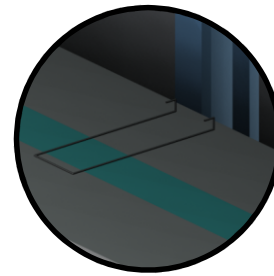
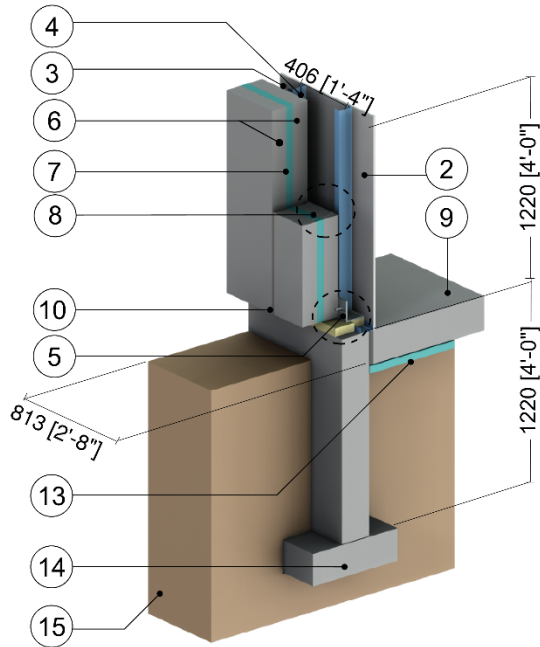
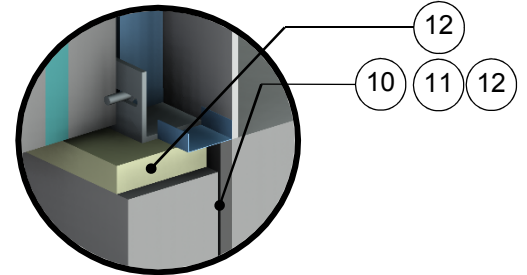


Detail 3

Precast Sandwich Panel with 3 5/8" Steel Stud (16" o.c.) – Thermally Broken Concrete Slab and Foundation Intersection



Connector Detail



Gravity and Slot Anchor Detail

ID	Component	Thickness Inches (mm)	Conductivity Btu·in / ft ² ·hr·°F (W/m K)	Nominal Resistance hr·ft ² ·°F/Btu (m ² K/W)	Density lb/ft ³ (kg/m ³)	Specific Heat Btu/lb·°F (J/kg K)
1	Interior Film ¹	-	-	R-0.7 (0.12 RSI) to R-0.9 (0.16 RSI)	-	-
2	Gypsum Board	1/2" (13)	1.1 (0.16)	R-0.5 (0.08 RSI)	50 (800)	0.26 (1090)
3	Air in Stud Cavity	5" (127)	-	R-0.9 (0.16 RSI)	0.075 (1.2)	0.24 (1000)
4	3 5/8" Steel Studs with Top and Bottom Tracks	18 gauge	430 (62)	-	489 (7830)	0.12 (500)
5	Gravity and Slot Anchors at Slab	-	347 (50)	-	489 (7830)	0.12 (500)
6	Precast Sandwich Panels	4" (102)	12.5 (1.8)	-	140 (2250)	0.20 (850)
7	Precast Sandwich Panel, Insulation	2" (51)	-	R-10 (1.76 RSI)	1.8 (28)	0.29 (1220)
8	Precast Sandwich Panel, Structural Ties @ 24" (610) o.c.	16 gauge	430 (62)	-	489 (7830)	0.12 (500)
9	Concrete Slab on Grade	8" (203)	12.5 (1.8)	-	140 (2250)	0.20 (850)
10	Sealant	-	2.4 (3.5)	-	174 (2800)	0.17 (700)
11	Fibreboard	1" (25)	0.38 (0.055)	R-2.6 (0.47 RSI)	16 (254)	0.50 (2100)
12	Armatherm 500	2" (50)	0.32 (0.05)	R-6.2 (1.09 RSI)	-	-
13	Foundation Insulation	3 1/2" (89)	0.24 (0.0343)	R-15 (2.6 RSI)	1.8 (28)	0.29 (1220)
14	Concrete Footing	12" (305)	12.5 (1.8)	-	140 (2250)	0.20 (850)
15	Soil	-	15.6 (2.25)	-	-	-
16	Exterior Film ¹	-	-	R-0.2 (0.03 RSI)	-	-

¹ Value selected from table 1, p. 26.1 of 2009 ASHRAE Handbook – Fundamentals depending on surface orientation