

SPECIAL INSPECTION PROGRAM

TABLE 1 - REQUIRED GEOTECHNICAL SPECIAL INSPECTIONS					
SYSTEM OR MATERIAL	IBC CODE REFERENCE	CODE OR STANDARD REFERENCE	INSPECTION		REMARKS
			FREQUENCY		
			CONTINUOUS	PERIODIC	

SOILS					
VERIFY FOOTING BEARING CAPACITY AND SUBGRADE PREPARATION FOR FILLS	1704.7	GEOTECHNICAL REPORT		X	BY THE GEOTECHNICAL ENGINEER
FILL MATERIAL VERIFICATION			X		
FILL PLACEMENT AND COMPACTION			X		
LIFT THICKNESS			X		

PILING					
PILING MATERIAL VERIFICATION (CERTIFIED MILL TEST REPOSTS)	1704.8	GEOTECHNICAL REPORT		X	BY THE GEOTECHNICAL ENGINEER. SPECIAL INSPECTIONS APPLY TO PILE TYPE AND SIZE. CAPACITY OF TEST PILES, CONDUCT LOAD TESTS (IF REQUIRED), RECORD BLOW COUNT PER FOOT OF PENETRATION AND TIP/CUT OFF ELEVATIONS (IF APPLICABLE). DOCUMENT ANY PILE DAMAGE, REFER TO TABLE 2 FOR ADDITIONAL MATERIALS RELATED SPECIAL INSPECTIONS.
INSTALLATION			X		

TABLE 2 - REQUIRED STRUCTURAL SPECIAL INSPECTIONS					
SYSTEM OR MATERIAL	IBC CODE REFERENCE	CODE OR STANDARD REFERENCE	INSPECTION		REMARKS
			FREQUENCY		
			CONTINUOUS	PERIODIC	

FABRICATORS					
FABRICATORS	1704.2			X	SPECIAL INSPECTIONS APPLY TO VERIFICATION OF DETAILED FABRICATION AND QUALITY CONTROL PROCEDURES INCLUDING REVIEW FOR COMPLETENESS AND ADEQUACY RELATIVE TO THE CODE REQUIREMENTS.

CONCRETE					
REINFORCING STEEL PLACEMENT	1704.4, 1907.5, 1913.4	ACI 318 1.3.2.C ACI 318 7.5		X	
PLACEMENT OF CAST-IN-PLACE ANCHOR BOLTS	1704.4, 1911.1, 1912.1	ACI 318 1.3.2C	X		ALL BOLTS VISUALLY INSPECTED
VERIFYING USE OF REQUIRED MIX DESIGN(S)	1704.4, 1904, 1905.2-4, 1913.2, 1913.3	ACI 318 1.3.2.A ACI 318 CHAPTER 4 ACI 318 5.2-5.4		X	
CONCRETE PLACEMENT	1704.4, 1905.9-10	ACI 318 1.3.2.D ACI 318 5.9-5.10	X		
VERIFICATION OF FORMWORK	1704.4, 1906.1	ACI 318 6.1.1		X	SPECIAL INSPECTIONS APPLY TO SHAPE, LOCATION AND DIMENSIONS OF THE CONCRETE MEMBER BEING FORMED

STEEL					
FABRICATION OF STRUCTURAL ELEMENTS	1704.2			X	REFER TO INSPECTION OF FABRICATOR REQUIREMENTS
MATERIAL VERIFICATION OF STRUCTURAL STEEL	1704.3, 2203.1	ASTM A6 AISC 360 A3.1		X	CERTIFIED MILL TEST REPORTS
MATERIAL VERIFICATION OF WELD FILLER METALS	1704.3	AISC 360 A3.5		X	MANUFACTURERS CERTIFIED TEST REPORTS
VERIFYING USE OF PROPER WPS'S				X	COPY OF WELDING PROCEDURE SPECIFICATIONS
VERIFYING WELDER QUALIFICATIONS	1704.3.1	AWS D1.1 SECTION 6		X	COPY OF QUALIFICATION CARDS
SINGLE PASS FILLET WELDS LESS THAN OR EQUAL TO 5/16"				X	
WELDING STUDS EXCEPT AS NOTED OTHERWISE	1704.3	AWS D1.1 SECTION 7	X		ALL WELDS VISUALLY INSPECTED PER AWS D1.1 7.8

TABLE 3 - REQUIRED TESTING FOR SPECIAL INSPECTIONS					
SYSTEM OR MATERIAL	IBC CODE REFERENCE	CODE OR STANDARD REFERENCE	INSPECTION		REMARKS
			FREQUENCY		
			CONTINUOUS	PERIODIC	

GEOTECHNICAL					
FILL IN DENSITY OR PREPARED SUBGRADE DENSITY	1704.7	VARIABLES: MINIMUM PER IBC APPENDIX J107.5		X	BY THE GEOTECHNICAL ENGINEER
MATERIAL VERIFICATION		VARIABLES: CLASSIFICATION AND TESTING OF CONTROLLED FILL MATERIALS		X	BY THE GEOTECHNICAL ENGINEER

CONCRETE				
CONCRETE STRENGTH	1704.4, 1905.6	ASTM C39	EACH 150 CY OR LESS THAN EACH 5000 SF OF SLAB OR WALL PLACED EACH EAY	FABRICATE SPECIMENS AT TIME FRESH CONCRETE IS PLACED
CONCRETE SLUMP		ASTM C143		
CONCRETE AIR CONTENT		ASTM C231		
CONCRETE TEMPERATURE		ASTM C1064		

STEEL				
PRE-CONSTRUCTION TESTING OF WELDING STUDS	1704.3.1	AWS D1.1 7.7.1	EACH SIZE AND TYPE OF STUD EACH SHIFT	

CONSTRUCTION MONITORING:

- HORIZONTAL MOVEMENT OF THE SHORING SYSTEM AND ADJACENT STRUCTURES ALONG WITH ADJACENT GROUND SURFACE SETTLEMENT SHALL BE OBSERVED AND RECORDED AT EACH STAGE OF THE EXCAVATION. OBSERVATIONS SHALL BE MADE BY MEANS OF ACCURATE MEASURING. HORIZONTAL MOVEMENT SHALL BE OBSERVED AT THE TOP, BOTTOM, AND AT EACH SOLDIER PILE ON AT LEAST EVERY FIFTH SOLDIER PILE.
- THE HORIZONTAL MOVEMENT OF THE TOP OF THE SHORING SYSTEM SHALL BE LESS THAN 5/8 INCH.

SPECIAL INSPECTION FOOTNOTES:

SPECIAL INSPECTIONS SHALL CONFORM TO CHAPTER 17 OF THE 2006 "INTERNATIONAL BUILDING CODE" AND OREGON AMENDMENTS. REFER TO THE TABLES 1, 2, AND 3 FOR SPECIAL INSPECTION AND TESTING REQUIREMENTS.

SPECIAL INSPECTIONS AND ASSOCIATED TESTING SHALL BE PERFORMED BY AN APPROVED ACCREDITED INDEPENDENT AGENCY MEETING THE REQUIREMENTS OF ASTM E328 (MATERIALS), ASTM D3740 (SOILS), ASTM C1077 (CONCRETE), ASTM A880 (STEEL), AND ASTM E543 (NON-DESTRUCTIVE), UNO. THE INSPECTION AND TESTING AGENCY SHALL FURNISH TO THE STRUCTURAL ENGINEER, GEOTECHNICAL ENGINEER, AND OWNER. A COPY OF THEIR SCOPE OF ACCREDITATION, SPECIAL INSPECTORS SHALL BE CERTIFIED BY THE BUILDING OFFICIAL. WELDING INSPECTORS SHALL BE QUALIFIED PER SECTION 6.1.4.1.1 OF AWS D1.1. THE OWNER SHALL SECURE AND PAY FOR SERVICES OF THE INSPECTION AND TESTING AGENCY TO PERFORM ALL SPECIAL INSPECTIONS AND TESTS.

THE SPECIAL INSPECTOR SHALL OBSERVE THE INDICATED WORK FOR COMPLIANCE WITH THE APPROVED CONSTRUCTION DOCUMENTS. ALL DISCREPANCIES SHALL BE BROUGHT TO THE IMMEDIATE ATTENTION OF THE CONTRACTOR FOR CORRECTION, NOTED IN THE INSPECTION REPORTS, AND IF NOT CORRECTED, THEY SHALL BE BROUGHT TO THE ATTENTION OF THE STRUCTURAL ENGINEER, GEOTECHNICAL ENGINEER, OWNER, AND THE BUILDING OFFICIAL.

THE SPECIAL INSPECTOR SHALL FURNISH INSPECTION REPORTS FOR EACH INSPECTION TO THE BUILDING OFFICIAL, STRUCTURAL ENGINEER, GEOTECHNICAL ENGINEER, CONTRACTOR, AND OWNER. THE SPECIAL INSPECTION AGENCY SHALL SUBMIT A FINAL REPORT INDICATING THE WORK REQUIRING SPECIAL INSPECTION WAS INSPECTED AND IS IN CONFORMANCE WITH THE APPROVED CONSTRUCTION DOCUMENTS AND THAT ALL DISCREPANCIES NOTED IN THE INSPECTION REPORTS HAVE BEEN CORRECTED.

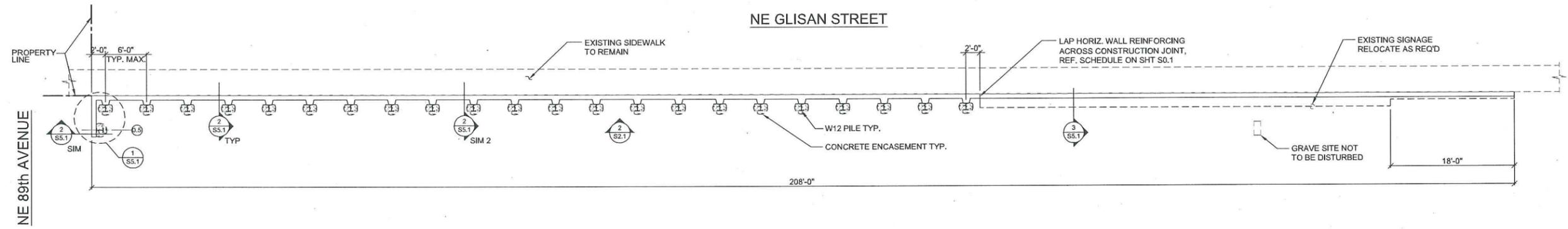
STRUCTURAL OBSERVATION:

THE STRUCTURAL ENGINEER OF RECORD WILL PERFORM STRUCTURAL OBSERVATION BASED ON THE REQUIREMENTS OF THE 2007 OREGON STRUCTURAL SPECIALTY CODE (OSSC) AND THE FOLLOWING CRITICAL STAGES OF CONSTRUCTION: PRIOR TO CONCRETE PLACEMENT. COPIES OF SITE OBSERVATION REPORTS AND FINAL OBSERVATION REPORT WILL BE SUBMITTED TO THE BUILDING OFFICIAL, CONTRACTOR, AND OWNER.

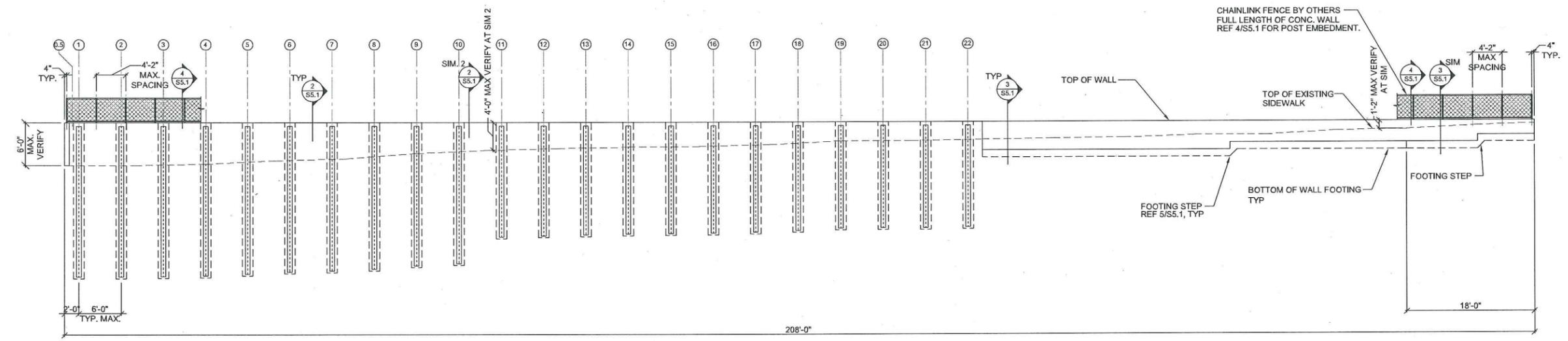
CLIENT:
BRAINARD CEMETARY RETAINING WALL
 NE GLISAN STREET
 PORTLAND, OREGON

SHEET TITLE:
SPECIAL INSPECTION AND CONSTRUCTION MONITORING PROGRAM

REVISIONS	BY
JOB NUMBER	22409
DATE:	07/07/10
SCALE:	AS NOTED
DRAWN:	JA
SHEET NUMBER:	



1 SOLDIER PILE WALL PLAN
 1/8"=1'-0"



2 SOLDIER PILE WALL ELEVATION
 1/8"=1'-0"

PILE NO.	EMBEDMENT DEPTH
0.5 - 10	16'-0"
11 - 22	12'-6"

- NOTES:**
- FIELD COORDINATE EMBEDMENT DEPTH INDICATED WITH MAXIMUM RETAINED SOIL HEIGHT SHOWN IN DETAIL 2/SS.1.
 - EMBEDMENT DEPTH INDICATES MINIMUM DISTANCE MEASURED FROM THE TOP OF EXISTING SIDEWALK TO BOTTOM OF SOLDIER PILE.

3 SOLDIER PILE SCHEDULE

- NOTES:**
- VERIFY ALL DRAWING DIMENSIONS AND EXISTING CONDITIONS. NOTIFY STRUCTURAL ENGINEER OF ANY DISCREPANCY BETWEEN THE EXISTING CONDITIONS AND CONSTRUCTION DOCUMENTS.
 - INDICATES 1,000 PSI LEAN MIX CONCRETE, ABOVE SIDEWALK AND 4,000 PSI CONCRETE BELOW SIDEWALK SURFACE.
 - REFERENCE 5/SS.1 FOR STEPPED FOOTING DETAIL.
 - MAXIMUM CONTROL JOINT SPACING SHALL BE 24'-0" o.c. LOCATE SOLDIER PILE WALL CONTROL JOINTS AT CENTER OF SOLDIER PILE, REFERENCE 6/SS.1.

CLIENT:
BRANARD CEMETARY RETAINING WALL
 NE GLISAN STREET
 PORTLAND OREGON

SHEET TITLE:
SOLDIER PILE WALL PLAN & ELEVATION

REVISIONS	BY
JOB NUMBER	22409
DATE:	07/07/10
SCALE:	AS NOTED
DRAWN:	JA
SHEET NUMBER:	

S2.1

