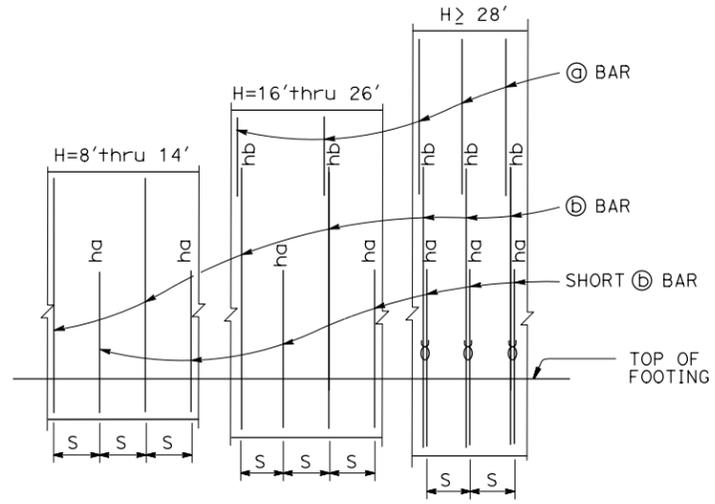


DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
X	X	X	X	X	X

REGISTERED CIVIL ENGINEER	X	DATE
PLANS APPROVAL DATE		

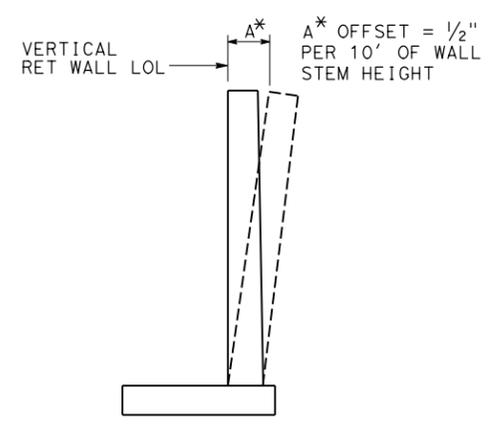
REGISTERED PROFESSIONAL ENGINEER	X
No.	X
Exp.	X
CIVIL	
STATE OF CALIFORNIA	

The State of California or its officers or agents shall not be responsible for the accuracy or completeness of electronic copies of this plan sheet.



ELEVATION

NOTES:
 "ha", "hb" above @ bars indicate distance from top of footing to upper end of @ bars, see table.
 "S" is @ bar spacing, see table.



WALL OFFSET

NO SCALE
 Values for offsetting forms to be determined by the engineer

DESIGN DATA

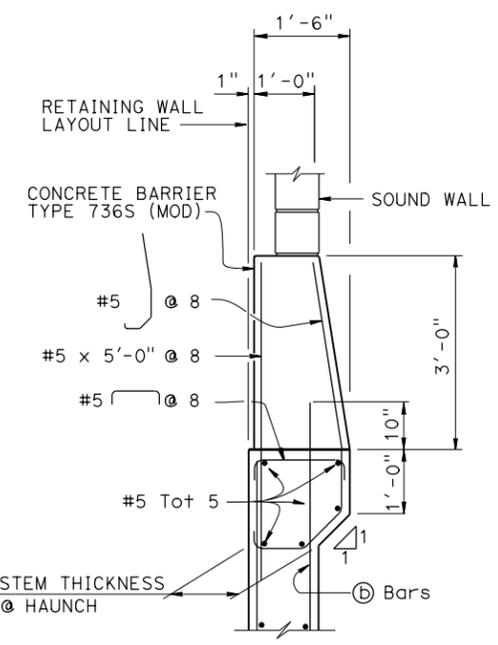
Design: AASHTO LRFD Bridge Design Specifications, 4th edition with California Amendments
 WS: 33 psf on Sound wall and Barrier
 LS: Varied surcharge on level ground surface
 CT: 54 kip maximum traffic impact loading evenly distributed over 10 feet at top of the barrier and 1:1 distribution down and outward
 EQE: Mononabe-Okabe Method
 $K_h = 0.3$
 $K_v = 0.0$
 Soil: $\phi = 34^\circ$
 $\gamma = 120$ pcf
 Reinforced Concrete: $f'_c = 3600$ psi
 $f_y = 60,000$ psi

Load Combinations and Limit States

Service I $Q=1.00DC+1.00EV+1.00EH+1.00LS+0.30WS$
 Service II $Q=1.00DC+1.00EV+1.00EH+1.00WS$
 Strength I $Q=aDC+\beta EV+1.50EH+1.75LS$
 Strength III $Q=aDC+\beta EV+1.50EH+1.40WS$
 Strength V $Q=aDC+\beta EV+1.50EH+1.35LS+0.40WS$
 Extreme I $Q=1.00DC+1.00EV+1.00EH+1.00EQD+1.00EQE$
 Extreme II $Q=1.00DC+1.00EV+1.00EH+1.00CT$

Where: Q: Force Effects
 a: 1.25 or 0.90, Which ever Controls Design
 B: 1.35 or 1.00, which ever Controls Design
 DC: Dead Load of Structure Components
 EV: Vertical Earth Fill Pressure
 LS: Live Load Surcharge
 EQE: Seismic Earth Pressure
 EQD: Soil and Structure Components Inertia. Soil inertia ignored for stem design
 WS: Wind Load on Sound wall and Barrier
 CT: Vehicular Collision Force

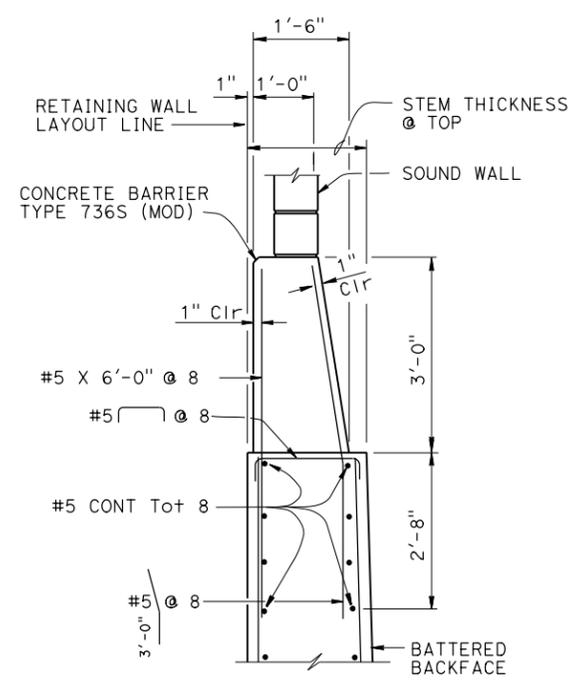
- NOTES:
- All piles are class 90 concrete piles.
 - Pile batter shown are 1:3.
 - Minimum distance between center pile and edge of footing is 1'-6".
 - Lateral resistance of each pile:
 30 kip for strength limit states.
 40 kip for extreme limit states.
 Pile group reduction factors are not applied, unless soil passive resistance on footing is included.
 - Maximum spacing between piles is shown in the table. Reduce to suit the length of footing.
 - Minimum distance between any two piles is 3'-0". Reduce to suit the length of footing.
 - For sound wall and retaining wall architectural finish or texture, see details elsewhere in Project Plans.
 - For details not shown and drainage notes, see (B3-5)
 - Footing cover, 2'-0" minimum.
 - For sound wall and reinforcement see "SOUND WALL - MASONRY BLOCK WITH BARRIER ON RETAINING WALL" sheets.
 - For H=6' through 14', extend @ bar into Barrier for stem with haunch.



DETAIL A - WITH HAUNCH

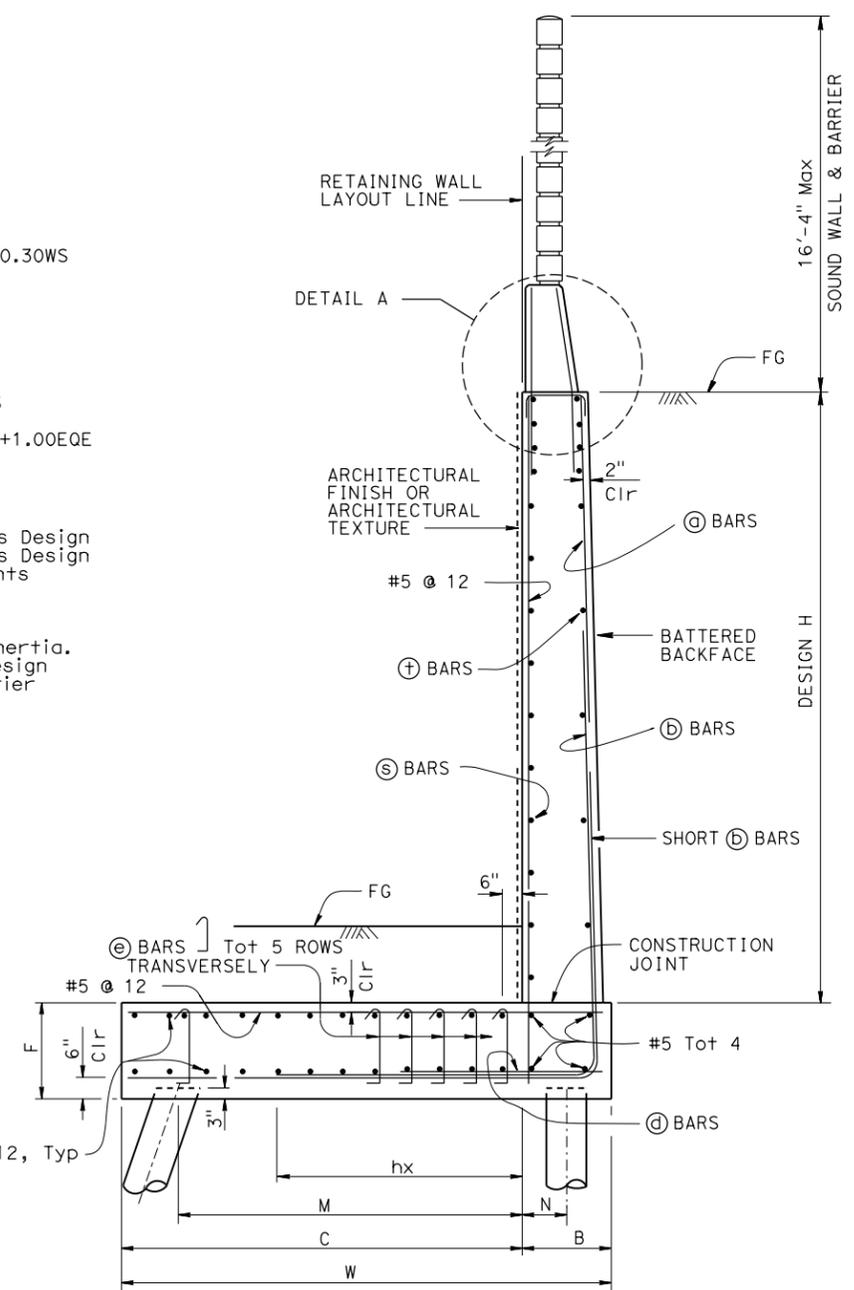
NO SCALE

For Details not shown, see "DETAIL A - WITHOUT HAUNCH"



DETAIL A - WITHOUT HAUNCH

NO SCALE



PILE FOOTING SECTION

NO SCALE

STANDARD DRAWING	
FILE NO. xs14-410-1	APPROVAL DATE <u>October 2014</u>

STATE OF CALIFORNIA		DIVISION OF ENGINEERING SERVICES	
DEPARTMENT OF TRANSPORTATION		PROJECT NUMBER & PHASE: X	

BRIDGE NO.	X	RETAINING WALL TYPE 7SWBP - DETAILS No. 1
POST MILE	X	