8146 Series Terminal Boxes

Ready-Term®
8146 Terminal Boxes Features:

- *Pre-Configured with terminals mounted*
- *Made of Fiberglass Reinforced Polyester (FRP)*
- *8 enclosure sizes with different depths*
- *For power and control circuits*
- *For I.S. circuits with blue terminals*
- *Entry hardware optional*
- *Field installation possible*

Ready-Term® 8146 Terminal Boxes

PRE-CONFIGURED FRP TERMINAL BOXES WITH PHOENIX TERMINALS

CLASSIFICATIONS of 8146/1

NEC- Class I, Zones 1 & 2 AEx e II T6/T5
Class I, Division 2, Groups A,B,C,D
Class II, Division 2, Groups F,G
Class III
Types 3,4 & 4X; IP66
File No. E177642

CEC-Class I, Zones 1 & 2 Ex e II T6/T5
Class I, Division 2, Groups A,B,C,D
Class II, Divisions 1 & 2, Groups E,F,G
Class III
CSA ENCLOSURES 3, 4 & 4X; IP66
File No. LR 99480

II 2G Ex e II T6/T5
II 2G Ex ia/ib IIC T6
PTB 01 ATEX 1016

II 2D Ex A21 IP66, T80˚C, T45˚C

IECEx
Ex e II T6/T5
Ex ia/ib IIC T6
Ex TD A21 IP66 T80˚C
IECEx PTB 06.0046

Max. Voltage 600 AC/DC

Ambient Temperature Range:
8146/1 +55˚C (+131˚F) Max., T5
+40˚C (+104˚F) Max., T6
–20˚C (–4˚F) Min.
8146/2 +75˚C (+167˚F) Max., T6
–20˚C (–4˚F) Min.

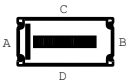
Special Ambient Temperature Range:*
* Consult Factory

FEATURES

The Ready-Term® 8146 Series of terminal boxes are made of impact proof fiberglass reinforced polyester resin. They offer a one-source solution to the time-consuming process of providing ready to install terminal boxes for hazardous locations. With its single part number solution, the Ready-Term® 8146 Series eliminates the inconvenience of purchasing the enclosure and individual parts. This Series is supplied with the indicated quantity of individually numbered terminals for each size of enclosure, fully certified and ready to be installed.

The FRP Ready-Term® 8146 Series are made of specially formulated impact proof glass fiber reinforced polyester which provides superior corrosion resistance while dissipating static electricity.

Ordering Information

TERM. QTY.	WIRE RANGE AWG.	TERM. SIZE mm2	MAX. AMPS. PER TERM.	CATALOG NUMBER FOR POWER & CONTROL CIRCUITS	CATALOG NUMBER GRND. WIRE CONNECTIONS	CATALOG NUMBER FOR INTRINSICALLY SAFE CIRCUITS	CATALOG NUMBER PA. WIRE CONNECTIONS	ENCLOSURE ORIENTATION
9	26-12	2.5	20	8146/1031-3DP-12009	4	8146/2031-3DP-12009	4	
15	26-12	2.5	20	8146/1041-3DP-12015*	8	8146/2041-3DP-12015*	8	
18	26-12	2.5	20	8146/1051-3DP-12018	14	8146/2051-3DP-12018	14	
15	26-10	4	30	8146/1051-3DP-10015	14	8146/2051-3DP-10015	14	
9	20-6	10	65	8146/1051-3DP-06009	12	- -		
24	26-12	2.5	20	8146/1061-3DP-12024	14	8146/2061-3DP-12024	14	
21	26-10	4	30	8146/1061-3DP-10021	14	8146/2061-3DP-10021	14	
9	20-6	10	65	8146/1061-3DP-06009	12	- -		
45	26-12	2.5	20	8146/1071S-3DP-12045	14	8146/2071S-3DP-12045	14	
36	26-10	4	30	8146/1071S-3DP-10036	14	8146/2071S-3DP-10036	14	
24	20-6	10	65	8146/1071S-3DP-06024	12	- -		

To Select Weidmuller Terminals Change P to W
For dimensional data see page C28
*With Phoenix terminals only

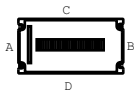
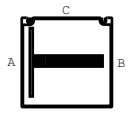
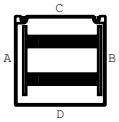
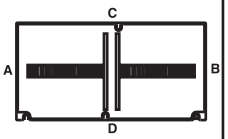
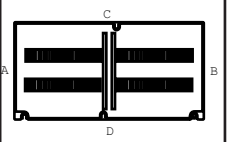
"Hazardous Location" Conduit Hubs

HUB, NPT THREAD SIZE	CATALOG NUMBER
1/2"	8166/11-01-NE
3/4"	8166/11-02-NE
1"	8166/11-03-NE
1 1/4"	8166/11-04-NE
1 1/2"	8166/11-05-NE
2"	8166/11-06-NE
2 1/2"	8166/11-07-NE
3"	8166/11-08-NE

Ready-Term® 8146 Terminal Boxes

PRE-CONFIGURED FRP TERMINAL BOXES WITH PHOENIX TERMINALS

Ordering Information

TERM. QTY.	WIRE RANGE AWG.	TERM. SIZE mm²	MAX. AMPS. PER TERM.	CATALOG NUMBER FOR POWER & CONTROL CIRCUITS	CATALOG NUMBER GRND. WIRE CONNECTIONS	CATALOG NUMBER FOR INTRINSICALLY SAFE CIRCUITS	CATALOG NUMBER PA WIRE CONNECTIONS	ENCLOSURE ORIENTATION
45	26-12	2.5	20	8146/1073S-3DP-12045	14	8146/2073S-3DP-12045	14	
36	26-10	4	30	8146/1073S-3DP-10036	14	8146/2073S-3DP-10036	14	
24	20-6	10	65	8146/1073S-3DP-06024	12	-	-	
18	16-4	16	85	8146/1073S-3DP-04018	6	-	-	
12	14-1/0	35	150	8146/1073S-3DP-1/012	6	-	-	
45	26-12	2.5	20	8146/1083-3DP-12045	36	8146/2083-3DP-12045	36	
36	26-10	4	30	8146/1083-3DP-10036	36	8146/2083-3DP-10036	36	
24	20-6	10	65	8146/1083-3DP-06024	24	-	-	
18	16-4	16	85	8146/1083-3DP-04018	6	-	-	
12	14-1/0	35	150	8146/1083-3DP-1/012	6	-	-	
90	26-12	2.5	20	8146/1083-3DP-12090	72	8146/2083-3DP-12090	72	
72	26-10	4	30	8146/1083-3DP-10072	72	8146/2083-3DP-10072	72	
48	20-6	10	65	8146/1083-3DP-06048	48	-	-	
90	26-12	2.5	20	8146/1093-3DP-12090	72	8146/2093-3DP-12090	72	
72	26-10	4	30	8146/1093-3DP-10072	72	8146/2093-3DP-10072	72	
48	20-6	10	65	8146/1093-3DP-06048	48	-	-	
36	16-4	16	85	8146/1093-3DP-04036	12	-	-	
24	14-1/0	35	150	8146/1093-3DP-1/024	12	-	-	
180	26-12	2.5	20	8146/1093-3DP-12180	72	8146/2093-3DP-12180	72	
144	26-10	4	30	8146/1093-3DP-10144	72	8146/2093-3DP-10144	72	
96	20-6	10	65	8146/1093-3DP-06096	48	-	-	

To Select Weidmuller Terminals Change P to W
For dimensional data see page C28

CLASSIFICATIONS of 8146/1

NEC- Class I, Zones 1 & 2 AEx e II T6/T5
Class I, Division 2, Groups A,B,C,D
Class II, Division 2, Groups F,G
Class III
Types 3, 4 & 4X; IP66
File No. E177642

CEC- Class I, Zones 1 & 2 Ex e II T6/T5
Class I, Division 2, Groups A,B,C,D
Class II, Divisions 1 & 2, Groups E,F,G
Class III
CSA ENCLOSURES 3, 4 & 4X; IP66
File No. LR 99480

II 2G Ex e II T6/T5
II 2G Ex ia/ib IIC T6
PTB 01 ATEX 1016

II 2D Ex td A21 IP66, T80˚C, T45˚C

IECEx
Ex e II T6/T5
Ex ia/ib IIC T6
Ex TD A21 IP66 T80˚C
IECEx PTB 06.0046

Max. Voltage 600 AC/DC

Ambient Temperature Range:
See Page C27

In addition to the various North Americanapplications, this Series is PTB certified for use in Zones 1 and 2. The design conforms to CENELEC EN/IEC 60 079-7 and many others. Consult factory.

APPLICATION
Typical applications include junction boxes for petrochemical plants, waste treatment facilities, oil refineries and other major industrial plants. As a product with certifications recognized globally, the Ready-Term® 8146 Series is well suited for original equipment manufacturers who market throughout the world.

The 8146/1 Series of terminal boxes is intended for use on circuits designed for power and motor control applications.

The 8146/2 Series is intended for use on circuits which are intrinsically safe. These enclosures are outfitted with blue terminals to provide an indication to field personnel that the circuits are intrinsically safe and should not be confused with non-intrinsically safe circuits.

These enclosures make it necessary for the metal entry hardware to be bonded to the ground system. Use the suitable 8166/11 conduit hubs specified in the hub table on page C26.

Custom enclosures can be configured upon customer request.

The following modifications are available:
- Conduit hubs 8166 (specify)
- Cable glands (specify)
- Close-up plugs (specify)
- Flange plates (specify)
- Screw-type terminals up to 600 MCM
- Cage-clamp Terminals up to 8 AWG

8146 Series Terminal Boxes

INSTALLATION OF ENTRY HARDWARE

The 8146 Series of FRP terminal boxes are available with factory installed conduit hubs for conduit installation or with cable glands for cable installation.

Approved and suitable for the location entry hardware can also be field installed.

These enclosures make it necessary for the metal cable glands or conduit hubs to be bonded to the ground system. This can be accomplished by installing them to a threaded brass back plate as shown with Method 1 (shown on the upper half of this page), or with grounding nuts, according to Method 2 (shown on the lower half of this page).

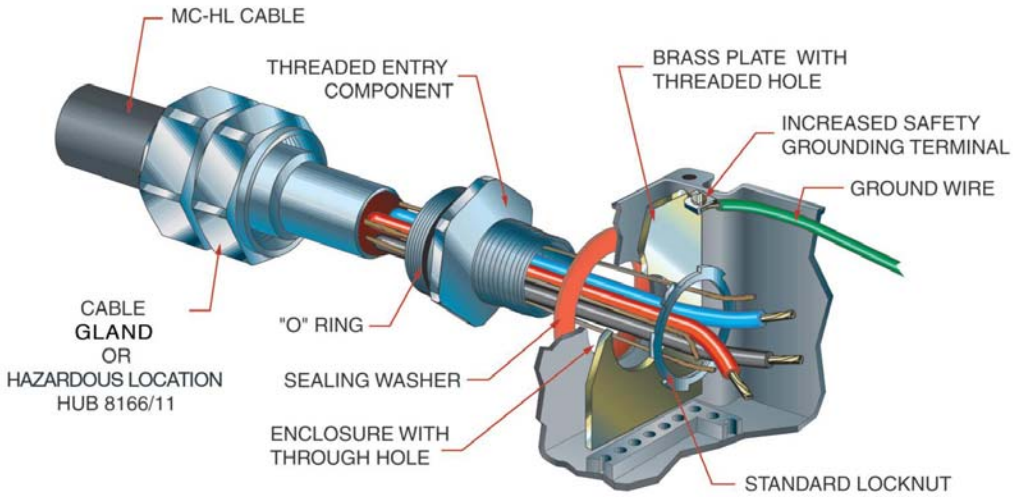
For cable glands see section J.

Table for max. numbers of entry openings either installed with conduit hubs 8166/11 or cable glands (see page C30) .

CAUTION:
The max. possible number of entries which can be installed on the sides of the enclosures depends on the number of terminal columns installed. With horizontally installed columns, there are no side entries possible or only limited, depending on enclosure size. With vertically installed columns there are no bottom or top entries possible, or only limited, depending on enclosure size.

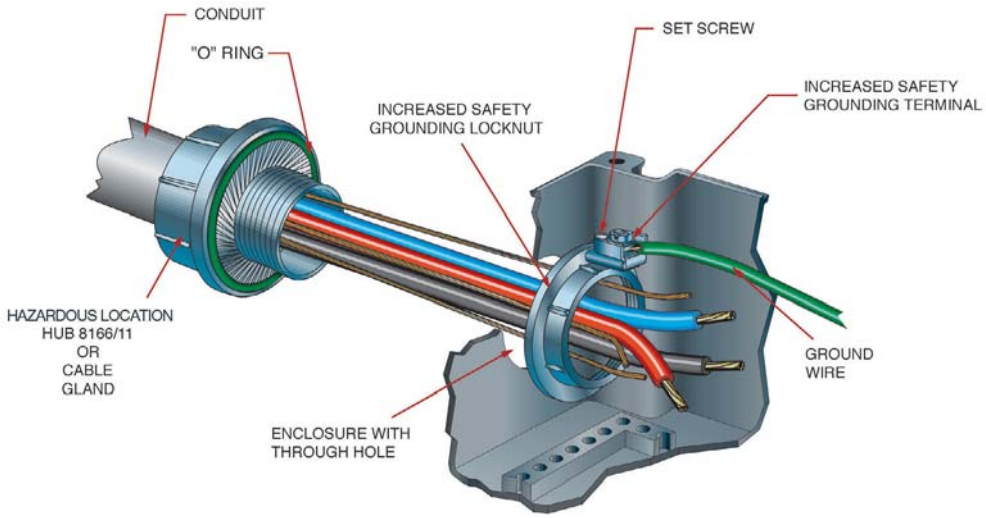
For Class I Zone 1 installation also non-armoured cable type TC-ER-HL is acceptable. For details see NEC, NFPA 10 2014, Article 505.15 (B) (1) (i).

Method 1: Installation using a hole 'through the enclosure' with a brass back plate (see page C31) with a threaded opening and "increased safety" ground terminal.



Brass Plate(s) must be connected to internal grounding system using jumper wires.

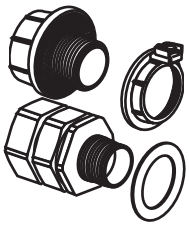
Method 2: Installation using a hole 'through the enclosure' with an "increased safety" grounding locknut instead of a brass back plate.



These locknuts must be bonded between each other and to the grounding system using a jumper wire.

8146 Series Terminal Boxes

INSTALLATION OF 8166/11 CONDUIT HUBS OR CABLE GLANDS



8146/.031 | 8146/.041

Size	w/o flanges A/B	w/o flanges C/D	w/o flanges A/B	w/o flanges C/D
1/2"	1	1	1	2
3/4"	1	1	1	2
1"	-	1	1	1
1-1/4"	-	-	1	1
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

8146/.051/.052

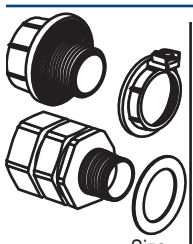
Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	2	3	-	2
3/4"	1	2	-	2
1"	1	2	-	1
1-1/4"	1	1	-	-
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

8146/.061/.062

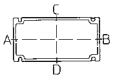
Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	3	4	2	2
3/4"	2	3	2	2
1"	2	2	1	1
1-1/4"	1	2	-	-
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

Table for max. numbers of entry openings either installed with conduit hubs 8166/11 or cable glands (see section K).

CAUTION:
The max. possible number of entries which can be installed on the sides of the enclosures depends on the number of terminal columns installed. With horizontally installed columns, there are no side entries possible or only limited, depending on enclosure size. With vertically installed columns there are no bottom or top entries possible, or only limited, depending on enclosure size.

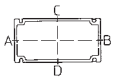


8146/.071/.072



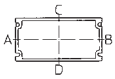
Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	3	6	2	4
3/4"	2	5	2	4
1"	2	4	1	2
1-1/4"	1	3	-	-
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

8146/.073/.075



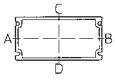
Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	6	12	4	11
3/4"	5	9	4	9
1"	4	8	2	4
1-1/4"	2	5	1	4
1-1/2"	2	4	1	3
2"	1	3	1	2
2-1/2"	1	2	1	2
3"	1	2	-	-

8146/.S71

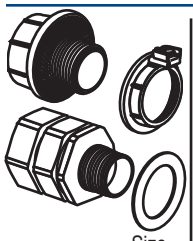


Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	2	7	-	4
3/4"	1	6	-	4
1"	1	4	-	2
1-1/4"	1	4	-	-
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

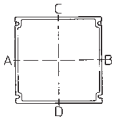
8146/.S73



Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	5	14	-	11
3/4"	3	12	-	9
1"	2	8	-	4
1-1/4"	1	5	-	4
1-1/2"	1	4	-	3
2"	1	3	-	2
2-1/2"	-	3	-	2
3"	-	2	-	-

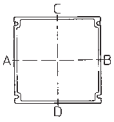


8146/.081/.082



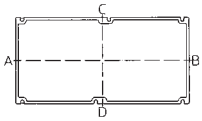
Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	6	7	4	4
3/4"	5	6	4	4
1"	4	4	2	2
1-1/4"	3	4	-	-
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

8146/.083/.085/.086



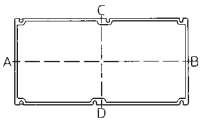
Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	12	14	11	11
3/4"	9	12	9	9
1"	8	8	4	4
1-1/4"	5	5	4	4
1-1/2"	4	4	3	3
2"	3	3	2	2
2-1/2"	2	3	2	2
3"	2	2	-	-

8146/.091/.092



Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	7	12	4	8
3/4"	6	10	4	8
1"	4	8	2	4
1-1/4"	4	7	-	-
1-1/2"	-	-	-	-
2"	-	-	-	-
2-1/2"	-	-	-	-
3"	-	-	-	-

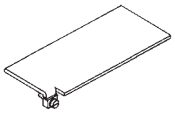
8146/.093/.095

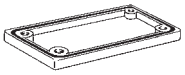
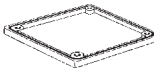
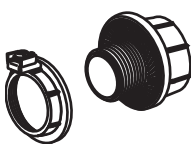


Size	w/o flanges A/B	w/o flanges C/D	with flanges A/B	with flanges C/D
1/2"	14	28	11	22
3/4"	12	19	9	18
1"	8	16	4	8
1-1/4"	5	11	4	8
1-1/2"	4	7	3	6
2"	3	6	2	4
2-1/2"	3	4	2	4
3"	2	4	-	-

8146 Series Terminal Boxes

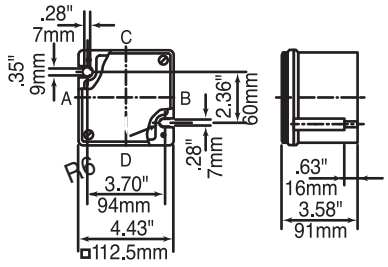
PARTS AND ACCESSORIES

ILLUSTRATION/DESCRIPTION		CATALOG NUMBER
Brass Plates for Flange Plates	 To bond metal cable glands	
	for 8146 Flange Size	
	1	**136201**
	2	**136568**
	3	**136726**
Brass Plates for Enclosures without Flange Plates	Side	
	8146/•03• C/D	**136395**
	8146/•04• A/B	**136395**
	C/D	**136365**
	8146/•05• A/B	**136240**
	C/D	**136 430**
	8146/•06• A/B	**136430**
	C/D	**136374**
	8146/•071 A/B	**136430**
	C/D	**136451**
	8146/•073 & A/B	**136616**
	8146/•075 C/D	**136631**
	8146/•S71 A/B	**136240**
	C/D	**136544**
	8146/•S73 A/B	**136611**
	C/D	**136626**
	8146/.081 A/B	**136451**
	C/D	**136544**
	8146/•083 & A/B	**136621**
	8146/•085 & C/D	**136626**
	8146/•086	
	8146/•091 A/B	**136544**
	C1/D1	**136201**
	C2/D2	**136544**
	8146/•093 & A/B	**136626**
	8146/•095 C1/D1	**136621**
	C2/D2	**136626**
	Flange-enclosure	81 460 32 55 0

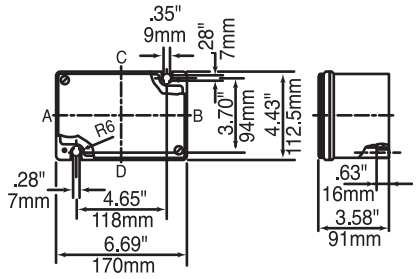
ILLUSTRATION/DESCRIPTION		CATALOG NUMBER
Flange Plates Size 1	in FRP 	
	Versions	
	0.11" 2,8mm thick	**135978**
	0.23" 5,8mm thick	**136032**
	For Mounting on:	
	Enclosure Sides	
	8146/•051/•052 C/D	
	8146/•061/•062 A/B/C/D	
	8146/•071/•072 A/B/C/D	
	8146/•S71 C/D	
	8146/•081/•082 A/B/C/D	
	8146/•091/•082 A/B/C/D	
Flange Plates Size 2		
	0.11" 2,8mm thick	**136045**
	0.23" 5,8mm thick	**136083**
	For Mounting on:	
	Enclosure Sides	
	8146/•073/•075 C/D	
	8146/•S73 C/D	
	8146/•083/•085/•86 A/B/C/D	
	8146/•093/•095 A/B/C/D	
Flange Plates Size 3		
	0.11" 2,8mm thick	**136199**
	0.23" 5,8mm thick	**136237**
	For Mounting on:	
	Enclosure Sides	
	8146/•073/•075 A/B	
Coupling Frames		
Size 0	2.68" x 2.68" (68 mm x 68 mm)	**136012**
Size 1	5.04" x 2.68" (128 mm x 68 mm)	**135974**
Size 2	10.47" x 4.96" (266 mm x 126 mm)	**136031**
Size 3	4.96" x 4 96" (126 mm x 126 mm)	**136235**
Entry Hubs		**8166/11 (see page J1)**

8146 Series Terminal Boxes

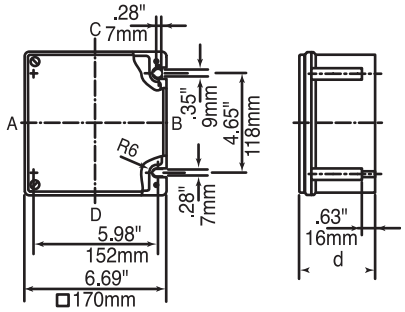
DIMENSIONS



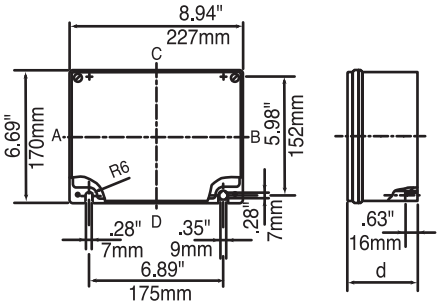
8146/•031



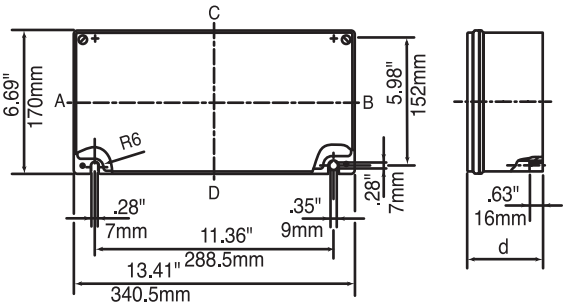
8146/•041



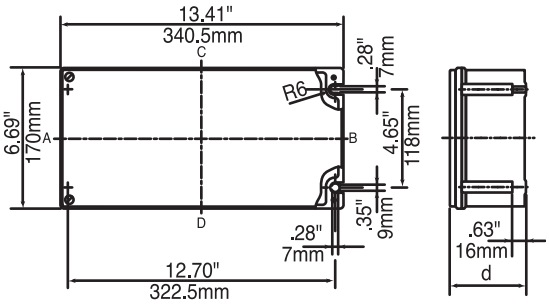
8146/•05•



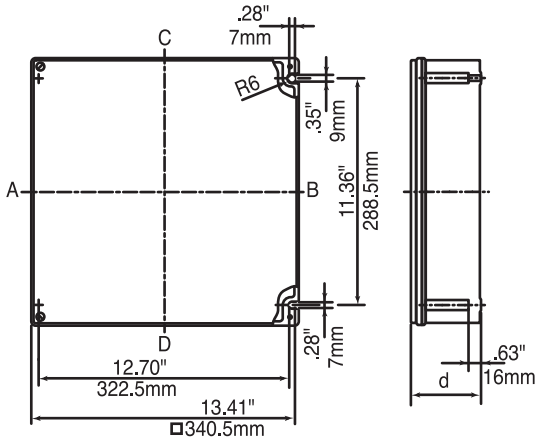
8146/•06•



8146/•07•

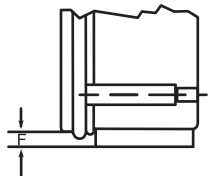


8146/•S7•



8146/•08•

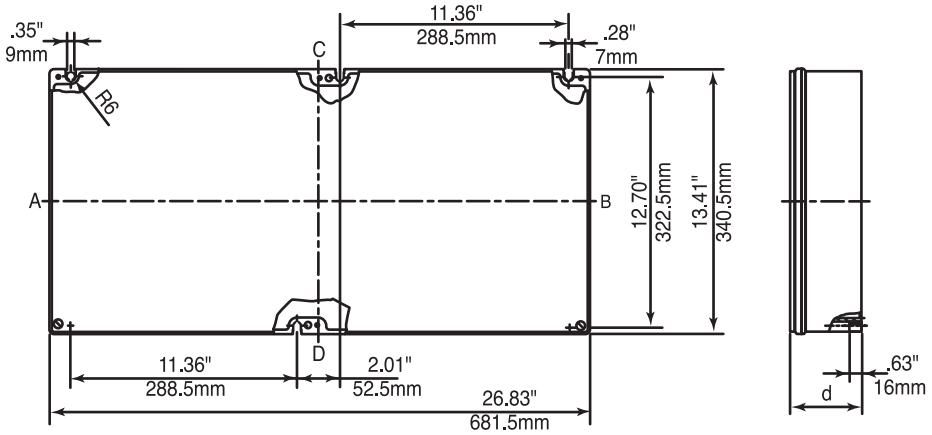
Flange option: Add to overall dimensions.



Flange Thickness	Dimension F
0.11" 2.8mm	0.27" 7mm
0.23" 5.8mm	0.39" 10mm

Available Enclosure Depth (d)						
Enclosure Sizes	1 3.58" 91mm	2 5.16" 131mm	3 5.91" 150mm	4 6.73" 171mm	5 7.48" 190mm	6 9.06" 230mm
8146/•03•	x	-	-	-	-	-
8146/•04•	x	-	-	-	-	-
8146/•05•	x	x	-	-	-	-
8146/•06•	x	x	-	-	-	-
8146/•07•	x	x	x	-	x	-
8146/•S7•	x	-	x	-	-	-
8146/•08•	x	x	x	x	x	x
8146/•09•	x	x	x	-	x	-

X indicates depths available.



8146/•09•

8146 Series Terminal Boxes

Terminal Data

Terminal Type Phoenix	solid/stranded wire range	Max. voltage, V	Max. Amps	Torque lb-in
UT 2.5	26-12	600	20	5.3-7
UT 4	26-10	600	30	5.3-7
UT 6	24-8	600	50	13.3-16
UT 10	20-6	600	65	13.3-16
UT 16	16-4	600	85	22-26.5
UT 35	14-1/0	600	150	28-32.7
Terminal Type Weidmueller				
WDU 2.5	22-12	600	25	4.5-7.1
WDU 4	22-10	600	35	9
WDU 6	20-8	600	45	14.2
WDU 10	16-6	600	65	20.4
WDU 16	14-6	600	70	35
WDU 35	12-2	600	115	51
WDU 70	6-2/0	600	175	87
WDU 120	2-250	600	225	130
WFF 185	8-500	600	380	177
WFF 300	6-600	600	500	354
Terminal Type Wago				
281-691	28-12	600	20	N/A
281-991	28-12	600	20	N/A
282-691	24-10	600	30	N/A
283-691	24-6	600	65	N/A
284-691	24-8	600	50	N/A

Electrical Capacity Tables
(only applicable for Class I, Zone 1)

In Class I, Zone 1 hazardous (classified) areas, heat produced by current in the wire inside an enclosure is a concern. Therefore, the continuous current of each current carrying conductor, the quantity and the size of the conductors inside a terminal enclosure needs to be limited. For each enclosure size, there is one table which shows the permissible values for that particular terminal enclosure.

How to use the electrical capacity tables:

- Determine the enclosure type you are dealing with.
- Reference the applicable electrical capacity table printed on pages C30-C34.

In the white area of the table the permitted numbers of current carrying conductors inside the enclosure are indicated (in and out counts two wires) depending on wire size and continuous current.

In the green shaded area of the table additional conductors/terminals are permitted up to the space limit of the enclosure.
(see pages C23 & C24)

In the area with red diagonal lines no conductors/terminals are permitted.

Jumper links and ground wires can be neglected, in calculating the number of wires. These can be added whenever necessary.

EXAMPLE:

Enclosure type: 8146/1061-3DP-10024 (see page C31).

The maximum physical quantity of terminals 26-10 AWG for this enclosure is 24.

Reference the table 8146/1061 on page C31, you will find that 18 wires 10 AWG with 30 Amps continuous current is the thermal limit of this enclosure.

Conclusion: To terminate 18 wires, 9 terminals are needed, terminating two wires per terminal only. The remaining 12 terminals (21 - 9 = 12) can be used for low amperage circuits in the green shaded area of the table. Jumper links and ground wires can be neglected.

Mixed circuits of different wire sizes and current values are possible by applying the table values proportionally

i.e. enclosure table 8146/1061.

Wire Size AWG	Current Amps	Number of Current Carrying Conductors		Proportion
		Permissible	Actual	
14	15	24	12	50%
12	20	24	12	50%

100% Max.

ELECTRICAL CAPACITY TABLES

Enclosure 8146/1031				
Current Amps	Wire size AWG			
	16	14	12	10
5				
10	27	53		
15		20	39	
20			19	43
25				22
30				14

Enclosure 8146/1041				
Current Amps	Wire size AWG			
	16	14	12	10
5				
10	28	56		
15		21	42	
20			20	46
25				23
30				15

Enclosure 8146/1241				
Current Amps	Wire size AWG			
	16	14	12	10
5				
10	28	57		
15		21	42	
20			21	47
25				24
30				15

Enclosure 8146/1242				
Current Amps	Wire size AWG			
	16	14	12	10
5				
10	35	70		
15		26	52	
20			26	58
25				30
30				18

Enclosure 8146/1051							
Current Amps	Wire size AWG						
	16	14	12	10	8	6	4
5							
10	32	63					
15		24	47				
20			23	52			
25				27			
30				17	37		
35					24		
40					16	43	
45						27	
50						20	
60							30
65							22
70							17

Enclosure 8146/1052							
Current Amps	Wire size AWG						
	16	14	12	10	8	6	4
5							
10	39	78					
15		29	58				
20			28	64			
25				33			
30				20	46		
35					29		
40					20	53	
45						33	
50						24	
60							37
65							27
70							21

8146 Series Terminal Boxes

ELECTRICAL CAPACITY TABLES

Enclosure 8146/1061

Current Amps	Wire size AWG						
	16	14	12	10	8	6	4
5							
10	34	67					
15		24	50				
20			24	55			
25				28			
30				18	40		
35					25		
40					17	46	
45						29	
50						21	
60							31
65							23
70							18

Enclosure 8146/1062

Current Amps	Wire size AWG						
	16	14	12	10	8	6	4
5							
10	41	81					
15		31	61				
20			30	67			
25				34			
30				21	48		
35					30		
40					21	56	
45						35	
50						25	
60							38
65							28
70							22

Enclosures 8146/1071 and 8146/1S71

Current Amps	Wire size AWG									
	16	14	12	10	8	6	4	3	2	1
5										
10	35	70								
15		26	52							
20			25	57						
25				29						
30				18	41					
35					26					
40					18	48				
45						30				
50						22				
60							33			
65							24	61		
70							19	34		
80								20	41	
85								16	29	
90								13	23	
100								9	15	29
110									11	19
115									9	16
125										11

Enclosures 8146/1072 and 8146/1S72

Current Amps	Wire size AWG									
	16	14	12	10	8	6	4	3	2	1
5										
10	42	83								
15		32	62							
20			31	69						
25				35						
30				22	49					
35					31					
40					21	57				
45						36				
50						26				
60							39			
65							29	73		
70							23	41		
80								24	49	
85								19	35	
90								16	27	
100								10	18	35
110									13	23
115									11	19
125										14

ELECTRICAL CAPACITY TABLES

Enclosure 8146/1073 and 8146/1S73

Current Amps	Wire size AWG											
	16	14	12	10	8	6	4	3	2	1	1/0	2/0
5												
10	45	90										
15		34	67									
20			33	74								
25				38								
30				24	53							
35					34							
40					23	62						
45						39						
50						28						
60							42					
65							31	79				
70							24	44				
80								26	53			
85								21	37			
90								17	29			
100								11	20	37		
110									14	25	83	
115									11	21	44	
125										15	28	
150											13	25
175												12

Enclosures 8146/1075 and 8146/1S75

Current Amps	Wire size AWG/MCM														
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250
5															
10	52	104													
15		39	77												
20			38	85											
25				44											
30				27	61										
35					39										
40					27	71									
45						45									
50						32									
60							49								
65							36	91							
70							28	50							
80								30	61						
85								24	43						
90								20	34						
100								13	23	43					
110									16	28	95				
115									13	24	50				
125										17	32				
150											15	28			
175												14	29		
200													15	35	
225														18	35

Enclosure 8146/1081

Current Amps	Wire size AWG										
	16	14	12	10	8	6	4	3	2	1	1/0
5											
10	48	94									
15		36	70								
20			35	77							
25				40							
30				25	56						
35					35						
40					24	65					
45						40					
50						29					
60							44				
65							33	82			
70							26	46			
80								27	56		
85								22	39		
90								18	31		
100								12	21	39	
110									14	26	87
115									12	22	46
125										16	29
150											13

Enclosure 8146/1082

Current Amps	Wire size AWG										
	16	14	12	10	8	6	4	3	2	1	1/0
5											
10	55	109									
15		41	81								
20			40	89							
25				46							
30				29	64						
35					41						
40					28	75					
45						47					
50						34					
60							51				
65							38	95			
70							30	53			
80								31	64		
85								25	45		
90								21	36		
100								14	24	45	
110									17	30	100
115									14	25	53
125										18	33
150											15

8146 Series Terminal Boxes

ELECTRICAL CAPACITY TABLES

Enclosure 8146/1083

Current Amps	Wire size AWG/MCM														
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250
5															
10	58	115													
15		44	86												
20			42	95											
25				49											
30				31	68										
35					43										
40					30	79									
45						50									
50						36									
60							54								
65							40	101							
70							32	56							
80								33	68						
85								27	48						
90								22	38						
100								14	26	48					
110									18	32	106				
115									15	27	56				
125										19	36				
150											16	32			
175												16	33		
200													17	39	
225														20	39

Enclosures 8146/1084

Current Amps	Wire size AWG/MCM														
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250
5															
10	62	123													
15		47	92												
20			45	101											
25				52											
30				33	73										
35					46										
40					32	85									
45						53									
50						38									
60							58								
65							43	107							
70							34	60							
80								35	73						
85								29	51						
90								23	40						
100								15	27	51					
110									19	34	113				
115									16	28	60				
125										20	38				
150											18	34			
175												17	35		
200													18	41	
225														22	42

Enclosure 8146/1085

Current Amps	Wire size AWG/MCM														
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250
5															
10	66	130													
15		49	97												
20			48	107											
25				55											
30				34	77										
35					49										
40					34	89									
45						56									
50						40									
60							61								
65							45	113							
70							35	63							
80								37	77						
85								30	54						
90								25	43						
100								16	29	54					
110									20	36	120				
115									17	30	63				
125										22	40				
150											19	36			
175												18	37		
200													19	43	
225														23	44

Enclosure 8146/1086

Current Amps	Wire size AWG/MCM														
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250
5															
10	73	144													
15		55	108												
20			53	119											
25				61											
30				38	86										
35					54										
40					37	99									
45						62									
50						45									
60							68								
65							51	126							
70							39	70							
80								42	85						
85								34	60						
90								28	47						
100								18	32	60					
110									22	40	133				
115									19	33	70				
125										24	45				
150											21	40			
175												20	41		
200													22	48	
225														25	49

Enclosure 8146/1091

Current Amps	Wire size AWG										
	16	14	12	10	8	6	4	3	2	1	1/0
5											
10	55	109									
15		41	81								
20			40	90							
25				46							
30				29	64						
35					41						
40					28	75					
45						47					
50						34					
60							51				
65							38	95			
70							30	53			
80								31	64		
85								25	45		
90								21	36		
100								14	24	45	
110									17	30	100
115									14	25	53
125										18	33
150											15

Enclosure 8146/1092

Current Amps	Wire size AWG										
	16	14	12	10	8	6	4	3	2	1	1/0
5											
10	62	122									
15		46	91								
20			45	101							
25				52							
30				32	73						
35					46						
40					32	84					
45						53					
50						38					
60							58				
65							43	107			
70							33	60			
80								35	72		
85								29	51		
90								23	40		
100								15	27	51	
110									19	34	113
115									16	28	60
125										20	38
150											17

8146 Series Terminal Boxes

ELECTRICAL CAPACITY TABLES

Enclosure 8146/1093

Current Amps	Wire size AWG/MCM																		
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250	300	400	500	600
5																			
10	65	129																	
15		49	96																
20			47	106															
25				55															
30				34	77														
35					48														
40					33	89													
45						56													
50						40													
60							61												
65							45	113											
70							35	63											
80								37	76										
85								30	54										
90								25	42										
100								16	29	54									
110									20	35	119								
115									17	30	63								
125										21	40								
150											18	36							
175												18	36						
200													19	43					
225														23	44				
250															23	58			
300																17			
350																	21		
380																		36	
450																			26

Enclosure 8146/1095

Current Amps	Wire size AWG/MCM																		
	16	14	12	10	8	6	4	3	2	1	1/0	2/0	3/0	4/0	250	300	400	500	600
5																			
10	72	143																	
15		54	106																
20			53	118															
25				61															
30				38	85														
35					54														
40					37	98													
45						61													
50						45													
60							67												
65							50	125											
70							39	69											
80								41	84										
85								33	60										
90								27	47										
100								18	32	59									
110									22	39	131								
115									18	33	69								
125										24	44								
150											20	39							
175												20	40						
200													21	48					
225														25	48				
250															26	64			
300																19			
350																	23		
380																		40	
400																		27	
450																			29