Ground-Mount Enclosures

Type 4 EnviroShield[™] Free-Standing with 3-Point Locking Data Sheet



Application

- Houses electrical controls and electrical instruments in harsh environments
- Provides quick and easy access indoors and out
- Protects against circulating dust, falling dirt, dripping non-corrosive liquids, rain, sleet, ice, splashing and hose directed water

Standards

- UL 508A listed, Type 3R, Type 4, Type 4X, Type 12
- Conforms to NEMA standard for Type 3R, Type 4, Type 4X, Type 12
- NSF Criteria C-2
- E.I.A. RS-310-D

Finish

• Type 4 enclosures have a washed and phosphate undercoat with ANSI 61 gray polyester powder inside and out

Accessories

- Full and half panels
- Side and swing panels
- Center post
- Channel mounting hardware
- Touch-up paint
- Climate control
- Mounting legs
- Rack mounting angles
- Swing out mounting frames
- See Accessories section
- Replacement handle, BD-PKHB (see page 429).

Construction

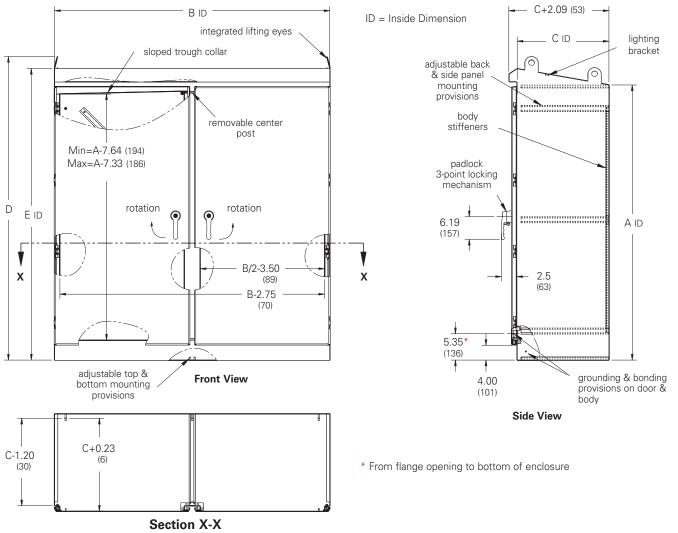
- Enclosure and door are fabricated from (12) gauge steel
- All continuous welded seams are finished smooth
- Doors are secured to the body with removable concealed hinges and a center locating 3-point key-locking and padlock handle mechanism
- Modern bevel profile on both sides of enclosure doors
- Removable center post
- Doors have a Neoprene IV2 closed cell gasket
- Ground studs provided on doors and body
- Print pocket provided
- Large lifting eyes are integrated with sides of enclosure
- Mounting channels are welded inside for locating panels or rack mounts along enclosure depth, as well as mounting studs for fixed panels
- Swing panels, single full and single half panels can be installed in double-door enclosures when the center post is used
- A variety of optional panels and accessories are available, (see pages 180-191)

Discount Schedule: C2 Subclass: VR0

Notes: We can provide special sizes, finishes and other modifications. Consult the factory for your special requirements.

Ground-Mount Enclosures Type 4 EnviroShield[™] Free-Standing with 3-Point Locking Illustration Sheet and Catalog Number

Enclosure Catalog Number ANSI 61 Gray	Enclosur Height x Wic A x B	ith x Depth		n		-
Carbon Steel	in.	mm	in.	mm	in.	- mm
ES-604812-4	60.00 x 48.00 x 12.00	1524 x 1219 x 305	65.87	1673	64.44	1637
ES-604816-4	60.00 x 48.00 x 16.00	1524 x 1219 x 406	65.87	1673	64.44	1637
ES-604820-4	60.00 x 48.00 x 20.00	1524 x 1219 x 508	65.87	1673	64.44	1637
ES-604824-4	60.00 x 48.00 x 24.00	1524 x 1219 x 609	65.87	1673	64.44	1637
ES-606012-4	60.00 x 60.00 x 12.00	1524 x 1524 x 305	65.87	1673	64.44	1637
ES-606016-4	60.00 x 60.00 x 16.00	1524 x 1524 x 406	65.87	1673	64.44	1637
ES-606020-4	60.00 x 60.00 x 20.00	1524 x 1524 x 508	65.87	1673	64.44	1637
ES-606024-4	60.00 x 60.00 x 24.00	1524 x 1524 x 609	67.87	1724	64.44	1637
ES-726012-4	72.00 x 60.00 x 12.00	1829 x 1524 x 305	77.87	1978	76.44	1941
ES-726016-4	72.00 x 60.00 x 16.00	1829 x 1524 x 406	77.87	1978	76.44	1941
ES-726020-4	72.00 x 60.00 x 20.00	1829 x 1524 x 508	77.87	1978	76.44	1941
ES-726024-4	72.00 x 60.00 x 24.00	1829 x 1524 x 609	77.87	1978	76.44	1941
ES-727212-4	72.00 x 72.00 x 12.00	1829 x 1829 x 305	77.87	1978	76.44	1941
ES-727216-4	72.00 x 72.00 x 16.00	1829 x 1829 x 406	77.87	1978	76.44	1941
ES-727220-4	72.00 x 72.00 x 20.00	1829 x 1829 x 508	77.87	1978	76.44	1941
ES-727224-4	72.00 x 72.00 x 24.00	1829 x 1829 x 609	79.87	2028	76.44	1941

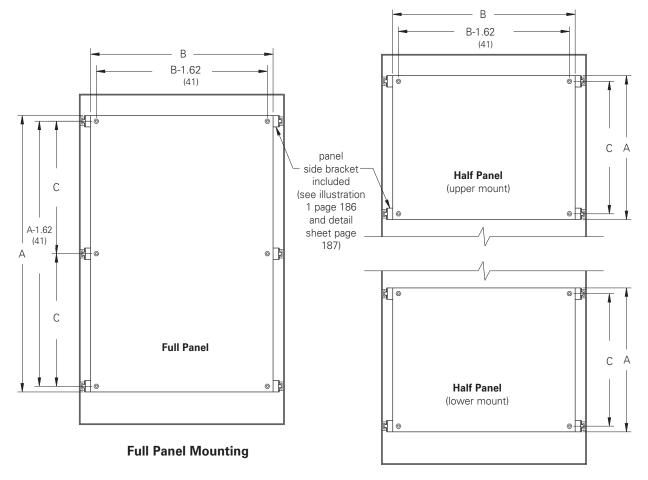


Type 4 Panel Enclosures

Free-Standing Enclosure Accessories Type 4 Single-Door Full and Half Panel Illustration Sheet and Catalog Number

Discount Schedule: C2 Subclass: DSD

	Full F	Panel (Si	ngle	-Do	or)		Half Panel (Single-Door)							
Panel	Panel Panel Size				Fits	s	 Panel Panel Size				Fit	s		
Catalog Number	Height x A x ^{in.}		C in.	mm	Enclos Height x ^{in.}		 Catalog Number	Height x A x ^{in.}		(in.	; mm	Enclo Height x ^{in.}		
AF6024P	47.87 x 19.87	1216 x 505	23.12	587	60.00 x 24.00	1524 x 610	AF6024HP	24.75 x 19.87	629 x 505	23.12	587	60.00 x 24.00	1524 x 610	
AF6036P	47.87 x 31.87	1216 x 809	23.12	587	60.00 x 36.00	1524 x 914	AF6036HP	24.75 x 31.87	629 x 809	23.12	587	60.00 x 36.00	1524 x 914	
AF7224P	59.87 x 19.87	1521 x 505	29.12	740	72.00 x 24.00	1829 x 610	AF7224HP	30.75 x 19.87	781 x 505	29.12	587	72.00 x 24.00	1829 x 610	
AF7230P	59.87 x 25.87	1521 x 657	29.12	740	72.00 x 30.00	1829 x 762	AF7230HP	30.75 x 25.87	781 x 657	29.12	587	72.00 x 30.00	1829 x 762	
AF7236P	59.87 x 31.87	1521 x 809	29.12	740	72.00 x 36.00	1829 x 914	AF7236HP	30.75 x 31.87	781 x 809	29.12	587	72.00 x 36.00	1829 x 914	



Half Panel Mounting

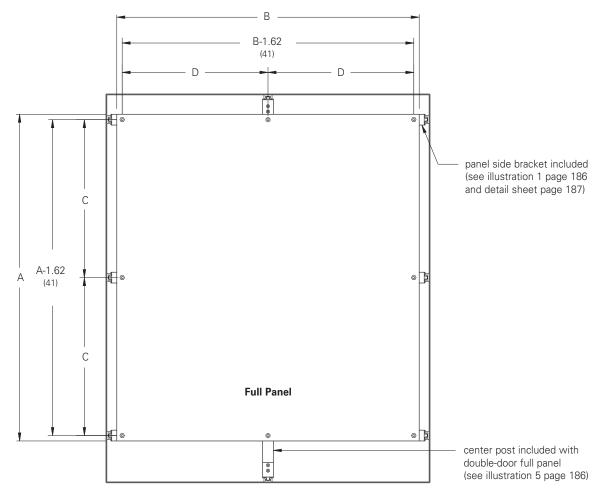
Note: Full and Half panel for single-door, single and dual-access enclosures are (12) gauge steel and furnished with panel side brackets and all hardware necessary for channel and panel mounting. Half Panels can be mounted in either the upper or lower portion of the enclosure. Free standing design permits the panel to adjust along the depth of the enclosure. With dual-access enclosures, Full and Half panels can be mounted back-to-back.

Free-Standing Enclosure Accessories Type 4 Double-Door Full Panel

Discount Schedule: C2 Subclass: DSD

Illustration Sheet and Catalog Number

Panel Catalog	Panel Size Height x Width A x B		C	;	D		Fits End Height >	
Number	in.	mm	in.	mm	in.	mm	in.	mm
AF6048P	47.87 x 43.87	1216 x 1114	23.12	587	21.12	530	60.00 x 48.00	1524 x 1219
AF6060P	47.87 x 55.87	1216 x 1419	23.12	587	27.12	689	60.00 x 60.00	1524 x 1524
AF7248P	59.87 x 43.87	1521 x 1114	29.12	740	21.12	530	72.00 x 48.00	1829 x 1219
AF7260P	59.87 x 55.87	1521 x 1419	29.12	740	27.12	689	72.00 x 60.00	1829 x 1524
AF7272P	59.87 x 67.87	1521 x 1724	29.12	740	33.12	841	72.00 x 72.00	1829 x 1829



Full Panel Mounting

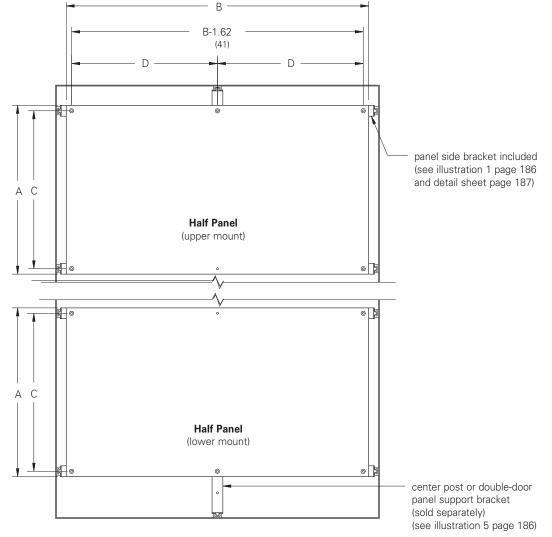
Notes: Full Panel for double-door, single and dual-access enclosures are (10) gauge steel and furnished with Panel Brackets, Center Post assembly, panel handle kit and all hardware necessary for channel and panel mounting. The Center Post assembly offers additional support of panel and equipment. Free-standing design permits the panel to adjust along the depth of the enclosure. With dual-access enclosures, Full and Half Panels can be mounted back-to-back.

Free-Standing Enclosure Accessories Type 4 Double-Door Half Panel

Discount Schedule: C2 Subclass: DSD

Illustration Sheet and Catalog Number

Panel	Panel Size Height x Width						Fits Enc Height x	
Catalog Number	A x	B	in.	; 	D in. mm		in.	mm
AF6048HP	24.75x43.87	629x1114	23.12	587	21.12	536	60.00x48.00	1524x1219
AF7248HP	30.75x43.87	781x1114	29.12	740	21.12	536	72.00x48.00	1829x1219
AF7260HP	30.75x55.87	781x1419	29.12	740	7.12	181	72.00x60.00	1829x1524
AF7272HP	30.75x67.87	781x1724	29.12	740	33.12	841	72.00x72.00	1829x1829



Half Panel Mounting

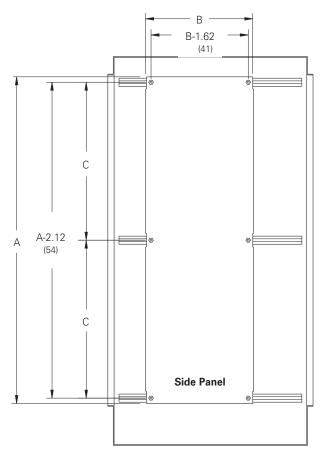
Note: Half panel for double-door, single and dual-access enclosures are (12) gauge steel and furnished with Panel Brackets and all hardware necessary for channel and panel mounting. A Center Post assembly or a double-door panel support bracket (catalog number AFSUP2) for additional support of the panel is optional and sold separately. Free-standing design permits the panel to adjust along the depth of the enclosure. With dual-access enclosures, Full and Half Panels can be mounted back-to-back.

Free-Standing Enclosure Accessories Type 4 Side Panel And Center Post Illustration Sheet and Catalog Number

Panel	Pane			Fit	s En	closu	re					
	Height x Width A x B		c		Height		Depth*					
Catalog Number	in.	mm	in.	mm	in.	mm	in.	mm				
AF6018SP	48.37 x 13.87	1229 x 340	23.12	587	60.00	1524	18.00	457				
AF7218SP	60.37 x 13.87	1533 x 340	29.12	740	72.00	1829	18.00	457				
AF7224SP	60.37 x 19.87	1533 x 505	29.12	740	72.00	1829	24.00	610				

Side Panel - Subclass: DSD

*	Back panels	restrict the m	ovement of	side pan	els and will prohibit	
	mounting in	some depths.	See detail	sheet for	back panel spacing.	

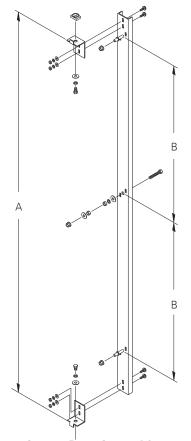


Side Panel Mounting

Side Panels are (12) gauge steel and furnished with hardware necessary for channel mounting. They will fit any width enclosure and are adjustable along its depth, however, when Full or Half Panels are installed, movement will be restricted and with some depths make side mounting prohibitive. **Discount Schedule: C2**

Center Post - Subclass: DS0

Center Post					Fi Enclo	
Catalog Number	A in.	mm	in.) mm	Hei in.	ght mm
AF60CPS	58.37	1483	23.12	587	60.00	1524
AF72CPS	70.37	1787	29.12	740	72.00	1829



Center Post Assembly

Center Post assembly is furnished with all double-door Full Panels and includes hardware necessary for channel and panel mounting. The Center Post is optional on double-door Half Panels and Swing Panel mounting and must be ordered separately. It attaches to the top and bottom channels making it adjustable along the depth of the enclosure. See illustration #5 on the Detail Sheet-page 186.

Type 4 Panel Enclosures

Free-Standing Enclosure Accessories Type 4 Single-Door Full and Half Swing Panel Illustration Sheet and Catalog Number

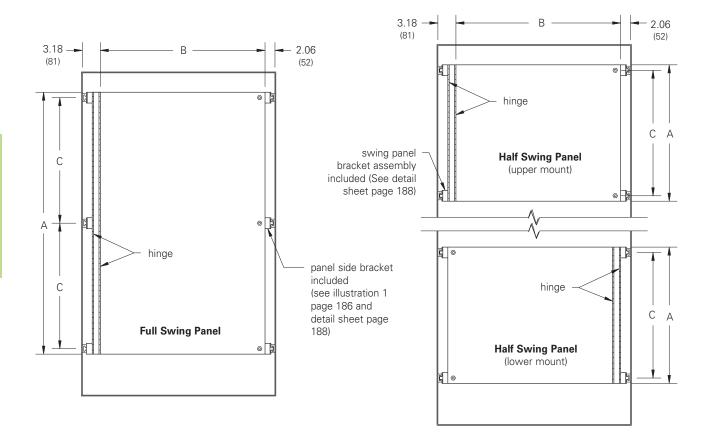
Full Swing Panel (Single-Door)

Discount Schedule: C2 Subclass: DSD

Half Swing Panel (Single-Door)

Panel	Panel			Fit	S		
0.1	Height x			Enclosure			
Catalog Number	A x in.	B	C in.	; mm	Height x in.	Width	
AF6024SWP	47.87 x 18.75	1216 x 476	23.12	587	60.00 x 24.00	1524 x 610	
AF6036SWP	47.87 x 30.75	1216 x 781	23.12	587	60.00 x 36.00	1524 x 914	
AF7224SWP	59.87 x 18.75	1521 x 476	29.12	740	72.00 x 24.00	1829 x 610	
AF7230SWP	59.87 x 24.75	1521 x 629	29.12	740	72.00 x 30.00	1829 x 762	
AF7236SWP	59.87 x 30.75	1521 x 781	29.12	740	72.00 x 36.00	1829 x 914	

Panel	Panel			Fit	S		
	Height x	Height x Width			Enclo	sure	
Catalog		AxB			C Height x		
Number	in.	mm	in.	mm	in.	mm	
AF6024HSWP	47.87 x 18.75	1216 x 476	23.12	587	60.00 x 24.00	1524 x 610	
AF6036HSWP	47.87 x 30.75	1216 x 781	23.12	587	60.00 x 36.00	1524 x 914	
AF7224HSWP	59.87 x 18.75	1521 x 476	29.12	740	72.00 x 24.00	1829 x 610	
AF7230HSWP	59.87 x 24.75	1521 x 629	29.12	740	72.00 x 30.00	1829 x 762	
AF7236HSWP	59.87 x 30.75	1521 x 781	29.12	740	72.00 x 36.00	1829 x 914	



Full Swing Panel Mounting

Half Swing Panel Mounting

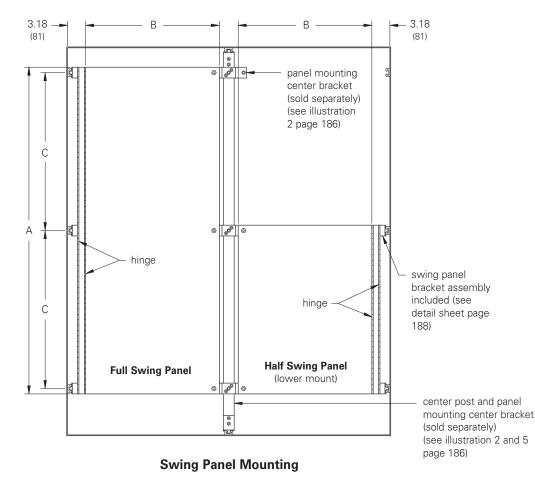
Note: Full Swing Panel and Half Swing Panel for single-door, single and dual-access enclosures are (12) gauge steel, have a dual hinge swing panel bracket and furnished with Panel Brackets and all hardware necessary for channel and panel mounting. Panels can be installed so they hinge on either the left or right side. In addition, Half Panels can be mounted in either the upper or lower portion of the enclosure. Free-standing design permits the panel to be adjustable along the depth of the enclosure. The dual hinge will allow the inner panel to swing completely out of the door opening when within 5.50 inches of the front. With dual-access enclosures, Full and Half Swing Panels can be mounted back-to-back.

Free-Standing Enclosure Accessories Type 4 Double-Door Full and Half Swing Panel Illustration Sheet and Catalog Number

Discount Schedule: C2 Subclass: DSD

	Full Swing Panel (Double-Door)							Half Swing Panel (Double-Door)						
Panel	Panel Panel Size Fits		S	Panel	Panel Panel Size				Fit	ts				
	Height x Width				Enclosure Height x Width				Enclosure					
Catalog	Ах	-	C		Height x		Catalog	Ax	_			Height x		
Number	in.	mm	in.	mm	in.	mm	Number	in.	mm	in.	mm	in.	mm	
AF6024SWP	47.87 x 18.75	1216 x 476	23.12	587	60.00 x 48.00	1524 x 1219	AF6024HSWP	24.75 x 18.75	629 x 476	23.12	587	60.00 x 48.00	1524 x 1219	
AF7224SWP	59.87 x 18.75	1521 x 476	29.12	740	72.00 x 48.00	1829 x 1219	AF7224HSWP	30.75 x 18.75	781 x 476	29.12	740	72.00 x 48.00	1829 x 1219	
AF7230SWP	59.87 x 24.75	1521 x 629	29.12	740	72.00 x 60.00	1829 x 1524	AF7230HSWP	30.75 x 24.75	781 x 629	29.12	740	72.00 x 60.00	1829 x 1524	
AF7236SWP	59.87 x 30.75	1521 x 781	29.12	740	72.00 x 72.00	1829 x 1829	AF7236HSWP	30.75 x 30.75	781 x 781	29.12	740	72.00 x 72.00	1829 x 1829	

A Center Post assembly and Center Bracket must be ordered separately.



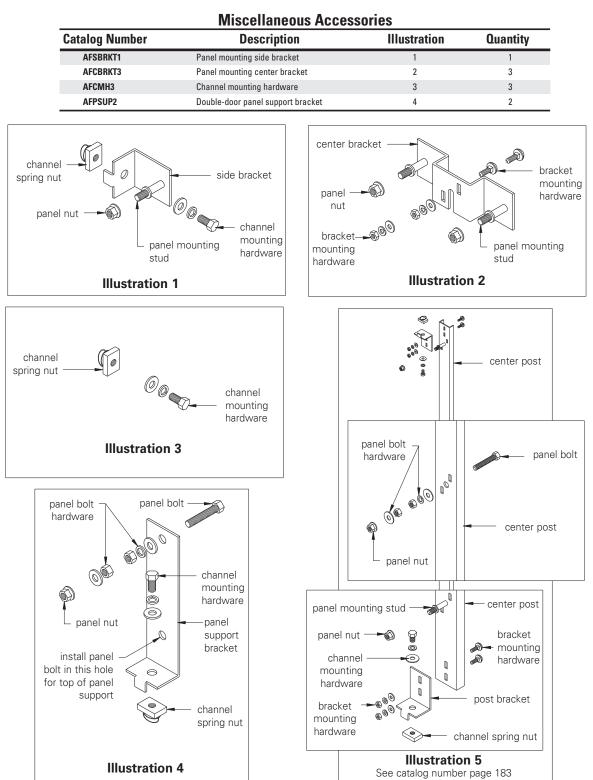
Note: Full Swing Panel and Half Swing Panel for double-door, single and dual-access enclosures are (12) gauge steel, have a dual hinge swing panel bracket, and furnished with hardware necessary for side channel mounting. A Center Post assembly and Center Bracket must be ordered separately. Panels can be installed so they hinge either on the left or right side. In addition, Half Panels can be mounted in either the upper or lower portion of the enclosure. Free-standing design permits the panel to adjust along the depth of the enclosure. The dual hinge will allow the inner panel to swing completely out of the door opening when within 5.50 inches of the front. With dual-access enclosures, Full and Half Swing Panels can be mounted back-to-back.

Notes: Dimensions are in inches. Millimeters shown are for reference only. Data subject to change without notice.

Type 4 Panel Enclosures

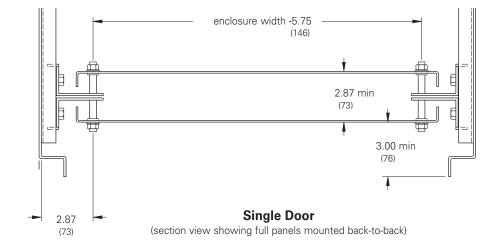
Free-Standing Enclosure Accessories Type 4 Miscellaneous Accessories Illustration Sheet and Catalog Number

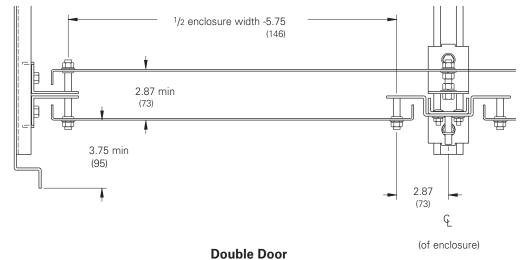
Discount Schedule: C2 Subclass: DS0



Free-Standing Enclosure Details Type 4 **Panel and Enclosure Detail Sheet**

Discount Schedule: C2 Subclass: DSD

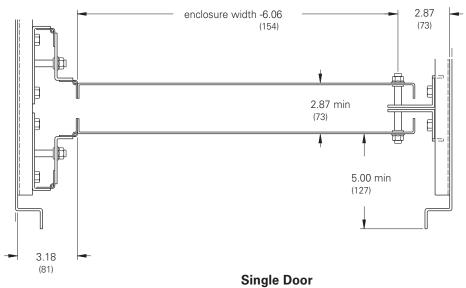




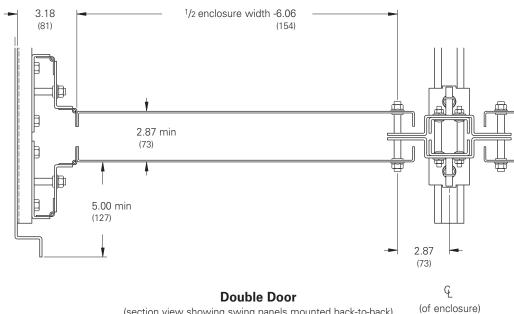
Type 4 Panel Enclosures

Free-Standing Enclosure Details Type 4 **Swing Panel and Enclosure Detail Sheet**

Discount Schedule: C2 Subclass: DSD



(section view showing swing panels mounted back-to-back)

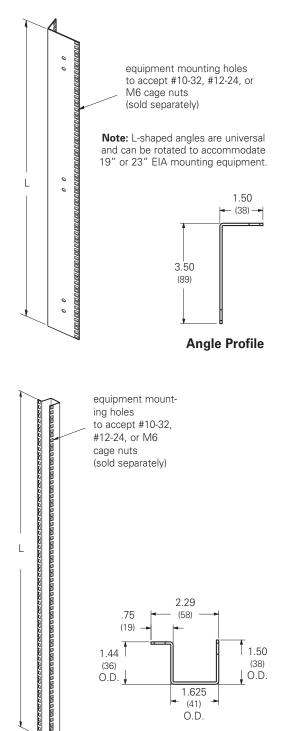


(section view showing swing panels mounted back-to-back)

Free-Standing Enclosure Accessories Rack Mounting Angles Illustration Sheet and Catalog Number

Discount Schedule: C2 Subclass: DS0

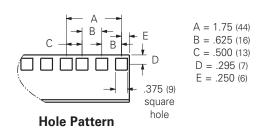
Heavy Duty Rack Mounting Angles are designed for mounting 19" (482mm) equipment in free-standing enclosures. A Center Post Assembly, "AFxxCPS" on page 183, and a Panel Mounting Center Bracket, "AFCBRKT3" on page 186, (each sold separately) are required when mounting in any double door enclosure. Mounting holes are spaced at the 19" "EIA" Standard and are provided to accept #10-32, #12-24, or M6 cage nuts (sold in packages of 100), on page 190.



'L' Shaped Mounting Angles

Catalog Number	Fits Enclosure Height		1	-	Mounting U's
	in.	mm	in.	mm	
ES-48RMA-L	48	1219	42.00	1067	24
ES-60RMA-L	60	1524	54.25	1378	31
ES-72RMA-L	72	1829	66.50	1689	38
ES-90RMA-L	90	2286	78.75	2000	45

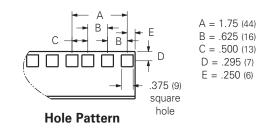
Kit contains two (2) full length 'L' angles, installation instructions, and hardware necessary to mount in single-door enclosures. Yellow Zinc finish.



'U' Shaped Mounting Angles

Catalog Number	Fits End Hei				Mounting U's
	in.	mm	in.	mm	
ES-48RMA-U	48	1219	42.00	1067	24
ES-60RMA-U	60	1524	54.25	1378	31
ES-72RMA-U	72	1829	66.50	1689	38
ES-90RMA-U	90	2286	78.75	2000	45

Kit contains two (2) full length 'U' angles, installation instructions, and hardware necessary to mount in single-door enclosures. Yellow Zinc finish.



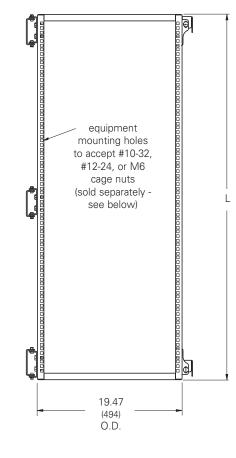
Free-Standing Enclosure Accessories Frames & Fasteners Illustration Sheet and Catalog Number

Discount Schedule: C2 Subclass: DS0

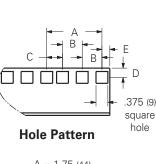
Swing-Out Rack Mounted Frame

Catalog Number	Fits Enclosure Height		I	L
	in.	mm	in.	mm
ES-48SORMF	48	1219	36.91	937
ES-60SORMF	60	1524	49.16	1248
ES-72SORMF	72	1829	59.66	1515
ES-90SORMF	90	2286	77.18	1960

Heavy Duty Swing-Out Rack Mounting Frames are designed for mounting 19" (482mm) equipment in free standing enclosures. A Center Post Assembly, "AFxxCPS" on page 183 and Panel Mounting Center Bracket, "AFCBRKT3" on page 186, (each sold separately) are required when mounting in any double door enclosure. Mounting holes are spaced per the "EIA" Standard and are provided to accept #10-32, #12-24, or M6 cage nuts (sold in packages of 100). Swing-Out Rack Mounting frames have white powder coated finish.



אנו ער ערו ערו ערו ערו ערו ערו ערו ערו ערו		0 0		
				(
			* • •	



A = 1.75 (44)
B = .625 (16)
C = .500 (13)
D = .295(7)
E = .250 (6)

Screws & Cage Nuts			
Catalog Number	Description	Finish	
Screws			
E2MA1032PHMS100	#10-32 Phillips	Clear Zinc	
E2MA1224PHMS100	#12-24 Phillips	Clear Zinc	
E2MAM6PHMS100	M6 Phillips	Yellow Zinc	
Cage Nuts			
E2MACN1032100	#10-32 Threads	Clear Zinc	
E2MACN1224100	#12-24 Threads	Clear Zinc	
E2MACNM6100	M6 Threads	Yellow Zinc	

Sold in bags of (100)



Screws



Cage Nuts

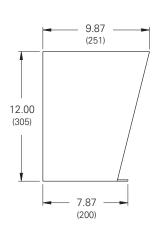
Free-Standing Enclosure Accessories Floor Stand & Stabilizer Kits Illustration Sheet and Catalog Number

Discount Schedule: C2 Subclass: DS0

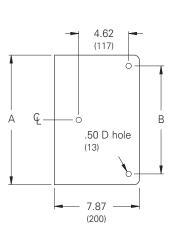
	1
2.2.2.2.2.2	Floor

Floor Stand Kits						
Catalog Number						
	A		В		C	
Steel	in.	mm	in.	mm	in.	mm
MFK12	12.0	305	10.06	256	-	-
MFK16	16.0	406	14.06	357	-	-
MFK18	18.0	457	16.06	408	7.00	178
MFK20	20.0	508	18.06	459	8.00	203
MFK24	24.0	610	22.06	560	10.00	254

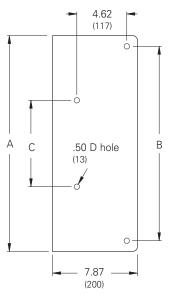
Floor Stand Kits are intended for use with EnviroShield™ Type 4X, Type 4 and Type 12 Enclosures where floor support is required. Each kit consists of two (10) gauge legs and hardware for mounting. At the base of each leg is a prepunched plate (see drawing). Steel kits have a gray polyester powder paint finish. Stainless steel kits are fabricated from 304 stainless steel. Standard Floor Stand Kits are 12 inches (305 mm) high. For special heights, special material or non-standard construction consult the factory.



Floor Stand Kit



Base 12 - 16 Deep



Base 18 - 24 Deep