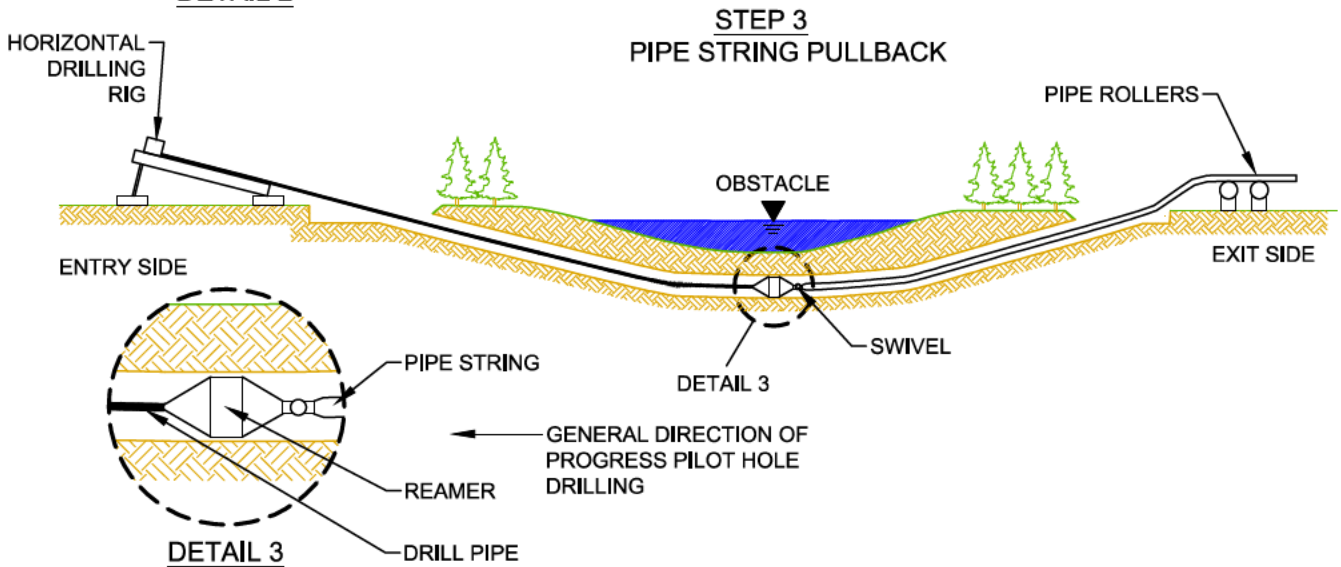
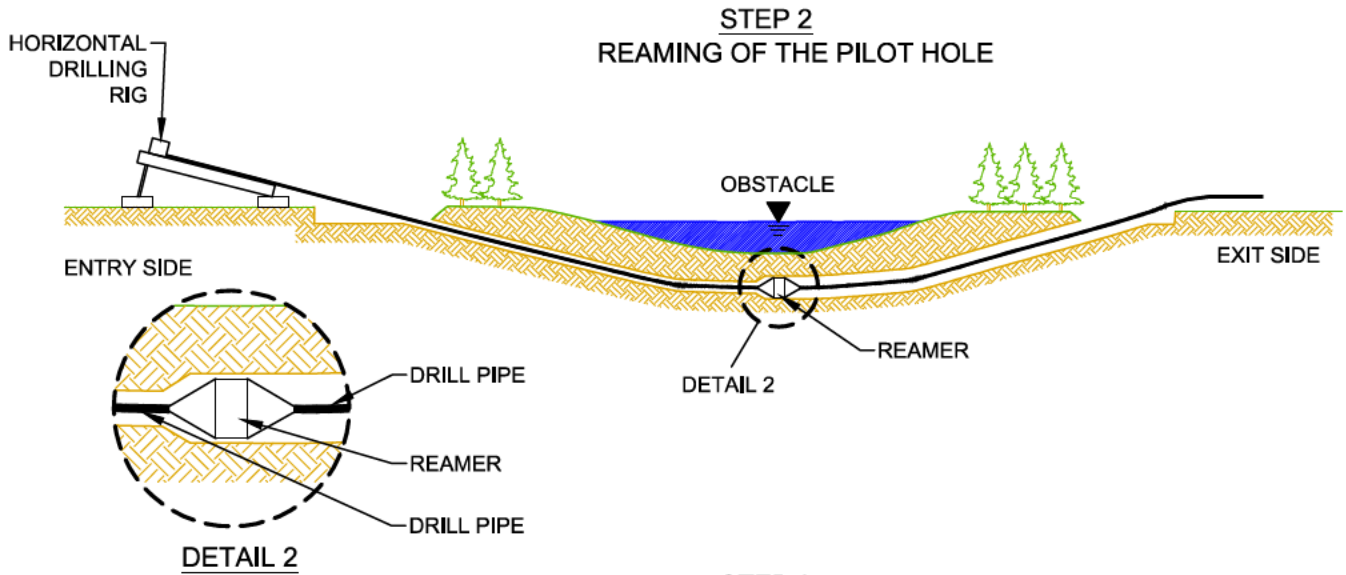
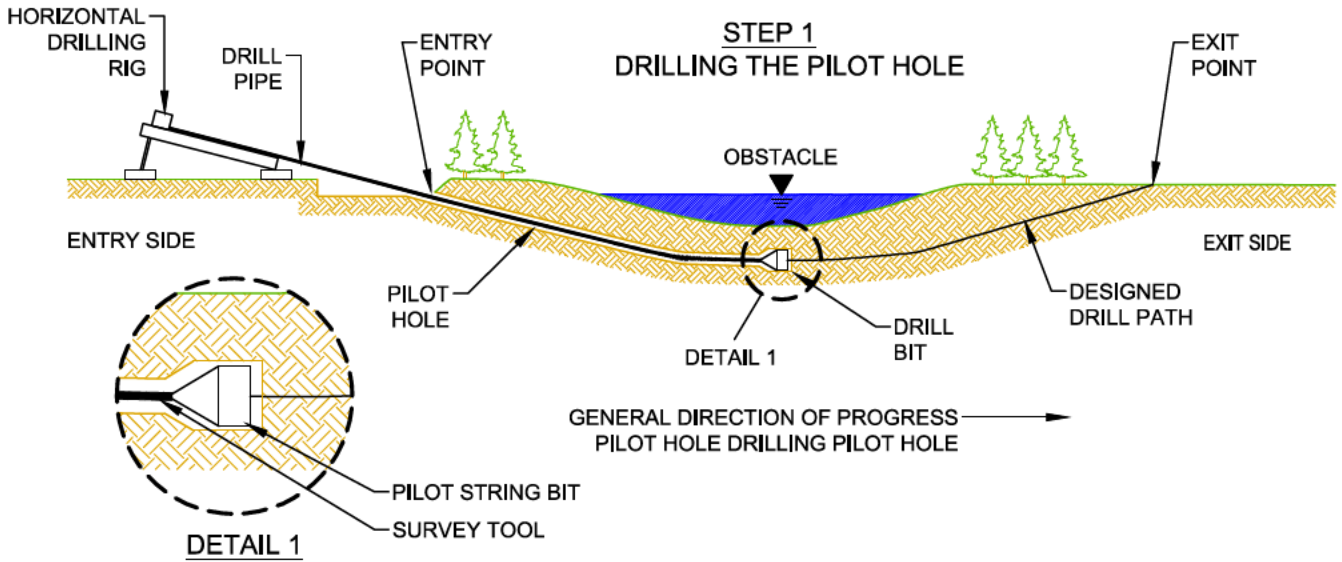
TYPICAL MUNICIPAL GRAVEL ROADWAY SECTION



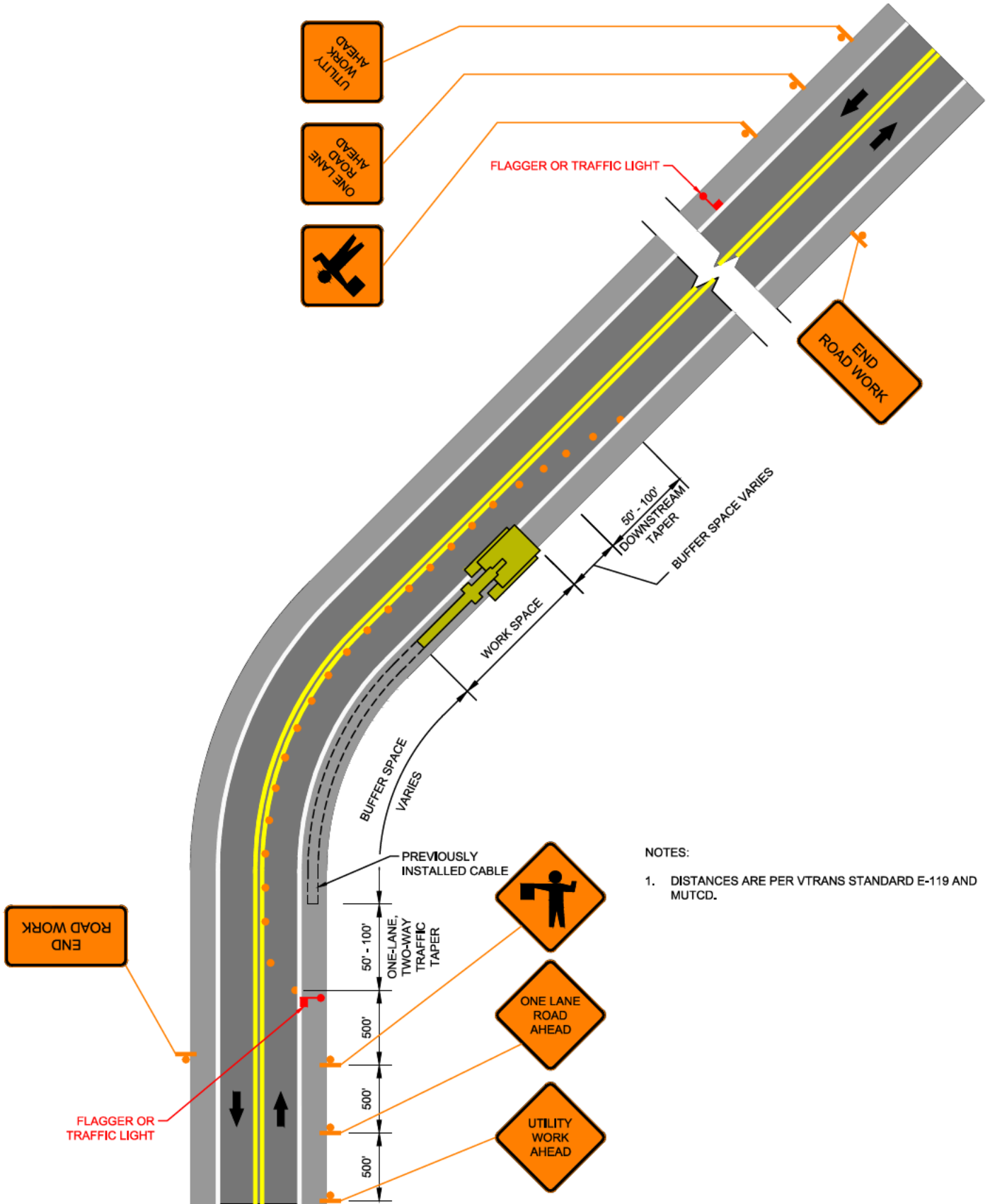
NOTES:

1. DIMENSIONS AND DETAILS ARE CONCEPT ONLY AND SUBJECT TO MODIFICATION TO MEET MUNICIPAL, STATE AND FEDERAL REQUIREMENTS.
2. ROADWAY WIDTH VARIES.
3. ROADWAY GRAVEL SHALL MEET THE MINIMUM STANDARDS OF APPLICABLE MUNICIPAL ROAD & BRIDGE STANDARDS.
4. TRENCH DEPTH 3'-0" TO CONCRETE BARRIER, 4'-0" TO TOP OF DC CABLE. OVERALL TRENCH DEPTH VARIES BASED ON THERMAL SOIL PROPERTIES.
5. STRUCTURAL FILL SHALL BE PER VERMONT AOT SPECIFICATION EXCEPT THERMAL RESISTIVITY SHALL BE 100°C-cm/WATT OR LESS UNLESS OTHERWISE SPECIFIED.
6. TRENCH BACKFILL SHALL BE THERMAL FILL AS REQUIRED TO MEET CALCULATED THERMAL CONDUCTIVITY REQUIREMENTS OF THE DESIGN.
7. UTILITY WARNING TAPE SHALL BE PLACED NOT LESS THAN 1'-0" ABOVE THE CONCRETE BARRIER PLATE.

TYPICAL HDD WORK SEQUENCE

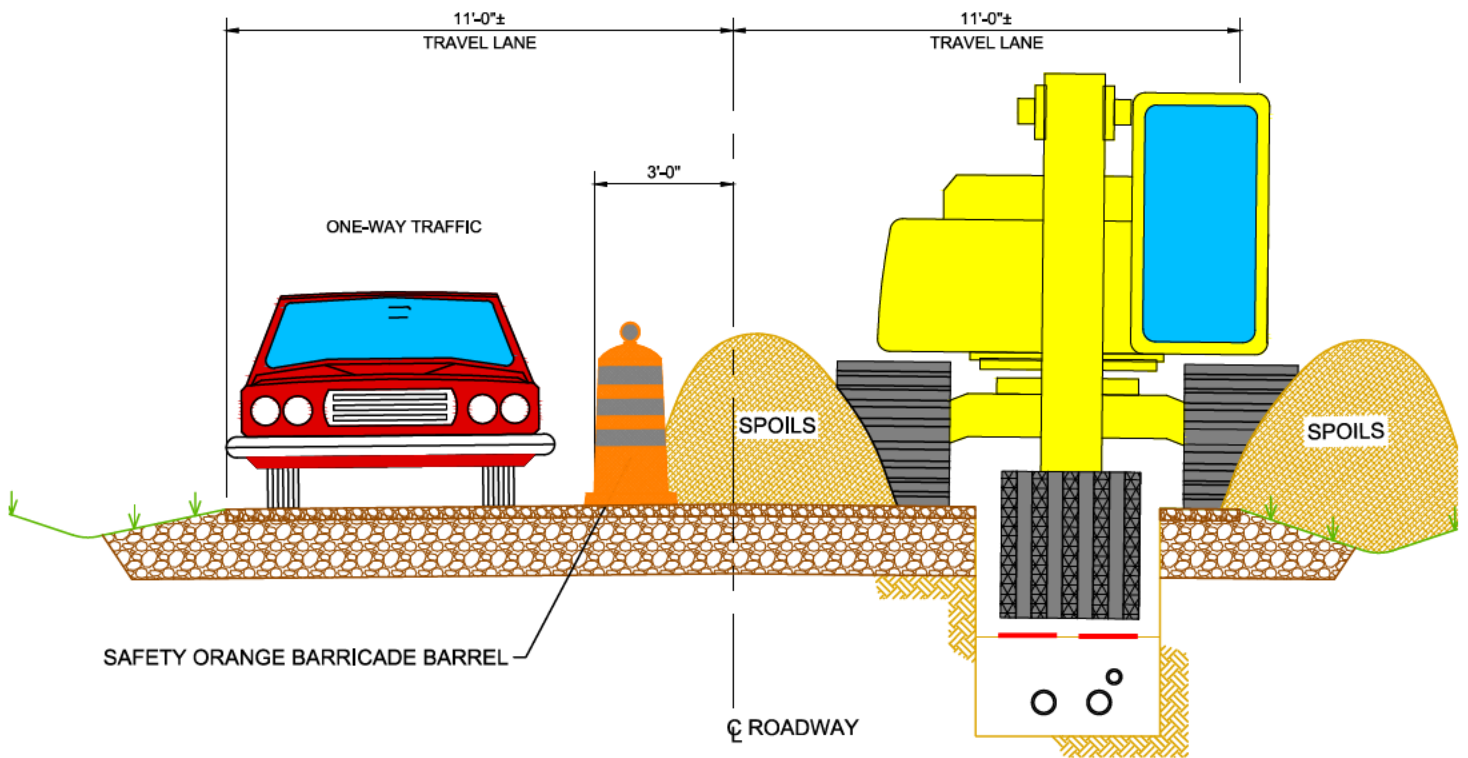


TRAFFIC CONTROL WITH LANE CLOSURE



NOTES:
 1. DISTANCES ARE PER VTRANS STANDARD E-119 AND MUTCD.

GRAVEL ROAD LANE CLOSURE



NOTES:

1. ONE-WAY TRAFFIC CONTROLLED BY FLAGGERS, UNIFORMED POLICE OR TRAFFIC LIGHTS AS REQUIRED PER VTRANS/AASHTO CRITERIA.
2. LANE CLOSURE MAY EXTEND INTO SEVERAL DAYS INCLUDING OVERNIGHT PERIODS.
3. TRAFFIC CONTROL ZONES AND DEVICES SHALL BE IN ACCORDANCE WITH FHWA MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES.