

Feb. 27/98

90-MINUTE NEUTRAL PRESSURE FIRE DOOR SPECIFICATIONS

Door Types	GP90, CD900, & LD9000
Fire Rating	90-minute single swing - including: - single door - door and transom 90-minute pairs including: - regular pair - double egress pair Label and Classification by Intertek/Inchcape Testing Services (Warnock Hersey)
Sizes	Single Swings Standard Single Swing: - 4'0" x 10'0" Single Swing Door with Transom: 4'0" x 10'0" overall 4'0" x 3'0" transom
Sizes	Standard Pairs - Options with Metal Edges Active/active or active/inactive 3 or 4 point latching: 1" GP Firestop meeting stiles and 1" metal edges - 6'0" x 7'0" Active/active or active/inactive 3 or 4 point latching: 2" GP Firestop meeting stiles and 1" metal edge - 8'0" x 8'0" Rim x Rim with removeable mullion: 2" GP Firestop meeting stiles and 1" metal edge - 8'0" x 8'0" Labelled Surface Mounted Top Rod Only Device of both leaves: thermally activated pin on each leaf (door to floor/sill), 3" bottom rail, 1" GP Firestop meeting stiles, and 1" metal edges - 8'0" x 8'0" Concealed Vertical Rod on both leaves: 5" GP Firestop meeting stiles and 5" metal edges 8'0" x 9'0" Surface Mounted Vertical Rods both leaves: 1" GP Firestop meeting stiles and 1" metal edges - 8'0" x 9'0"
Sizes	Standard Pairs - Options without Metal Edges Active/active or active/inactive 3 or 4 point latching: 2" GP Firestop meeting stiles 6'0" x 7'0" Active/active or active/inactive 3 point latching: special 4" GP Firestop meeting stiles with intumescent strip in stile - 8'0" x 8'0" Rim x Rim with removeable mullion and special 4" GP Firestop meeting stiles with intumescent strip in stile - 8'0" x 8'0" Adams Rite Concealed Top Rod Only Device installed on both leaves: thermally activated pin on each leaf (door to door/sill), 3" bottom rails, and special 4" GP Firestop meeting stiles with intumescent strip in stiles - 8'0" x 8'0" Surface Mounted Vertical Rods both leaves with a special 4" GP Firestop meeting stiles with intumescent strip in stile - 8'0" x 8'0"
Sizes	Double Egress Pairs - Option with Metal Edges Active/Inactive 3 or 4 point latching: 1" GP Firestop meeting stiles and 1" metal edges - 6'0 x 7'0" Active/Active Surface Mounted Vertical Rods both leaves: 5" GP Firestop meeting stiles and 1" metal edges - 8'0" x 8'0" Active/Active Concealed Vertical Rods both leaves: 5" GP Firestop meeting stiles and 5" metal edges - 8'0" x 8'0"

Sizes	<p>Double Egress Pairs - Option without Metal Edges</p> <p>Active/Active Surface Mounted Vertical Rods on both leaves, special 4" GP Firestop meeting stiles with intumescent strip in stiles - 8'0" x 8'0"</p> <p>Active/Active Adams Rite Concealed Top Rod only on each leaf with thermally activated pin on each leaf (door to floor/sill), 3" bottom rail, and special 4" GP Firestop meeting stiles with intumescent strip in stile - 8'0" x 8'0"</p>
Transoms	<p>Single Door</p> <p>4'0" x 10'0" maximum combination with 4'0" x 3'0" maximum transom size.</p> <p>Requires an approved transom bar or a) 5" minimum GP Firestop meeting edges and a rabbett cut joint or</p> <p>b) Metal edge on the top of the door and metal edge and astragal on bottom edge of transom for straight cut joint.</p> <p>Paired Doors</p> <p>8'0" x 10'0" maximum total size, transoms installed over a pair of doors must be separated with a mullion limiting the width of the each separate transom to the width of each leaf of the door pair.</p>
Stiles	<p>Minimum 1" GP Firestop composition with or without maximum of 1/4" wood after trim.</p> <p>Special GP stiles used in some standard pairs and all double egress pairs (see sizes)</p> <p>Mill option stiles unless specified, with hardwoods to match faces available.</p>
Rails	<p>Top rail - Minimum 1" GP Firestop composition with or without maximum 1/4" wood after trim.</p> <p>Bottom rail - minimum 1" GP Firestop composition after trim.</p> <p>Mill option rails unless specified, hardwood top rails available on request.</p>
Core	GP fire door core.
Adhesive	Residential, Commercial, Architectural - all Type I water proof
Faces	1/8" plywood, hardboard, medium density overlay, or decorative plastic laminate in general purpose 0.050" thickness.
Vision Panels	Maximum visible glass area of single or multiple lights not to exceed 100 sq. in. per leaf. Maximum cutout width is 10". Maximum cutout height is 33". Cutouts must be 6" from edge of door or any other cutout or hardware preps, with a minimum bottom rail of 10". Lights must be glazed with a minimum of 1/4" wire glass installed in a listed and labeled frame. (For larger lights, please call for information).
Louvres	Maximum cutout width of 24" and maximum height of 24". Cutouts must be 6" from edge of door or any hardware prep and 10" from bottom of door. Doors prepared for louvres shall not be prepared for vision panels or fire exit hardware.
Blocking	May be placed at desired locations to provide adequate screw holding and support for various hardware applications.
Hinges	Per NFPA 80, Table 2-8.1.1 - listed butt, spring, pivot, pocket pivot, anchor, continuous or Soss invisible hinges - minimum 4" x 4" x 0.097" thickness.
	Pivot, anchor, and pocket - blocking is recommended. Soss invisible - blocking required.

Latch sets	Positive latching required on all fire doors. Roller latches not allowed. Minimum latch throw is 1/2". Listed cylindrical - maximum 2-1/8" diameter bore, maximum 5" backset (unless blocked) Listed mortise with maximum 4-1/2" deep by 6-1/2" high pocket.
Exit devices	Listed exit device with rim, mortise, surface vertical rod, concealed vertical rod or surface mounted top rod only devices. Through bolts are required if no blocking is specified. See sizes (Pg. 1 & 2) or call Lynden Door for more information.
Dead bolts	Listed dead bolt - maximum 2-1/8" diameter with a minimum of 6" from deadbolt center line to lock bolt center line. Maximum 5" backset unless blocked.
Viewers	Listed viewers to a maximum 1" diameter
Flush bolts	Listed mortised automatic or semi-automatic, or surface mounted manual flushbolts with a minimum latch throw of 3/4" are allowed. Extension latchbolts up to 24" with a maximum hole diameter of 1/2" are allowed.
Edge guards	For installation of pairs without GP II meeting stiles, channels of 18 or 20 gauge steel with a minimum lap of 1" and attached to with a minimum #8 x 3/4" screws 2" from each end and 12" on center. Mortise edge guards are allowed when a minimum of 2" GP II stiles are used. Surface mounted edge guards are allowed.
Door bottoms	Mortised or semi-mortised type with a maximum cutout of 1" x 1-3/4", or surface-mounted type are allowed. Cutouts require a minimum 3" GP bottom rail.
Closers	Closing devices are required on all fire doors. Surface mounted - mounted with through bolts or a minimum of #12 x 1-1/4" fully threaded to the head, wood screws with a 5" GP Firestop top rail. Floor closers require a minimum of a 5" GP Firestop bottom rail. Spring Hinges are allowed - minimum 1" GP Firestop stile strongly recommended.
Wire Chase	3/8" x 3/8" square or 3/8" diameter through the door connecting the latch location to the hinge location on the opposite side of the door for low voltage wiring is allowed. A hole up to 5/8" diameter by 2" long may be provided on the hinge stile for wire splice.
Protection plates	Plates up to 48" from the bottom edge of door may be applied with WHI approval of materials and fastenings.
Plant ons	Maximum width 2-1/2", maximum thickness 3/4" wood with a density of 28.7 pcf or denser, and may not be applied closer than 3-1/2" to the edge of the door, or to lights or hardware cutouts. Maximum area of moulding can not exceed 20% of the door face. Adhesive only may be used. No mechanical fasteners are allowed.