

LV Switchgears & Protection Devices

2024 Product Information and Catalogue



We don't tell, Our product speaks the Quality!

Soldier switchgear was established in 1998 with a vision to ensure electrical safety and efficiency. At soldier we manufacture and deliver product that assure you the utmost safety and reliability.

Our products have been manufactured using best-in-class raw materials to ensure safe and efficient distribution of power.

Our long term strategy has helped us to achieve our customer base and to increase our market presence.

Our products have been tested in nabl accredited labs that assures you quality and reliability of our products. Our approvals such as CE, ISO 9001:2015, ROHS and other further attest to our consistent performance.

certificates & credentials



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Certificate of Compliance

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MSME

ROHS

CE



ISO 9001 : 2015



IS 13032:1991



IP 43



Ik09



MINIATURE CIRCUIT BREAKER (MCB)



Operation Principle and Specifications

MCB's (Miniature circuit breakers) are electro mechanical devices which protect an electric circuit from overloading and short circuit. The over current, in an electrical circuit may occur from short circuit, overloading or any faults in electrical wiring.

MCB's are a alternative to a porcelain fuse carrier since it does not requires replacement in case of overload and short circuit. The ease of operation makes mcb's easy to operate and is cost effective as compared to fuse carrier.

Soldier MCB's have been designed and manufactured by using high quality material to fulfil your objective and meet the demand needed.

Thermal Operation (Overload Protection):

The thermal operation provides protection from moderate overloads. Under overload condition, a thermo-metallic element (bimetallic strip) becomes overheated, which deflects or bends until it operates a latching mechanism allowing the main contacts to open.

Magnetic Operation (Short-circuit Protection):

In magnetic operation, short circuit current actuates a coil or solenoid causing a plunger to strike the latching mechanism & make latch to be displaced which separate main contacts. As the contacts are separated in event of overload or short circuit conditions, an electric arc is formed, this arc than goes up through the arc runner and enters into arc splitters and finally quenched.



SALIENT FEATURES

BREAKING CAPACITY

MCB's are designed to withstand a Breaking Capacity of 10000A.

IP20 PROTECTION

We realise the importance of safety and thus have designed the MCB's in such a way that no live parts are exposed to human contact.

ERGONOMIC DOLLY KNOB

Easy to operate On/Off marking to know the Status of MCB

CONTACT POSITION INDICATION

Soldier MCB's has Red and Green indication provided below the knob that indicates ON/OFF contact position irrespective of mounting or knob position to identify the real position of contact in-side the MCB's

BI-STABLE DIN CLIP

MCB's can be conveniently mounted on DIN Rail (standard size of Din rail is 35 mm) and can be easily replaced without disturbing your existing wiring.

SPECIALLY DESIGNED ARC CHAMBER

12 plates arc chamber is provided for Quick & Efficient arc quenching









TECHNICAL SPECIFICATIONS

TECHNICAL SPECIFICATIONS		
Standard Conformity	Standard Rated Current (In)	Execution
IS/IEC:60898-1	6Amp - 63Amp , C Curve	SP, SPN, DP, TP, TPN
Rated Short Circuit Capacity	Rated Voltage	Rated Frequency
10000A (10kA)	240/415 Volts	50Hz
Rated Insulation Voltage	Energy Limiting Class	Tripping Mechanism
660 V AC	Class 3	Magnetic & Thermal
Terminal Capacity	Protection Class	Contact Indication
25 sq. mm	IP20	Red - On, Green - Off
Mounting	Di electric Strength	Power Loss
Din Rail (35 mm × 7 mm)	2.5kV	As per the IS/IEC Standards

RESIDUAL CURRENT CIRCUIT BREAKER

Soldier, RCCB (Residual Current circuit breaker) for protection against earth leakage. The RCCB is a switching device that carries and breaks current. It is to be used in association with miniature circuit breakers, its function is to detect earth leakage current and open the connected circuit to protect people and equipment.



WORKING PRINCIPLE OF RESIDUAL CURRENT CIRCUIT BREAKER

The flow of current through electrical facilities always involves risks. Poorly insulated equipment, faulty wires and incorrect use of electrical devices cause current to flow through the wrong path (i.e. through the insulation) to the earth. This current is called 'Leakage Current'.

Earth leakage is an electrical hazard and is responsible for electrical shocks and fires. Earth leakage and its associated hazards can be prevented by Residual Current Circuit Breaker (RCCB) that is also popularly known as Earth Leakage Circuit Breaker (ELCB). On sensing residual current, the RCCB is triggered to trip off the circuit.

FEATURES

- Simple and Robust operating mechanism.
- Dual termination for Bus Bar as well as cable connection
- Advance neutral
- Test button for regular inspection
- Positive contact indication

RCCB TRIPPING TEST

Identifying earth leakage fault with RCCBs is very simple. First, switch off all the switches/MCB's switch the RCCB ON and then switch on the remaining switches one after the other. When you find the RCCB trips repeatedly on switching one circuit on, you have found the faulty circuit. This is the quickest way to identify a faulty circuit/appliance. You can then isolate that faulty circuit, rectify the fault and switch ON the RCCB.

SELECTION OF RCCB

RCCB Ratings (mA)	Applications	
30 mA	Human Protection / Domestic Installation	
100 mA	Limited Human Protection / Machine Protection	
300 mA	Industries / Buildings	

TECHNICAL SPECIFICATIONS

Standard Conformity Standard Rated Current (In) Execution

IS 12640-1: 2016,IEC 61008-1 25A, 40A & 63A DP, FP

Rated Short Circuit Capacity Rated Voltage Rated Frequency

6000A (6kA) 240/415 Volts 50Hz

Rated Insulation Voltage Protection Tripping Mechanism
660 V AC Against earth fault / Leakage current Electro - Mechanical

Terminal Capacity Protection Class Contact Indication
35 sq. mm IP 20 Red - On, Green - Off

35 sq. mm IP 20 Red - On, Green - Off

Mounting Di electric Strength Rated Sensitivity

Din Rail (35 mm \times 7 mm) 2.5kV 30mA, 100mA 8 300mA





TWO WAY CENTRE OFF **CHANGEOVER SWITCH**

SOLDIER Mini Changeover Switch is a manual operated changeover switch for switching load between two power supplies. MCB Changeover switch finds wide applications in residential, commercial as well as in industries area. This switching device widely accepted For Individual Bungalow(IB) which is having low voltage distribution circuits. Changeover switches are used to shift from one source of supply to another source and vice versa. MCB changeover switch comes in 2P (Double Pole) and 4P (Four Pole) versions, for single and three phase application respectively. It has three positions (I-O-II) with centre-off.

TECHNICAL SPECIFICATIONS

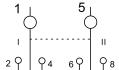
Standard Rated Current (In) Standard Conformity **Execution** IS/IEC 60947-3 DP, FP 40A & 63A

Rated Impulse voltage Rated Voltage Rated Frequency 4KV 240/415 Volts 50Hz

Electrical Endurance life Rated Insulation Voltage **Utilisation category** 660 V AC 10,000 AC22A

Protection Class Terminal Capacity Operating Temperature IP 20 -25°C to 60°C 35 sq. mm

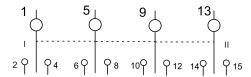
Mounting Di electric Strength Storage Temperature 2.5kV Din Rail (35 mm x 7 mm) -25° C to 60°C



Incoming terminals (main supply) Incoming terminals (standby supply) 4 8 8 Outgoing terminals (to load) 1 8 5 185

No Load/Off position

Two Pole (DP)



"I" Incoming terminals (main supply) 2, 6, 10 & 14

Incoming terminals (standby supply) 4, 8, 12 &15 Outgoing terminals (to load)
O No Load/Off position 1, 5, 9 & 13

Four Pole (FP)



ISOLATOR



SOLDIER Isolators are switch disconnectors with Independent manual operation, capable of making, carrying and breaking current under normal circuit conditions. These devices ensures complete deenergization of the electrical circuits of residential θ commercial areas θ also adheres to the required standard.

TECHNICAL SPECIFICATIONS

Standard Conformity Standard Rated Current (In) IS/IEC 60947-3 40A & 63A

Rated Impulse voltage Rated Voltage 240/415 Volts

Rated Insulation Voltage Execution

6000A (6kA)

660 V AC

Terminal Capacity Protection Class 35 sq. mm IP 20

DP, FP

240/415 Volts

Mounting **Utilization Category** Din Rail $(35 \text{ mm} \times 7 \text{ mm})$ AC 22A

TINY MCB



Soldier TINY Miniature Circuit Breaker (TINY-MCB) is an advanced product range of the most compact circuit breaker available in the world, incorporating all the safety features of a traditional MCB. Powered by the new age technology, it redefines the concept of protection. It thus offers undeterred protection from overload and short-circuit, securing the precious appliances by increasing their operational longevity.

TECHNICAL SPECIFICATIONS

Standard Conformity Standard Rated Current (In) IS/IEC 60898-1:2002 6Amp - 32Amp

Rated Impulse voltage Rated Voltage

3000A (3kA)

Rated Frequency Execution 50Hz SP, DP



Features

- Use of high grade ETP copper parts.
- In accordance with IS/IEC 60947-3.
- Quick make and break mechanics from both side.
- Sheet metal enclosures undergo 8 tank phospating process to ensure antirust conditioning, superior finish and lasting stregth.
- Fitted with detachable and PVC gasket packing for weather proofing.
- For maximum safety all doors are incorporated with an interlocking device so that they open only when the switch handle is in "OFF" position.
- lp20 Degree protection.
- Fully powder coated in 60 micron powder coating thickness.
- Light grey texture finish powder coating.

OFFLOAD CHANGEOVER SWITCH

Soldier OFFLOAD CHANGEOVER SWITCHES are fabricated cut of high quality CRCA steel sheets with high quality powder coating at optium condition to adhere to the defined safety standards and to prevent rust formation. Units are designed for the surface mounting and it offers high conductivity and longer functional life

Specifications:

Standard Ratings : 16A, 32A, 63A, 100A, 200A

320A, 400A, 630A

No of Poles : 2P, 4P Rated Voltage : 240 /415V

Enclosure Type : CRCA sheet steel duty powder coated

& phosphated

Degree of protection : IP20



SWITCH FUSE UNIT

Soldier SWITCH FUSE UNIT are fabricated cut of high quality CRCA steel sheets with high quality powder coating at optium condition to adhere to the defined safety standards and to prevent rust formation. Units are designed for the surface mounting and it offers high conductivity and longer functional life

Specifications:

Standard Ratings : 16A, 32A, 63A, 100A, 200A

320A, 400A, 630A

No of Poles : 2P, 3P+N Rated Voltage : 240 /415V

Enclosure Type : CRCA sheet steel duty powder coated

& phosphated

Degree of protection : IP20



PORCELAIN FUSE UNIT

Soldier PORCELAIN FUSE UNIT are re-wireable fuse specifically utilised in industrial, domestic and commercial electrical fittings ensuring power supply with no disturbance. The fuse unit are made of porcelain with parts made of copper and brass to ensure flawless power distribution.

Specifications:

Standard Ratings : 16A, 32A, 63A, 100A, 200A, 320A

500A

Rated Voltage : 240 /415V Rated Frequency : 50Hz Reference Standard : IS 2086:1993







Soldier BUSBAR CHAMBERS are the metallic strips or bars, housed inside the switchgear, panel boards and busway enclosures for high current power distribution and ensure straight forward network configurantion. The main purpose of using is it to conduct a substantial current of electricity.

Benefits & Features:

- Has high short- circuit strength and low fire load.
- Ratings: 32A, 63A, 100A, 200A, 320A, 400A.
- Aesthetic step design for busbar holder.
- High conductivity copper busbar made from ETP.
- Ample wiring space for safe & reliable power distribution.
- Rated frequency: 50Hz
- Light grew texture finish powder coating.
- Covers are detachable and PVC gasket packing for weather proofing.
- Fully Powder coated in 60 micron powder coating thickness.
- Sheet metal enclosures undergo 8 tank phospating process to ensure anti-rust conditioning superior finish and lasting strength.

Efficient & Safer

DISTRIBUTION BOARD'S

Soldier distribution boards make an essential part of any circuit in your homes, offices or any other place. They serve an important purpose and cannot be ignored at any cost. One of the most important devices, they make sure that the current is properly distributed to all the devices allowing proper functioning. This also makes sure that none of the devices suffer from the effects of over currents or short circuits.

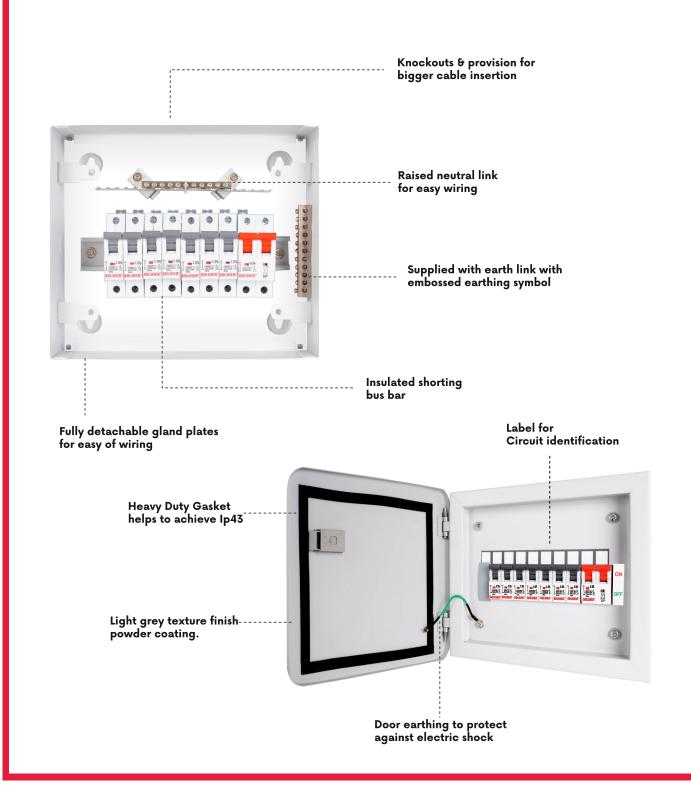
Soldier distribution boards are manufactured with precision and high quality metal sheets that also ensures anti - rust powder coating that provides a long lasting strength and blends aesthetic, safety and quality.

The Soldier range of distribution boards are elegant when it comes to their looks. They fit in perfectly with the interiors of your homes, adding to the aesthetics. Available in different colors, the designer DBs serve a dual purpose. They not only save you from the harmful effects of current but also make your walls magnificent. The horizontal and vertical DBs give you the flexibility to choose the ones that are right for you.

Safety re-defined

Revolutionize your home with our

Distribution Boards for unparalleled safety and efficiency.

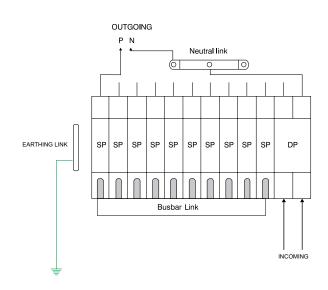


PLATINUM DISTRIBUTION BOARD



Features:

- Conforms to IS/IEC 13032:1991
- Range available 4, 6, 8, 10, 12 & 16 ways
- Available in both SPN & TPN
- Suitable for Flush and Surface mounting
- IP 43 protection for double door Dbs
- IK 09 for double doors Dbs
- Available in CRCA sheet steel with anti-corrosive powder coating for superior finish
- Ready to use DBS with 100A insulated busbar, neutral link bar, earth bar blanking plates
- Provision for DP MCB/Isolators/RCCB as Incomer and SP MCB as outgoings



Please note: Wiring of electrical products should be done by trained professionals following all safety norms.

ULTRA DISTRIBUTION BOARD

Soldier Distribution Boards are specially designed to meet the requirements of all segments. These Boards are equipped with top and bottom removable gland plates with adequate number of knock outs, which enable easy installation and connection of conduits of all sizes. These distribution boards are designed that ensure easy installation with sturdy colour and impeccable protection. These Distribution Boards undergo a seven tank phosphating process to ensure an anti rust conditioning, superior finish and long lasting strength.

Features:

- Conforms to IS/IEC 13032:1991
- Range available 4, 6, 8, 10, 12 & 16 ways
- Available in both SPN & TPN
- Suitable for Flush and Surface mounting
- IP 43 protection for double door Dbs
- IK 09 for double doors Dbs
- Sheet metal enclosures undergo 8 tank phosphating process to ensure anti-rust conditioning superior finish and lasting strength
- Ready to use DBS with 100A insulated busbar, neutral link bar, earth bar blanking plates
- Provision for DP MCB/Isolators/RCCB as Incomer and SP MCB as outgoings



SINGLE DISTRIBUTION BOARD

Soldier Distribution Boards are specially designed to meet the requirements of all segments. These Boards are equipped with top and bottom knock outs, which enable easy installation and connection of conduits of all sizes. These distribution boards are designed that ensure easy installation with sturdy colour and impeccable protection. These Distribution Boards undergo a seven tank phosphating process to ensure an anti rust conditioning, superior finish and long lasting strength.

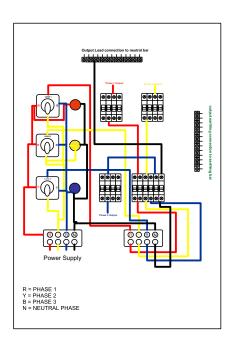
Features:

- Conforms to IS/IEC 13032:1991
- Range available 4, 6, 8, 10, & 12 ways
- Available in SPN
- Suitable for Flush and Surface mounting
- Sheet metal enclosures undergo 8 tank phosphating process to ensure anti-rust conditioning superior finish and lasting strength
- Ready to use DBS with 100A insulated busbar, neutral link bar, earth bar blanking plates
- Provision for DP MCB/Isolators/RCCB as Incomer and SP MCB as outgoings



PHASE SELECTOR DB'S















Soldier Phase selector distribution boards are a type of TPN distribution board. A phase selector distribution board is equipped with three rotary switches each connected to one of the three incoming phases. Each single phase load is then distributed over the three outgoing phase connections. The phase selector distribution boards are mainly used to prevent the problem of phase cuts.

Features:

- Conforms to IS/IEC 13032:1991
- Range available 4, 6, 8 ways
- Suitable for Flush and Surface mounting
- IP 43 protection for double door Dbs
- IK 09 for double doors Dbs
- Available in CRCA sheet steel with anti-corrosive powder coating for superior finish
- Ready to use DBs with 3 nos. 63A Rotary switches (with wiring),
 3 nos. Indicator for phase identification, 100a insulated busbar,
 earthing bar, blanking plates.
- Provision for DP MCB/Isolators/RCCB as Incomer and SP MCB as outgoings
- Light grey texture finish powder coating.

PHASE SELECTOR

Soldier phase selector board's provide flexibility in selecting and interchanging the phase in case there is power outage in one phase.

Benefit & Features:

- Suitable for surface & Flush mounting.
- Sufficient space for wiring.
- Pre-wiring with fitted rotary switch available.
- Available in both SPN & TPŃ.
- Ratings: 40A & 63A



AC DISTRIBUTION BOARD

Soldier ac distribution board are aesthetically designed & highly durable with great functioning metal clad plug & sockets and is suitable for the protection of applications like AC, Geyser etc.

Benefit & Features:

- High quality brass parts used for better conductivity.
- Conduit knockouts provided for different size cable connection.
- Provision of earthing terminal.
- Equipped with neutral link.
- Sockets made of almunium to provide high insulation as well durability.



CAM OPERATED ROTARY SWITCH

CAM operated rotary switches are used to make or break operation in a sequential way by rotating the switch to different positions. The basic operating mechanism of Cam Switch is required to suit intended application coupled with "Quick-Make", "Quick-Make-Quick-Break" and "Spring Return" operating mechanisms are offered to cover wide range requirements.

Benefit & Features:

- Making & breaking of contacts.
- Silver tipped contacts that ensures high durability.
- Flame retardant housing.
- Suitable for industries as well as domestic purpose.
- Ratings : 40A, 63A & 100A



REVERSE FORWARD SWITCH

Soldier reverse forward switch is an electric switch that is capable of being connected in pairs in two different ways to reverse the flow direction of current.

Benefit & Features:

- Compact and Aesthetic Design.
- Housing made from high quality steel.
- Manufacturing of Bakelite block through CNC moulding.
- 99.99% ETP (Electrolytic Tough Pitch) copper used in static and moving parts.



MODULAR AC BOX | 4M

Soldier modular ac distribution board are aesthetically designed & highly durable with great functioning mini mcb with socket & Plug Top.

Benefit & Features:

- Compact and Aesthetic Design.
- Overload and short circuit protection.
- ISI Marked Mini MCB with short circuit breaking capacity
- Easy to Operate and Replace.
- Available with 25A MCB + 25A Socket & 16A Plug Top.



METAL PLUG & SOCKET

Soldier metal clad plug & socket are made out of non corroding die cast Alumunium alloy and are designed to avoid accidental finger contact with live parts and are provided with scraping earth feature to ensure earth connection are made first and break last. Sockets are provided with protective cap to ensure safety when not in use.

Benefit & Features:

- Outer casting made of non corroding die cast aluminium.
- Floating contacts for self aligning to facilitate smooth plugging.
- Provides protection to incoming cables.

 Designed to avoid accidental finger contact with pins.
- Available in 20A 2P, 20A 3P, 32A 3P.



KWH STATIC METER'S

Soldier static meters are manufactured in a state of the art ISI certified facility. These meters delivers high accuracy readings and have a robust design. Our meters provide allow cost solution for better energy measurement. An effective resolution of 0.005 is provided so that even a small amount of energy will not be left unmetered. The meters are designed around a robust electronic circuiting The meters are available in both single and three phase range to suit the varying customer demand.



Range 5-30A, 10-40A. Class 1.0 accuracy as per IS 13779. Phase available indication provided. Anti temper features.

Operating temperature - 25°C to + 50°C

Frequency 50Hz

Available in Both LCD & Analog

Single Phase Static Meter (SILVER)



Single Phase Static Meter (GOLD)

• Range 5-30A, 10-40A.

Class 1.0 accuracy as per IS 13779.

Phase available indication provided.

• Anti temper features.

Operating temperature - 25°C to + 50°C

Frequency 50Hz

Available in Both LCD & Analog



Single Phase Static Meter (MULTIFUNCTION)

Range 5-30A, 10-40A.

Class 1.0 accuracy as per IS 13779.

• Phase available indication provided.

• Anti temper features.

Operating temperature - 25°C to + 50°C

• Frequency 50Hz

Battery backup to take unit readings even during power
out.

• Voltage reader & Ampere reader.

Backlit Lcd display that makes easier to read readings.



• Range 10-40A, 10-60A.

Class 1.0 accuracy as per IS 13779.

Phase available indication provided.

Anti temper features.

Operating temperature - 25°C to + 50°C

Frequency 50Hz

Available in Both LCD & Analog

Multifunction meters are also available.

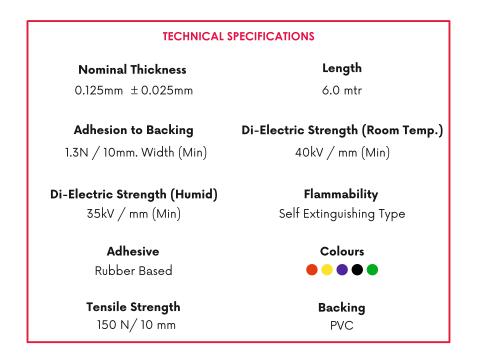


SELF ADHESIVE PVC INSULATION TAPE



0.125mm X 16mm X 6mtr

Soldier PVC Insulation Tape, with its outstanding specialized adhesive delivers unmatched performance. Its high tensile strength gives the additional benefit of excellent properties.







Please Note: For best result we recommend applying to surface that is clean, dry, smooth & free from dust, oil or any other contaminants.

Unmatched quality Exceptional performance

As a professional of low voltage products Soldier has established itself by experience of many years and workmanship. Committed to quality and safety we are recognized as a leading manufacturer in Low voltage switchgear products.

All our products are designed for extreme endurance and raw materials are chosen to withstand arduous conditions.

Today Soldier Stands for Quality, Safety and Reliability.



MCB | ISOLATOR | CHANGEOVER SWITCH | SWITCH FUSE UNIT



RCCB | KWH STATIC METER | DISTRIBUTION BOARDS





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