

UL/cUL SYSTEM NO. F-A-1105

METAL PIPE THROUGH CONCRETE FLOOR ASSEMBLY

F-RATING = 2-HR.

T-RATING = 2-HR.

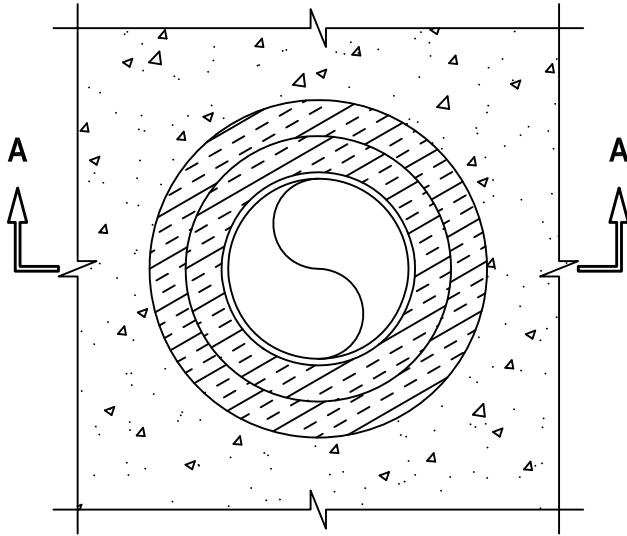
L-RATING AT AMBIENT = LESS THAN 1 CFM / SQ FT

L-RATING AT 400°F = 4 CFM / SQ FT

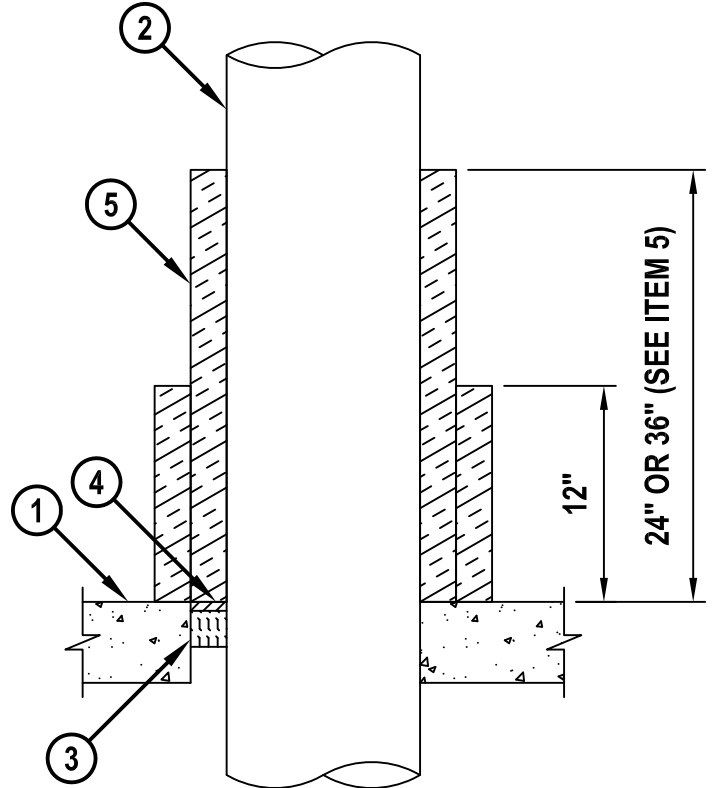
W-RATING = CLASS I (SEE NOTE NO. 4 BELOW)

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TOP VIEW



SECTION A-A



Hilti Firestop Systems

HILTI, Inc.
Tulsa, Oklahoma USA (800) 879-8000

Sheet 1 of 2

Scale 3/32" = 1"

Date Jan. 07, 2015

Drawing No.

**FA
1105e**

Saving Lives through Innovation and Education

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1. CONCRETE FLOOR ASSEMBLY (2-HR. FIRE-RATING) :
 - A. LIGHTWEIGHT OR NORMAL WEIGHT CONCRETE FLOOR (MINIMUM 4-1/2" THICK).
 - B. STEEL FLOOR UNIT/FLOOR ASSEMBLY (UL/cUL D700, D800, OR D900 SERIES) - LIGHTWEIGHT OR NORMAL WEIGHT CONCRETE FLOOR (MINIMUM 2-1/2" THICK) OVER METAL DECKING.
2. PENETRATING ITEM TO BE ONE OF THE FOLLOWING :
 - A. MAXIMUM 10" NOMINAL DIAMETER STEEL PIPE (SCHEDULE 40 OR HEAVIER).
 - B. MAXIMUM 10" NOMINAL DIAMETER CAST OR DUCTILE IRON PIPE.
 - C. MAXIMUM 6" NOMINAL DIAMETER STEEL CONDUIT.
 - D. MAXIMUM 4" NOMINAL DIAMETER EMT.
3. MINIMUM 2" THICKNESS MINERAL WOOL (MIN. 4 PCF DENSITY) TIGHTLY PACKED.
4. MINIMUM 1/2" DEPTH HILTI FS-ONE MAX OR FS-ONE INTUMESCENT FIRESTOP SEALANT OR HILTI CP 604 SELF-LEVELING FIRESTOP SEALANT, HILTI CFS-S SIL GG FIRESTOP SILICONE SEALANT, OR HILTI CFS-S SIL SL FIRESTOP SILICONE SEALANT (SEE NOTE NO. 3 BELOW).
5. DUCT WRAP (NOMINAL 1-1/2" OR 2" THICK FYREWRAP DUCT INSULATION OR FIREWRAP DUCT 1.5 INSULATION [MANUFACTURED BY UNIFRAX] OR NOMINAL 1-1/2" THICK FIREMASTER FASTWRAP XL DUCT INSULATION [MANUFACTURED BY THERMAL CERAMICS]) WRAPPED AROUND PENETRANT, EXTENDING 24" ABOVE THE FLOOR (FOR PENETRANTS OF NOMINAL 4" DIAMETER OR SMALLER) OR 36" ABOVE THE FLOOR (FOR PENETRANTS GREATER THAN A NOMINAL 4" DIAMETER). AN ADDITIONAL LAYER OF DUCT WRAP TIGHTLY WRAPPED AROUND THE FIRST LAYER OF DUCT WRAP, EXTENDING 12" ABOVE FLOOR. SEAMS TO OVERLAP MINIMUM 1" AND SEALED WITH FOIL TAPE.

NOTES :

1. MAXIMUM DIAMETER OF OPENING = 12-3/4".
2. ANNULAR SPACE = MINIMUM 0", MAXIMUM 2".
3. WHEN HILTI CP 604 SELF-LEVELING FIRESTOP SEALANT, HILTI CFS-S SIL GG FIRESTOP SILICONE FIRESTOP SEALANT, OR HILTI CFS-S SIL SL FIRESTOP SILICONE SEALANT IS USED, MINIMUM THICKNESS OF MINERAL WOOL IS 4" AND MINIMUM THICKNESS OF FLOOR IS 4-1/2".
4. W-RATING APPLIES ONLY WHEN HILTI CP 604 SELF-LEVELING FIRESTOP SEALANT, HILTI CFS-S SIL GG FIRESTOP SILICONE FIRESTOP SEALANT, OR HILTI CFS-S SIL SL FIRESTOP SILICONE SEALANT IS USED.



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Scale	-
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