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FIRE DOOR FRAME LISTING PROGRAM

	Fire Door Frames Sinzheim, Germany	
Listing No. Project No.	F411-2 F411-2 Edition 10	
Effective Date: st Revised Date:	October 12, 2012 December 18, 2023	
Standards:	CAN/ULC S104 UL 10B UL 10C NFPA 252	Standard Method for Fire Tests of Door Assemblies. Fire Tests of Doors Assemblies. Fire Tests of Doors Assemblies. Standard Methods of Fire Tests of Door Assemblies.
Product:	45 min Rated Positive Pressure Fire Door Frames	
Markings:	See FD001 - Fire Door Labeling requirements	
Models:	45-MINUTE CATEGORY C FIRE DOOR FRAMES:	

Maximum Frame Sizes:

MDF Core:

Last

Swing Type:		Maximum Dimensions		
		Width:	Height:	
Single Swing	Rectangular	3'6" (1067 mm)	7'9" (2362 mm)	
	Arched Top	3'6" (1067 mm)	7'9" (2362 mm)	
	Mulled Assembly	7'0" (2134 mm)	7'9" (2362 mm)	
Pairs		Not Permitted		
Double Egress		Not Permitted		

Laminated Core Version 1:

Swing Types	Maximum Dimensions		
Swing Type:	Width:	Height:	
Single Swing	3'6" (1067 mm)	9'0" (2743 mm)	
Communicating	3'6" (1067 mm)	9'0" (2743 mm)	
Pairs	7'0" (2134 mm)	9'0" (2743 mm)	
Double Egress	Not Permitted		



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Laminated Core Version 2:

Swing Type:	Maximum Dimensions		
Swing Type:	Width:	Height:	
Single Swing	3'6" (1067 mm)	10'0" (3048 mm)	
Communicating	3'6" (1067 mm)	9'0" (2743 mm)	
Pairs	7'0" (2134 mm)	9'0" (2743 mm)	
Double Egress	Not Pe	ermitted	

Limitations:

Minimum Frame Width: Maximum Frame Width: Minimum Frame Thickness:

Minimum Rabbet for Door: Minimum Stop Height: Minimum Stop Width: 4-3/4"
Equivalent to wall thickness
3/4" (-1/16") [MDF frame]
5/8" (-1/16") [Laminated Core frame]
1-3/4"
1/2"
1-3/16"
1-11/16" [Communicating Door Frame]

Maximum Sizes Fire Rated Fire Windows, and SIdelites:

Mindow Trees	Maximum Dimensions		
Window Type:	Width:	Height:	
Single Glazed	2'0'' (610 mm)	4'0" (1219 mm)	
Combination	maximum 2 units wide x 2 units high		

Limitations:

Minimum Frame Width:	4-1/2"
Maximum Frame Width:	Equivalent to wall thickness
Minimum Frame Thickness:	5/8" [Wolman SW 45-1 Material]
Maximum Frame Thickness:	1 ¹ / ₂ " [Wolman SW 45-1 Material + MDF]
Minimum Mullion Thickness:	2"
Stop Height:	1/2"
Stop Width:	3/4"



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Glass Lights (Listed and labeled for rated opening):

- Glazing material shall be listed and labeled for rated opening and light kit type.
- Glazing installed in accordance with the installation instructions for Wolman frames.
- Glazing details:
 - Maximum window opening 24" x 48" (Width x Height) with Wolman vision kit using Listed 3/16" ceramic glazing.
 - Wolman Glazing Clips used at 8" maximum spacing, fastened using 3/4" staples or flat head nails.
 - Silicone sealant must be used around perimeter of glass (between the glass and frame).

Arched Top Frames:

Full Arch, arched top door frame:

The frame remains the same as the rectangular frame except it features a half-ofdoor-width radius curve. Two framed corner supports will be installed in the corners of the rough opening.

Shallow Arch, arched top door frame:

The frame remains the same as the rectangular frame except it features a large radius curve where the top hinge remains in the original location.

Mulled Assemblies:

Sidelites may be mulled to door frames.

Casing / Moulding:

Material: MDF or Solid wood with minimum density of 27 lbs./ft³ density Minimum 3/8" thick x 1-1/2" wide.

Frame moulding to be applied with finishing nails at 12" on center.

Hardwood Facings: Maximum $\frac{1}{4}$ " Hardwood Facing applied to the face of the frame members.

Hinge and Hardware Preparation:

Hinges and applicable hardware must be fire rated for use in openings at or above the fire rating of the frame system being installed. All hinges must be installed as per NFPA 80.

Preparation of hinges and hardware shall be made in accordance with NFPA 80, and the manufacturer's installation instructions and templates.



Concealed Hinges:

Listed SOSS and TECTUS concealed hinges are permitted but require the frame thickness to be built-up to fully enclose the hinge body.

Electric Strikes:

Listed electric strikes are permitted but require the frame thickness to be built-up to fully enclose the strike body. Maximum mortise depth 1 $\frac{1}{2}$ ", maximum mortise height 3 $\frac{1}{2}$ ".

Electric Raceways:

A ¹⁄₄" diameter hole is permitted anywhere below 40" above the floor on the hinge or latch frame leg. Wire can then be routed through the hole for electronically controlled hardware. The hole may be left open or sealed with silicone caulking.

Mortised Door Closer:

Concealed closer allowed in the frame header. Maximum 2-1/6" x 3-5/8" x 12" pocket dimensions lined with Interdens Type 15 on 4 sides.

Header is constructed with layers of Palusol SW cores. Minimum 3/8" frame header thickness above the concealed closer pocket.

Installation:

Frame to be installed in accordance with installation. Installation instructions shall be shipped with frames.

Shims need to be installed. Silicone caulking applied between the jamb and rough opening on both sides of the assembly. Each hinge needs to be fastened through the shim into the frame with at least $#12 \times 2 \cdot 1/2$ " screws. The frame can then be fastened at all non-hinge shim locations with 2" finishing nails. Follow NFPA 80 Installation guidelines.

Notes: Refer to QAI evaluation report F411-2 and the applicable test reports for test assembly configurations used for fire endurance testing.

Refer to the <u>QAI FD002 - Fire Door Guidelines for general guidelines of fire door</u> assemblies

Final acceptance of the product in the intended application is to be determined by the authority having jurisdiction (AHJ).

Product is to be installed in accordance with the manufacturer's published installation instructions by qualified installing personnel.



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