

Contents



Chemical Comparisons

- Chemical Resistance
- Temperature Resistance
- Plastic Comparison

10



Timer Switches

- Surface Mounting Combinations with Timer
- Surface Switch with Timer
- Surface Mounting Digital Timer

24



Combination Switched Socket Outlets

- Versions From 250V 10A to 500V 50A
- Factory Wired Internal Phase Connections
- Includes Dustproof & Hoseproof Flap



Sunset Switches

- Sunset Switches Premium
- Sunset Switches Economy

26



Surface Socket Outlets

- Extra Low Voltage & 3 Phase Sockets
- Spare Parts Internal Socket Housings

14



Angle And Straight Plugs

- 56P 56PA
- Plug and Socket Caps
- Internal Pin Housings

28



Appliance Inlets

- 3 PIN 5 PIN
- 10A 50A

16



Extension Sockets & Appliance Connectors

- 3 Pin 5 PIN
- 10A 50A
- Pendant Conversion Kits
- Pendant Outlets
- Switched Pendant Outlets
- Suspension Pendant Enclosure Kit

3-



Surface Switches

- 1 Pole 6 Pole
- <u>10A 63A</u>

• 20A - 32A

- 250V Single & 2 Way Switches
- Heavy Duty Surface Switches

1 /



Special Combinations & Modules

- Switched Sockets & Modules
- Portable Combined Sockets with Rcd
- Switched Sockets & 24Hr Timer
- Switched Socket Timer & Transforme

34



Push-Button Control Stations

• Start, Stop, Start/Stop Control Station

Changeover & Reversing Switches

- Emergency Control Stations
- Mushroom Button Control Station

21



Metal Clad Industrial Switchgear

- Switched Sockets & Modules
- Portable Combined Sockets with Rcd
- Switched Sockets & 24Hr Timer
- Switched Socket Timer & Transformer

37



Key Operated Switches

- Standard Security
- Medium Security

425

Transformers

Hoseproof Transformers

38

Contents



Wall Lights

- Surface Mounted Wall Light
- Flush Mounted Wall Light

39



Mounting Enclosures (Back Boxes)

- Back Boxes

40



56 Series Dol Motor Starters

- Motor Starters

50



Mounting Enclosure Lids (Covers)





Switchgear Cover Assemblies

• DIN Rail Accessory Mounting Cover Kits



Industrial Switchgear Accessories

- 56 Series 1 & 2 Gang Gasket
- Single & Three Phase Led
- Padlock Clip

52



56 Series High Pressure Gaskets



- 66CV Switched Socket Outlets
- 66P Series Straight Plugs



Adaptable Enclosures

- Armoured Cable Junction Box



Technical Section

- Socket Configurations
- <u>Technical Terms</u>
- Technical Tables
- Wiring Diagram Types
- Numerical Index

56





Designed to satisfy customer needs, precisely engineered and carefully manufactured, Clipsal Industrial Switchgear is as versatile as your requirements.

Industrial switchgear, being one of the most important components of industry, has to be tough, safe, able to take hard knocks and give reliable performance under many adverse conditions.

The Clipsal 56 and 66 Series satisfies these challenges with the use of durable engineering plastics.

The 56 Series has been tested for protection against ingress of water and dust to International Protection Rating IP56, and in many instances exceeds this level of protection.

It is testimony to the excellence in both manufacture and performance of 56 and 66 Series Industrial Switchgear.

Dust Resistant, Hoseproof and UV Resistant

Because its tough enclosure casing is dust resistant, hoseproof and UV resistant, the 56 Series is suitable for heavy industrial environments.

The aesthetic appearance of the 56 Series makes it the ideal choice for installation in commercial facilities such as television studios, shopping centres and warehouses. What's more, 56 Series products are just as acceptable alongside a public or domestic swimming pool.

Safety in Operation

For safety's sake all of the switches in the range have been equipped with facilities for double pad-locking. When plugs are removed, the socket flap automatically locks into place, preventing dust or water from entering.





56 Series Colour Range

For over a decade the Clipsal 56 Series has enjoyed a reputation for excellent performance in harsh industrial environments.

All products in the 56 Series are available in light grey UV stabilised rigid polycarbonate. The light grey series has excellent strength compared to other compatible plastic products.

There is, however, no economical plastic material available that provides maximum impact strength as well as a high degree of chemical resistance.

Clipsal has chosen not to compromise on either count and instead offers two high performance chemical resistant ranges for environmentally aggressive locations.

The UV and chemical resistant orange and white version is suitable for indoor and outdoor applications, such as chemical plants, timber and paper processing plants and laboratories.

The chemical resistant grey range of sockets, switched socket outlets and covers has been specifically designed for indoor food environments where aggressive alkali cleaners are used, such as dairies, abattoirs and food processing plants.

Standards

Pin configurations for plugs, sockets and switched socket outlets comply with AS/NZS3123 and switches with appropriate parts of AS/NZS3947.3 & AS/NZS3133.

PVC Solvent Bonding Compatibility

All Clipsal 56 Series Enclosures are manufactured from robust UV stabilised PVC and can be solvent bonded to standard electrical PVC conduit accessories.

Transparent Plastic Materials

The introduction of transparent materials to the 56 Series enables the inspection and checking of the components pin/socket configuration and wiring at a glance, while still providing protection against the elements

Designed to Mix and Match

What suits one industry might not be the perfect match for another. That's why the 56 Series was specifically designed to mix and match. There is an extensive choice of modules available, including switches, sockets, photo electrical cells and residual current devices.

Clipsal mounting enclosures range in size from 1 to 16 gang. This allows assemblies to be customised - from a simple switch station to a large electrical control panel.

Accessories can be ordered Less Enclosure (back box) by simply specifying LE after the Catalogue Number.

56 Series Modules

Designed to mix and match and packed with features designed to outperform all other protected accessories

Modular system with 1 to 16 gang arrangements to satisfy your every need. Available in high impact Grey (GY), Chemically Resistant Orange (RO), Chemically Resistant White (RW) or Chemically Resistant Grey (CG) finishes.

Screw caps eliminate dirt.

Raised lettering for long life of markings.

Clear indication of switch position.

Contoured profile reduces dust build-up.

Visible gasket - your guarantee of sealing.

Captive stainless steel combination head fixings for corrosion resistance and effortless installation.

LED indicator option in switches.

8mm Padlock ON/OFF facility.

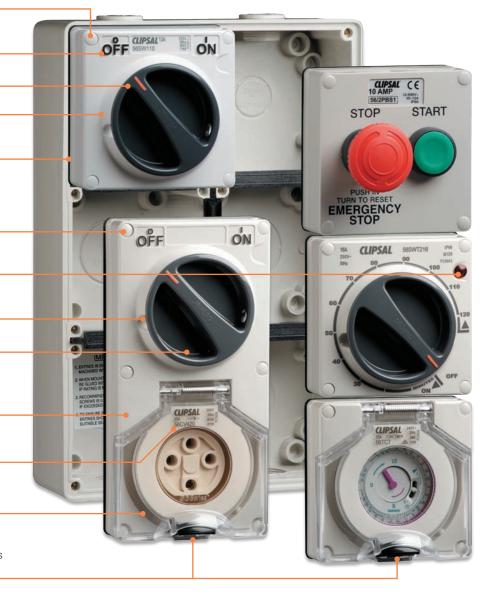
Rotary ON/OFF switch.

Mechanical interlock optional to ensure power disconnection before insertion or removal of the plug.

Permanent laser engraved ratings and specifications are durable & clearly displayed.

Redesigned transparent socket cover for improved visibility, strength & accessability.

Larger and easy-to-use latch design. Socket cover automatically closes to ensure IP rating is maintained. Padlocking option available.









56 Series Plugs

Clipsal's 56 Series Industrial Switchgear has a long standing history as being the toughest, most trusted industrial switchgear on the Australian market. This legacy has been carried on with Clipsal's new range of industrial plugs and socket connectors.



Snap Shut Bodies

Screw-less assembly using a 'latching' spring allows for speed, simplicity, product strength and improved reliability.

To Open

- 1. Look for padlock and arrow icons
- 2. Align grey band to locked position
- 3. Insert driver and push down firmly
- 4. Align grey band to unlocked position
- 5. Twist body left only



The 'latching' spring clip stays down once it is pressed, so it is just a simple 'press and switch'. The spring clip, when shut, does not exert any stress on the housings, resulting in a stronger body and sleeve connection.

To Close

- 1. Look for padlock and arrow icons
- 2. Align grey band to unlocked position
- 3. Insert driver and push down firmly
- 4. Align grey band to locked position
- 5. Twist body right only



Quick Connect Terminal Options

Clipsal's new Quick Connect terminals are 50% faster because they are designed to secure terminated wires under spring tension. Compared with traditional screw-in terminals, the Quick Connect design secures cables far more reliably.

The innovative new 56 Series plugs not only perform better but will save you valuable time and in turn increase your business profit.

Add QC to part number when ordering.



Terminate

- 1. Push driver into slot to open terminal
- Insert stripped, untwisted cable into terminal.
- 3. Release driver from slot

Release

- 1. Push driver into slot to open terminal
- 2 Pull out cable

Colour Options

The plastics used to manufacture the 56 Series range are superior quality industrial grade resins with outstanding high impact strength and UV protection.

Colours available:

- Chemical Resistant Orange (RO)
- Electric Orange (EO).
- Chemical Resistant White (RW
- Grey (GY).

66 Series Modules

Make light work of installations with 66 Series Combination Switched Socket Outlets

Clipsal design, engineering and precision brings you the revolutionary 66 Series of Combination Switched Socket Outlets and Plugs for 50 and 63 amp., 4, 5 or 7 pin heavy-duty appliances, such as welders, pumps, and mobile conveyors.

Until recently 50 and 63 amp. socket outlets and plugs were constructed with metal clad housings, which, in many situations, encounter drawbacks with their heavyweight, time consuming installation and susceptibility to corrosion.

66 Series Switched Socket Outlets and Plugs solve these problems and offer many other additional benefits.

Major features of the 66CV Switched Socket Outlets are their robust PVC back box and polyester cover that provide excellent chemical and high impact resistance as well as UV stability, in a neat, compact unit that's quicker and easier to install. 66P Plugs are manufactured from fully moulded, transparent polycarbonate or resistant orange polyester to offer the same degree of strength and resistance to chemicals and UV rays.

For convenience and safety, both the switched socket outlets and plugs can be easily used with gloved hands.

An internal interlock is fitted to the outlet to prevent insertion or withdrawal of the plug (provided the plug is fitted with an interlock facility) while the switch is in the 'on' position.

66CV Series Combination Switched Socket Outlets also incorporate a padlock facility in the 'off' position for added safety and security.





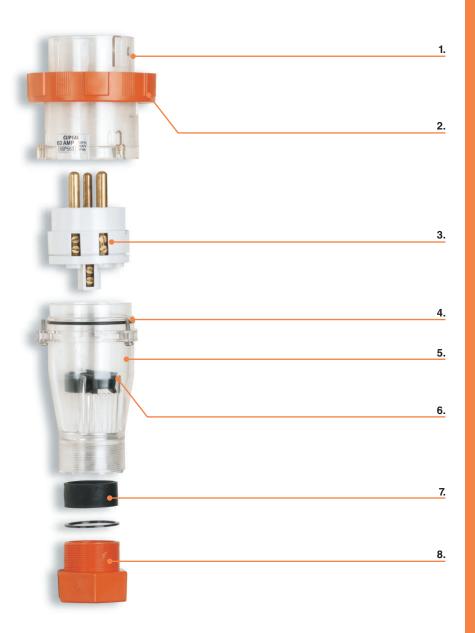
Features

- IP66 protection in accordance with AS 1939 for the Combination Switched Socket Outlet and also when engaged with a plug.
- Separate back box with rear wiring facility for easy installation of large diameter cables.
- 1 x M40 entry (top) and 2 x M32 entries (bottom) to assist cable termination
- Large switch knob and socket outlet flap for easy operation even with gloved hand.
- Socket outlet flap includes a heavy spring assembly to ensure IP66 integrity.

- Configurations of sockets and keyways in accordance with
- AS/NZS 3123.
- Stainless steel, combination head, captive cover screws for corrosion resistance and easy installation.
- Switch rated for motor duty, AC23 in accordance with
- AS/NZS 3947.3.
- Standard colour Grey. Resistant Orange optional. Double insulated for operator safety.
- Interior assembly is completely removable to assist with cable entry and termination of the large conductors required for the unit.

66 Series Plugs

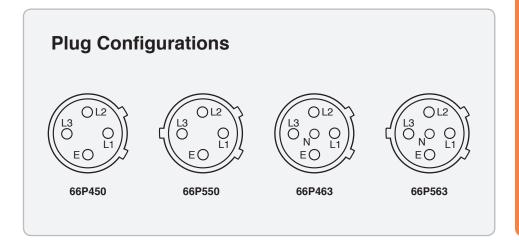
Screw-less assembly using a 'latching' spring allows for speed, simplicity, product strength and improved reliability.



Features

- Clear pin surround provides quick and sure location of plug in socket and protection of pins
- Wide Lock Ring can be tightened and unscrewed with ease, even with a gloved hand. Provides positive sealing with an inbuilt sponge-type gasket.
- Sturdy Terminal Housing for durability and years of reliable service.
- 4. Stainless Steel Combination Head Screws for corrosion resistance and easy installation
- 5. Transparent Polycarbonate Body allows instant inspection of connections
- Internal Cable Clamp is fast fixing and grips two ways, preventing cable from twisting
- 7. Cable Gland is extremely flexible with positive grip to ensure
- 8. Gland Nut with 50mm threaded cable entry for alternative facility

Note - IP Ratings only apply to cable terminations as per wiring instructions.



Chemical Comparisons

Chemical Resistance

It is well documented that Clipsal's standard grey products are ideal for most applications. For those environments where harsh chemicals are used that require special chemical resistant properties, Clipsal offers as an option of two product ranges:

- 1) Chemical Resistant Orange (RO)/ Chemical Resistant White (RW) and
- 2) Chemical Resistant Grey (CG)

These two ranges have been developed by leading plastic material manufacturers and offer greater resistance to chemical attack than common plastic materials with minimal reduction in impact strength.

To make selection of the correct product easy, we provide the following information and table as a guide on page 11.

Chemical Resistant Orange (RO)/Chemical Resistant White (RW) offers resistance to a wide range of chemical types. It is ideal for corrosive and industrial chemicals, animal fats, oils, solvents and lubricants.

This material has excellent UV resistance for use outside.

Chemical Resistant Grey (CG) is ideal in food processing and medical areas exposed to strong cleaning Alkalis (Sodium Hydroxide or Caustic Soda) are used. It should be noted that the material used in this product is not recommended for outside use due to low UV resistance.



Temperature Resistance

The temperature range of the 56 Series products are limited by two aspects;

- 1) the material used in mouldings and
- 2) the operating temperature of the electrical components.

The material type limits the use of the standard product to -25°C to +75°C.

For temperatures outside of these limits, and for information on the heat generated by the electrical components, please contact your Clipsal rep.



56C310,RW



56C310,CG

Plastic Comparison Chart

Applications	Standard Grey & Electric Orange	Resistant Orange & White	Resistant Dark Grey
Outdoor use - mechanical properties	А	А	D
Outdoor use - colour properties	В	В	D
Indoor use	А	А	А
Saltwater environments	А	А	D
Thermal properties	А	А	В
Lightweight	А	А	А
High rigidity	В	В	С
Impact resistant	А	В	С

This table should be used as a guide only. Any end user should test to evaluate the suitability of any chemical with any plastic A - EXCELLENT Recommended; no adverse effects after extended exposure.

B - G00D Acceptable, minimal loss of mechanical properties after long periods of exposure

C - FAIR Marginal acceptability; loss of mechanical properties after long periods of exposure.



56C432,RO

Chemical Comparisons

Product Type (colour)	All Mounting Enclosures (ie Back Box)	Grey Transparent Covers and Plugs	Resistant Orange (RO) Resistant White (RW) Covers and Plugs	Dark Grey (CG) Covers Limited Range
Acids	(16 Dack Dox)	Oovers and Flugs	oovers and rings	Lillited Hallye
Weak Solutions				
Hydrochloric 10%	A	A	A	A
Nitric 10%	A	A	A	В
Concentrate	7.	,,	,,	
Sulphuric 100%	А	D	D	D
Alkalis	7.			
Weak Solutions				
Sodium Hydroxide 10% (Caustic Soda)	A	D	В	A
Concentrate	T.	J.	D	7.
Potassium Hydroxide 100%	A-B	D	D	А
Automotive	N D	, and the second	D	71
Petroleum	А	D	A	D
Lubricating Oils		D	A	C
Hydraulic Oil		D	A	C
Solvents			Λ	
Aliphatic Hydrocarbons (Alkanes)				
Methane	В	A	A	
Propane	A	A	A	
Alcohols	N .	, A	A	
Ethylene Glycol	A	A	A	
Glycerol (Glycerin)	A	C	В	А
Methyl Alcohol (Methanol)	A	D	В	
Ethyl Alcohol (Ethanol)	A	A	A	D
Amines	n n	A	A	U
Aniline	D	D	D	
Aromatic Hydrocarbons	U	D	D	
Methyl Benzene	D	D	В	D
Xylene	D	D	В	D
Ethers	U	D D	D	U U
Dimethyl Ethyl	A	A	A	
Ketones	- A	A	A	
Acetone	A	D	С	D
Acetophenone	D	D	C	D
Ethyl Methyl Ketone	D	D	C	D
Miscellaneous				
Detergent	А	A	A	D
Inorganic Salts				
Magnesium Sulphate	А	A	A	
Oxidising Agents				
Weak Solution				
Sodium Hypochlorite 5%	A	A	A	A
Strong Solution	<i>/</i> /	TA .	П	7
Hydrogen Peroxide 30%	A	A	A	A
Water	71	<i>n</i>	Α	^
Ambient	A	A	A	A
Hot >60°C	C	A	В	C
Steam		D	D	D

This table should be used as a guide only. Any end user should test to evaluate the suitability of any chemical with any plastic.

A - EXCELLENT
C - FAIR

Recommended; no adverse effects after extended exposure.

B - GOOD
Acceptable, minimal loss of mechanical properties after long periods of exposure.

D - POOR
Not recommended for use.

Combination Switched Socket Outlets





56C310,GY

The Clipsal range of three phase combinations includes two module units and one-piece cover models. All internal phase connections between switches and sockets are factory wired.

The 4 and 5 pin, 10 and 20A one-piece cover models have integral wiring between the switch and socket outlet. Installation time is reduced by not having to check factory wire terminations. There is also no likelihood of wires falling out during installation.

56CV315,RO

Combination sockets feature a clear dustproof and hoseproof flap with a snap catch latch. Both the superseded non IP56 plain plugs and the current IP66 retention ring plugs can be accommodated. 250V, 110V and extra low voltage two module combinations are also available.

Earth and neutral connectors accommodating 3 x 6mm² cables are supplied with 500V models.

Options available

- Less Enclosure add LE to Catalogue
 Number e.g. 56C410 becomes 56C410LE.
- Versions with key operated switches available to special order.

Catalogue Number	No. of switch poles	I _{the} (Amp)	U _i / U _e (Volt)
56C210	1 Pole	10A	110V
56C215/32	1 Pole	15A	32V
56C3/110	1 Pole	10A	110V
56C310RP	1 Pole	10A	250V
56C310	1 Pole	10A	250V
56C310HD	1 Pole	10A	250V
56C310L	1 Pole	10A	250V
56C315	1 Pole	15A	250V
56C315HD	1 Pole	15A	250V
56C320	1 Pole	20A	250V
56C320F	1 Pole	20A	250V
56C332	1 Pole	32A	250V
56C310D	2 Pole	10A	250V
56C315D	2 Pole	15A	250V
56C410	3 Pole	10A	500V
56C416K	3 Pole	16A	500V
56C420	3 Pole	20A	500V
56C432	3 Pole	32A	500V
56C440	3 Pole	40A	500V
56C450	3 Pole	50A	500V
56C510	3 Pole	10A	500V
56C520	3 Pole	20A	500V
56C532	3 Pole	32A	500V
56C540	3 Pole	40A	500V
56C550	3 Pole	50A	500V
56C610	3 Pole	10A	500V
56C710	3 Pole	10A	500V
56C720	3 Pole	20A	500V

Catalogue Number	No. of switch poles	I _{the} (Amp)	U _i / U _e (Volt)
56CV310	1 Pole	10A	250V
56CV310HD	1 Pole	10A	250V
56CV315	1 Pole	15A	250V
56CV315HD	1 Pole	15A	250V
56CV320	1 Pole	20A	250V
56CV332	1 Pole	32A	250V
56CV410	3 Pole	10A	500V
56CV416K	3 Pole	16A	500V
56CV420	3 Pole	20A	500V
56CV432	3 Pole	32A	500V
56CV440	3 Pole	40A	500V
56CV450	3 Pole	50A	500V
56CV510	3 Pole	10A	500V
56CV520	3 Pole	20A	500V
56CV532	3 Pole	32A	500V
56CV540	3 Pole	40A	500V
56CV550	3 Pole	50A	500V
56CV610	3 Pole	10A	500V
56CV710	3 Pole	10A	500V
56CV720	3 Pole	20A	500V

Refer to page 57 for explanation of socket configurations.

	Dimension	al Drawings	
56C210 56C215/32 56C3/110 56C310 56C310HD 56C315 56C315HD 56C320 56C320 56C315D 56C410 56C410 56C420 56C420 56C420 56C450 56C450 56C520 56C520 56C532 56C540 56C540 56C540 56C540 56C550 56C510 56C510 56C510 56C510 56C510 56C520 56C532 56C540 56C550 56C510 56C510 56C510 56C510 56C510 56C510 56C510 56C520 56C532 56C540 56C550 56C510 56C710 56C710 56C710 56C710 56C710 56C710	1 x M25 CONDUIT ENTRY 198 2 x M20 CONDUIT ENTRIES FRONT & SIDES COMPLETE	204	36 30 30 30 30 30 30 30 30 30 30 30 30 30
56CV310HD 56CV315HD 56CV315HD 56CV320 56CV320 56CV410 56CV410 56CV420 56CV420 56CV432 56CV440 56CV450 56CV520 56CV520 56CV540 56CV540 56CV540 56CV540 56CV540 56CV540 56CV540 56CV540	1 x M25 CONDUIT ENTRY 198 2 x M20 CONDUIT ENTRIES FRONT & SIDES COMPLETE	204	36 30 30 30 30 30 30 30 30 30 30 30 30 30

Combination Switched Socket Outlets

- Internal interlock facility available on three phase, one piece cover combinations - add I to Catalogue Number e.g. 56CV410 becomes 56CVI410.
- Resistant Orange add RO to Catalogue Number e.g. 56CV410 becomes 56CV410,RO.
- Resistant White add RW to Catalogue Number e.g. 56C410 becomes 56C410,RW.
- Two piece versions available in Chemical Grey. Chemical Grey - add CG to Catalogue Number e.g. 56C410 becomes 56C410,CG.

			TV	VO PIECE							
le (A) Utili	sation Categ	ory	M	Number	Cond. Term	Size in mm ²	IP	O/A Dims.	Matching Plug	Matching	Socket
AC21A	AC22A	AC23A	Rating	of Sockets	Min.	Max/Cond.	Rating	(H) x (W) x (D)	Straight	Plug Angle	Config
10	8	8	M80	2 Parallel Flat	1.5	6	66	204x101x83	56P210		D
15	10	8	M80	2 Polarised	1.5	6	66	204x101x83	56P215/32		Е
10	8	8	M80	2 Round & Flat Earth	1.5	6	66	204x101x83	56P3/110		J
10	8	8	M80	3 Round	1.5	6	66	204x101x83	56P310RP		G
10	8	8	M80	3 Flat	1.5	6	66	204x101x83	56P310		Α
10	10	11	M100	3 Flat w/heavy duty switch	1.5	6	66	204x101x108	56P310		Α
10	8	8	M80	2 Flat & Round Earth	1.5	6	66	204x101x83	56P310SL		С
15	10	8	M80	3 Flat	1.5	6	66	204x101x83	56P315		В
15	15	15	M120	3 Flat w/heavy duty switch	1.5	6	66	204x101x108	56P315		В
20	20	21	M150	3 Round	2.5	6	66	204x101x108	56P320	56PA320	Н
20	20	20	M150	3 Flat	2.5	6	66	204x101x108	56P320F		F
32	32	28	M180	3 Round	6	16	66	204x101x108	56P332	56PA332	1
10	10	11	M100	3 Flat double pole	1.5	6	66	204x101x108	56P310		А
15	15	15	M120	3 Flat double pole	1.5	6	66	204x101x108	56P315		В
10	10	11	M100	4 Round	1.5	6	66	204x101x108	56P410	56PA410	K
16	16	15	M120	Unique key config.	1.5	6	66	204x101x108	56P416K	56PA416K	М
20	20	21	M150	4 Round	2.5	6	66	204x101x108	56P420	56PA420	L
32	32	28	M180	4 Round	4	16	66	204x101x108	56P432	56PA432	N
40	40	35	M200	4 Round	10	16	66	204x101x108	56P440	56PA440	0
50	50	35	M250	4 Round	10	16	66	204x101x108	56P450	56PA450	Р
10	10	11	M100	5 Round	1.5	6	66	204x101x108	56P510	56PA510	Q
20	20	21	M150	5 Round	2.5	6	66	204x101x108	56P520	56PA520	R
32	32	28	M180	5 Round	4	16	66	204x101x108	56P532	56PA532	S
40	40	35	M200	5 Round	10	16	66	204x101x108	56P540	56PA540	T
50	50	35	M250	5 Round	10	16	66	204x101x108	56P550	56PA550	U
10	10	11	M100	6 Round	1.5	6/2.5	66	204x101x108	56P610	56PA610	V
10	10	11	M100	7 Round	1.5	6/2.5	66	204x101x108	56P710	56PA710	W
20	20	21	M150	7 Round	2.5	6/2.5	66	204x101x108	56P720	56PA720	X

			01	IE PIECE							
le (A) Utili:	sation Categ	ory	M	Number	Cond. Term	Size in mm	IP	O/A Dims.	Matching Plug	Matching	Socket
AC21A	AC22A	AC23A	Rating	of Sockets	Min.	Max/Cond.	Rating	(H) x (W) x (D)	Straight	Plug Angle	Config
10	8	8	M80	3 Flat	1.5	6	66	204x101x83	56P310		А
10	10	11	M100	3 Flat w/heavy duty switch	1.5	6	66	204x101x83	56P310		А
15	10	8	M80	3 Flat	1.5	6	66	204x101x83	56P315		В
15	15	15	M120	3 Flat w/heavy duty switch	1.5	6	66	204x101x108	56P315		В
20	20	21	M150	3 Round	2.5	6	66	204x101x108	56P320	56PA320	Н
32	32	28	M180	3 Round	6	16	66	204x101x108	56P332	56PA332	1
10	10	11	M100	4 Round	1.5	10	66	204x101x108	56P410	56PA410	K
16	16	15	M120	Unique key config.	1.5	6	66	204x101x108	56P416K	56PA416K	М
20	20	21	M150	4 Round	2.5	10	66	204x101x108	56P420	56PA420	L
32	32	28	M180	4 Round	4	16	66	204x101x108	56P432	56PA432	N
40	40	35	M200	4 Round	6	16	66	204x101x108	56P440	56PA440	0
50	50	35	M250	4 Round	10	16	66	204x101x108	56P450	56PA450	Р
10	10	11	M100	5 Round	1.5	10	66	204x101x108	56P510	56PA510	Q
20	20	21	M150	5 Round	2.5	10	66	204x101x108	56P520	56PA520	R
32	32	28	M180	5 Round	4	16	66	204x101x108	56P532	56PA532	S
40	40	35	M200	5 Round	6	16	66	204x101x108	56P540	56PA540	T
50	50	35	M250	5 Round	10	16	66	204x101x108	56P550	56PA550	U
10	10	11	M100	6 Round	1.5	6/2.5	66	204x101x108	56P610	56PA610	V
10	10	11	M100	7 Round	1.5	6/2.5	66	204x101x108	56P710	56PA710	W
20	20	21	M150	7 Round	2.5	6/2.5	66	204x101x108	56P720	56PA720	X

Surface Socket Outlets







56SO310,GY 56SO520,RO 56SO710,RW

Extra Low Voltage and 3 Phase sockets

Clipsal Surface Socket Outlets range in size from 32V 10A to 500V 50A.

All sockets feature hoseproof and dust resistant flaps with automatic snap catch latches. The transparent flap enables instant visual inspection of socket condition and pin configuration.

The full range of sockets accommodate both the superseded IP56 plain plugs and the current IP66 retention ring plugs in order to rationalise the number of variations required.

Earth and neutral connectors accommodating $3 \times 6 \text{mm}^2$ cable are supplied with all 500V models.

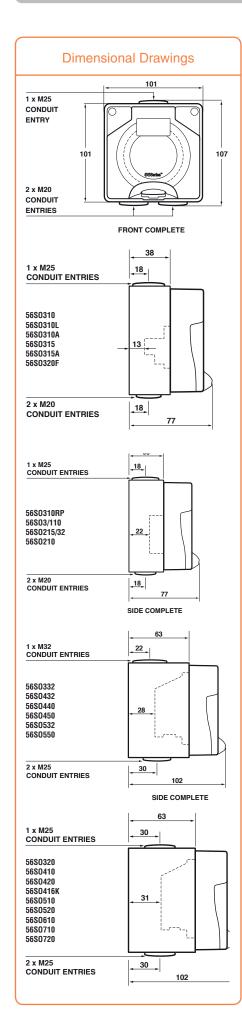
Terminal housings are moulded in tough polyester to minimise damage.

Catalogue	I _{the}	U,/U。	Number of	Cond. Term	Size in mm	IP	O/A Dims.	Matching Plug	Matching Plug	Socket
Number	(Amp)	(Volt)	Sockets	Min.	Max/Cond.	Rating	(H) x (W) x (D)	Straight	Straight	Config.
5680210	10A	110V	2 Parallel Flat	1.5	16	66	107x101x77	56P210		D
5680215/32	15A	32V	2 Pin Polarised	1.5	6	66	107x101x77	56P215/32		Е
56803/110	10A	110V	2 Round Live & Flat Earth	1.5	6	66	107x101x77	56P3/110		J
56S0310RP	10A	250V	3 Round	1.5	6	66	107x101x77	56P310RP		G
5680310	10A	250V	3 Flat	1.5	6	66	107x101x77	56P310		Α
5680315	15A	250V	3 Flat	1.5	6	66	107x101x77	56P315		В
56SO310A	10A	250V	3 Flat auto-switched D/P	1.5	10	66	107x101x77	56P310		Α
56SO315A	15A	250V	3 Flat auto-switched D/P	1.5	10	66	107x101x77	56P315		В
56SO310L	10A	250V	2 Flat & Round Earth	1.5	6	66	107x101x77	56P310SL		С
5680320	20A	250V	3 Round	2.5	6	66	107x101x102	56P320	56PA320	Н
56SO320F	20A	250V	3 Flat Pins	2.5	6	66	107x101x77	56P320F		F
5680332	32A	250V	3 Round	6	16	66	107x101x102	56P332	56PA332	1
5680410	10A	500V	4 Round	1.5	6	66	107x101x102	56P410	56PA410	K
56SO416K	16A	500V	Unique key configuration	1.5	6	66	107x101x102	56P416K	56PA416K	M
5680420	20A	500V	4 Round	2.5	6	66	107x101x102	56P420	56PA420	L
56SO432	32A	500V	4 Round	4	16	66	107x101x102	56P432	56PA432	N
5680440	40A	500V	4 Round	6	16	66	107x101x102	56P440	56PA440	0
5680450	50A	500V	4 Round	10	16**	66	107x101x102	56P450	56PA450	Р
5680510	10A	500V	5 Round	1.5	6	66	107x101x102	56P510	56PA510	Q
5680520	20A	500V	5 Round	2.5	6	66	107x101x102	56P520	56PA520	R
5680532	32A	500V	5 Round	4	16	66	107x101x102	56P532	56PA532	S
5680540	40A	500V	5 Round	6	16	66	107x101x102	56P540	56PA540	T
5680550	50A	500V	5 Round	10	16**	66	107x101x102	56P550	56PA550	U
5680610	10A	500V	6 Round	1.5	6/2.5	66	107x101x102	56P610	56PA610	V
5680710	10A	500V	7 Round	1.5	6/2.5	66	107x101x102	56P710	56PA710	W
5680720	20A	500V	7 Round	2.5	6/2.5	66	107x101x102	56P720	56PA720	Χ

Note: 56S0320 and 56S0320F come with the facility to fit auxiliary switch 56S0AUX15.

** - L1, L2, L3 Cable size max. $25mm^2 - 1_{be}$ - Conventional Enclosed Thermal Current U_i - Insulation Voltage

Surface Socket Outlets





Spare Parts Internal Socket Housings

A full range of replacement internal socket housings is available for 3 phase 56SO models. They eliminate the need to replace an entire unit if only the internal socket housing is damaged. Socket terminal housings are moulded in durable polyester.

Options available

- Less Enclosure add LE to catalogue number e.g. 56SO410 becomes 56SO410LE.
- Resistant Orange add RO to catalogue number e.g. 56SO410 becomes 56SO410,RO.
- Resistant White add RW to catalogue Number e.g. 56SO310 becomes 56SO310RW.



56SO410G Series

Catalogue	I _{the}	U _i	Number of	Cond. Term	Size in mm²	Socket
Number	(Amp)	(Volt)	Sockets	Min.	Max/Cond.	Configuration
56SO320G	20A	250V	3 Round	2.5	6	Н
56S0332G	32A	250V	3 Round	6	16	I
56SO410G	10A	500V	4 Round	1.5	6	K
56SO416KG	16A	500V	Unique key configuration	1.5	6	М
56SO420G	20A	500V	4 Round	2.5	6	L
56SO432G	32A	500V	4 Round	6	16	N
56SO440G	40A	500V	4 Round	10	16	0
56SO450G	50A	500V	4 Round	10	16	Р
56SO510G	10A	500V	5 Round	1.5	6	Q
56SO520G	20A	500V	5 Round	2.5	6	R
56S0532G	32A	500V	5 Round	6	16	S
56SO540G	40A	500V	5 Round	10	16	T
56SO550G	50A	500V	5 Round	10	16	U
56SO610G	10A	500V	6 Round	1.5	6/2.5	V
56S0710G	10A	500V	7 Round	1.5	6/2.5	W
56S0720G	20A	500V	7 Round	2.5	6/2.5	X

I $_{\rm the}$ - Conventional Enclosed Thermal Current $U_{\rm i}$ - Insulation Voltage

Appliance Inlets





56AI310,RW

56AI520,GY

56 Series Appliance Inlets

56 Series Appliance Inlets feature a downward facing, angled pin housing which enables extension socket plugs to be neatly connected without bulky right angle entry.

A screwed lock ring is standard on all models to secure extension sockets and appliance connectors, and ensure IP integrity.

All mouldings are impact resistant and UV stabilised.

Note: The IP rating is only achieved on 500V appliance inlets if the screw-on cap (56PC Series) provided is fitted when not in use.

All 56Al Series Appliance Inlets are compatible with 56CSC Extension Sockets and there is no need for special reverse pin plugs.

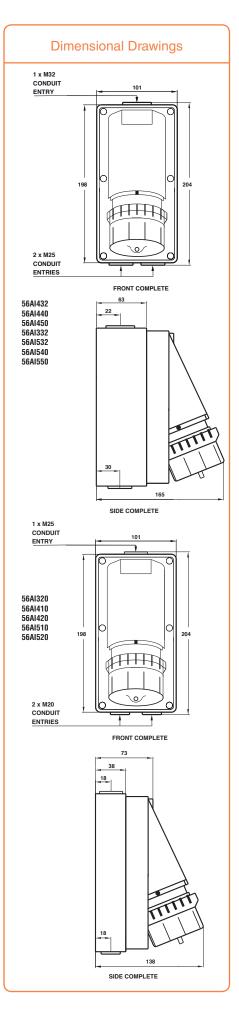
Options available

- All appliance inlets are available Less Enclosure - add LE to Catalogue Number e.g. 56Al420 becomes 56Al420LE.
- 56Al310 and 56Al315 versions available in Chemical Resistant Orange e.g. 56Al310 becomes 56Al310.RO.

Dimensional Drawings 1 x M25 CONDUIT ENTRY 101 2 x M20 CONDUIT ENTRIES FRONT COMPLETE 56AI310 56AI315 101 107 2 x M20 COMPLETE SIDE COMPLETE

Catalogue Number	I the (Amp)	U ; (Volt)	Number of Pins		Term n mm Max	IP Rating	Matching Extension Socket	Socket Config. socket	O/A Dims. (H) x (W) x (D)
56AI310	10A	250V	3 Flat	1.5	6	66	56CSC310	Α	107x101x82
56AI315	15A	250V	3 Flat	2.5	6	66	56CSC315	В	107x101x82
56AI320	20A	250V	3 Round	2.5	6	66	56CSC320	Н	204x101x138
56AI332	32A	250V	3 Round	6	16	66	56CSC332	I	204x101x165
56AI410	10A	500V	4 Round	1.5	6	66	56CSC410	K	204x101x138
56AI420	20A	500V	4 Round	2.5	6	66	56CSC420	L	204x101x138
56AI432	32A	500V	4 Round	6	16	66	56CSC432	N	204x101x165
56AI440	40A	500V	4 Round	10	16	66	56CSC440	0	204x101x165
56AI450	50A	500V	4 Round	10	16	66	56CSC450	Р	204x101x165
56AI510	10A	500V	5 Round	1.5	6	66	56CSC510	Q	204x101x138
56AI520	20A	500V	5 Round	2.5	6	66	56CSC520	R	204x101x138
56AI532	32A	500V	5 Round	6	16	66	56CSC532	S	204x101x165
56AI540	40A	500V	5 Round	10	16	66	56CSC540	T	204x101x165
56AI550	50A	500V	5 Round	10	16	66	56CSC550	U	204x101x165

U $_{\text{the}}$ - Conventional Enclosed Thermal Current $U_{_{\mathrm{i}}}$ - Insulation Voltage



Surface Switches





56SW320,R0

Options available

- · Less Enclosure add LE to Catalogue Number e.g. 56SW320 becomes 56SW320LE.
- Resistant Orange add RO to Catalogue Number e.g. 56SW320 becomes 56SW320,RO
- · Resistant White add RW to Catalogue Number e.g. 56SW320 becomes 56SW320,RW
- · Chemical Grey add CG to Catalogue Number e.g. 56SW320 becomes 56SW320,CG.
- 56SW320CX replaces 56SW320C control switch

56 Series Surface Switches

56SW110,GY

56 Series Surface Switches are available from 250V, 10A to 500V 63A. They incorporate a positive, rotary switch action. 'ON' and 'OFF' positions are clearly marked and there is provision for two padlocks. Hole diameter is 8mm.

If locking is required in the 'ON' position, simply drill a hole where necessary.

To provide easier wiring of our 56 Series Three Pole 63A Switch, a deeper two gang enclosure and centrally mounted option (Cat. No. 56SW363/2), allows additional room for wiring associated with this application.

Earth and neutral connectors accommodating 3 x 6mm² cables are supplied with all products above 20A.

All 63A switches come with the facility to fit auxiliary micro switch 56SWAUX15.

Catalogue	No. of Switched	l the	U _i /U	I _e (A) U	tilisation (Category	M	Conductor Term	inal size in mm²	IP	O/A Dims.
Number	Poles	(Amp)	(Volt)	AC21A	AC22A	AC23A	Rating	Min.	Max/Cond.	Rating	(H) x (W) x (D)
56SW110	1 Pole	10A	250V	10	8	8	M80	1.5	6	66	107x101x83
56SW110HD*	1 Pole	10A	250V	10	10	10	M100	6	16	66	107x101x108
56SW110/2*	1 Pole	10A	250V	10	8	8	M80	1.5	6	66	107x101x83
56SW110/I*	1 Pole	10A	250V	10	8	8	M80	1.5	6	66	107x101x83
56SW115*	1 Pole	15A	250V	15	8	8	M80	1.5	6	66	107x101x83
56SW115HD*	1 Pole	15A	250V	15	15	15	M100	6	16	66	107x101x108
56SW115/2*	1 Pole	15A	250V	15	8	8	M80	1.5	6	66	107x101x83
56SW120	1 Pole	20A	250V	20	20	20	M150	2.5	16	66	107x101x108
56SW132	1 Pole	32A	250V	32	32	28	M180	4	16	66	107x101x108
56SW150	1 Pole	50A	250V	50	50	25	M250	10	25	66	107x101x108
56SW163	1 Pole	63A	250V	63	63	25	M300	16	25	66	107x101x108
56SW210/2*	2 Pole	10A	250V				M40			66	
56SW220	2 Pole	20A	500V	20	20	20	M150	2.5	16	66	107x101x108
56SW232	2 Pole	32A	500V	32	32	28	M180	4	16	66	107x101x108
56SW250	2 Pole	50A	500V	50	50	25	M250	10	25	66	107x101x108
56SW263	2 Pole	63A	500V	63	63	25	M300	16	25	66	107x101x108
56SW310	3 Pole	10A	500V	10	10	10	M100	1.5	16	66	107x101x108
56SW320	3 Pole	20A	500V	20	20	20	M150	2.5	16	66	107x101x108
56SW332	3 Pole	32A	500V	32	32	28	M180	4	16	66	107x101x108
56SW350	3 Pole	50A	500V	50	50	25	M250	10	25	66	107x101x108
56SW363	3 Pole	63A	500V	63	63	25	M300	16	25	66	107x101x108
56SW363/2*	3 Pole	63A	500V	63	63	25	M300	16	25	66	204x101x108
56SW420*	4 Pole	20A	440V	20	20	20	-	2.5	6	66	107x101x108
56SW432*	4 Pole	32A	440V	20	20	20	-	2.5	6	66	107x101x108

*Further Information

56SW110HD - Single Pole Heavy Duty **56SW110/2** - 2 way 4 terminal

56SW110/I - Intermediate switch mechanism

56SW115 - 1 way 2 terminal **56SW115HD** - Single Pole Heavy Duty **56SW115/2** - 2 way 4 terminal

56SW210/2
56SW363/2- 2 way 6 terminal
- 2 gang enclosure56SW420- with 7 Series switch mechanism

56SW432 - with 7 Series switch mechanism

Surface Switches



56SW120,RY

Safety Surface Switches

Clipsal's safety range of switches ensures isolators are highly visible by using a brightly coloured red switch knob and yellow plate.

The high visibility naturally reduces an individual's response time in the event of an emergency.

Range consists of the following catalogue numbers at standard switch prices.

Nominate colour "RY". e.g. 56SW120 becomes 56SW120,RY.

- 56SW120,RY
- 56SW132,RY
- 56SW320,RY
- 56SW332.RY
- 56SW350,RY
- 56SW363,RY

Refer to previous page for technical information.

250V Single and Twin 2 Way Switches with sliding switch dollies



56 Series Single and Twin Sliding Switches are available in 10A and 15A ratings. A single intermediate switch is also available.

Options available

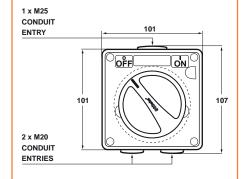
- Less enclosure add LE to Catalogue Number e.g. 56SSW10 becomes 56SSW10,LE.
- Resistant Orange add RO to Catalogue Number e.g. 56SSW10 becomes 56SSW10.RO.

56SSW10,GY

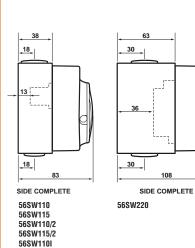
Catalogue Number	Description	No. of switches p/Module	I _{the} (Amp)	U,/Ue (Volts)	M Rating	Cond. Size i	n mm²	IP Rating	0/A Dims. (H) x (W) x (D)
		p/mounic				Min.	Max		
56SSW10	Single sliding switch	1	10A	250V	M80	1.5	6	56	107x101x65
56SSW15	Single sliding switch	1	15A	250V	M80	1.5	6	56	107x101x65
56SSW10/I	Intermediate sliding	1	10A	250V	M100	1.5	6	56	107x101x65
56SSW2/10	Twin sliding switch	2	10A	250V	M80	1.5	6	56	107x101x65
56SSW2/15	Twin sliding switch	2	15A	250V	M80	1.5	6	56	107x101x65
56SSW2AM	Twin sliding switches marked 'auto / man / on / off'								

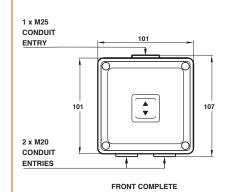
Note: AC utilisation categories to AS/NZS3947.3 I_{the} - Conventional Enclosed Thermal Current U_i - Insulation Voltage U_e - Operational Voltage

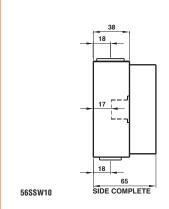
Dimensional Drawings



FRONT COMPLETE







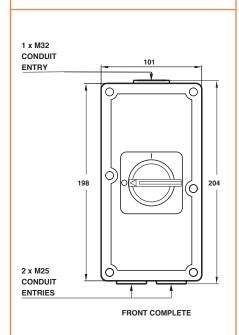
Surface Switches

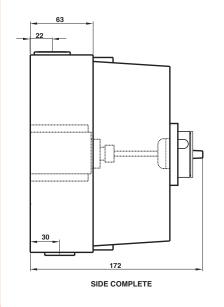




56SWH325,GY

Dimensional Drawings





Heavy Duty Surface Switches

Clipsal Heavy-Duty Surface Switches come with integral 3 or 4 pole configurations, from 25 to 80A ratings. The switch actuator comes standard in safety red/yellow and has 3 padlocking facilities. Hole diameter is 8mm.

The switch is mounted separate to cover in a DIN mounting drop-in cradle which allows quick removal and installation.

The extra deep enclosure allows ample wiring space for easy installation and the switch is suited to motor rating.

Options available

- Resistant Orange add RO to Catalogue Number eg. 56SWH325 becomes 56SWH325,RO
- Auxiliary contact add C for 1 N/C 10A contact to Catalogue Number e.g. 56SWH325 becomes 56SWH325C. Add CO for 1 N/C and 1 N/O 10A contact to Catalogue Number e.g. 56SWH325 becomes 56SWH325CO

Catalogue Number	No. of switches	I the	U _i /U _e (Volt)	kW	Util	I _e (A) isation (Cat.	Cond. Size i		IP Rating	O/A Dims. (H) x (W) x (D)
Nullibol	poles	(Amp)	(Voit)		AC21A	AC22A	AC23A	Min.	Max	Hutting	(11) * (11) * (12)
				Motor F	Rated in	56E2 De	eep Lid				
56SWH325	3 Pole	25A	690V	7.5	25	25	25	1.5	16	56	204x101x172
56SWH340	3 Pole	25A	690V	11	40	40	25	1.5	16	56	204x101x172
56SWH363	3 Pole	63A	690V	25	63	63	63	1.5	35	56	204x101x172
56SWH380	3 Pole	80A	690V	25	80	80	63	1.5	35	56	204x101x172
56SWH425	4 Pole	25A	690V	7.5	25	25	25	1.5	25	56	204x101x172
56SWH440	4 Pole	40A	690V	11	40	40	25	1.5	25	56	204x101x172
56SWH463	4 Pole	63A	690V	25	63	63	40	1.5	25	56	204x101x172
			Motor	Rated i	in Stainl	ess Stee	el Enclos	sures			
56SWH325S	3 Pole	25A	690V	7.5	25	25	25	1.5	16	56	204x101x172
56SWH340S	3 Pole	25A	690V	11	40	40	25	1.5	16	56	204x101x172
56SWH363S	3 Pole	63A	690V	25	63	63	63	1.5	35	56	204x101x172
56SWH380S	3 Pole	80A	690V	25	80	80	63	1.5	35	56	204x101x172
56SWH425S	4 Pole	25A	690V	7.5	25	25	25	1.5	25	56	204x101x172
56SWH440S	4 Pole	40A	690V	11	40	40	25	1.5	25	56	204x101x172
56SWH463S	4 Pole	63A	690V	25	63	63	40	1.5	25	56	204x101x172

Changeover and Reversing Switches



56SW220C0,GY

Designed to give full motor control in a unit that is rated IP66. Clipsal's Changeover and Reversing Switches are housed within single modules as part of the overall modular concept of the range.

Earth and neutral connectors accommodating 3 x 6mm² cables are provided with all models.



56SW320R,GY

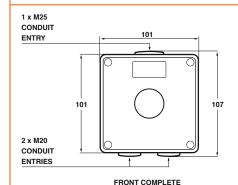
Option available

 Resistant Orange - add RO to Catalogue Number e.g. 56SW220CO becomes 56SW220CO,RO.

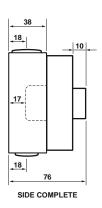
Clipsal 7 Series Cam Type Switch Mechanisms are used and therefore special configurations are available. Contact your Clipsal representative for more information.

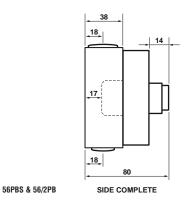
Dimensional Drawings 1 x M25 CONDUIT 101 **ENTRY** 30 O OFF 0 101 107 0 2 x M25 CONDUIT **ENTRIES** 30 56SW220C0 SIDE COMPLETE FRONT COMPLETE 30 30 0 0 0 0 0 0 0 0 0 0 30 124 56SW420C0 56SW320R SIDE COMPLETE SIDE COMPLETE

Dimensional Drawings



56PB & 56PBS

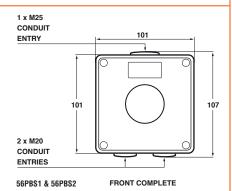


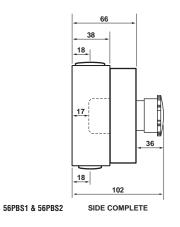


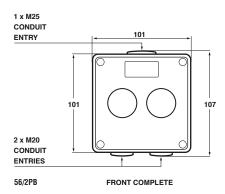
Catalogue	ewitchen u		U ,/U ֱ	le (A)	Utilisation Cat	egory	AC15	Cond. Term	Size in mm²	IP	O/A Dims.
Number	poles	(Amp)	(Volt)	AC21A 690V	AC21A	AC23A 690V	240V/415V	Min.	Max	Rating	(H) x (W) x (D)
56SW220CO Changeover Switch	2 Pole	20A	500V	20	-	15	8/6	1.5	2 x 4	66	107x101x124
56SW420CO 3 Phase Changeover Switch	4 Pole	20A	500V	20	-	15	8/6	1.5	2 x 4	66	107x101x124
56SW320R Reversing Switch	3 Pole	20A	500V	20	-	15	8/6	1.5	2 x 4	66	107x101x124

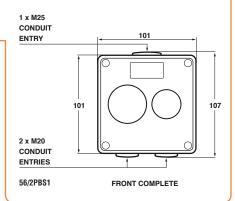
Push Button Control Stations

Dimensional Drawings











Push Button (PB) range L-R: 56/2PB,GY, 56PBS1,GY, 56PBS,GY, 56/2PBS1,GY.

This rugged range consists of five different combinations of stop start control stations.

The stations are ideal in wet, dusty or dirty conditions for controlling motor starters on pumps, saws, compressors, lathes, processors and processing lines.

56PB - Start control station.

56PBS - Stop control station.

56PBS1 - Emergency stop station. This station has a mushroom head with twist reset and red push button.

56PBS2 - Stop station. This station has a mushroom head with twist reset and red push button (labelled stop only).

56/2PB - Combination stop/start control station with momentary operation push buttons. The red stop button has an extended head and the green start button a flush head.

56/2PBS1 - Combination stop/start control station with same stop button as the 56PBS1.

Options available

- Less Enclosure Add LE to Catalogue Number e.g. 56PB becomes 56PBLE.
- Resistant Orange Add RO to Catalogue Number e.g. 56PBS1 becomes 56PBS1,RO.
- Resistant White Add RW to Catalogue Number e.g. 56PBS1 becomes 56PBS1,RW.

Catalogue	the	U _i /U _e	Cate	ilisation gory	Button	Cond. Size i		IP Dating	O/A Dims.	
Number	(Amp)	(Volt)	AC15 240V	DC13 24V	Colour	Min.	Max.	Rating	(H) x (W) x (D)	
56PB Start control station	10A	250V	6	8	Green	1	4	66	107x101x76	
56PBS Stop control station	10A	250V	6	8	Red	1	4	66	107x101x80	
56PBS1 Emergency stop control station	10A	250V	6	8	Red	1	4	66	107x101x102	
56PBS2 Mushroom button latching control station	10A	250V	6	8	Red	1	4	66	107x101x102	
56/2PB Start/Stop control station	10A	250V	6	8	Red/Green	1	4	66	107x101x80	
56/2PBS1 Emergency stop control & start station	10A	250V	6	8	Red/Green	1	4	66	107x101x80	

Note: AC utilisation categories to AS/NZS3947.5 | ___ Conventional Enclosed Thermal Current | U_ - Insulation Voltage | U_ - Operational Voltage | U_ - Operational Voltage | U_ - Operational Current |

Contact Block Spares/Buttons							
ZB5AZ101	(NO) Normal Open Contact						
ZB5AZ102	(NC) Normal Closed Contact						
ZB5AA3	Push Button Head Green						
ZB5AS54	Emergency Stop Head 40mm Red						
ZB5AC4	Push Button Head Raised Red						

Key Operated Switches



56K1SW310,GY

56 Series Key Operated Switches are designed for all key switch applications with the choice of three versions.

Earth and neutral connectors accommodating 3 x 6mm² are supplied with all models.

Standard Security

For general applications. From single phase 20A to three phase 50A. These switches are supplied with individual keys.

Medium Security

For medium security applications. These switches are fitted with high quality Lock Focus 227 Barrell locks. The key itself is rotated in order to operate the switch mechanism. These switches are supplied with individual keys. The switch cover has smooth edges to resist forced actuation.

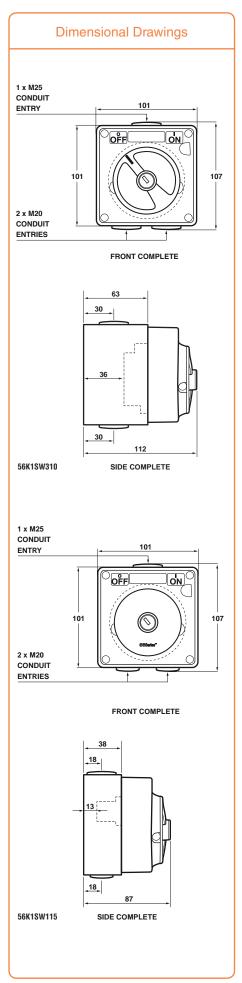


56K1SW310MS,GY

Options available

- Common keys for a number of switches are available to special order.
- Resistant Orange add RO to Catalogue Number e.g. 56K1SW120 becomes 56K1SW120,RO.





Key Operated Switches

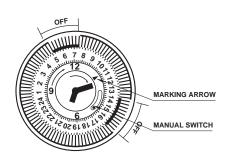


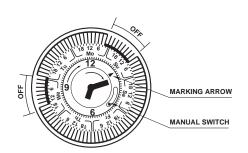
Catalogue	No. of	I the	U ¡/U e	I _e (A) U	Itilisation C	ategory	М	Conductor Term	inal Size in mm²	IP	O/A Dims.
Number	Switched Poles	(Amp)	(Volt)	AC21A	AC22A	AC23A	Rating	Min.	Max/Cond.	Rating	(H) x (W) x (D)
					STANDARD	SECURITY	Y KSW				
					For locking	in the 'off' po	osition				
56K1SW115	1 Pole	15A	250V	15	10	8	M80	1.5	6	66	107x101x87
56K1SW120	1 Pole	20A	250V	20	20	20	M250	2.5	25	66	107x101x112
56K1SW132	1 Pole	32A	250V	32	32	25	M250	4	25	66	107x101x112
56K1SW150	1 Pole	50A	250V	50	50	25	M250	10	25	66	107x101x112
56K1SW220	2 Poles	20A	500V	20	20	20	M220	2.5	25	66	107x101x112
56K1SW232	2 Poles	32A	500V	32	32	25	M220	4	25	66	107x101x112
56K1SW250	2 Poles	50A	500V	50	50	25	M220	10	25	66	107x101x112
56K1SW310	3 Poles	10A	500V	10	10	10	M200	1.5	25	66	107x101x112
56K1SW320	3 Poles	20A	500V	20	20	20	M200	2.5	25	66	107x101x112
56K1SW332	3 Poles	32A	500V	32	32	25	M200	4	25	66	107x101x112
56K1SW350	3 Poles	50A	500V	50	50	25	M200	10	25	66	107x101x112
				For	r locking in t	he 'on' or 'of	f' position				
56K2SW115	1 Pole	15A	250V	15	10	8	M80	1.5	6	66	107x101x83
56K2SW120	1 Pole	20A	250V	20	20	20	M250	2.5	25	66	107x101x112
56K2SW132	1 Pole	32A	250V	32	32	25	M250	4	25	66	107x101x112
56K2SW150	1 Pole	50A	250V	50	50	25	M220	10	25	66	107x101x112
56K2SW220	2 Poles	20A	500V	20	20	20	M220	2.5	25	66	107x101x112
56K2SW232	2 Poles	32A	500V	32	32	25	M220	4	25	66	107x101x112
56K2SW250	2 Poles	50A	500V	50	50	25	M220	10	25	66	107x101x112
56K2SW310	3 Poles	10A	500V	10	10	10	M200	1.5	25	66	107x101x112
56K2SW320	3 Poles	20A	500V	20	20	20	M200	2.5	25	66	107x101x112
56K2SW332	3 Poles	32A	500V	32	32	25	M200	4	25	66	107x101x112
56K2SW350	3 Poles	50A	500V	50	50	25	M200	10	25	66	107x101x112
					MEDIUM S	SECURITY	KSW				
				Fo	or locking in	only the 'off'	position				
56K1SW115MS	1 Pole	15A	250V	15	10	8	M80	1.5	6	66	107x101x87
56K1SW132MS	1 Pole	32A	250V	32	32	20	M250	4	25	66	107x101x112
56K1SW310MS	3 Poles	10A	500V	10	10	10	M200	1.5	25	66	107x101x112
						SECURITY					
					r locking in t						
56K2SW115MS	1 Pole	15A	250V	20	20	20	M80	2.5	25	66	107x101x112
56K2SW132MS	1 Pole	32A	500V	32	32	25	M250	4	25	66	107x101x112
56K2SW310MS	3 Poles	50A	500V	50	50	25	M200	10	25	66	107x101x112

Note: AC utilisation categories to AS/NZS3947.3 | I_{be} - Conventional Enclosed Thermal Current | U_i - Insulation Voltage | U_e - Operational Voltage | I_e - Operational Current

Timer Switches







56TC7,GY 56TC7

Surface Mounting Combinations with Timer - IP66

56 Series TC Synchronised Timers allow time control in IP56 environments. They are available in 24 hour and 7 day configurations with minimum switching times as indicated.

All timers are supplied with sliding tabs for easy setting and are fitted with manual override switches.

Earth and neutral connectors accommodating 3 x 6mm² cables are supplied.

This timer has a 150 hour battery running

Note: The 56TC Timer range is not suitable for fluorescent loads.

Options available

 Add LE to Catalogue Numbers for models Less Enclosure. LE models are suitable for mounting in 56ES1 shallow type enclosures.

Catalogue Number	Switching	I _{the}	U _i /U _e (Volt)	I _e (A) U	I _e (A) Utilisation Category		M Battery Running Rating Hrs		nning Switch	Switching Sliding Tab Col.	Conductor Terminal Size in mm²		IP Rating	0/A Dims. (H) x (W) x (D)
				AC21A	AC22A	AC23A		1113	Time	iau cui.	Min.	Max.		
56TC	1 NO / 1 NC	16A	250V	16	10	8	M90	150	15	Black	2.5	6	66	107x101x102
56TC7	1 NO / 1 NC	16A	250V	16	10	8	M90	150	120	Black	2.5	6	66	107x101x102

Note: AC utilisation categories to AS/NZS3947.3 | ___ Conventional Enclosed Thermal Current | U_i - Insulation Voltage | U_i - Operational Voltage | I_j - Operational Current | **Nicad rechargable battery requires 70 hours for full recharge.



Surface Switch with Timer - IP56

Clipsal's 56 Series Two Hour Process Timer is a surface mounting model that features a mechanical timer operated by a rotary switch.

The timer is fully variable with the range of zero to two hours in 10 minute increments which can be reset or overridden at any stage.

A single gang module, the unit is double pole 250V 16A a.c. and is supplied as standard with a power on neon.

The 16A mechanism has pressure plate type terminals. The 56SWT216 is ideally suited to

run pumping or filtering operations or for use with hot water service boosters. Also suitable for fluorescent loads.

Earth and Neutral connectors accommodating 3 x 6mm2 cables are supplied.

This timer has a 150 hour battery running reserve.

Option available

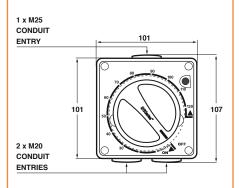
 Less enclosure - Add LE to Catalogue Number e.g. 56SWT216 becomes 56SWT216LE.

56SWT216(GY)

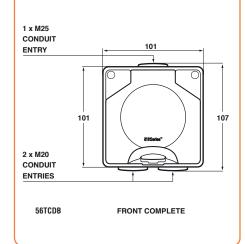
Catalogue Number	Switching	I the	U ¡/U e (Volt)	I _e (A) Ui	I _e (A) Utilasation Category		M Rating	Battery Running Hrs	Switching Time	Conductor Terminal Size in mm²		IP Rating	0/A Dims. (H) x (W) x (D)
				AC21A	AC22A	AC23A		пів		Min.	Max.		
56SWT216	2 Pole	16A	250V	16	10	8	120	N/A	10 mins. minimum 120 mins. maximum	2.5	4	66	107x101x102

Timer Switches

Dimensional Drawings 1 x M25 CONDUIT ENTRY 101 2 x M25 CONDUIT ENTRIES 56TC FRONT COMPLETE









56TCDB,GY

Surface Mounting Digital Timer - IP66

When a timer with pin point precision is required in an IP66 environment, the 56TCDB Digital Timer is the answer.

The digital timer features highly accurate timing and multi-function control with fully programmable push button facilities.

Earth and neutral connectors accommodating 3 x 6mm2 cables are supplied.

The 56TCDB also incorporates a 150 hour battery running reserve that retains information in the event of a loss of mains power.

Note: The 56TCDB Timer is not suitable to switch fluorescent loads. The timer has a stored charge and therefore should not be connected to portable equipment.

Other features are as follows:

Holiday Programming

Before going away, a simple holiday program can be set for a period of up to 99 days.

This program will have priority over the normal program and can either operate as set or continually without a preset limit. Program start can be immediate or delayed by up to six days.

Seven Day Fully Programmable 42 Memory Locations

This facility enables up to 21 on/off switching commands to be given at any time during a seven day period. i.e.

- Memory No. 1 (ON) Mon, 8.00a.m.
- Memory No. 2 (OFF) Mon, 8.25a.m.
- Memory No. 3 (ON) Mon, Tue, Wed, 9.00p.m.
- Memory No. 4 (OFF) Mon, Tue, Wed, 9.40p.m.

Settings can continue through to a maximum of 42 locations (21 on / 21 off).

Daylight Saving Switch

Enables summer/winter time changes at the press of a button.

150 Hour Battery Running Reserve

Retains program and setting during power blackout.

Inbuilt Bypass Switch

This function disengages timing when not required. The Inbuilt Bypass Switch can be set at permanently 'on' or permanently 'off' or 'on' until programmed 'off' or 'off' until programmed 'on'

*For further details refer to operating instructions.

Catalogue Number	Switching	I the	U _i /U _e (Volt)	I _e (A) U	tilisation (ategory	M Rating	Battery Running Reserve Hours	Min. Switch Time	Conductor Size i	r Terminal n mm²	IP Rating	0/A Dims. (H) x (W) x (D)
				AC21A	AC22A	AC23A				Min.	Max.		
56TCDB	1 NO / 1 NC	10A	240V	10	10	8	100	**150 hours	1 min	2.5	6	66	107x101x102

Sunset Switches





56SSR,GY

56SSR,GY

Sunset Switches Premium

Sunset switches automatically switch lights on when the ambient light level falls below a predetermined level.

The 56SSR is surface mounting but can be adapted to flush mounting by using 56FA surrounds and brackets.

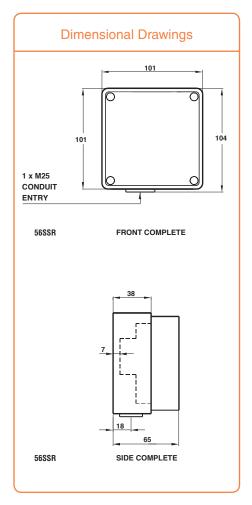
The 56SSR allows control of a 10A load current in a two wire configuration, therefore, eliminating the need for separate neutral at the switch. The 56SSR also incorporates a fully configurable timer with a remote-disable option.

When correctly connected to a suitable supply and load, the 56SSR will turn the load on when the ambient light level is below approximately 10 lux. Similarly, the load will be turned off when the light level exceeds approximately 30 lux. Delays of approximately eight seconds on turnoff and 30 seconds on turn-on are incorporated into the circuit to reject the effects of short term changes in the light levels, which may otherwise turn the load on or off.

The 56SSR is also equipped with a timer circuit which, if enabled, will turn the light off after a preset time delay. The time delay can be from 15 minutes to 15 hours and 45 minutes; set in 15 minute increments.

The timer can be disabled by applying neutral potential to the terminal T1, in which case the status of the load is controlled only by the ambient light level. This feature provides a remote timer override function if required.

Since the 56SSR Sunset Switch is a two wire product which does not require any power while the load is turned on, there is one specific aspect of its operation well worth noting. When power is applied to the sunset switch for the first time, it will require up to 3.5 minutes to warm up. This behaviour is caused by the time delay required to charge an energy storage element within the unit.



Catalogue Number	I _{the}	U ¡/U e (Volt)	I _e (A) U	tilisation (Category	M Rating	Temp. Range	Time Adjust	Conductor Terminal Size in mm ²		IP Rating	0/A Dims. (H) x (W) x (D)	Operating Voltage
Hullibol	(Allip)	(1011)	AC21A	AC22A	AC23A	· · · · · · · · · · · · · · · · · · ·	Hungo		Min.	Max.	· · · · · · · · · · · · · · · · · · ·	(II) X (W) X (D)	Voltago
56SSR	10A	250	10	10	8	M80	0° to +40°C	15 Min. to 945 Min.	1.0	2x4.0	66	101x107x65	190-265V 50Hz a.c.
56PEDD3	10A	250	10	10	8	M80	0° to +40°C	15 Min. to 945 Min.	1.0	2x4.0	66	101x107x65	190-265V 50Hz a.c.

Sunset Switches



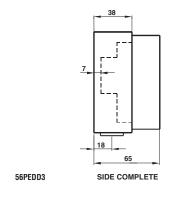


56PEDD3,GY

56PEDD3,GY

Dimensional Drawings 101 104 2 x M25 CONDUIT ENTRY

56PEDD3 FRONT COMPLETE



Sunset Switches Economy

A switch that turns lights on at dusk and off at dawn by itself, how simple is that? For consistent lighting without lifting a finger, choose the Clipsal photo electric switch. A 'smart' switch that operates according to the level of sunlight, making it a simple to use, reliable and economical way to save time and energy.

- No capacitor or time programming necessary.
- IP66 rated for extreme environments.
- Factory set dusk to dawn saves set up time.
- 10A fluorescent and resistive loads.
- Three wire device eliminates the need for capacitor on small inductive loads.

56SSR Specifications										
Operating Voltage Range	192-265V 50 Hz AC									
Maximum Load Current	10A									
Minimum Load Current	40mA									
Incompatible Load Types	Electric Transformers Fluorescent Loads Discharge Lamps Motor Loads									
Off-state Leakage Current at 240V AC	8.2mA (capacitive) max									
DC Component of Off-state Leakage Current	0mA									
Timing Range	15min - 15hrs and 45min									
Setting Step	15min									
Timer Accuracy	<u>+</u> 15%									
Operating Temperature Range	-10 to 45°C									
Maximum warm-up time at 240V AC	4 min									

56PEDD3 Sp	ecifications
Operating Voltage Range	220-240 V AC 50 Hz
Maximum Load Current	10A
Minimum Load Current	0mA
Compatible Load Types	Incandescent, Fluorescent and 240V Halogen Iron Core and Electric Transformers Shaded Pole Induction Motors (exhaust fans, 5A max) Split Phase Induction Motors (ceiling fans, 5A max) Other Motor Loads (5A max)
Supply Current	15mA
Power Consumption	1W
Operating Temperature Range	0 to 45°C
Turn ON Light Level	Approx. 10 lux
Turn OFF Light Level	Approx. 50 lux

Angle and Straight Plugs



56P Series Plugs

Clipsal has a comprehensive range of straight and angle plugs. All are fitted with a screwed ring for securing to socket outlets and to ensure IP66 rating.

Design innovations include a transparent centre body section for instant visual checking of connections and an internal cable clamp which grips two ways to prevent cable twisting.

Optional Terminators

Catalogue Number	Suits Gland Nut Thread	Description
56T20	20mm	To suit 10-20 Amp Plugs. Suits 20mm Flexible Hose.
56T25	25mm	To suit 32-50 Amp Plugs. Suits 25mm Flexible Hose.
56T32	32mm	To suit 32-50 Amp Plugs. Suits 32mm Flexible Hose.

^{*} When plugs are not in use, IP66 Rating is maintained by fitting a 56PC Series Plug Cap.

Catalogue # Straight	Catalogue # Angle	I th	U ; (Volt)	No. of Pins		r Terminal n mm²	Cable I Diar	Nominal neter	IP Rating	Pin Config.	Gland Nu	it Thread
" Ottuight	" Allylo	(Amp)	(Voit)		Min.	Max/Cond.	Min.	Max.	· · · · · · · · · · · · · · · · · · ·	oomig.	Straight	Angled
56P210	-	10A	110V	2 Parallel Flat Pins	0.75	1.5	7	12.5	66	D	20mm	
56P215/32	-	15A	32V	2 Polarised, Extra Low Voltage	1.5	2.5	7	12.5	66	Е	20mm	
56P3/110	-	10A	110V	2 Round Live & Flat Earth	0.75	1.5	7	12.5	66	J	20mm	
56P310RP	-	10A	250V	3 Round Pins	0.75	1.5	7	12.5	66	G	20mm	
56P310	-	10A	250V	3 Flat Pins	1.0	2.5	7	12.5	66	А	20mm	
56P310SL	-	10A	250V	2 Flat Pins & Round Earth	1.0	2.5	7	12.5	66	С	20mm	
56P315	-	15A	250V	3 Flat Pins	1.0	2.5	7	12.5	66	А	20mm	
56P320	56PA320	20A	250V	3 Round Pins	1.0	6	7	16	66	Н	25mm	23mm
56P320F	-	20A	250V	3 Flat Pins	2.5	2.5	7	16	66	F	20mm	
56P332	56PA332	32A	250V	3 Round Pins	1.5	2.5	7	16	66	В	20mm	37mm
56PC2					Plug	Cap to Suit Pl	hase Plugs					
56P410	56PA410	10A	500V	4 Round Pins	2.5	4	7	16	66	K	25mm	23mm
56P416K	56PA416K	16A	500V	Unique Key Configuration	2.5	4	7	16	66	М	23mm	23mm
56P420	56PA420	20A	500V	4 Round Pins	2.5	4	7	16	66	L	25mm	23mm
56P432	56PA432	32A	500V	4 Round Pins	2.5	16	9	28	66	N	37mm	37mm
56P440	56PA440	40A	500V	4 Round Pins	2.5	16	9	28	66	0	37mm	37mm
56P450	56PA450	50A	500V	4 Round Pins	2.5	25	9	28	66	Р	37mm	37mm
56P510	56PA510	10A	500V	5 Round Pins	2.5	4	7	16	66	Q	25mm	23mm
56P520	56PA520	20A	500V	5 Round Pins	2.5	4	7	16	66	R	25mm	23mm
56P532	56PA532	32A	500V	5 Round Pins	2.5	16	9	28	66	S	37mm	37mm
56P540	56PA540	40A	500V	5 Round Pins	2.5	16	9	28	66	T	37mm	37mm
56P550	56PA550	50A	500V	5 Round Pins	2.5	25	9	28	66	U	37mm	37mm
56P610	56PA610	10A	500V	6 Round Pins	2.5	4/2.5	7	16	66	V	23mm	23mm
56P710	56PA710	10A	500V	7 Round Pins	2.5	4/2.5	7	16	66	W	23mm	23mm
56P720	56PA720	20A	500V	7 Round Pins	2.5	4/2.5	7	16	66	Х	23mm	23mm
56P320QC	-	20A	250V	3 Round Pins QCT	1.0	4	7	16	66	Н	56AM25	56AM25
56P410QC	-	10A	500V	4 Round Pins QCT	2.5	4	7	16	66	K	56AM25	56AM25
56P420QC	-	20A	500V	4 Round Pins QCT	2.5	4	7	16	66	K	56AM25	56AM25
56P510QC	-	10A	500V	5 Round Pins QCT	2.5	4	7	16	66	Р	56AM25	56AM25
56P520QC	-	20A	500V	5 Round Pins QCT	2.5	4	7	16	66	Q	56AM25	56AM25

Angle and Straight Plugs





Angled versions ensure a neat cable run when connected to socket outlet.

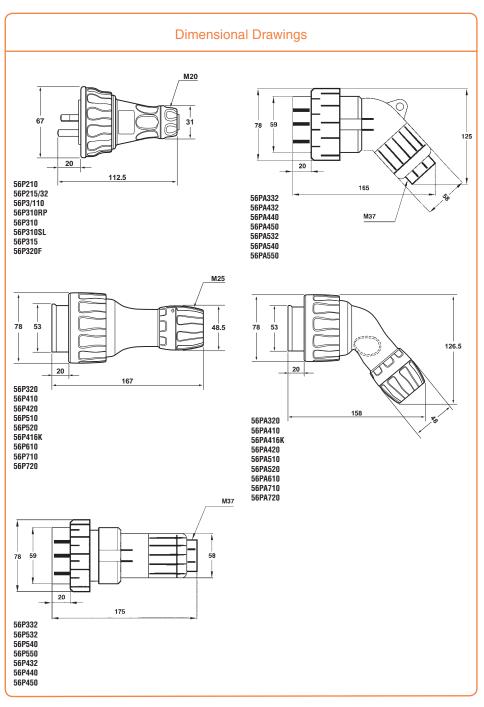
56AM25 adapter suits 25mm cable and conduit glands, and is suitable on 10A and 20A units three phase.

Options available

- When plugs are not in use IP66 rating is maintained by fitting a 56PC Plug Cap.
- Resistant Orange Add RO to Catalogue Number e.g. 56P410 becomes 56P410,RO.
- · Colours: EO, GY, RW, RO.
- * Note: Refer 56T Series for terminators to connect hose to non standard thread size.



56CSC310,E0



Angle and Straight Plugs





56PCI, 56PC2

Plug and Socket Caps

When not in use, Clipsal 56P and 56PA Series Plugs can be additionally protected by utilising our 56PC Series Plug Caps.

When in position, they protect the pins from damage, dirt, grease and water ingress.

The caps are simple to fit and fully enclose the plug face.

Likewise, to plug caps, Clipsal Single Phase CSC Extension Sockets/ Appliance Connectors can be additionally protected by utilising our 56SC2 Socket Cap.



56PAXXXG Series

Internal Pin Housings

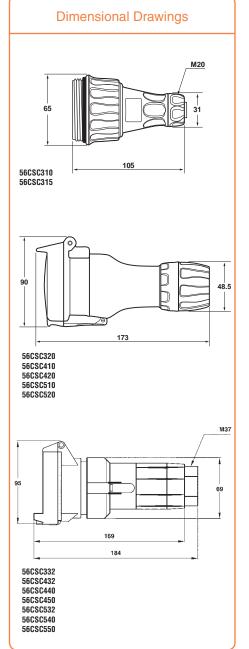
A full range of replacement pin housings is available for the three phase straight and angle plugs.

They eliminate the expense of replacing an entire unit if only the pin housing is damaged. Pin housings are moulded in durable polyester.

Catalogue	I _{th}	U _i	No. of Round Pins		r Terminal n mm²							
Number	(Amps)	(Volts)		Min.	Max/Cond.							
56P410G1	10A	500V	4 Rounded Pins Post 2009 Suits Straight & Angled	2.5	4							
56P420G1	20A	500V	4 Rounded Pins Post 2009 Suits Straight & Angled	2.5	4							
56P510G1	10A	500V	5 Rounded Pins Post 2009 Suits Straight & Angled	2.5	4							
56P520G1	20A	500V	5 Rounded Pins Post 2009 Suits Straight & Angled	2.5	4							
56PA432G	32A	500V	4 Round Pins	2.5	16							
56PA440G	40A	500V	4 Round Pins	2.5	25							
56PA450G	50A	500V	4 Round Pins	2.5	4							
56PA510G	10A	500V	5 Round Pins	2.5	4							
56PA520G	20A	500V	5 Round Pins	2.5	16							
56PA532G	32A	500V	5 Round Pins	2.5	16							
56PA540G	40A	500V	5 Round Pins	2.5	16							
56PA550G	50A	500V	5 Round Pins	2.5	25							
56PA610G	10A	500V	6 Round Pins	2.5	4/2.5							
56PA710G	10A	500V	7 Round Pins	2.5	4/2.5							
56PA720G	20A	500V	7 Round Pins	2.5	4/2.5							
56PC	10-20A		Protective Pin Cap to suit Three Phase Plugs									
56PCI	32-50A	32-50A Protective Pin Cap to suit Three Phase Plugs										
I - Insulation Voltage I -	Conventional F	nelosed There	nal Current									

 $\rm U_{\rm i}$ - Insulation Voltage $\rm \, I_{\rm th}$ - Conventional Enclosed Thermal Current

Extension Sockets and Appliance Connectors







56CSC532,E0

56CSC410,E0

Three Phase Extension Socket/Appliance Connector

Clipsal's Three Phase Extension Socket/ Appliance Connector is an important design breakthrough.

Now there is a common unit for both cord extension socket and appliance connector applications.

All connectors have impact resistant, UV stabilised mouldings.

The IP66 rating can be achieved when extension socket/connectors are used in conjunction with compatible accessories such as 56P Plugs, 56PA Plugs and 56AI Appliance Inlets.

IP66 rated units feature a hose proof cap which maintains the International Protection Rating when the accessory is not being used.

Note: Cap not provided as standard with single phase extension sockets.

For 50A rated socket/appliance connectors refer to 56T Series for terminators to connect hose to non standard gland nut thread.

56AM25 adapter suits 25mm cable and conduit glands and is suitable on 10A and 20A units Three phase.

Options available

- 56SC2 Socket Cap to suit single phase extension sockets.
- 56CSC310 and 56CSC315 available in Resistant Orange - Add RO to Catalogue Number e.g. 56CSC310 becomes 56CSC310,RO.
- · Colours: EO, GY, RO.

Catalogue Number	I _{th} (Amp)	U _i (Volt)	No. of Sockets		or Terminal in mm²		Cable Nominal Diameter		Matching Plug Straight	Matching Plug Angle	Socket Configuration	Gland Nut
Number	(Allip)	(Voit)		Min.	Max/Cond.	Min.	Max.	Rating	r rag otrargit	. rug riligio	Comiguration	Thread
56CSC310	10A	250V	3 Flat Pins	0.75	1.5	7	11	66	56P310		Α	31mm
56CSC315	15A	250V	3 Flat Pins	0.75	1.5	7	11	66	56P315		В	31mm
56CSC320	20A	250V	3 Round Pins	1.0	6	7	16	66	56P320	56PA320	Н	48.5mm
56CSC332	32A	250V	3 Round Pins	2.5	16	9	28	66		56PA332	I	69mm
56SC2					Soc	ket Cap to	suit Single P	hase Extensior	Sockets			
56CSC410	10A	500V	4 Round Pins	1.0	6	7	16	66	56P410	56PA410	K	48.5mm
56CSC420	20A	500V	4 Round Pins	1.0	6	7	16	66	56P420	56PA420	L	48.5mm
56CSC432	32A	500V	4 Round Pins	2.5	16	9	28	66	56P432	56PA432	N	69mm
56CSC440	40A	500V	4 Round Pins	2.5	16	9	28	66	56P440	56PA440	0	69mm
56CSC450	50A	500V	4 Round Pins	2.5	16	9	28	66	56P450	56PA450	Р	69mm
56CSC510	10A	500V	5 Round Pins	1.0	6	7	16	66	56P510	56PA510	Q	48.5mm
56CSC520	20A	500V	5 Round Pins	1.0	6	7	16	66	56P520	56PA520	R	48.5mm
56CSC532	32A	500V	5 Round Pins	2.5	16	9	28	66	56P532	56PA532	S	69mm
56CSC540	40A	500V	5 Round Pins	2.5	16	9	28	66	56P540	56PA540	Т	69mm
56CSC550	50A	500V	5 Round Pins	2.5	16	9	28	66	56P550	56PA550	U	69mm

Extension Sockets and Appliance Connectors







56POK, 56SMH



56AM25

Pendant Conversion Kits

Clipsal 56POK and 56POKI Pendant Outlet Kits enable the three phase 56CSC Series Industrial Connectors to be easily converted to pendant outlets.

There are two models available for connectors; 10A - 20A and 32A - 50A, both of which are

manufactured from quality stainless steel to last and withstand loads of up to 50kg.

The 56SPOK allows easy conversion of the 56C and 56CV Series to pendant outlets.

Catalogue Number	Description
56POK	Pendant Outlet Adaption Kit - Suitable for 10A-20A
56POKI	Pendant Outlet Adaption Kit - Suitable for 32A-50A
56PEK25	Switched Pendant Outlet Kit - Moulded 25mm entry
56PEK32	Switched Pendant Outlet Kit - Moulded 32mm entry
56SPOK	Switched Pendant Outlet Kit (suits 2 x 56C or 56V Series)
56SHM	Suspension Hook (replaces 56POK)
56AM25	25mm Gable Gland Nut

Suspension Pendant Enclosure Kit

The 56PEK25 and 56PEK32 Suspension Enclosure Kit is a two module angled enclosure with a large eye for attaching a chain. The angle feature allows for greater ease of operation while suspended. The 56PEK25 has one single 25mm entry and the 56PEK32 has one 32mm entry, both are available in Grey (GY), Resistant White (RW) and Resistant Orange (RO).

56SPOK is still available and allows two 56C to be mounted back to back.

The suspension enclosure is angled for easier operation in commercial and industrial environments.



56PEK25, 56PEK32

Catalogue Number	Description
56PEK25	Switched Pendant Outlet Kit, Moulded 25mm Entry
56PEK32	Switched Pendant Outlet Kit, Moulded 32mm Entry

Dimensional Drawings MOUNTING HOLE 105 56SP0 **56POK** 106 56SMH

Extension Sockets and Appliance Connectors







56SP0310,RW

56P0410 56P0420 56P0520 56P0432 56P0440 56P0450 56P0450 56P0550 169 169 190

Pendant Outlets

Clipsal 56PO Three Phase Pendant Outlets are a hanging version of our 56CSC Connectors.

All have impact resistant UV stabilised mouldings.

Switched Pendant Outlets

A 56 Series Switched Pendant Outlet that combines safety, performance and functionality. An IP66 rated outlet that provides the ability to disconnect the supply without unplugging and from a prominent location.

Catalogue Number	I _{th}	U _i (Volt)	No. of Sockets		r Terminal in mm²		Nominal neter	IP Rating	Matching Plug Straight	Matching Plug Angle	Socket Configuration	Gland Nut
	(*********	(10.1.)		Min.	Max/Cond.	Min.	Max.					Thread
56P0410	10A	500V	4 Round Pins	1.0	6	7	16	66	56P410	56PA410	K	23mm
56P0420	20A	500V	4 Round Pins	1.0	6	7	16	66	56P420	56PA420	L	23mm
56P0432	32A	500V	4 Round Pins	2.5	16	9	28	66	56P432	56PA432	N	37mm
56P0440	40A	500V	4 Round Pins	2.5	16	9	28	66	56P440	56PA440	0	37mm
56P0450	50A	500V	4 Round Pins	2.5	16	9	28	66	56P450	56PA450	Р	37mm
56P0510	10A	500V	5 Round Pins	1.0	6	7	16	66	56P510	56PA510	Q	37mm
56P0520	20A	500V	5 Round Pins	1.0	6	7	16	66	56P520	56PA520	R	37mm
56P0532	32A	500V	5 Round Pins	2.5	16	9	28	66	56P532	56PA532	S	37mm
56P0540	40A	500V	5 Round Pins	2.5	16	9	28	66	56P540	56PA540	T	37mm
56P0550	50A	500V	5 Round Pins	2.5	16	9	28	66	56P550	56PA550	U	37mm
56SP0310	10A	250V	3 Flat Pins Double Pole (RW)									
56SP0315	15A	250V	3 Flat Pins Double Pole (RW)									

Special Combinations and Modules







Combined Switched Sockets and Modules

Despite Australia having one of the safest electrical systems in the world, accidents can still occur.

A faulty or poorly maintained appliance, a frayed cord, wet hands or carelessness with power tools are all situations that can lead to tragedy.

To help avoid electrocution in industrial environments, Clipsal has a range of combination switched sockets with inbuilt RCD protection. The RCD works by constantly monitoring and comparing the current flow in both the Active and Neutral circuits of an electrical installation.

During normal operation, these Active and Neutral currents are in balance. However, should any current flow to Earth, an imbalance is created in these circuits.

If this imbalance is sufficient (30mA), the RCD will cut the electrical supply in less than 40 milliseconds, perhaps the most important fraction of a second in someone's life.

Apart from the protection from electrocution that an RCD offers, it will also cut off power to expensive electrical equipment in the event of an electrical fault to Earth. This protects appliances against costly damage and the installation against fire resulting from faults of this nature.

Clipsal Combination Switched Sockets with RCD protection enable quick disconnection of power in the case of an emergency and provide motor rated isolation. A neon is standard on all models to indicate that the RCD is protecting the outlet. If the neon is not illuminated, the RCD has tripped and no power is available from the socket.

The internal phase connections between switches and sockets are factory wired.

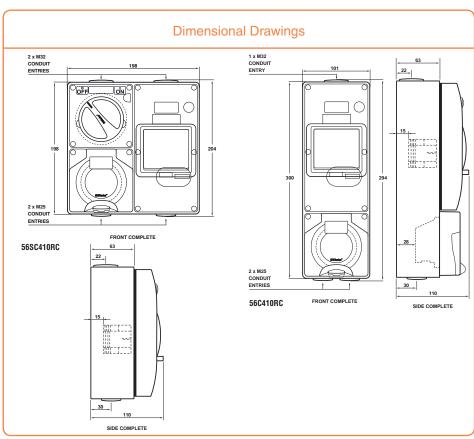
The 56RC provides stand alone protection or multiple protection of socket outlets in a modular IP66 Series Enclosure.

Warning: The RCD used in Clipsal 56 Series Modules only protects against shocks from current passing through the body to Earth; the cause of the majority of electrocutions. Complete protection under all circumstances is not possible from this or any other device.

Option available

 Resistant Orange - Add RO to Catalogue Number e.g. 56C410,RO becomes 56C410RC,RO.

Catalogue Number	No. of Switch Poles	I _{the} (Amp)	U _i /U _e (Volt)
56SC310RC	1 Pole	10A	250V
56SC315RC	1 Pole	15A	250V
56SC410RC	3 Pole	10A	500V
56SC420RC	3 Pole	20A	500V
56SC432RC	3 Pole	32A	500V
56SC440RC	3 Pole	40A	500V
56SC510RC	3 Pole	10A	500V
56SC520RC	3 Pole	20A	500V
56SC532RC	3 Pole	32A	500V
56SC540RC	3 Pole	40A	500V



Special Combinations and Modules

	SINGLE PHASE RESIDUAL CURRENT DEVICE													
Catalogue	Catalogue No. of I U./U. Voltage Parameters Prospective Short Cond. Term Size in mm² IP O/A Dims.													
Number	Poles	(Amp)	(Volt)	Min. (V)	Max. (V)	33kA for 40mS	Min.	Max.	Rating	(H) x (W) x (D)				
56RC	2 Pole 30mA 1 Phase RCD	20A	250V	190	260	Unit must be protected by 20A max. MCB	1.5	6	66	107x101x101				

					RCD PROTEC	TED OUTLETS					
Catalogue Number	I _{the} (Amp)	U _i /U _e (Volt)	Number of Sockets	Protection	Cond. Term Min.	Size in mm² Max.	IP Rating	0/A Dims (H) x (W) x (D)	Matching Plug Straight	Matching Plug Angle	Socket Config.
56C310RC	10A	250V	3 Flat	30mA RCD	2.5	6	66	204x101x100	56P310		А
56C315RC	15A	250V	3 Flat	30mA RCD	2.5	6	66	204x101x100	56P315		В
56C310/4EL	10A	250V	3 Flat	30mA RCD	1.5	16	66	300x101x135	56P310		Α
56C315/4EL	15A	250V	3 Flat	30mA RCD	2.5	6	66	204x101x100	56P315		В
56C410RC	10A	500V	4 Round	30mA RCD	1.5	16	66	300x101x110	56P410	56PA410	K
56C420RC	20A	500V	4 Round	30mA RCD	1.5	16	66	300x101x110	56P420	56PA420	L
56C432RC	32A	500V	4 Round	30mA RCD	4	16	66	300x101x110	56P432	56PA432	N
56C440RC	40A	500V	4 Round	30mA RCD	10	16	66	300x101x110	56P440	56PA440	0
56C510RC	10A	500V	5 Round	30mA RCD	1.5	16	66	300x101x110	56P510	56PA510	Q
56C520RC	20A	500V	5 Round	30mA RCD	1.5	16	66	300x101x110	56P520	56PA520	R
56C532RC	32A	500V	5 Round	30mA RCD	4	16	66	300x101x110	56P532	56PA532	S
56C540RC	40A	500V	5 Round	30mA RCD	10	16	66	300x101x110	56P540	56PA540	T

	SWITCHED RCD PROTECTED OUTLETS - IP66														
Number	Protection	le (A) Utilisation Category			M	Cond. Term	Size in mm ²	IP	O/A Dims.	Matching Plug	Matching	Socket			
of Sockets	TTOLCOLION	AC21A	AC22A	AC23A	Rating	Min.	Max/Cond.	Rating	(H) x (W) x (D)	Straight	Plug Angle	Config.			
3 Flat	30mA RCD	10	8	8	M100	2.5	6	66	300x101x100	56P310		А			
3 Flat	30mA RCD	15	8	8	M100	2.5	6	66	300x101x100	56P315		В			
4 Round	30mA RCD	10	10	10	M100	1.5	16	66	204x198x135	56P410	56PA410	K			
4 Round	30mA RCD	20	20	20	M100	1.5	16	66	204x198x135	56P420	56PA420	L			
4 Round	30mA RCD	32	32	20	M100	4	16	66	204x198x135	56P432	56PA432	N			
4 Round	30mA RCD	40	32	20	M100	10	16	66	204x198x135	56P440	56PA440	0			
5 Round	30mA RCD	10	10	10	M100	1.5	6	66	204x198x135	56P510	56PA510	Q			
5 Round	30mA RCD	20	20	20	M100	1.5	16	66	204x198x135	56P520	56PA520	R			
5 Round	30mA RCD	32	32	20	M100	4	16	66	204x198x135	56P532	56PA532	S			
5 Round	30mA RCD	40	40	20	M100	10	16	66	204x198x135	56P540	56PA540	T			

Note: AC utilisation categories to AS/NZS3947.3 I note: AC utilisation categories to AC utilisation categories to AS/NZS3947.3 I note: AC utilisation categories to AC utilisation categories to

Portable Combined Switched Sockets with RCD

Ruggedly constructed, these portable units feature an easy to carry handle, a hanging facility for builders' poles and three metres of heavy-duty flexible cord.



56C420/ELP and 56SO4ELP15

	PORTABLE RCD PROTECTED COMBINATIONS AND PROTECTED OUTLETS - IP56														
Catalogue No. of I U/U No. of Sockets Protection Number Catalogue O/A Dims. Socket Plug Number Phases (Amp) (Volt) No. of Sockets Protection Number Number (H) x (W) x (D) Config. of															
56C310EL2P	1	10A	250V	Twin 3 Flat Pins	30mA RCD	56P310	-	243x294x105	А	56P310					
56C315ELP	1	15A	250V	Single 3 Flat Pins	30mA RCD	56P315	-	243x195x105	В	56P315					
56SO4ELP15	1	10A	250V	4 Auto Switching, 3 Flat Pins	30mA RCD	56P310	-	243x294x105	В	56P315					

Special Combinations and Modules







56CTC2SO, GY

Combination Switched Sockets and 24Hr Timer

Clipsal combinations with a timer have been specially developed for swimming pool applications. Both manual and automatic switching are provided. When manual switching is desired, the time clock is overridden, allowing the unit to be operated as required.

The 24 hour timer has been expressly designed for Australian conditions.

All units are supplied with a Clipsal 439 PVC Plug and Clipsal 437PR Weatherproof Ring for each socket outlet.

Option available

• 56CTC and 56CTC15 are available less enclosure e.g. 56CTC becomes 56CTCLE.

Dimensional Drawings 1 x M25 CONDUIT ENTRY 2 x M20 CONDUIT ENTRIES 30 * * 2 x M25 CONDUIT ENTRIES FRONT COMPLETE 2 x M25 CONDUIT ENTRIES FRONT COMPLETE SIDE COMPLETE 56CTC 56CTC2SO SIDE COMPLETE

Catalogue Number	I _{the} (Amp)	U _; /U _e (Volt)	Number of Sockets	M Rating	Conducto Size i	r Terminal n mm²	Timer Type		A) Utilisat Category		Timer	Min. Time Switch	IP Rating	0/A Dims. (H) x (W) x (D)
					Min.	Max.		AC21A	AC22A	AC23A		Duration		
56CT	10A	250V	3 Flat Pins	80	1.5	6	56TC	10	8	8	24hr	15min.	56	300x101x102
56CTC15	15A	250V	3 Flat Pins	80	1.5	6	56TC	15	8	8	24hr	15min.	56	300x101x102
56CTC2S0	10A	250V	3 Flat Pins	80	1.5	6	56TC	15	8	8	24hr w/ Extra Socket	15min.	56	204x198x102
56CTC2S015	15A	250V	3 Flat Pins	80	1.5	6	56TC	15	8	8	24hr w/ Extra Socket	15min.	56	204x198x102

In-Conventional Enclosed Thermal Current U1 - Insulation Voltage U2 - Operational Voltage U2 - Operational Current *Circuit protection device (HRC Fuse or MCB) to be 16 amp. maximum. Approvals No. S/1/56CTC Series. Please ensure the appropriate 56 Series Plug is used for weatherproof integrity.

Metal Range





WilcoRowco™ range

Metal Clad Industrial Switchgear

A Tough Performer In Harsh Conditions

WilcoROWCO™ Metal Clad Industrial Switchgear has built a reputation as a true performer in the harshest conditions. The entire Metal Clad range can really take a beating and withstand extreme temperature without compromising performance or safety.

The Metal Clad range is made from high-grade aluminium, providing a lightweight, corrosion resistant industrial switchgear that will perform in the most demanding industrial applications.
WilcoROWCO™ Metal Clad…the tough performer in harsh conditions.

Durable Design, Built To Last

The WilcoROWCO™ range is manufactured from high-grade diecast aluminium, which offers excellent impact resistance, ensuring long product life in any industrial application. All materials used for the Metal Clad range are tested to operate in extreme temperatures from -20°C to +60°C ambient.

Switch status information (ON/OFF) is cast into the body to ensure visibility at all times, even after years of abuse.

IP Rating Makes Water No Worries

All WilcoROWCO™ Metal Clad Industrial Switchgear is IP66 rated with synthetic gaskets to provide high performance and protection in any situation. Metal Clad Switchgear provides peace of mind in knowing that the safety hasn't been compromised.

Safe Power Without Compromise

WilcoROWCO™ Metal Clad Industrial Switchgear is designed for safety and durability, with single phase models featuring multi-pole switching.

Metal Clad Industrial Switchgear can also be padlocked off at two locations. The two padlock positions accept 8mm hasp padlocks or scissor lockout tags and comply with Australian Occupational Heath and Safety Requirements.

Rigorous Testing

The WilcoROWCO™ Metal Clad range is tested to appropriate Australian standards, providing specialist ratings that will ensure accurate matching, specific to the required application.

The superior quality control of the Metal Clad range translates to less equipment downtime and improved safety in the workplace.

Compatible Modular Design

Based on three frame sizes, the Metal Clad range is designed as a family of products, allowing for interchange compatibility. This means that junction/utility boxes can be mounted, and with a simple cover change can be converted into a switch.

All these superior features of the WilcoROWCO™ Metal Clad range add up to create durable, high performance industrial switchgear that's unbeatable in the harshest of conditions.

Superior Features Provide Easy Installation

The entire Metal Clad range is designed with installers in mind. They can be mounted using internal or external options, depending on the application requirements. The flexibility even extends to the earthing point, which can be relocated within the enclosure.

All large Metal Clad Switchgear is base mounted, making them suitable for large cables - typical to this kind of application. This feature provides the installer with a simple and fast installation solution.

Metric thread stainless steel screws also come standard with the Metal Clad range. They are treated to prevent chemical reaction with the aluminium body, offering superior corrosion resistant properties.

Note: Refer to separate Metal Clad WilcoROWCO™ brochure for technical and range information.

Transformers





56T150,GY

Hoseproof Transformers - IP56

Clipsal Transformers are ideal for swimming pool lighting applications.

The 56T150 Series is manufactured to AS3126 and features self resetting short circuit protection against thermal overload.

Note: We recommend that the transformer be installed in a position which provides protection against direct sunlight on exceptionally hot days. This will ensure no nuisance activation of the short circuit protection device. Thermally operated, the device is incorporated in the primary side of the transformer, and will cut-out to protect the unit from overheating.

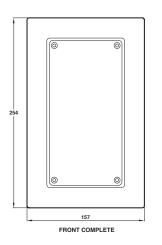
1 x M25 CONDUIT ENTRY 2 x M25 CONDUIT FRONT COMPLETE LOW VOLTAGE TERMINALS 56T150 SIDE COMPLETE

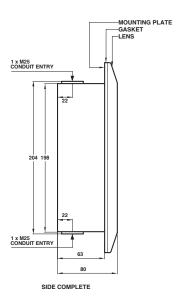
Dimensional Drawings

Catalogue	alogue Rated Voltage Number of Conductor Terminal Size in mm ²		inal Size in mm²	O/A Dims.		
Number	Input	Output	Transformers	Min.	Max.	(H) x (W) x (D)
56T150	250V	32V (150 max.)	1	1.5	10	300x101x96
56T150/1	2 250V	12V (150 max.)	1	1.5	10	300x101x96
56T150/2	1 250V	24V (150 max.)	1	1.5	10	300x101x96

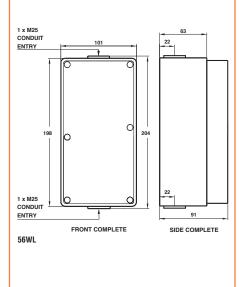
Wall Lights

Dimensional Drawings





56FWI





56FWL,GY

Neat and discreet, Clipsal wall lights are the simple way to brighten up all sorts of situations - indoors and out.

They can be either surface mounted or flush mounted, making them ideal for garden areas, paths, walkways, subways, etc; and indoor situations including stairwells and cellars.

56WL Surface Mounted Wall Light

- · Surface mounting.
- 56E2 Enclosure.
- · Lens gasket and sealing screws.
- Lamp assembly (comprising lamp holder ballast, terminal block and bracket) - Lamps purchased separately.
- Accepts Philips PL7 and PL9 Lamps.

56WL,GY

Both versions suit single ended fluorescent lamps (Philips PL7 up to PL9), complete with opal polycarbonate diffuser.

56FWL Flush Mounted Wall Light

- Flush mounting.
- 56E2 Enclosure.
- Lens.
- Lamp assembly (as for 56WL).
- Flush-mounting bracket with foam gasket and sealing screws.

Note: IP66 rating is ensured when surface mounting, but when flush mounting, IP66 will depend on (1) type/texture of the wall surface and (2) care when mounting to seal all areas where water may enter unit.

Catalogue Number	Ivpe Mounting		O/A Dims. (H) x (W) x (D)		
56WL	Surface	66	204x101x91		
56FWL	Flush	43	254x157x84		

Mounting Enclosures (Back Boxes)





56B, 56DV

56E Series

All Clipsal Mounting Back Boxes are moulded in UV stabilised rigid PVC to facilitate glueing of fittings for conduit entry.

Ample conduit and cable entries are provided and there is plenty of wiring room for easy installation.

All screwed conduit entries are provided with plugs. The multigang enclosures feature moulded bridges between modules to ensure switches and sockets sit flush on a continuous surface. Moulded dividers are also available for multigang boxes to segregate services and are standard with 4, 6, 8, 9 and 16 gang enclosures.

Each enclosure has a number of mounting points and 220/10 Sealing Plugs are provided to double insulate mounting screw heads and ensure the IP rating.

Moulded gaskets are supplied with switch and socket modules.

Options Available

 Resistant Orange - Add RO to Catalogue Number e.g. 56E2 becomes 56E2,RO.
 Resistant White - Add RW to Catalogue Number e.g. 56E2 becomes 56E2,RW.
 Chemical Grey - Add CG to Catalogue Number e.g. 56E2 becomes 56E2,CG.

Mounting Accessories

- Stainless steel pole mounting bracket kit to suit 56E2, 56E3 and 56E4VH Modules. Catalogue No. 56PMK.
- Stainless steel mounting feet suit all enclosures. Catalogue Number 56MF.

Bridges and Dividers

56 Series Bridges (56B) suits 56E Series Mounting Enclosures and provide a continuous flat surface for socket and switch modules in multigang enclosures, thereby ensuring sealing.

56 Series Dividers (56DV) for segregated services in 56E Enclosures.

Anti Corrosion Enclosure Screws

These stainless steel screws are 32mm long M3.5 x 0.8 / 6NC to suit 56E Series Enclosures.



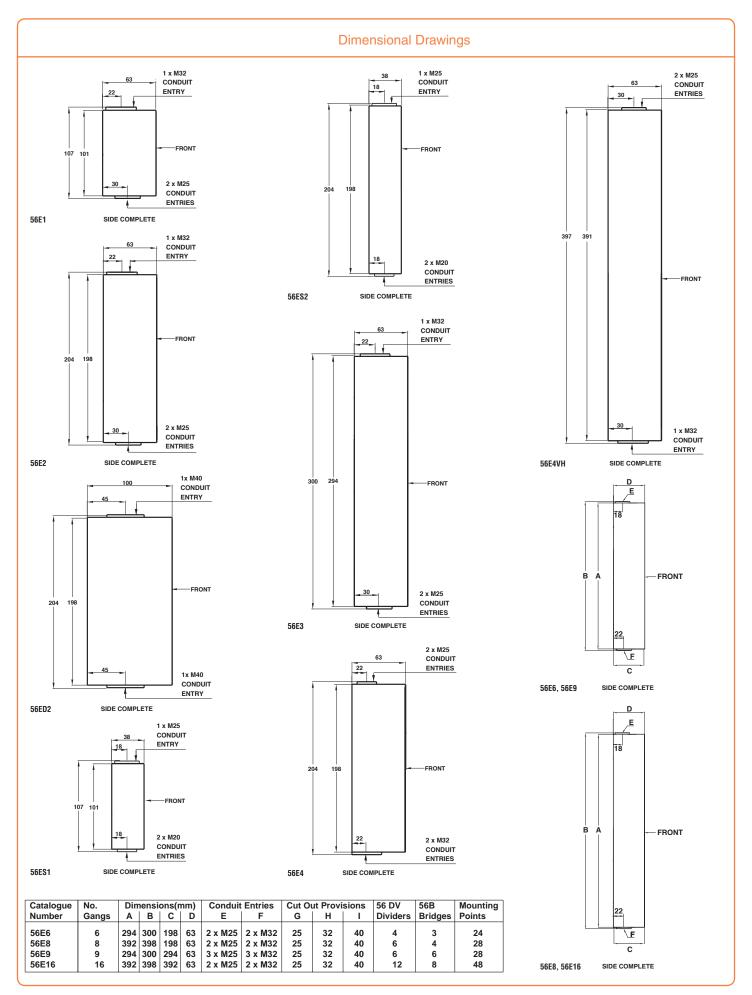
56EV2

Currently used in application throughout major supermarkets nationally.

Catalogue Number	No. of Gangs	O/A Dims. (H) x (W) x (D)	Mounting Points	No. of Conduit Entries (mm)	Cut-Out Provision (mm)
56E1	1	63x101x101	8	2x25, 1x32	1x25/32
56ES1	1 Shallow	38x101x101	4	1x25, 1x20	1x20/25
56E2	2	63x101x198	8	2x25, 1x32	1x25, 1x32
56ED2	2 Deep	100x101x198	8	2x40	1x25, 1x32
56ES2	2 Shallow	38x101x198	4	1x25, 2x20	2x20/25
56EV2	2 Vert. Mount	110x101x145		1x25	
56EV2/225	2 Vert. Mount	110x101x145		2x25	
56EV2/32	2 Vert. Mount	110x101x145		1x32	
56E3	3	294x101x63	16	2x25, 1x32	2x25, 1x32
56E4	4	63x198x198	16	2x25, 2x32	2x25, 1x32, 1x40
56E4VH	4 In Line	63x101x391	16	2x25, 1x32	2x25, 1x32, 1x40
56E6	6	63x198x294	24	2x25, 2x32	2x25, 2x32, 2x40
56E8	8	63x198x391	28	2x25, 2x32	4x25, 2x32, 2x40
56E8SB 2 Pillars Removed	8	391x198x63	28	2x25, 2x32	4x25, 2x32, 2x40
56E9	9	391x198x63	28	3x25, 3x32	4x32, 2x32, 2x40
56E9SB 2 Pillars Removed	9	63x294x294	28	3x25, 3x32	4x32, 2x32, 2x40
56E16	16	63x391x391	48	2x25, 2x32	6x25, 6x32, 4x40

56E2/4EL denotes an E2 Enclosure complete with 56EL4N Cover and DIN Rail to suit 4EL RCDs.

Mounting Enclosures



Mounting Enclosure Lids (Covers)



56L4,GY, 56L3,GY, 56L1,GY, 56L2,GY

Mounting enclosure lids are moulded in UV stabilised polycarbonate.

All are 28mm high and supplied complete with sealing gasket.

Options available

- Resistant Orange add RO to Catalogue Number e.g. 56L1 becomes 56L1,RO.
- 56L1 available in Chemical Resistant Grey

 add CG to Catalogue Number e.g. 56L1
 becomes 56CL1,CG.
- Resistant White add RW to Catalogue Number e.g. 56L1 becomes 56L1,RW.

Catalogue Number	Number of Congo	Dimensions (mm)					
Catalogue Number	Number of Gangs	Α	В	C	D		
56L1	1	95	95	28	84	84	
56L2	2	192	95	28	84	181	
56L3	3	288	95	28	84	277	
56L4	4	192	192	28	181	181	

Pre-Drilled Mounting Enclosure Lids



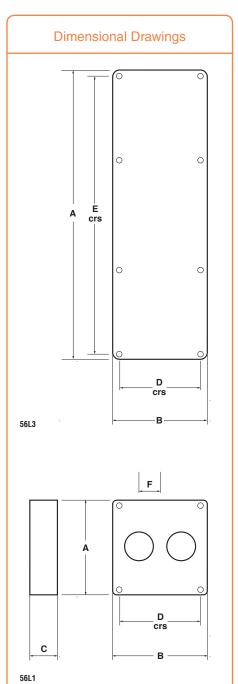
56L1/22,GY

One gang, 28mm high lids are also available pre-drilled to accept 22 or 30.5mm diameter IP56 rated push- buttons or indicating lights. Dimensions are identical to the 56L1.



56L1/22/2,GY

Catalogue Number	Hole Diameter	No. of Holes	
56L1/22	22mm	1	-
56L1/22/2	22mm	2	20
56L1/30	30mm	1	-
56L1/30/2	30mm	2	20



Switchgear Cover Assemblies

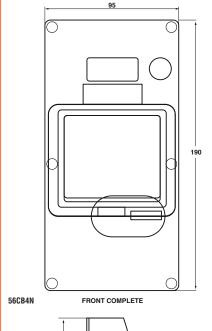


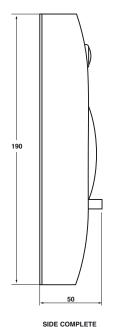




56CB4,GY 56CB4NM,GY

Dimensional Drawings





56CB4N

DIN Rail Accessory Mounting Cover Kits

The 56 Series Two Gang Cover Assemblies are moulded in hi-impact polycarbonate and feature a specially designed mounting bracket which will accommodate the full range of Clipsal circuit breakers, RCDs and combination MCB/RCDs.

Covers suit all 56 Series enclosures (minimum standard depth 63mm) and are supplied with neon indicators, which can be wired from either the line or load side of the switch.

The unique protective membrane versions offer the same level of safety even when the flap is opened. A special membrane incorporated into the unit covers MCBs, RCDs and accessories to provide a barrier against dust and water, including wet hands when the flap is opened to reset switches.

All 56CB4 include a padlocking facility on the cover flap.

Options available

- Resistant Orange add RO to Catalogue Number e.g. 56CB4N becomes 56CB4N,RO.
- · Resistant White add RW to Catalogue Number e.g. 56CB4N becomes 56CB4N,RW.
- Chemical Grey add CG to Catalogue Number e.g. 56CB4N becomes 56CB4N,CG.
- Protective membrane add M to catalogue number e.g. 56CB4N becomes 56CB4NM.

COVER WITH MOUNTING BRACKET AND NEON (LESS ENCLOSURE)							
Catalogue Number	U _; /U _e (Volt)	Module Type	No. of Poles	Module Width	Neon Voltage	Protective Membrane	
56CB4N	240V / 440V	1, 2, 3 pole MCB	4 RCD	4 max.	240V / 415V	No	
56CB4	240V / 440V	1, 2, 3 pole MCB	4 RCD	4 max.	240V / 415V	No	
56CB4NM	240V / 440V	1, 2, 3 pole MCB	4 RCD	4 max.	240V / 415V	Yes	

56 Series High Pressure Gaskets



56HPG series

High Pressure Water Gaskets

Following extensive field investigations, Clipsal has developed a new high water pressure gasket suited to the rigors of industrial environments.

In industries where hygiene is paramount (dairies, abattoirs), it was found that high-risk areas are most commonly cleaned using a 75°C, 1600psi, 25 l/min, high pressure cleaning gun with chemical cleaner added. The unique 56 Series Clipsal High Pressure Gaskets are specifically designed to cope with exposure to this kind of high water pressure blasting and are suited to 56E1, 56E2, and 56E4 enclosures.

Features

- The ideal solution for high pressure cleaning environments.
- Unique and only available from Clipsal.
- Designed to suit extreme food preparation environments.
- Made to last in our harsh Australian conditions.
- Specially developed from extensive field investigations.
- UV stablised.
- · Chemically resistant.

Catalogue Number	Description
56HPG1	1 Gang suits 56E1 encl. (back box)
56HPG2/1	2 Gang suits 56E2 encl. (back box) and 1x2 gang covers e.g. 56CV series
56HPG2/2	2 Gang suits 56E2 encl. (back box) and 2x1 gang covers e.g. 56C Series
56HPG4/3	4 Gang suits 56E4 encl. (back box) and 1x1 gang covers e.g. 56C Series
56HPG4/4	4 Gang suits 56E4 encl. (back box) and 4x1 gang covers e.g. 2 x 56C Series

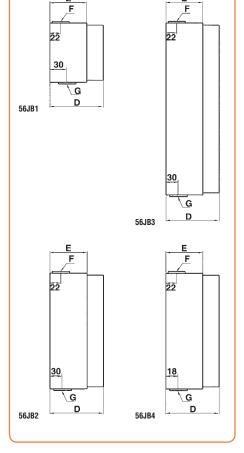








MOUNTING PLATE 15mm C MOUNTING PLATE 15mm C MOUNTING PLATE 15mm C 56DB3 56DB6 56XDB6 56XDB9 D







56DB3, 56DB6

Junction Boxes

Adaptable Enclosures and Enclosures Covers

Clipsal Adaptable Enclosures are supplied complete with gear tray to mount control equipment, contactors, relays, time switches, transformers, etc.

Transparent deep lids (covers), sealing screws and gasket are standard.

Gear trays have eight mounting points for optimum securing. Impact resistant and UV stabilised, the backbox and gear tray are moulded in PVC and the lid in polycarbonate.

Options available

- Resistant Orange for 56DB2 only add RO to Catalogue Number e.g. 56DB2 becomes 56DB2,RO.
- Other resistant versions available to special order.
- COVER ONLY Add L to catalogue number.
 e.g. 56XDB1 becomes 56XDB1L.

Catalogue Number	No. of Gangs	0/A Dims (H) x (W) x (D)	No. of mounting points	IP Rating	Cut Outs (mm)
56XDB1	1	165x101x101	4	IP66	1x25, 1x20
56DB2	2 with gear tray	140x101x198	8	IP66	1x25, 1x32
56DB3	3 with gear tray	140x101x294	12	IP66	2x25, 1x32
56DB4	4 with gear tray	198x198x140	16	IP66	2x25, 1x32, 1x40v
56XDB4	4 with gear tray	182x198x198	16	IP66	2x25, 1x32, 1x40
56DB6	6 with gear tray	140x198x294	24	IP66	2x25, 2x32, 2x40
56XDB6	6 with gear tray	184x198x298	24	IP66	2x25, 2x32, 2x40
56DB9	9 with gear tray	180x294x294	28	IP66	4x25, 2x32, 2x40

Junction Boxes

56 Series Junction Boxes are designed for industrial environments. They are supplied complete with Earth and Neutral connectors for up to 3 x 6mm² cables and sealing gasket.

25mm and 32mm screwed conduit entries and sealing plugs are provided, as are cable entry cut outs in the back.

Options available

- Resistant Orange for 56JB1 and 56JB2 only
 add RO to Catalogue Number e.g. 56JB1
 becomes 56JB1,RO.
- Other resistant versions available to special order.

Catalogue Number	No. of Gangs	O/A Dims (H) x (W) x (D)	IP Rating	Cut Outs (mm)
56JB1	1	91x101x101	IP66	1x25/32
56JB2	2	91x198x101	IP66	1x25, 1x32
56JB3	3	91x294x101	IP66	2x25, 1x32
56JB4	4	91x198x198	IP66	2x25, 1x32, 1x40
56JB1SWA	1 suits SWA cable applications	91x101x101	IP66	3x20





56/32,GY 56/01X,GY

Two Aperature Enclosure IP66

Apertures suit Clipsal's popular 30 Series Mechanisms.

Catalogue Number	Description
56/32	107x101x75

Option available

Other resistant versions available to special order.

Computer Surface Modules

Connection of computer and other communication equipment in factory environments is now possible with the Clipsal 56/01/1 and 56/01X.

Both units are single gang 56 Series Modules.

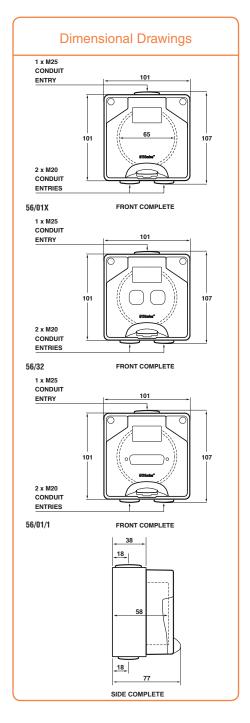
The 56/01/1 enables the fitting of one DB25 connector.

The 56/01X is a blank plate that will enable any specific customer requested configuration socket to be fitted by the installer.

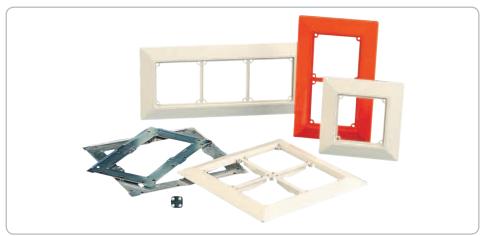
Option available

 Less enclosure - add LE to Catalogue Number e.g. 56/01/1 becomes 56/01/1LE.

Catalogue Number Description		IP Rating	O/A Dims. (H) x (W) x (D)	
56/01/1	Suits DB25 connector	66	107x101x77	
56/01X	Blank unit	66	107x101x77	







Moulded Surrounds and Metal Brackets

Flush Surrounds

Surface mounted 56 Series Sockets, Switches and Combinations can be transformed into flush mounting equivalents using the 56FA Surrounds and Brackets. The surrounds can be used on various types of walls to ensure a neat installation, such as:

- a mounting enclosure (back box) in poured concrete
- a bracket on brick, brick veneer or panel
 walls

The brackets provide the installer with a practical method of flush mounting 56 Series accessories. Comprehensive installation instructions are supplied with all units.

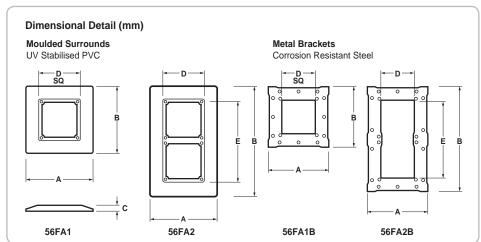
56FA1, 56FA2, 56FA3 and 56FA4 Flush Surrounds contain a moulded flange, foam gasket and stainless steel mounting screws.

56FA1B, 56FA2B, 56FA3B and 56FA4B Flush Surrounds contain a corrosion resistant steel mounting metal bracket.

Option available

- Resistant Orange add RO to Catalogue Number e.g. 56FA1 becomes 56FA1,RO.
- Resistant White add RW to Catalogue Number e.g. 56FA1 becomes 56FA1,RW.

Catalogue	Number	Description		Dim	ensions (mm)	
Number	of Gangs	Description	Α	В	C	D	E
56FA1	1	Flush surround suits single gang 56 Series	157	157	13	97	
56FA1B	1	Metal mounting bracket suits 56FA1	141	141		82	
56FA2	2	Flush surround suits two gang 56 Series	157	254	13	97	194
56FA2B	2	Metal mounting bracket suits 56FA2	141	242		82	179
56FA3	3	Flush surround suits three gang 56 Series	157	350	13	97	281
56FA3B	3	Metal mounting bracket suits 56FA3	141	338		82	275
56FA4	4	Flush surround suits four gang 56 Series	254	254	13	184	184
56FA4B	4	Metal mounting bracket suits 56FA4	242	242		179	179







• Special 56E8 and 56E9 Mounting Enclosures

(backboxes) available with removable pillar

to suit 56SB13 add SB to cat no. e.g. 56E8

· Less enclosure - add LE to catalogue number

e.g. 56SB13 becomes 56SB13LE.

· Resistant Orange for 56SB4 - add RO to

catalogue number e.g. 56SB4 becomes

56SB4,GY 56SB13,GY

56 Series Distribution Board

Available in a fully modular design that lets you mix and match from 2 to 16 gangs. With an IP66 rating they come in High Impact Grey (GY) and Chemical Resistant Orange (RO). You can make your own switchboard by fixing module devices together.

Features

- 4 and 13 modules wide to suit DIN Rail RCDs, MCBs, MCB/RCD and accessories.
- Deep cover for ample wiring room above and below the DIN rail.
- · Solid damage resistant cover.
- Cover latches open for easy maintenance.
- Space above MCBs to accept locking off and padlocking accessories.
- IPA identification drill outs.

base for easy termination.

56SB4

 Time saving drop in cradle for easier cable installation on 56SB4.

Features a lockable cover for padlocking up

to 7mm diameter clasp. Full size heavy-duty

Neutral bar to accept 1 x 35mm², 4 x 16mm²

and 1 x 35mm2. Neutral bar raised above the

 563/10 Earth and neutral terminator accommodating 3 x 6mm² cables.

56SB13

Options available:

becomes 56E8SB.

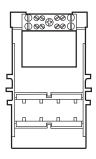
56SB4,RO.

Features a lockable cover for padlocking up to 7mm diameter hasp. Full size heavy-duty Neutral Earth bar to accept

- 2 x 35mm²
- 5 x 16mm² unprotected / 2 x 35mm2,
 8 x 16mm² protected and 2 x 35mm2,
- 12 x 16mm² Earth.
- Neutral/Earth bar raised above the base for easy termination.

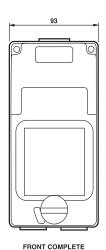
Catalogue Number	Description
56SB4	Supplied with Neutral bar and Earth Connector - suits 4 modules full DIN (IP66)
56SB13	Supplied with Neutral and Earth bars - 13 module - full DIN rail - 12 pole busbar (IP66)
56SBLK	KG locking kit to suit 56SB4 and 56SB13

Dimensional Drawings



56SB4 MOUNTING CRADLE

56SB4



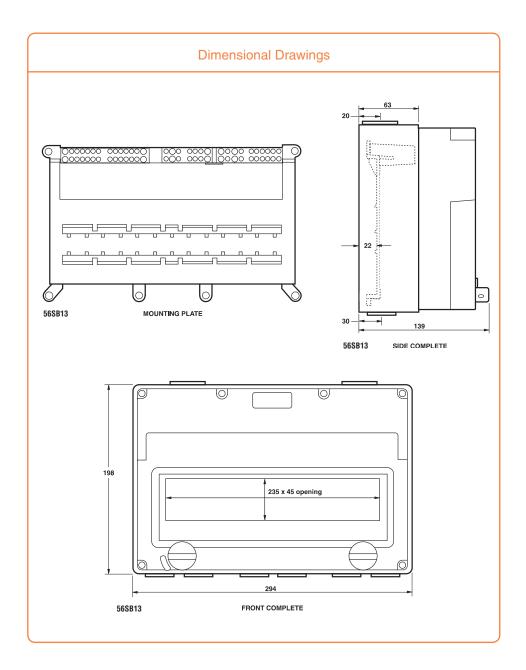
123
63
1 X M32
CONDUIT
ENTRY

FRONT

2 X M25
CONDUIT
ENTRIES

139

568B4
SIDE COMPLETE





56JB1SWA,GY

Armoured Cable Junction Box

Available in High Impact Grey (GY) and Chemical Resistant Orange (RO), this 56 Series Junction Box is ideal for installation where cables tee-off to luminaires.

Steel wire armoured cables are internally Earthed using a special mounting plate to ensure an IP66 rating. The plate is fitted with 70mm wide DIN rail for DIN style terminals. Space from the DIN rail to the lid is 58mm.

Each enclosure comes with loose $5 \times 563/10$ Active Terminals, Neutral Terminal and Earth Terminal (suitable for $3 \times 6mm^2$).

The box also comes with 3 x 20mm screwed conduit entries complete with blanking plugs.

Catalogue Number	No. of Gangs	0/A Dims. (H) x (W) x (D)	IP Rating	
56JB1SWA	1	107x101x90	IP66	1x25/32

DOL Motor Starters







56DOL9/1R,GY 56ROL9/10,GY

56DOL9/15,GY

56 Series Motor Starters

The rugged reliability and modular construction of Clipsal 56 Series Industrial Switchgear, when combined with the cutting edge technology of the Telemechanique Series range of contactors and overload relays, will give you the most exciting breakthrough in motor control technology.

A range of rugged, dependable DOL Motor Starters for single phase motors up to 2.2kW (3.0hp) and three phase motors up to 11kW (7.5hp).

56 Series Motor Starters offer unequalled levels of design flexibility, together with superior onthe-job performance.

For maximum versatility and flexibility there are four versions in each of the single and three phase options:

- START/STOP RESET
- STOP/RESET only
- · START/STOP RESET with isolating switch

Features

- Modular flexibility. Starters can be coupled with almost any number of 56 Series Modules in one enclosure.
- · Ease of wiring.
- UV stabilised for proven outdoor performance.
- Chemical Resistant Orange (RO) enclosures are available for environmentally aggressive locations
- Hoseproof and dustproof to IP66.
- · Heavy-duty impact resistant enclosure.
- Customised units can be ordered to meet individual customer requirements.

Models available

- Direct-On-Line (DOL) Starters
- Reversing (ROL) Starters
- Enclosed Star-Delta Starters

Option available:

 Less overload - add LO to catalogue number e.g. 56DOL9/1 becomes 56DOL9/1LO 56DOL12/1 becomes 56DOL12/1LO 56DOL16/1 becomes 56DOL16/1LO



56 DOL range

DOL Motor Starters







56DOL 56YD16 56YD9

	DOL MOTO	OR SERIES	STARTERS	- 56 Series [[40008]				
2 Push Buttons (Stop / Reset and Start). Complete with overload*									
Catalogue Number	Motor Rating			Supplied / Fitted with	Min. Overload	Max. Overload			
56DOL9/1	4kW	9A AC3	25A AC1	LRD05	0.63	1.0A			
56DOL9/1V6	4kW	9A AC3	25A AC1	LRD06	1.0	1.6A			
56DOL9/2V5	4kW	9A AC3	25A AC1	LRD07	1.6	2.5A			
56DOL9/4	4kW	9A AC3	25A AC1	LRD08	2.5	4.0A			
56DOL9/6	4kW	9A AC3	25A AC1	LRD10	4.0	6.0A			
56DOL9/8	4kW	9A AC3	25A AC1	LRD12	5.5	8.0A			
56DOL9/10	4kW	9A AC3	25A AC1	LRD14	7.0	10.0A			
56D0L12/1	5.5kW	12A AC3	25A AC1	LRD16	9.0	13.0A			
56DOL16/1	7.5kW	16A AC3	25A AC1	LRD21	12.0	18.0A			
56D0L22/1	11kW	25A AC3	40A AC1	LRD22	16.0	24.0A			
		Reset Ve	rsion - Pus	h Button					
56D0L9/1R	4kW,	9A AC3,	25A AC1	LRD05	0.63	1.0A			
56D0L9/1V6R	4kW,	9A AC3,	25A AC1	LRD06	1.0	1.6A			
56D0L9/2V5R	4kW,	9A AC3,	25A AC1	LRD07	1.6	2.5A			
56D0L9/4R	4kW,	9A AC3,	25A AC1	LRD08	2.5	4.0A			
56DOL9/6R	4kW,	9A AC3,	25A AC1	LRD10	4.0	6.0A			
56D0L9/8R	4kW,	9A AC3,	25A AC1	LRD12	5.5	8.0A			
56DOL9/10R	4kW,	9A AC3,	25A AC1	LRD14	7.0	10.0A			
56D0L12/1R	5.5kW,	12A AC3,	25A AC1	LRD16	9.0	13.0A			
56D0L16/1R	7.5kW,	16A AC3,	25A AC1	LRD21	12.0	18.0A			
56D0L22/1R	11kW,	25A AC3	40A AC1	LRD22	16.0	24.0A			
Switch Ver	sion - 2 Pus	h Button (St	op /Reset /	and Start) and	Isolating Sw	itch**			
56DOL9/1S	4kW,	9A AC3	25A AC1	LRD05	0.63	1.0A			
56D0L9/1V6S	4kW	9A AC3	25A AC1	LRD06	1.0	1.6A			
56D0L9/2V5S	4kW	9A AC3	25A AC1	LRD07	1.6	2.5A			
56D0L9/4S	4kW	9A AC3	25A AC1	LRD08	2.5	4.0A			
56DOL9/6S	4kW	9A AC3	25A AC1	LRD10	4.0	6.0A			
56D0L9/8S	4kW	9A AC3	25A AC1	LRD12	5.5	8.0A			
56D0L9/10S	4kW	9A AC3	25A AC1	LRD14	7.0	10.0A			
56D0L12/1S	5.5kW	12A AC3	25A AC1	LRD16	9.0	13.0A			
56D0L16/1S	7.5kW	16A AC3	25A AC1	LRD21	12.0	18.0A			
56D0L22/1S	11kW	25A AC3	40A AC1	LRD22	16.0	24.0A			

*	Stop / reset button is mushroom head type, 40mm diameter and applies to 56D0L9,
	56DOL12 and 56DOL16. Operating Temperature - 20 to +60°. 415V AC rated. 56DOL22
	has extended 'stop / reset' and flush 'start' buttons.

^{**} Stop / reset button is mushroom head type, 40mm diameter and applies to 56D0L9S, 56D0L12S and 56D0L16S. Operating Temperature - 20 to +60°. 415V AC rated. 56D0L22S have extended 'stop / reset' and flush 'start' Buttons.

	56 SERIES DOL STARTERS - SPARE COVERS					
To replace the cover over the starter only. Available in Grey (GY) or Chemically Resistant Orange (RO)						
Catalogue Number	Description					
56DOL9CVR/1	To suit 56DOL9, 12 & 16 range, includes cover and cradle					

STAR DELTA MOTOR STARTERS - 56 SERIES [40009]								
2 Push Buttons (Stop / Reset and Start). Complete with Overload***								
Catalogue Number								
56YD9/1	7.5kW	LRD14	7.0	10.0A				
56YD12/1	11kW	LRD16	9.0	13.0A				
56YD16/1	15kW	LRD21	12.0	18.0A				

REV	REVERSING DOL MOTOR STARTERS - 56 SERIES [40010]										
Two Contactor Version. 3 Push Buttons (Fwd - Stop / Reset - Rev). Complete with Overload in 56 Series Enclosures (IP66)****											
Catalogue Number	Motor Rating			Supplied / Fitted with	Min Overload	Max Overload					
56ROL9/10	4kW	9A AC3	25A AC1	LRD14	7.0	10.0A					

 $^{^{\}star\star\star}$ 415V AC control, 3-30 second adjustable run up delay and 20-300 millisecond adjustable transition delay, 30 starts per hour.

Note: All starters are available for 240V AC coil - add "B" to catalogue number. Other coil voltage and overloads are available as a special.

^{****}Operating temperature - 20 to + 60°. 415V AC rated.

Industrial Switchgear Accessories



56D

Condensation Drain

Catalogue Number 56D

Where condensation build up is a problem. The 56D is made from chemically resistant nylon and comes complete with lock nut.

Note: Installation of the 56D will derate the product to IP54.



56SOAUX15

Auxiliary Switch - 56 Series

Catalogue Number 56SOAUX15

Suits 415V sockets. Used to indicate if plug is connected or not.

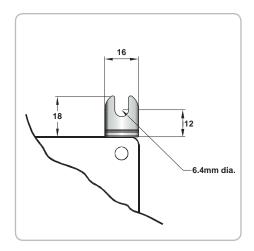


56G1

56 Series 1 Gang Gasket

Catalogue Number 56G1

Replacement single gang gasket. Rated IP66.



56MF

Mounting Feet & Pole Mounting Brackets

Catalogue Number 56MF

Mounting feet and stainless steel mounting screws (11/4" x 10 gauge) are provided to space 56 Series accessories off walls used in food industries.

The 56MF is designed to be used in conjunction with food industry 280MC Mounting Channels and 280 Series 25mm Conduit Clips.

Catalogue No. 56PMK

A heavy-duty stainless steel pole mounting kit made of 316 Grade stainless steel. Comes complete with 4¾" and 1¼" size stainless steel mounting screws.



56SWAUX15

Auxiliary Switch - 56 Series

Catalogue Number 56SWAUX15

Suits 63A switches. Used to indicate if switch is 'on' or 'off'.



56SOLOCK

Lock for Socket Flaps - 56 Series

Catalogue Number 56SOLOCK
Suits all products equipped with flap.

Industrial Switchgear Accessories







56G2

56 Series 2 Gang Gasket

Catalogue Number 56G2

Replacement double gang gasket.

56LEDK1

Single Phase Red LED

Catalogue Number 56LEDK1

Field fit kits includes LED on flying leads, lens, o-ring, drill bit 5.5mm (7/32) and instructions.

LEDs provide more reliability and extended life compared to traditional neons used in 56 Series.

56LEDK3

Three Phase Red, White, Blue LED

Catalogue Number 56LEDK3

Field fit kits includes LED on flying leads, lens, o-ring, drill bit 5.5mm (7/32) and instructions.

LEDs provide more reliability and extended life compared to traditional neons used in 56 Series.



Catalogue Number	Description
56D	Condensation Drain with Lock Nut
56SOAUX15	Auxiliary Switch for 56 Series 415V Sockets
56G1	56 Series 1 Gang Gasket
56G2	56 Series 2 Gang Gasket
56LEDK1	Single Phase LED kit 240/415V Red
56LEDK3	Three Phase LED Kit 240/415V Red, White, Blue
56MF / 56PMK	Mounting Feet with Screws / Heavy Duty Pole Mounting Kit
56SWAUX15	Auxiliary Switch for 63A Switches
56SOLOCK	Lock for Socket Flaps
56SOCOVER	Replacement Socket Cover

56SOCOVER, RO

Replacement Socket Cover - 56 Series

Catalogue Number 56SOCOVER

Available in High Impact Grey (GY), Chemically Resistant Orange (RO), Chemically Resistant White (RW) or Chemically Resistant Grey (CG).

66 Series Switched Socket Outlets



66CV563,RO

66CV SWITCHED SOCKET OUTLETS

Major features of the 66CV Series are its robust PVC back box and polyester cover that provide excellent chemical and high impact resistance as well as UV stability, in a neat, compact unit that's quick and easy to install.

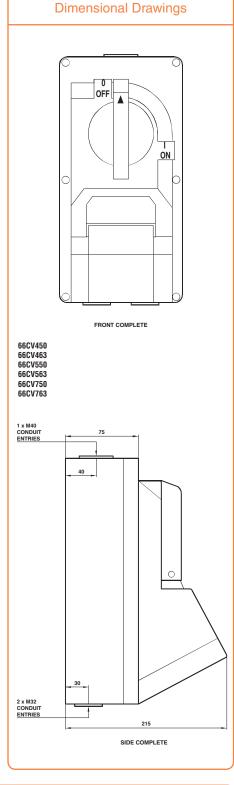
An internal interlock is fitted to the outlet to prevent insertion or withdrawal of the plug (provided the plug is fitted with an interlock facility) while the switch is in the 'ON' position.

66CV Series Combination Switched Socket Outlets also incorporate a padlock facility in the 'OFF' position for added safety and security.

Hole diameter 7.8mm.

Option available

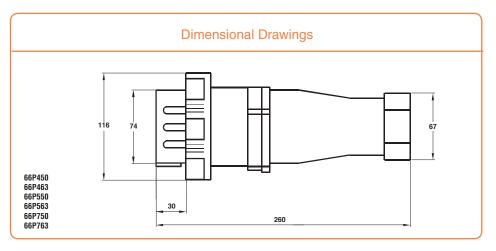
 Resistant Orange - add RO to Catalogue Number e.g. 66CV450 becomes 66CV450,RO.



Catalogue Number	No. of Switch	h I _{the} U _i h (Amn) (Volt)		I ့ (A) Utilisation at U ॄ=415V		M Rating	M Number of		Conductor Terminal Size in mm²		ID		O/A Dims. (H) x (W) x (D)	Matching Plug Straight
	Poles			AC21A	AC22A	AC23A			Min.	Max			Strangill	
66CV450	3	50A	500V	50	50	40	-	4	10	25	66	320x160x215	66P450	
66CV550	4	50A	500V	50	50	40	-	5	10	25	66	320x160x215	66P550	
66CV750	4	50A	500V	50	50	40	-	7	10	25/2.5	66	320x160x215	66P750	
66CV463	3	63A	500V	63	63	50	-	4	16	35*	66	320x160x215	66P463	
66CV563	4	63A	500V	63	63	50	-	5	16	35*	66	320x160x215	66P563	
66CV763	4	63A	500V	63	63	50	-	7	16	25/2.5	66	320x160x215	66P763	

Note: AC utilisation categories to AS3947.3 Some restrictions may apply if using conduit for 35mm² conductors Ing- Conventional Enclosed Thermal Current UI, - Insulation Voltage UI, - Operational Current

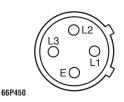
66 Series Straight Plugs





66P563(EO)

Dimensional Drawings









66P Series Straight Plugs

The 66P Series Straight Plug is constructed from fully moulded, transparent polycarbonate. This makes for easy installation and instant visual checking of connections. All models are also insulated for operator safety.

Designed for heavy industrial areas, all 66P models are impact resistant, insulated and contain corrosion proof metal components and UV stabilised mouldings.

For convenience and safety the plug can be used with gloved hands and has a mechanical interlock facility to prevent withdrawal of the socket outlet while the power is still on.

Options available

- Spare cable clamp Catalogue Number 66PCC.
- Resistant Orange add RO to Catalogue Number. e.g. 66P450 becomes 66P450,RO.

	Catalogue Number	I _{th} (Amp)	U ; (Volt)	No. of Pins		r Terminal ı (mm²)		lominal r (in mm)	IP Rating	Entry Size (mm)
		()	(1011)		Min.	Max/Cond.	Min.	Max.		
(66P450	50A	500V	4	6	25	25.5	40	66	50
(66P550	50A	500V	5	6	25	25.5	40	66	50
(66P750	50A	500V	7	6	25/10	25.5	40	66	50
(66P463	63A	500V	4	6	25	25.5	40	66	50
(66P563	63A	500V	5	6	25	25.5	40	66	50
	66P763	63A	500V	7	6	25/10	25.5	40	66	50

 I_{the} - Conventional Free Air Current U_{e} - Operational Current

Internal Socket and Pin Housings

As with the 56 Series, the 66 Series offers a full range of replacement socket and pin housings.

They eliminate the expense of replacing an entire unit if only the housing is damaged.

Catalogue	I _{th}	U /	No. of Pins	Conductor Term. Size in mm²		
Number	(Amp)	(V)	140. 011 1113	Min.	Max/Cond.	
66SO450G	50A	500V	4	10	25	
66SO463G	63A	500V	4	16	25	
66SO550G	50A	500V	5	10	25	
66SO563G	63A	500V	5	16	25	
66SO750G	50A	500V	7	10	25/2.5	
66SO763G	63A	500V	7	16	25/2.5	
66P450G	50V	500V	4	6	25	
66P463G	63V	500V	4	6	25	
66P550G	50V	500V	5	6	25	
66P563G	63V	500V	5	6	25	
66P750G	50V	500V	7	6	25/10	
66P763G	63V	500V	7	6	25/10	

Lloyd Registered Products for Shipping Approvals

Lloyd's Register of Shipping Approvals for 56 Series Switchgear

500V Three Phase	56SW132	500V Three Phase	250V and Low	56PA440	56P320
Sockets	56SW150	Combination	Voltage Switched	56PA450	56P320F
56SO410	56SW163	Switched Sockets	Sockets	56PA510	56P332
56SO420	56SW220	56C410	(Single and Double	56PA520	56PA320
56SO432	56SW232	56C420	Pole Combination)	56PA532	56PA332
56SO440	56SW250	56C432	2 Module	56PA540	Appliance Inlets
56SO450	56SW263	56C440	56C210	56PA550	56Al310
56SO510	56SW310	56C450	56C215/32	56PA610	56Al315
56SO520	56SW320	56C510	56C3/110	56PA710	56Al410
56SO532	56SW332	56C520	56C310	56PA720	56Al420
56SO540	56SW340	56C532	56C310D	Stroight	56Al432
56SO550	56SW350	56C540	56C310L	Straight 56P410	56Al440
56SO610	56SW363	56C550	56C310RP		56Al450
56SO710		56C610	56C313	56P420	56AI510
56SO720	250V Two-way	56C710	56C315	56P432	
250V and Extra Low	Switches (Single	56C720	56C315D	56P440	56AI520
Voltage Sockets	and Twin with	56CV410	56C320	56P450	56AI532
56SO210	Sliding Switch	56CV420	56C332	56P450	56AI540
56SO215/32	Dollies)	56CV432		56P510	56AI550
56SO3/110	56SSW10	56CV440	With Standard One	56P520	
56SO310	56SSW15	56CV450	Piece Cover	56P532	500V Three Phase
56SO310L	56SSW2/10	56CV510	56CV310	56P540	Appliance
56SO310RP	56SSW2/15	56CV520	56CV315	56P550	Connectors
56SO313		56CV532	56CV320	56P610	56CSC410
56SO315		56CV540	56CV332	56P710	56CSC420
56SO320		56CV550		56P720	56CSC432
56SO320F		56CV610	With Interlock		56CSC440
56SO332		56CV710	56CVI320	250V a.c. and Low	56CSC450
		56CV720	56CVI332	Voltage Plugs	56CSC510
Rotary Switches				56P210	56CSC520
(Single, Double and Triple Pole)			500V Three Phase	56P215/32	56CSC532
56SW110			Plugs	56P3/110	56CSC540
56SW110/2			Angle	56P310	56CSC550
56SW115			56PA410	56P310SL	
56SW115/2			56PA420	56P310RP	
			56PA432	56P313	
56SW120					

Department of Industrial Relations Coal Mines Regulation Act 1982

Rotary Switches	500V Three Phase	500V Three Phase
(Single, Double and	Sockets	Angle Plugs
Triple Pole)	56SO532	56PA410
56SW120	56SO550	56PA510
56SW132	56SO540	56PA520
56SW150	56SO610	56PA532
56SW220	56SO710	56PA540
56SW250	56SO720	56PA550
56SW320		56PA610
56SW332		56PA710
56SW350		56PA720

56 Series accessories comply with the relevant parts of the following standards:

AS/NZS3123 - Approval and test specifications - plugs, socket outlets and couplers for general industrial application.

AS/NZS3133 - Approval and test specifications - air break switches.

Plug and Socket Configurations

Socket Configurations

Plug Configurations

2 & 3 Pin



10A 250V A

15A 250V



16A 500V (unique) M



32A 500V N



2 & 3 Pin

15A 250V B

10A 250V



М

32A 500V

(unique)

16A 500V



10A 250V



40A 500V



10A 250V C



40A 500V O



10A 110V D



50A 500V



10A 110V D



50A 500V P



15A 32V Polarised E



10A 500V Q



15A 32V Polarised



10A 500V Q



20A 250V F



20A 500V R



20A 250V F



20A 500V R



10A 250V G



32A 500V S



10A 250V G



32A 500V S



20A 250V H



40A 500V T



20A 250V H



40A 500V T



32A 250V



50A 500V



32A 250V I



50A 500V U



10A 110V



10A 500V V



10A 110V J



10A 500V V





10A 500V K



10A 500V W



10A 500V K



10A 500V W



20A 500V



20A 500V X



20A 500V L



20A 500V X

International Protection Ratings & Technical Terms

PROTECTION AGAINST SOLIDS

	TEST	PROTECTION
Х	No test applied	No specific protection
0	No test applied	Inherent degree of protection
1		Protected against solid objects equal to or greater than 50mm diameter. (eg. accidental contact with hand)
2		Protected against solid objects equal to or greater than 12.5mm diameter. (eg. contact with finger)
3		Protected against solid objects equal to or greater than 2.5mm diameter. (eg. tools and wires)
4		Protected against solid objects equal to or greater than 1mm diameter. (eg. fine tools and wires)
5	AVV.	Protected against quantities of dust that could intefere with satisfactory operation.
6	0	Completely protected against dust.

Defined by IEC 60529 DIN 40050 CEI 70-1

To Australian standards AS 60529-2004
Degrees of protection provided by enclosures.
(IP Code)

PROTECTION AGAINST LIQUIDS

	TEST	PROTECTION
Х	No test applied	No specific protection
0	No test applied	Inherent degree of protection
1		Protected against drops of water falling vertically.
2		Protected against drops of water falling at up to 15 degrees from the vertical.
3		Protected against spraying water at up to 60 degrees from the vertical.
4		Protected against splashing water from all directions.
5	52232	Protected against jets of water from all directions.
6		Protected against jets of water of similar force to heavy seas.
7		Protected against the effects of temporary immersion.
8		Protected against the effects of continuous immersion.

PROTECTION AGAINST IMPACT

	TEST	PROTECTION
Х	No test applied	No specific protection
1	150g \$\dagger\$ 15cm	Resistant to impacts of weight up to 150g falling from 15cm.
3	250g \$\frac{1}{20cm}\$	Resistant to impacts of weight up to 250g falling from 20cm.
5	500g † 40cm	Resistant to impacts of weight up to 500g falling from 40cm.
7	1.5kg †40cm	Resistant to impacts of weight up to 1.5kg falling from 40cm.
9	5kg † 40cm	Resistant to impacts of weight up to 5kg falling from 40cm.

Defined by UTE 20010

Defined by IEC 60529

The following technical terms are brief descriptions indicating the tests involved to attain ratings. For further information refer to the standards indicated.

M-Rating (Refer AS/NZS3133)

Clipsal switches and switched socket outlets are marked with an M-Rating. This indicates that these products have been tested and found suitable for switching locked rotor current.

In part, this test involves 50 operations, make and break of the nominated locked rotor current at 0.5 power factor lagging. The switch will not fail to interrupt the current or fail in any way electrically or mechanically.

AC-15 (refer AS/NZS3947)

Control of electromagnetic loads (>72VA).

AC-23 (refer AS/NZS3947)

Switching of motor loads or highly inductive loads

In part this involves five make and break operations at:

- 10 times rated current make
- 1.1 times rated voltage make
- 0.35 cos
- 8 times rated current break
- 1.1 times rated voltage break
- 0.35 cos.

Additional mechanical at no load and electrical endurance tests at rated current and voltage at 0.35 cos are conducted.

AC-21 (refer AS/NZS3947)

Switching of resistive loads, including moderate overloads

In part this involves five make and break operations, at $1^{1}/_{2}$ times rated current and 1.1 times rated voltage at 0.95 cos.

Additional mechanical no load and electrical endurance tests at rated current and voltage at 0.95 cos are conducted.

AC-22 (refer AS/NZS3947)

Switching of mixed resistive and inductive loads, including moderate overloads.

In part this involves five make and break operations at three times rated current and 1.1 times rated voltage at 0.65 cos. Additional mechanical no load and electrical endurance tests at rated current and voltage at 0.65 cos.

Technical Tables

Cable Size - Nominal Area of Conductor mm²	No. and Diameter of Wires for Standard Conductor No./mm	Overall Diameter of AS/NZS300U Table E7 mm
0.5	1/0.80	2.5
1	1/1.13	2.9
1.5	1/1.38	3.2
	7/0.50	3.3
2.5	1/1.78	3.6
	7/0.67	3.8
4	7/0.85	4.8
6	7/1.04	5.3
10	7/1.35	6.3
16	7/1.70	7.3
25	19/1.35	9.4
35	19/1.53	10.4
50	19/1.78	12.0
70	19/2.14	13.8
95	37/1.78	16
120	37/2.03	17.7
150	37/2.25	19.7
185	37/2.52	22
240	61/2.25	25.1
300	61/2.52	27.9
400	61/2.85	31.4
500	61/3.20	34.9
630	127/2.52	38.9

Dimensions, standard copper and aluminium conductors 1 core 0.6/1kV PVC insulated cable to AS/NZS5000, 75° C

Note: For exact dimensions refer to manufacturers' details.

Useful 3-Phase Formulae

kW = Line Amps x Line Volts x 1.732 x P.F.

1000

kVA = Line Amps x Line Volts x 1.732

1000

 $kW = kV.A \times P.F.$

Electric Motors

Power Output = Power Input x Efficiency

kW Output = kW Input x Efficiency

kW Output = 1.732 x Line Volts x Line Amps x P.F. x Efficiency

1000

kV.A Input = $\underline{1.732}$ x Line Volts x Line Amps

1000

Line Amperes = 1000 x kW Output

Line Volts x 1.732 x P.F. x Efficiency

Line Amperes = $\underline{1000 \times kV.A Input}$

Line Volts x 1.732

The power factor is usually taken as 0.8 (as an all-round figure) but this varies with the speed and size of the motor. The efficiency varies from 85% in small motors to 90% and over for large motors.

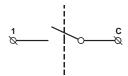
Measure	Symbol	Unit
Length	S	m
Area	А	m²
Volume	V	m³
Weight	m	kg
Density	Р	kg/m³
Time	t	S
Frequency	F	Hz
Rotary Speed	n	S ⁻¹
Linear Speed	V	ms ⁻¹
Acceleration	a	ms ⁻²
Power	F	N (Newton)
Pressure	Р	Pa (Pascal)
Torque	M	Nm
Work	W	J (Joule)
Power	Р	W (Watt)
Reactive Voltampere		Var
Voltampere		V.A
Current	I	A (Ampere)
Operational Current	lth	А
Conventional Enclosed	Ithe	А
Thermal Current	61/2.85	31.4
Voltage	U	V (Volts)
Insulated Voltage	Ui	V
Operational Voltage	Ue	V
Resistance	R	(Ohm)
Impedance	Z	
Reactance	Χ	
Reluctance	S	A/Wb
Capacitance	С	F (Farad)
Quantity of Electricity	Q	C (Coulomb)
Magnetic Field Strength	Н	A/m
Magnetic Flux	Ø	Wb (Weber)
Inductance	L	H (Henry)
Magnetic Flux Density	В	T (Tesca)
Temperature	t	°C (Centigrade)
Illuminance	Е	l x (Lux)
Luminance	L	cd/m²
Luminous Flux	Ø	Im (Lumen)
Luminous Intensity	l	cd (Candela)

Abbreviations for Multiples and Sub Multiples				
T	tera	10 ¹²		
G	giga	10 ⁹		
M	mega	10 ⁶		
k	kilo	10 ³		
d	deci	10 ⁻¹		
С	centi	10 ⁻²		
m	milli	10 ⁻³		
U	micro	10 ⁻⁶		
n	nano	10 ⁻⁹		
р	pico	10 ⁻¹²		

Common Conversion Factors

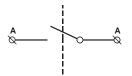
Quality	Non-SI Unit	Metric	Conversion Factors (approx.) Non-SI to Metric (SI) Units	Metric (SI) to Non-SI Units
	Inch (in)	Millimetre (mm) or Centimetre (cm)	1 in = 25.4mm	1 cm = 0.39 in
Length	Foot (ft)	Centimetre (cm) or Metre (m)	1 ft = 30.5 cm	1 m = 3.28 ft
	Yard (yd)	Metre (m)	1 yd = 0.914 m	1 m = 1.09 yd
	Mile	Kilometre (km)	1 mile = 1.61 km	1 km = 0.62 mile
	Square Inch (in²)	Square Millimetre (mm²)	1 in ² = 645 mm ²	$1 \text{ mm}^2 = 0.002 \text{ in}^2$
	Square Inch (in²)	Square Centimetre (cm²)	$1 \text{ in}^2 = 6.45 \text{ cm}^2$	$1 \text{cm}^2 = 0.155 \text{ in}^2$
Area	Square Foot (ft²)	Square Centimetre (cm²) or Square Metre (m²)	1 ft² = 929 cm²	$1 \text{ m}^2 = 10.76 \text{ ft}^2$
	Square Yard (yd²)	Square Metre (m²)	$1 \text{ yd}^2 = 0.836\text{m}^2$	$1 \text{ m}^2 = 1.20 \text{ yd}^2$
	Acre	Hectare (ha)	1 acre = 0.405 ha	1 ha = 2.47 acres
	Square Mile	Square Kilometre (km²)	1 Square Mile = 2.59 km ²	1 km ² = 0.387 sq. mile
	Cubic Inch (in³)	Cubic Centimetre (cm³)	1 in ³ = 16.4 cm ³	1 cm ³ = 0.06 in ³
Volume	Cubic Inch (ft³)	Cubic Decimetre (dm³) or	1 ft ³ = 28.3 dm ³	1 m ³⁺ = 35.3 ft ³
	Cubic Yard (yd³)	Cubic Metre (m³)	$1 \text{ yd}^3 = 0.765 \text{m}^3$	1 m ³ = 1.31 yd ³
	Fluid Ounce UK (fl. oz UK)	Millilitre (ml)	1 fl. oz (UK) = 28.4 ml	1 ml = 0.035 fl. oz (UK)
	Pint UK (pt UK)	Millilitre (ml) or Litre (l)	1 pint UK = 568 ml	1 I = 1.76 pint (UK)
Volume	Gallon UK (gal UK)	Litre (I) or Cubic Metre (m³)	1 gal UK = 4.55 l	1 m ³ = 220 gallons (UK)
(Fluids)	Fluid Ounce US (Fl. oz US)	Millilitre (ml)	1 fl. oz (US) = 29.6 ml	1 ml = 0.034 fl. oz (US)
	Pint US (gal US)	Litre (I) or Millilitre	1 pint (US) = 473 ml	1 I = 2.11 pint (US)
	Gallon US (gal US)	Litre	1 gallon (US) = 3.79 l	1 I = 0.264 gallon (US)
	Ounce (oz)	Gram (g)	1 oz = 28.3 g	1 g = 0.035 oz
	Pound (lb)	Gram (g) or kilogram (kg)	1 lb = 454 g	1 kg = 2.20 lb
	Ton	Tonne (t)	1 ton = 1.02 tonne	1 tonne = 0.984 ton
Mass	tael	Gram (g)	1 tael= 37.8 g	1 g = 0.026 tael
	Catty	Kilogram (kg)	1 catty = 0.605 kg	1 kg = 1.65 cattoes
	Picul	Kilogram (kg)	1 picul = 60.50 kg	1 kg = 0.017 picul
-	Pound Force (lbf)	Newton (N)	1 lbf = 4.45 N	1 N = 0.225 lbf
Force	Kilogram Force (kgf)	Newton (N)	1 kgf = 9.81 N	1 N = 0.102 kgf
	Pound Force per square inch (psi)	kilopascal (kPa)	1 psi = 6.86 kPa	1 kPa = 0.145 psi
Pressure	Kilogram force per square centimetre (kgf/cm²)	kilopascal (kpa)	1 kgf/cm ² = 98 kPa	1 kPa = 0.01 kgf/cm ²
	Inch of water (in H ₂ O)	Pascal (Pa)	1 in H ₂ 0 = 249 Pa	1 Pa = 0.004 in H ₂ 0
	Bar	kilopascal (kPa)	1 Bar = 100 kPa	1 kPA = 0.01 bar
Velocity	Mile per hour (mph)	Kilometre per hour (km/h)	1 mile = 1.61 km/h	1 km/h = 0.62 mph
Temperature	Fahrenheit temp. (F)	Celsius temp. (C)	<u>°C = 5 (°F − 32)</u> 9	${}^{\circ}F = (9 \times {}^{\circ}C) + 32$
	Pound per cubic inch (lb/in³)	Gram per cubic centimetre (g/cm³) = tonne per cubic metre (t/m³)	1 lb/in³ = 27.7 t/m³	1 t/m³ = 0.036 lb/in³
Density	Pound per cubic foot (lb/ft³*)	Kilogram per cubic metre (kg/m³)	1 lb/ft ³ = 16.02 kg/m ³	1 kg/m³ = 0.06 lb/ft³
	Ton per cubic yard (ton/yd³)	Tonne per cubic metre (t/m³)	1 ton/yd = 1.33 t/m ³	1 t/m³ = 0.752 ton/yd³
	British thermal unit (Btu)	Kilojoule (kJ)	1 Btu = 1.06 kJ	1 kJ = 0.948 Btu
Energy	Therm	Megajoule (MJ)	1 Therm =106 MJ	$1 \text{ MJ} = 9.48 \times 10^{-3} \text{ therm}$
	Calorie (dietician)	Kilojoule (kJ)	1 Cal (dietician) = 4 kJ	1 kJ = 0.23 Cal (dietician)
Power	Horsepower (hp)	Kilowatt (kW)	1 hp = 0.746 kW	1 kW = 1.34 hp
Fuel Consumption	Mile per gallon (mpg)	Litres per 100 m	$\frac{\text{(n) x mpg} = 2821/100 km}{\text{n}}$	(n) x 1/100 km = 282 n

Switch Wiring Diagram Types

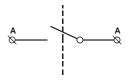


Switch is 30 Series mech.

56C215/32	56C310C	56SW110
56C210	56C3/110	56SW115
56C310	56C310RP	
56C315	56CV310	
	E6C\/21E	



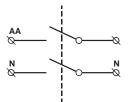
56C310HD 56C315HD



Switch terminals are not identified Switch is backwired

Conductor termination is pressure plate type

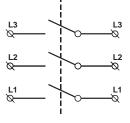
56C320	56SW110HD
56CV310HD	56SW115H
56CV310HD	56SW120
	56SW132
	56SW150
	56SW163



Switch terminals are not identified Switch is backwired

Conductor termination is pressure plate type

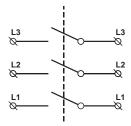
56C310D 56C315D



Switch terminals are not identified Switch is backwired

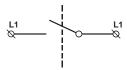
Conductor termination is pressure plate type

56C410	56CV410	56CV710	56K1SW310
56C420	56CV420	56CV720	56K1SW320
56C416K	56CV510	56CV432	56K2SW310
56C510	56CV520	56CV532	56K2SW320
56C520	56CV416K	56CV440	
	56CV610	56CV/450	



Switch terminals are not identified Switch is backwired Conductor termination is plain screw type

56SWH	66CV450	56SW363/2	56C610	56C432	56C550
56SWH 325	66CV463	56SW363	56C710	56C532	56CV540
56SWH 363		56SW350	56C720	56C450	56CV550
56SWH 340		56SW332	56C440	56C540	56SW310
56SWH 380					56SW320

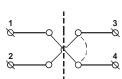


Switch terminals are not identified

Switch is backwired

Conductor termination is plain screw type

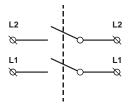
56K1SW120 K6K2SW120



56SW110/1 56SSW10/1

& MICRO	56SW363 with 56SWAUX15
	Switch terminals are not identified Switch is backwired Conductor termination is plain screw type
1 1	Replaces
∞	56C320C
ł	56C332C
	56C350C

Switch Wiring Diagram Types



Switch is sidewired

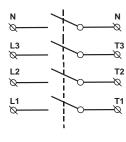
Conductor termination is pressure plate type

56SW220 56K1SW220 56SW232 56K2SW220

56SW250 56SW263

Switch is 30 Series mech.

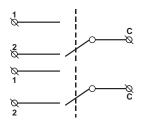
56SW110/2 56SW115/2 56SSW10 56SSW15



If neutral potential is applied to remote terminal timer function is overridden

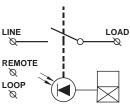
56SW420 56SWH425 56SWH440 56SWH463 66CV550 66CV563 66CV750

66CV763



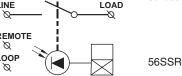
CIrcuit is shown in the 'OFF' position

56SSW2/10 56SSW2/15



Switch is sidewired

Conductor termination is pressure plate type



PUSH (STOP BUTTON) NC-NORMALLY CLOSED CONTACTS LINE LOAD -⊖ 3 NO-NORMALLY OPEN CONTACTS (START BUTTON)

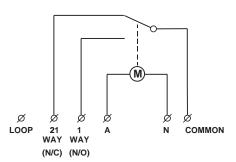
(No Marking, Colour Green, Non Latching) 56PB

56PBS (Stop, Colour Red, Non Latching)

56PBS1 (Emergency Stop, Marked on Switch and Plate, Colour Red Mushroom, Latching

56PBS2 (Stop, Colour Red Mushroom, Latching) (Stop/Start, Colour Red/Green, Non Latching)

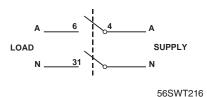
56/2PBS1 (Stop, Colour Red Mushroom, Latching)(Start, Colour Green, Non Latching)



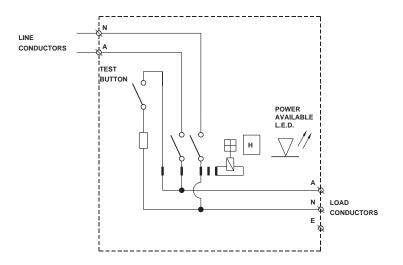
Switch is 30 Series mech.

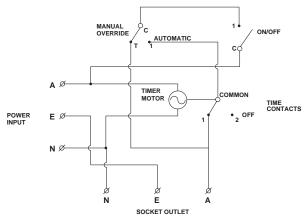
Conductor termination is pressure plate type

56CTC 56CTC15 56CTC2SO 56CTC2SO15 56TC 56TC7 56TCDB



Wiring Diagram Types





56CTC Series wiring identification

Switches are 30 series mech

