



Rittal — Arc Flash Products



Safety always comes first

Arc Flash

Understanding Arc Flash

Products designed with your safety in mind.

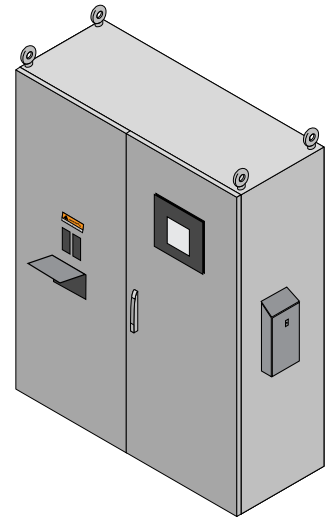
An arc flash is the explosive release of energy that occurs when there is a phase-to-phase or phase-to-ground arc fault. This arc fault may be the result of unsafe work procedures such as a dropped tool or accidental contact, or by corrosion, insulation failure, conductive dust, contact by animals and other factors.

Arc flash is a major safety concern for any application that incorporates high current electrical equipment, and its prevention should be considered from the very beginning of any application design. If arc flash provisions were not made in the original designs, it is also possible to retrofit existing installations to meet safety standards including NFPA 70E and IEEE 1584 to help ensure that your personnel are not at risk to arc flash-related injuries.

Rittal's arc flash products are designed to minimize exposure to energized equipment by allowing for programming, data acquisition and system adjustment without opening the door—keeping arc flash hazards contained within the enclosure and away from possible human error or other variables that can lead to accidents. A wide range of interface flaps, window kits, and interface extensions allow data retrieval, equipment monitoring, or routine maintenance to be done externally—without exposure to arc flash hazards. Supplemental accessories such as external fold-down shelves increase the convenience of using laptops and other equipment during service while external data pockets store pertinent information in a secure place—on-site, and without the need to open the enclosure for access.

Arc flash prevention should be incorporated into any design from the start, and legacy installations should be retrofitted to protect the safety of your operations and those who carry them out.

Rittal arc flash products. Protection that works.



External Data Pocket

Based on the popular AE wallmount enclosure, this data pocket is designed to hold system-related documents.

Material:
Sheet steel, 16ga (1.5mm)

Finish:
Pocket and cover: Dipcoat-primed, powder-coated in textured RAL 7035 (light gray)

Configuration:

Slotted head insert
Foamed in place gasket
Mounting hardware included

Protection Rating:

NEMA 4 (IP 66)

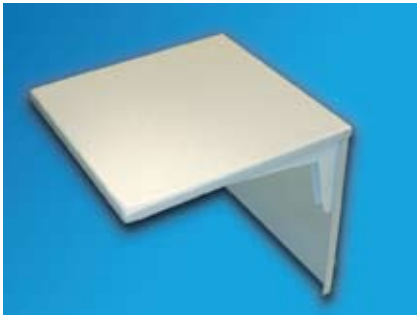
Detailed drawings:

visit www.rittal-corp.com

Height in inches (mm)	Width in inches (mm)	Depth in inches (mm)	Weight in lb (kg)	PU	Part No.
16 (409)	14 (356)	3 (76)	13.5 (29.7)	1	EDP1614C
14 (356)	19 (487)	3 (76)	15 (33.0)	1	EDP1419C

Arc Flash

Shelf, interface extensions



Fold-down shelf

Collapsible shelf designed to support programming and monitoring equipment. Locks in raised position and folds down when not in use.

Material:

Sheet steel, 14ga (2.0mm)

Finish:

Dipcoat-primed, powder-coated in textured RAL 7035 (light gray)

Configuration:

Continuous hinge
Mounting hardware included

Detailed drawings:

visit www.rittal-corp.com

Height in inches (mm)	Width in inches (mm)	Depth in inches (mm)	Weight in lb (kg)	PU	Part No.
12 (305)	12 (305)	2 (51)	7.5 (16.5)	1	FDS1212C
18 (457)	18 (457)	2 (51)	14 (30.8)	1	FDS1818C



Interface extension with wall connection and built-in RJ 45 module

For extending the internal enclosure interfaces – e.g. from industrial PCs and switches – to the outside of the enclosure. The wall connection only needs the same space as a switch.

Benefits:

- Rapid access for maintenance work
- The protection category of the enclosure is preserved
- The lock nut cuts into the spray-finish creating a conductive connection
- Screw-on protective cap

Material:

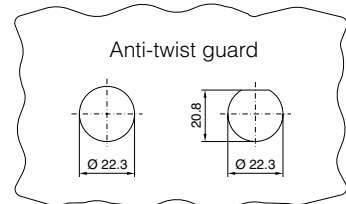
Enclosure: Brass, nickel-plated
Cover: Aluminium, anodized
Seal: Polyamide

Protection category:

NEMA 4X (IP 66) with the protective cap closed

Detailed drawings:

visit www.rittal-corp.com



Material thickness: 1 – 6 mm

Design	Wall Connection	Inside	Length mm	Packs of	Part No.
USB	Type A Jack	Type A connector	0.5	1	2482.210
			1.0	1	2482.220
			2.0	1	2482.230
RJ 45	Jack	Connector	0.5	1	2482.700
			1.0	1	2482.710
			2.0	1	2482.720
RJ 45	Jack	Jack	–	1	2482.730

Other versions and lengths available upon request.

Modular interface flaps



Interface flaps, modular

For universal use in all situations where rapid access to interfaces and sockets is needed. The enclosure remains closed and protected from the external environment and unauthorized access. Space-saving installation:

- in small enclosures and compact enclosures as a programming interface for controllers
- in IT and industrial enclosures as maintenance access for networks
- in PC enclosures and console systems for the temporary connection of additional equipment in mobile Industrial Workstations for rapid connection to existing network structures
- in Command Panel systems for programming and maintenance of integral components

The mounting frame has a flap which snaps into position at opening angles of 90° to 180°. A snap fastener ensures a reliable seal. This may be locked if required.

Material:

Mounting frame and metal flap:
Fine die-cast zinc, matte nickel-plated
Plastic flap: Polycarbonate (semi-transparent)
Lock: Polycarbonate, RAL 7024

Protection category:

NEMA 12 (IP 65) with sealed flap and proper assembly

Detailed drawings:

visit www.rittal-corp.com

Description	cUL	UL	Packs of	Part No.
Mounting frame¹⁾				
1 Single, with plastic flap (semi-transparent)			1	2482.300
2 Double, with plastic flap (semi-transparent)			1	2482.310
3 Single, with metal flap	■	■	1	2482.320
4 Double, with metal flap	■	■	1	2482.330
Socket modules				
5 Germany (VDE), spring-action terminals max. 2 x 2.5 mm ² , connection at rear			1	2482.400³⁾
6 Germany (VDE), screw terminals max. 6 mm ² , connection at rear, color: yellow (RAL 1016), for installation in front of main switch			1	2482.410³⁾
7 USA NEMA 5-15, plug-in solder connection 4.8 x 0.8 mm	■	■	1	2482.420⁴⁾
8 USA NEMA 5-15, plug-in solder connection 4.8 x 0.8 mm (N, PE) 6.3 x 0.8 mm (phase), fuse 3 A	■	■	1	2482.430⁴⁾
Interface inserts				
9 2 x SUB-D9 (jack/pin)	■	■	1	2482.500
10 SUB-D9 (jack/jack)	■	■	1	2482.510
11 SUB-D9 (jack/pin), SUB-D25 (jack/pin)	■	■	1	2482.520
12 SUB-D25 (jack/pin)	■	■	1	2482.530
13 2 x USB A (jack/jack)	■	■	1	2482.540²⁾
14 RJ 45 (jack/jack, Cat. 5e), SUB-D9 (jack/jack), SUB-D9 (pin/pin)	■	■	1	2482.550
15 2 x RJ 45 (jack/jack, Cat. 5e)	■	■	1	2482.560²⁾
16 USB A (jack/jack), RJ 45 (jack/jack, Cat. 5e), SUB-D9 (jack/pin)	■	■	1	2482.570²⁾
17 RJ 45 (jack/jack, Cat. 5e), SUB-D9 (jack/pin), SUB-D25 (jack/pin)	■	■	1	2482.580
18 Blanking plate (slimline), for individual population, usable area: 45 x 75 mm	■	■	1	2482.590

¹⁾ Electrically conductive. ²⁾ Conductively linked to mounting frame. ³⁾ Rated voltage: 250 V AC, rated current: 10 – 16 A
⁴⁾ Rated voltage: 125 V AC, rated current: 15 A (2482.420)/3 A (2482.430)
All SUB-D interfaces may be rotated while in operation. Other socket modules and interface inserts available on request.



Arc Flash

Windows



Window kits

Window kits can be installed in most Rittal enclosures of suitable size and include all necessary hardware. Oil resistant gaskets ensure a tight seal around the entire window.

Material/finish:

Carbon Steel: 14 ga, painted RAL 7035 (light gray)

Stainless Steel 304: 14 ga

Stainless Steel 316L: 14 ga

Note:

Allow for clearance of gaskets, gasket retainers, door stiffeners, print pockets, door handles, latch rods, and other parts attached to the door or cover when you determine the size of the window kit you require.

Protection ratings:

NEMA 4 (IP 66) Carbon

NEMA 4X (IP 66) Stainless

Detailed drawings:

visit www.rittal-corp.com

Window Height in inches (mm)	Window Width in inches (mm)	Frame Height in inches (mm)	Frame Width in inches (mm)	Part No. Carbon Steel	Part No. Stainless 304	Part No. Stainless 316
5.0 (127)	3.0 (76)	7.5 (191)	5.5 (140)	WK0503C	WK05034	WK05036
9.0 (229)	5.5 (140)	11.5 (292)	8.0 (203)	WK0905C	WK09054	WK09056
13.0 (330)	3.0 (76)	15.5 (394)	5.5 (140)	WK1303C	WK13034	WK13036
13.0 (330)	8.0 (203)	15.5 (394)	10.5 (267)	WK1308C	WK13084	WK13086
17.0 (432)	5.5 (140)	19.5 (495)	8.0 (203)	WK1705C	WK17054	WK17056
17.0 (432)	11.0 (279)	19.5 (495)	13.5 (343)	WK1711C	WK17114	WK17116
23.0 (584)	15.0 (381)	25.5 (648)	17.5 (445)	WK2315C	WK23154	WK23156
29.0 (737)	19.0 (483)	31.5 (800)	21.5 (546)	WK2919C	WK29194	WK29196
35.0 (889)	23.0 (584)	37.5 (953)	25.5 (648)	WK3523C	WK35234	WK35236



System windows

Protects display and operating instruments against dirt, liquids and unauthorized access.

Material:

System windows:

Extruded aluminum sections with die-cast zinc corner pieces and single-pane safety glass.

Finish:

Base frame:

Powder-coated in RAL 7035 (light gray).

Hinge and lock section:

Natural anodized.

Protection ratings:

NEMA 12 (IP 54)

Detailed drawings:

visit www.rittal-corp.com

Window Height in inches (mm)	Window Width in inches (mm)	Frame Height in inches (mm)	Frame Width in inches (mm)	Part No. 30 Section	Part No. 60 Section	Part No. Stainless 304
7.9 (200)	16.9 (430)	10.6 (270)	19.7 (500)	2735.500	–	–
11.8 (300)	16.9 (430)	14.6 (370)	19.7 (500)	2735.510	2736.510	–
15.7 (400)	16.9 (430)	18.5 (470)	19.7 (500)	2735.520	2736.520	–
19.7 (500)	16.9 (430)	22.4 (570)	19.7 (500)	2735.530	2736.530	–
23.6 (600)	16.9 (430)	26.4 (670)	19.7 (500)	2735.540	2736.540	–
7.9 (200)	24.8 (630)	10.6 (270)	27.6 (700)	2735.560	–	–
11.8 (300)	24.8 (630)	14.6 (370)	27.6 (700)	2735.570	–	–
15.7 (400)	24.8 (630)	18.5 (470)	27.6 (700)	2735.580	2736.580	–
19.7 (500)	24.8 (630)	22.4 (570)	27.6 (700)	2735.590	2736.590	–
23.6 (600)	24.8 (630)	26.4 (670)	27.6 (700)	2735.250	2736.250	–
21.4 (543)	16.0 (408)	23.6 (600)	20.6 (522)	–	–	2793.560
21.4 (543)	23.9 (608)	23.6 (600)	28.4 (722)	–	–	2793.760
Custom Sizes				2735.509	2736.509	–

Note: 30 Section System Windows are 1.3 inches (33mm) deep; 60 Section System Windows are 2.5 inches (63mm) deep; stainless System Windows are 1.5 inches (38mm) deep

Rittal — Arc Flash Products

Want to learn more about Rittal's Arc Flash products and our complete line of industrial enclosures? Visit www.rittal-corp.com/industrial to see how Rittal can help turn your vision into reality.

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Arc Flash

An overview of arc flash issues, including applicable codes and standards.



Hazardous Locations

What they are and how to recognize them.

Connect with the Experts

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