

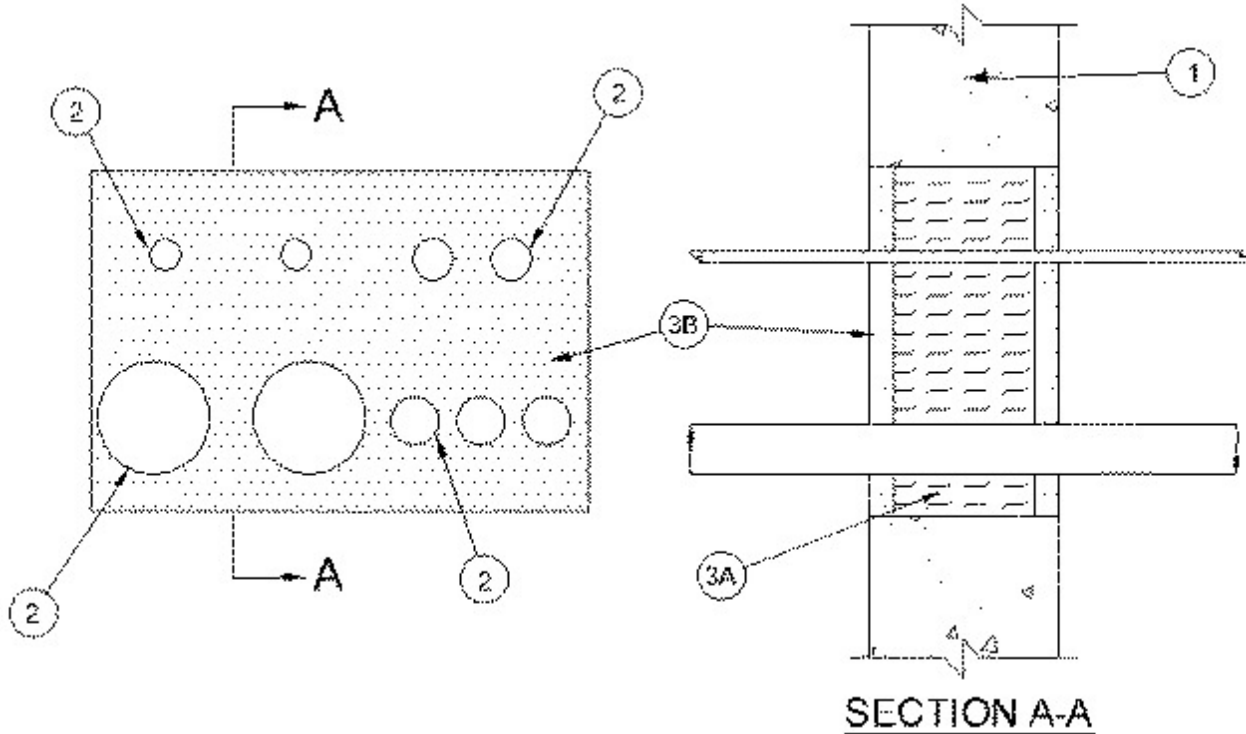


System No. W-J-8021

April 03, 2003

F Rating — 2 Hr

T Ratings — 1/4, 1/2 or 3/4 Hr (See Item 2)



1. **Wall Assembly** — Min 6 in. thick reinforced lightweight or normal weight (100-150 pcf) concrete. Wall may also be constructed of any UL Classified **Concrete Blocks***. Max area of opening is 200 sq in. with a max dimension of 20 in.

See **Concrete Blocks** (CAZT) category in the Fire Resistance Directory for names of manufacturers.

2. **Through Penetrants** — Any combination of the following metallic penetrants to be installed within the firestop system. The annular space between penetrants shall be min 1/4 in. to max 3-1/2 in. and between penetrants and periphery of opening shall be min 1/4 in. to max 2-1/2 in. Penetrants to be rigidly supported on both sides of floor or wall assembly. The following types and sizes of conduit or metal clad cable may be used:

A. **Conduit** — Nom 4 in. diam (or smaller) electrical metallic tubing . Max two 4 in. diam conduits and max three 2 in. diam conduits per opening. **When 3 or 4 in diam EMT is used, T Rating is 1/2 hr. When 2 in. diam (or smaller) EMT is used, T Rating is 3/4 hr.**

B. **Metal Clad Cable+** — Nom 2 in. diam (or smaller) 4 conductor 2/0 AWG steel or aluminum Metal Clad Cable+ with or without PVC jacket. Max two metal clad cables per opening. **When metal clad cable is used, T Rating is 1/2 hr.**

See **Through-Penetrating Products** (XLHY) category in Vol. 2 of the Fire Resistance Directory for names of manufacturers.

C. **Flexible Metal Conduit** — Nom 1-1/2 in. diam (or smaller) steel or aluminum **Flexible Metal Conduit+**. Max two flexible metal conduits per opening. **When flexible metal conduit is used, T Rating is 1/4 hr.**

See **Flexible Metal Conduit** (DXUZ) category in the Electrical Construction Materials Directory for names of manufacturers.

T Rating of firestop system is equal to the lowest T Rating of any penetrant used.

3. Firestop System — The firestop system shall consist of the following:

A. Packing Material — Min 4-3/4 in. thickness of min 4 pcf mineral wool batt insulation firmly packed into opening as a permanent form. Packing material to be recessed from both surfaces of wall as required to accommodate the required thickness of fill material.

B. Fill, Void or Cavity Material* - Caulk — Min 5/8 in. thickness of fill material applied within the annulus, flush with both surfaces of wall.

RECTORSEAL — Biostop 500+

*Bearing the UL Classification Mark