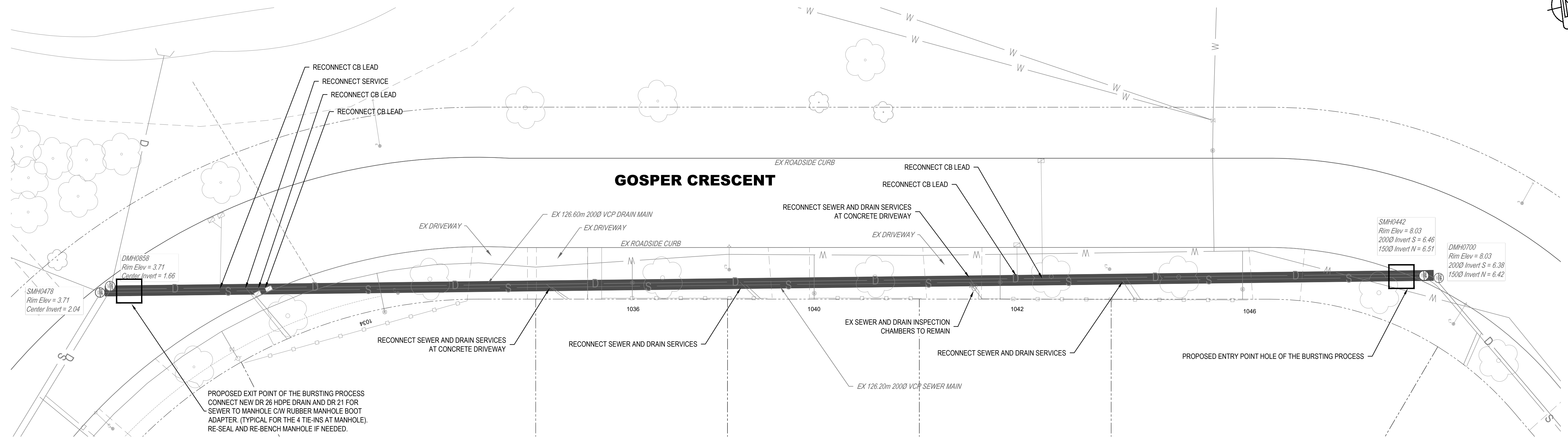
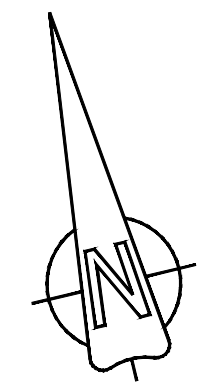


DISCLAIMER:
 LOCATION OF UTILITIES SHOWN ARE APPROXIMATE ONLY AND SHOULD BE CONFIRMED BY FIELD SURVEY AND BY USE OF A PIPE LOCATOR AND MANUAL DIGGING WHERE REQUIRED. EXISTING SERVICE LOCATIONS ARE SHOWN TO INDICATE THE EXISTENCE OF THE SPECIFIED SERVICE ONLY AND ARE NOT NECESSARILY COMPLETE OR SHOWN IN THE CORRECT LOCATION. IT IS THE CONTRACTOR'S RESPONSIBILITY TO LOCATE, VERIFY THE INVERT ELEVATIONS BY HAND EXCAVATION BEFORE CONSTRUCTION OF THE UTILITY CROSSING AND SHALL BE RESPONSIBLE FOR ADEQUATE PROTECTION FROM DAMAGE AT CONTRACTOR'S COST



PROPOSED EXIT POINT OF THE BURSTING PROCESS
 CONNECT NEW DR 26 HDPE DRAIN AND DR 21 FOR SEWER TO MANHOLE CW RUBBER MANHOLE BOOT ADAPTER. (TYPICAL FOR THE 4 TIE-INS AT MANHOLE). RE-SEAL AND RE-BENCH MANHOLE IF NEEDED.

NOTE:

- ENTRY AND EXIT HOLE TO BE LIMITED TO 2 X 3 METER TRENCH CW APPROVED SHORING CAGE FOR EROSION OR SIDE SLOPE PROTECTION.
- EXPECTED BURSTING TO BE SIZE ON SIZE, PNEUMATIC, HYDRAULIC EXPANSION, OR STATIC PULL. METHOD RE-USING EXISTING PIPE SLOPE OF EACH CLASSIFICATION. EXITING AND ENTERING THE SAME MANHOLE PRE-CORED HOLE INVERTS.
- PRIOR TO EXCAVATING THE ENTRY AND EXIT HOLE, EXCAVATE AND EXPOSE ALL SERVICE CONNECTIONS AFFECTED TO FACILITATE IMMEDIATE RE-CONNECTIONS AT THE END OF THE DAY TO LIMIT INCONVENIENCE.
- EXCAVATED MATERIAL FROM ENTRY AND EXIT HOLE TO BE DISPOSED ON AN APPROVED DISPOSAL SITE IN VANCOUVER ISLAND.
- ALL HDPE PIPES TO BE USED MANUFACTURED PER ASTM D3034 AND CERTIFIED BY CSA B182.2.
- INSTALLING OF THE SEWER AND DRAIN HDPE PIPES TO BE PULLED TOGETHER AT THE SAME TIME.
- PIPE JOINING TO BE DONE ABOVE GROUND BY BUTT FUSION. BEADS NO LESS THAN 1/4 INCH IN SIZE AND FUSION TEMPERATURE IN THE RANGE OF (400-450) °F AND INTERFACIAL PRESSURE BETWEEN (60 - 90) psi.
- ALL TIE-INS TO THE HDPE MAIN PIPE SHALL BE CORED ABOVE THE SPRING LINES OF THE MAIN PIPE WHERE ITS BEING CONNECTED MATCHING THE SIZE OF THE INSIDE DIMENSION OF THE INCOMING SERVICE PIPE.
- ALL SEWER AND DRAIN SERVICE CONNECTION TIE-INS INCLUDING CATCH BASIN LEAD TIE-INS TO BE COMPLETED WITH FERNCO TAP SADDLE WITH STAINLESS STEEL CLAMPS.
- AFTER COMPLETION OF ALL TIE-INS, A COMPLETED CCTV IS REQUIRED TO SATISFY THAT THE INSTALLED PIPE IS FREE OF DEFECTS.
- DRIVEWAY RESTORATION PER TOWNSHIP'S SUPPLIED SUPPLEMENTAL DRAWING TOE-SD-7.2, TOE-SD-G5.1, TOE-SD-S7a, TOE-SD-S11.1 AND TOE-SD-S9a.
- ROADWAY AND GROUND RESTORATION PER MMCD.
- ALL GREEN LAWN TO BE REPLACED WITH SOD MATCHING EXISTING GRASS SPECIE. WITH 100mm APPROVED TOP SOIL.
- ALL EXISTING IRRIGATIONS DISTURBED DURING CONSTRUCTION SHALL BE RESTORED.

**ISSUED FOR REVIEW
 XXX**

CONFIRM UNDERGROUND LOCATIONS WITH UTILITY COMPANIES	LEGEND - Existing services shown solid										REVISIONS			REVISIONS APPROVED			DESIGN APPROVED			TOWNSHIP OF ESQUIMALT			PROJECT NO. E0
	CABLE	— TV —	SIDEWALK	SW	TREE	⊕	ELECTRIC POLE	E ⊕	TEL POLE	⊕	SURVEY MONUMENT	⊕										DESIGN DWG. NO. C - 105	
	DRAIN	— D —	SEWER MANHOLE	⊕	CATCH BASIN	⊕	DRAIN CLEANOUT	⊕	LAWN BASIN	⊕	UNDERGROUND	— UG —	ISSUED FOR REVIEW			ISSUED FOR TENDER			APPROVED BY: 2024.05.10 CD DESIGN ENG. ASSIST ENG. MUNICIPAL ENG. 2021.01.20 JM			Sheet # 1	
	GAS	— G —	GAS VALVE	⊕	GAS SNIFFER	⊕	GAS METER	⊕	STREET LIGHT	⊕	TEL	— T —							SCALES: H=1:200 DATE: 2020.12.15				