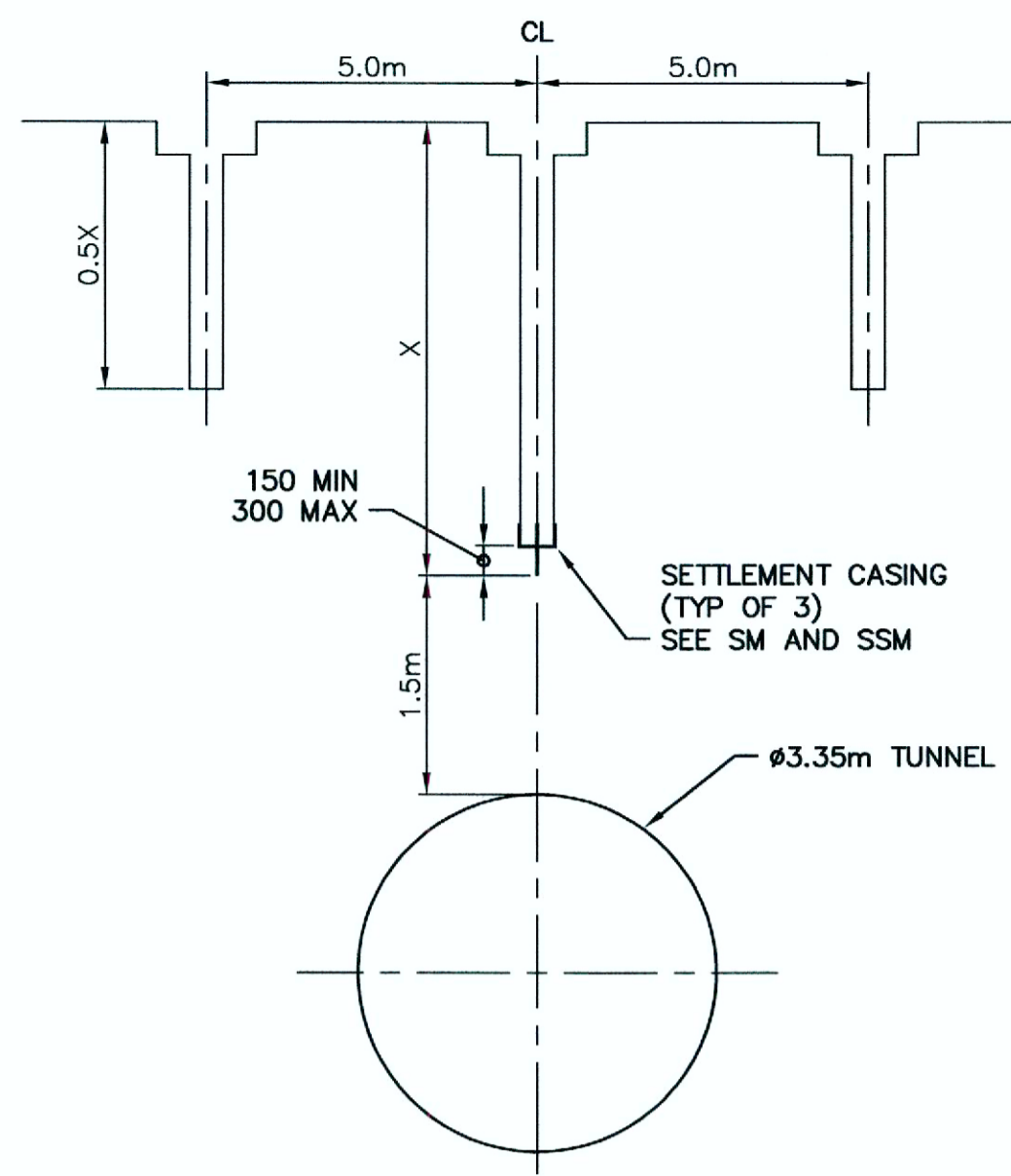
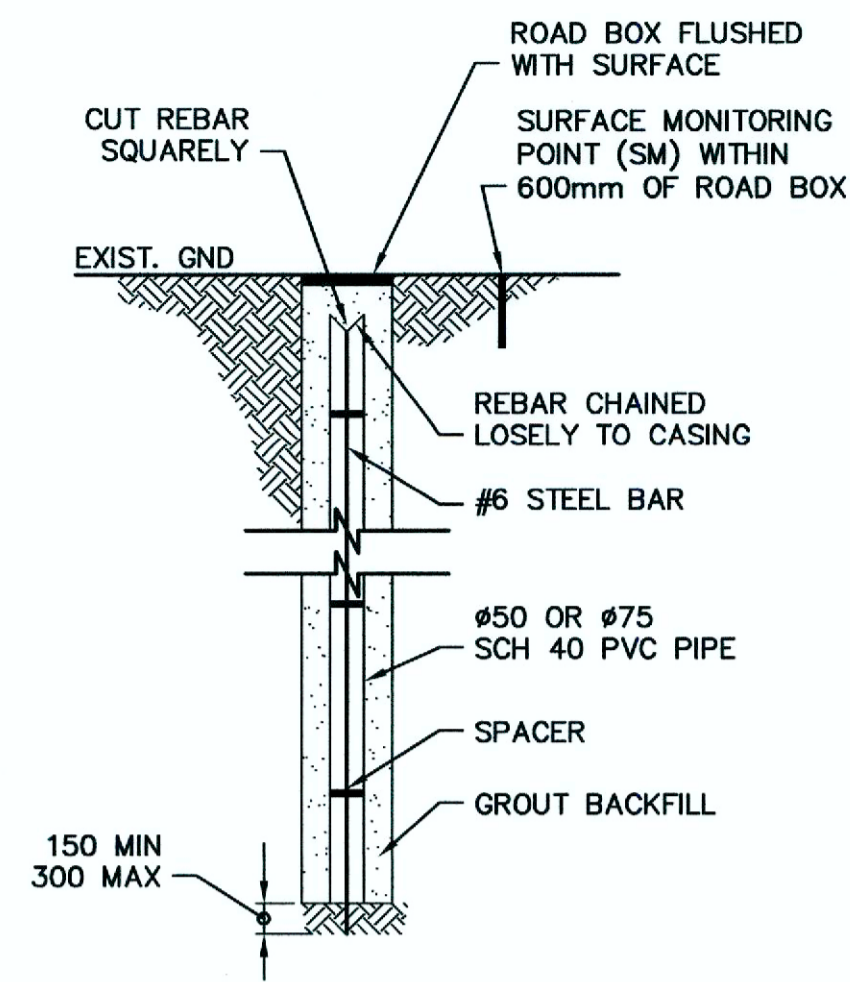


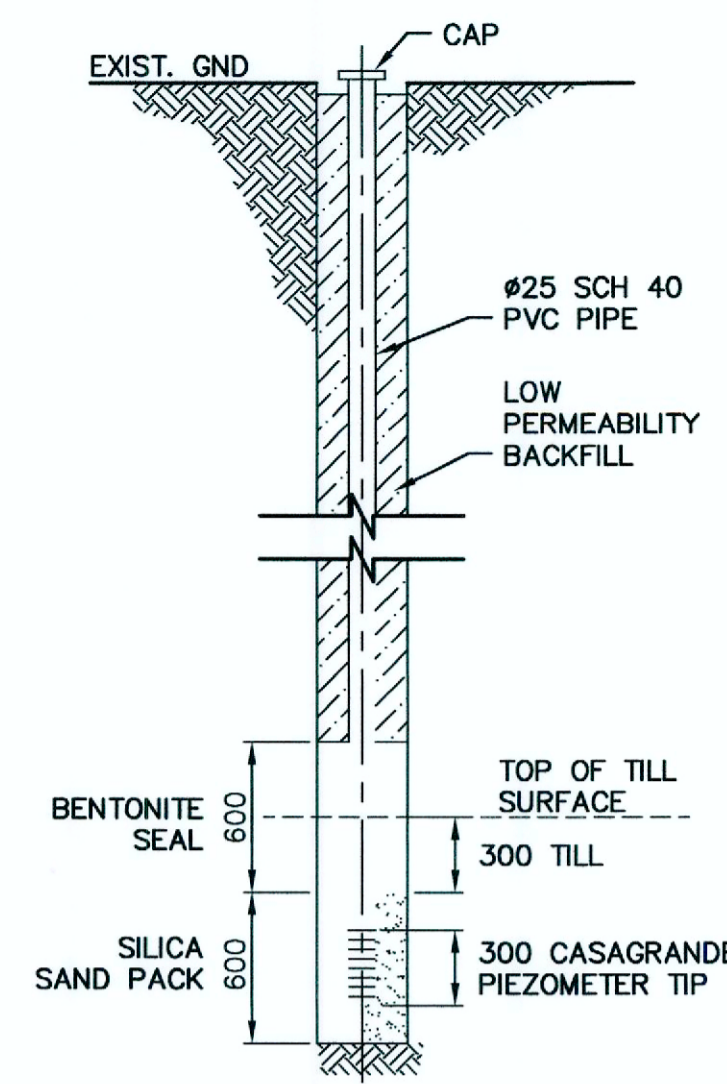
UTILITY SETTLEMENT MONITORING POINT



SURFACE AND SUBSURFACE MONITORING ARRAY

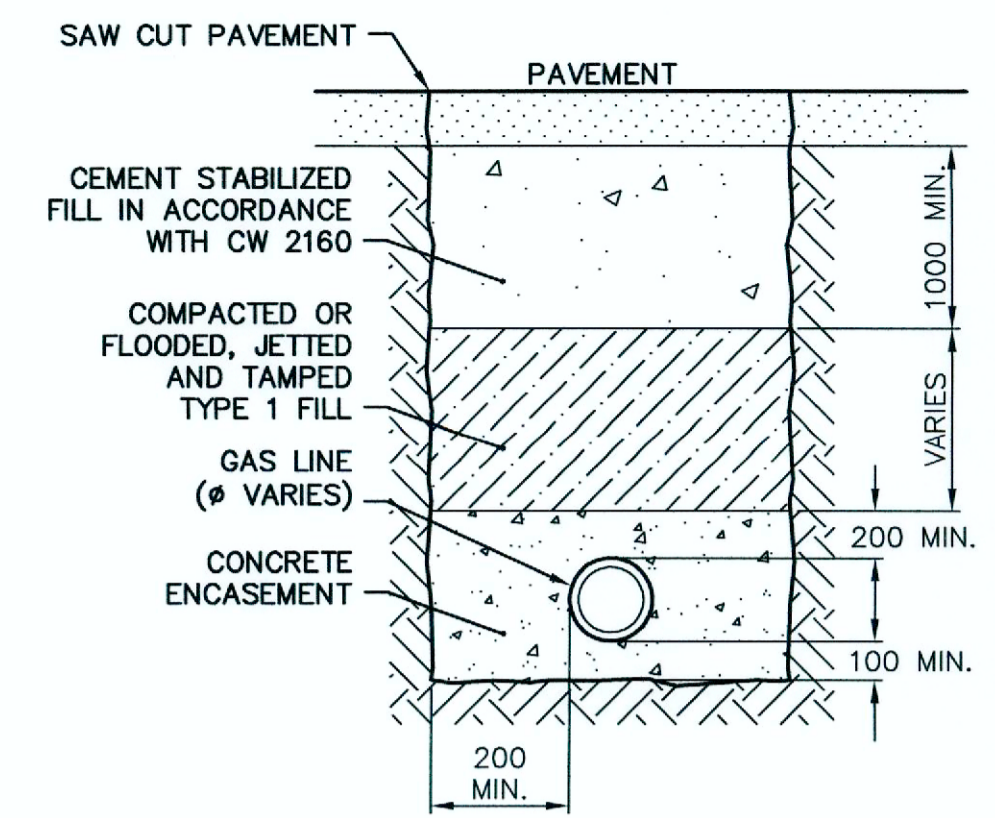


SURFACE AND SUBSURFACE MONITORING POINTS (SM AND SSM)



- NOTES:
1. INSTALL A PROTECTIVE COVER, EITHER FLUSH MOUNT OR ABOVE GRADE.
 2. SATURATE SAND PACK PRIOR TO INSTALLING BENTONITE SEAL.

2 STANDPIPE INSTALLATION DETAIL



NOTES:

1. SHOULD THE TUNNELLING OR TRENCHLESS SEWER CONSTRUCTION ACTIVITIES BE FOUND TO IMPACT GAS LINES OR SERVICES, THE CONTRACT ADMINISTRATOR MAY DIRECT THE CONTRACTOR TO ENCASE THE LINE AS SHOWN.
2. COORDINATE WORK WITH MANITOBA HYDRO.
3. EXCAVATE USING HYDRO VAC METHODS.
4. EXPOSE AND SUPPORT PIPE IN ACCORDANCE WITH MANITOBA HYDRO REQUIREMENTS.
5. PROTECT FROM FLOTATION.
6. LENGTH OF ENCASEMENT TO BE 10m.
7. PAYMENT FOR WORK WILL BE PAID OUT UNDER THE PROVISIONAL ITEM FOR "GAS LINE ENCASEMENT" AND WILL INCLUDE ALL WORK ITEMS SHOWN/ DESCRIBED ON THE DRAWING AND ANY OTHER INCIDENTAL ITEMS REQUIRED TO UNDERTAKE THE WORK.

3 PROVISION FOR GAS LINE ENCASEMENT

NOTE: REFER TO SPECIFICATIONS AND DRAWINGS FOR EXACT INSTALLATION LOCATION.

1 MONITORING POINT DETAILS

File Name C:\pw_workdir\ch2mhill_wbg\cortez\0443046\



B.M. ELEV.		KGS GROUP CONSULTING ENGINEERS		JACOBS		ENGINEER'S SEAL PROVINCE OF MANITOBA M. DRAPER REGISTERED PROFESSIONAL ENGINEER 37958		THE CITY OF WINNIPEG WATER AND WASTE DEPARTMENT	
DESIGNED BY AF		DRAWN BY JBC		CHECKED BY MD		APPROVED BY (KGS Group)		PROJECT TITLE COCKBURN AND CALROSSIE COMBINED SEWER RELIEF WORKS - CONTRACT 5 MISCELLANEOUS DETAILS	
HOR. SCALE: AS NOTED		RELEASED FOR CONSTRUCTION		DATE 01/29/19		CONSULTANT DRAWING NO. C-515		SHEET OF 17 OF 19	
NO. REVISIONS		DATE BY		DATE				COMPUTER FILE NAME C-515.dwg	
								CITY DRAWING NUMBER LD-8906	