

CLIPSAL



Official Provider of Electrical Accessories & Building  
Automation to the Sydney 2000 Olympic Games

Number 1, 2000

# new products bulletin

featuring:

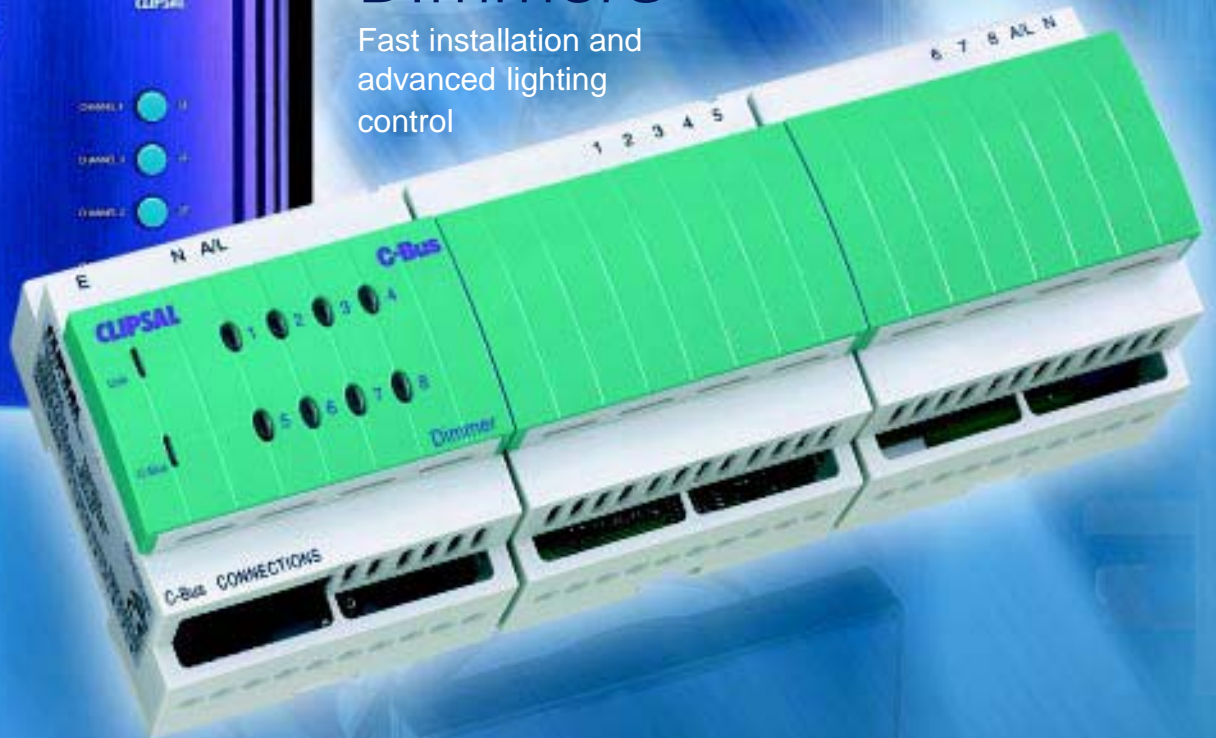


INTEGRATED SYSTEMS

[clipsal.com](http://clipsal.com)

## C-Bus DIN Rail Series & Professional Series Dimmers

Fast installation and  
advanced lighting  
control




INDUSTRIAL



DATACOMMS



ELECTRICAL ACCESSORIES



6ADX Series  
Soft Starters



Patch by  
Exception



DC Lifesaver  
Smoke Alarm



PROVIDER

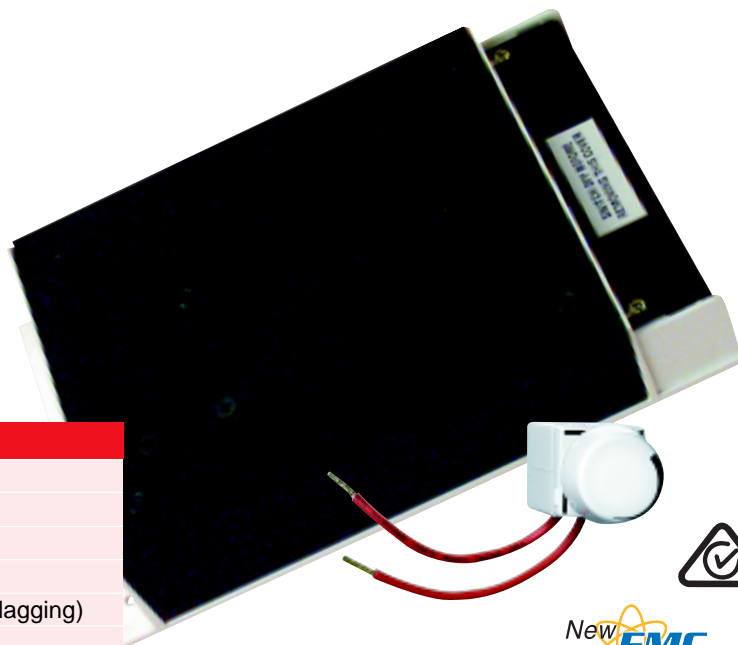
# High Power Dimmers are now EMC Compliant

Clipsal's High Power Dimmer Range is back, and this time it's 100% EMC compliant.

High Power Dimmers are housed in a neat, compact enclosure that measures just 250mm x 150mm x 55mm, yet packs a powerful punch with 2400VA capacity. Each dimmer is supplied with a controller, which fits into any Clipsal 30 Series aperture.

The range is suitable for incandescent and low voltage lighting in domestic and commercial applications.

Electrical Specifications	
Nominal operating range	220-240V~, 50Hz
Minimum load	100 watts
Maximum ambient temperature	50°C
Maximum interconnection cable	100m (2.5mm <sup>2</sup> )
Current rating	10A (1.0 to 0.6PF lagging)
Catalogue number	32/2400
Description	High Power Dimmer, 2400VA



New **EMC** compliant

## The battery powered Lifesaver

To complement Australia's largest selling range of AC Smoke Alarms, Clipsal introduces the 755DC ionisation smoke alarm.

The Smoke Alarm features a test button, replaceable DC alkaline battery (supplied), easy to install mounting bracket, loud audible alarm, low profile design and insect resistant detection chamber.

The unit is designed to operate for up to two years before batteries need to be replaced.

<b>Cat. Number</b>	<b>755DC</b>
<b>Description</b>	DC Smoke Alarm, Ionisation







## *New looks for an old favourite*

**Polished Brass**

**Antique Brass**

**Florentine Bronze**

**Chrome**

**Timber  
Mounting Blocks**

### **Timeless Heritage now in three beautiful new colour schemes**

The elegance, charm and timeless appeal of the 1920's have resulted in painstaking restorations of homes from this era, as well as a growth in new homes with Federation styling. Due to this increase in popularity, we've added new colour choices to the Heritage switch and socket range. In addition to our exquisite Polished Brass Range, we now offer the old world charm of Antique Brass (AB), the rustic beauty of Florentine Bronze (FB), and for those who want to recreate the art deco era of the '20s and '30's, classic Chrome (CH).

### ***Chips off the old Blocks***

Mounting Blocks add the final authentic touch to any Heritage installation. The following products have recently been added to the range.

### ***Pre Drilled Mounting Blocks with Fixing Screws***

All Mounting Blocks are now pre-drilled to allow for easy mounting onto wall clips, brackets and wall boxes. Fixing screws are also supplied for all heritage Mounting Blocks, with the exception of Cat. No. 1920MBR and 1920MB1. Pilot holes have been provided in all Mounting Blocks to allow for fixing of all Heritage switches and sockets.

### ***Mounting Blocks without Holes***

All Mounting Blocks can also be ordered in a 'No Holes' version. This provides the added flexibility of customising Mounting Blocks to the needs of today's homes.

### ***Oval Mounting Block***

To add to the popular range of Mounting Blocks, we now offer the new Oval Shape 2 Gang Mounting Block. It is available pre-drilled or without holes and in all colour finishes.

### ***Undercoated Mounting Blocks***

Pre-sanded and Undercoated Mounting Blocks are now available. These blocks are even easier to paint than before, which enables home owners to precisely match the colour of the blocks with the home's decor.

*For a full list of all the new and existing  
Heritage products and pricing, refer to  
the latest Heritage brochure and  
February Trade Product Guide.*





# Ventilation *Italian Style*

## Additions to the Airflow O.erre Exhaust Fan Range

Airflow has now expanded on its superb range of imported Italian exhaust fans for the Australian market. In conjunction with O.erre, Airflow can now provide a fan for virtually any location that requires effective ventilation.

## Wall Exhaust Fans with Fixing Kits

These axial fans have grilles made in shining ABS material and are designed to extract air and fumes directly outside or, with the aid of a locking ring, into roof space. They are splashproof for use in areas of high humidity.

All fans (including existing models) come standard with Wall Fixing Kits that include flexible aluminium duct to fit various wall thicknesses, as well as rainproof shutters or grilles to keep draughts and vermin out when the fan is switched off.

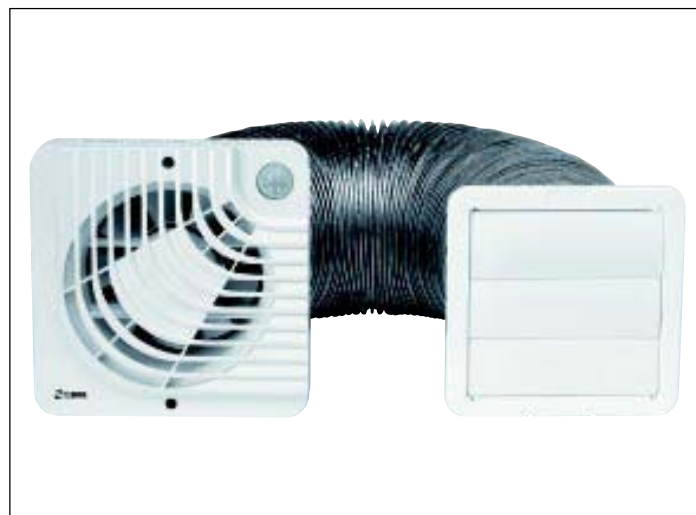
Wall Fans can also be ordered without wall kits. To order, simply place OW in place of WK. e.g. WK1570 becomes OW1570.

## Electronic Versions

To add even further flexibility to the wall exhaust range, Airflow can now provide Timer and Sensor models.

Timer versions can be adjusted to run from around 2 to 20 minutes.

Infrared Sensor versions start automatically when a presence is detected in a room.



Cat. No.	Description	Hole Ø	Perform	Watts
WK1570	Standard 10	100 mm	88m <sup>3</sup> /hr	21W
WK1612	Standard 15	150 mm	230m <sup>3</sup> /hr	36W
WK1414	Mini 10T (timer)	100 mm	85m <sup>3</sup> /hr	14W
WK1422	Mini 12T (timer)	120 mm	125m <sup>3</sup> /hr	21W
WK1216	Mini/Sensor 10	100 mm	85m <sup>3</sup> /hr	14W
WK1224	Mini/Sensor 12	120 mm	125m <sup>3</sup> /hr	21W
WK1851	Minimatic 10	100 mm	90m <sup>3</sup> /hr	14W
WK1869	Minimatic 10T (timer)	100 mm	90m <sup>3</sup> /hr	14W
WK8468	Minimatic 15T (timer)	150 mm	230m <sup>3</sup> /hr	45W



When the room is vacated, the sensor's timer takes control, keeping the fan operating for a preset time. The sensor operates in both dark and light areas with a radius of up to 8 metres. The OW1869, WK1869, OW8468 and WK8468 come standard with automatic opening shutters.

## Accessories

Additional accessories have been added to the ducting range to provide installers with added flexibility.



Cat. No.	Description
CED100/3	100 mm Flexible Aluminium Ducting - 3 metres. Complies to AS 4254
CED125/3	125 mm Flexible Aluminium Ducting - 3 metres. Complies to AS 4254
OW8146	100 mm Locking Ring to ceiling mount - 100 mm Standard, Mini and Minimatic Fans
OW8152	120 mm Locking ring to ceiling mount - 120 mm Standard, Mini, and Minimatic Fans
OW8005	External Grille to suit 100 mm ductwork
OW8021	External Grille to suit 125 mm ductwork
OW9078	External Grille to suit 150 mm ductwork
OW8013	External Gravity Shutter to suit 100 mm ductwork
OW8039	External Gravity Shutter to suit 125 mm ductwork
OW8047	Double Glazing Kits for all Ventilator models except OW197



## Cabinet Fans with IP Ratings

O.erre's Range of Systema Fans and return air vents and filter relieve the stress placed on switchboard components that are installed in hot or harsh environments.

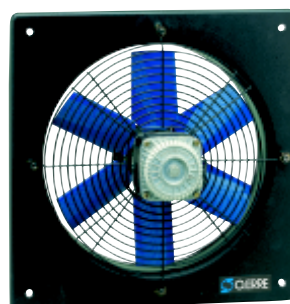
The IP44 to IP54 Rating and ball bearing motors ensure durability, with a minimum of 30,000 hours of continuous operation. The body and grille are made of self-extinguishing plastic material and the external grilles are slotted for draining. Filters can be cleaned and removed even while the fan is in operation.



Cat. No.	Description	Watts	Perform (m <sup>3</sup> /hr)
OW9763	Systema IP44 Cabinet Fan, return air vent and filter, 42m <sup>3</sup> /hr	15	42
OW9920	Systema IP54 Cabinet Fan, return air vent and filter, 85m <sup>3</sup> /hr	40	85
OW9813	Systema IP44 Cabinet Fan, r return air vent and filter, 360m <sup>3</sup> /hr	70	360

## Industrial Wall Plate Exhaust Fan increases in size.

Due to popular demand, we have introduced an O.erre industrial fan for Single Phase large ventilation areas. As with all EB Wall Plate Fans, this model comes with a safety grille which, like the frame, is made from steel and is protected by an epoxy based anti-corrosion paint safety grille. The impeller is made from ABS material, while the 4 pole induction motor class F is IP54 protected.



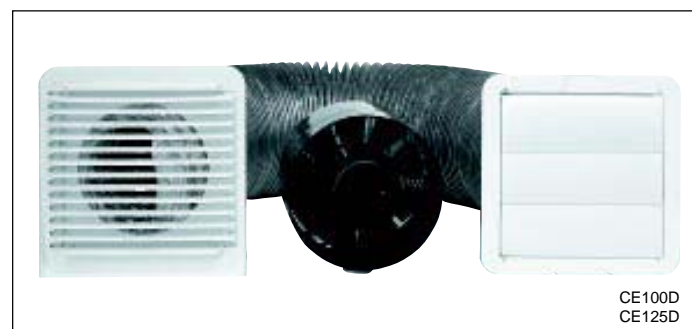
For added safety, a range of protection grilles and gravity shutters are also available. Please refer to the O.erre brochure and Trade Product Guide for further information.

Cat. No.	Description	Wattage	m <sup>3</sup> /hr
EB504M	Wall plate fan - IP54 single phase with nominal 500 mm fan. Height 630 x Width 630 x Depth 235 mm	230W	4500

## Airflow Ducted Exhaust Kit Expansion

Due to popular demand, Airflow have to decided to make the choice of Ducted in-line kits easier by adding 100mm, 125mm, 200mm and 250mm kits to the range. All ductwork complies to AS 4254.

Two new in-line fans, (OW1844 and OW1943) each with IP44 rated motors, can be purchased separately.



Cat. No.	Description	Watts	m <sup>3</sup> /hr
CE100D	100 mm fan with 3 metres of ducting, plus ducting accessories.	15	80
CE125D	120 mm fan with 3 metres of ducting, plus ducting accessories.	16	130
CE200D	200 mm fan with 6 metres of ducting, plus ducting accessories.	45	520
CE250D	250 mm fan with 6 metres of ducting, plus ducting accessories	70	876
OW1844	100 mm In-line axial fan for 100 mm duct	15	80
OW1943	120 mm In-line axial fan for 125 mm duct	16	80



# AIRFLOW<sup>®</sup>

## Sunshine Bathroom Heaters

are now even more brilliant



The Airflow Range has recently been streamlined and improved, and now consists of three superb models that look brilliant in any bathroom or en suite. All models have a 100 Watt incandescent globe that fills bathrooms with pure, even light, with two models also including a powerful exhaust fan that quickly removes all traces of steam and stale air. Models available:



### Threesome 6500A

Ideal in bathrooms with ceilings up to 2.4 metres (8 feet) in height.

#### Features:

- 4 x 275 Watt heat globes.
- Attractive, slimline design.
- 2 heat settings.
- An R80 100 Watt centre light for optimum brightness.
- Powerful exhaust fan.
- Clipsal 2000 Series wall switch included.
- Easy installation.

Also available with 875W lamps (6800A).

### En Suite 6600A

Stylish new design with improved lighting and a larger, more powerful exhaust fan. Ideal in small bathrooms or en suites with ceilings up to 2.4 metres (8 feet) in height.

### Petite 6601A

Stylish new design with improved lighting. Ideal in small bathrooms/en suites, walk-in-robos and dressing rooms with ceilings up to 2.4 metres (8 feet) in height.



#### En Suite 6600A

##### Features:

- 2 x 275 Watt heat globes.
- Attractive design.
- Economical operation.
- New design with one 100 Watt globe for improved brightness.
- A more powerful exhaust fan for 100% increased air-flow over previous model.
- Clipsal 2000 Series wall and architrave plates included.
- Easy installation.

#### Petite 6601A

##### Features:

- 2 x 275 Watt heat globes.
- Attractive design.
- Economical operation.
- New design with one 100 Watt globe for improved brightness.
- Clipsal 2000 Series wall and architrave plates included.
- Easy installation.

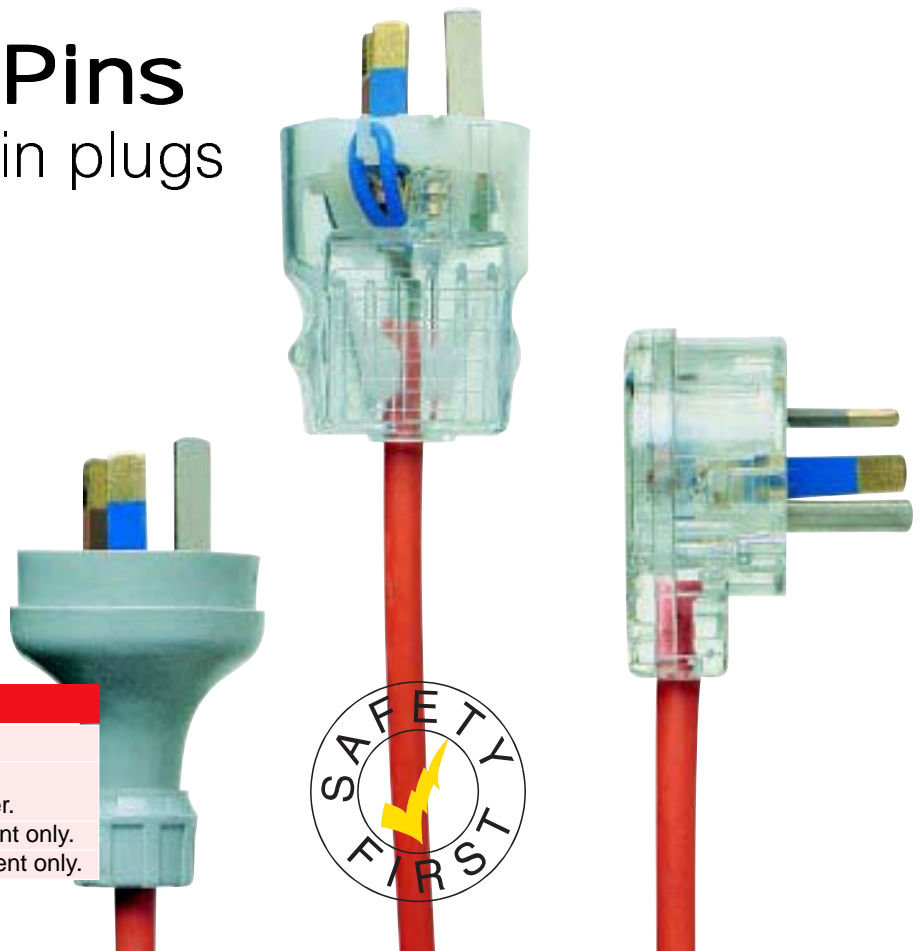
# New Safety Pins

## Clipsal insulated pin plugs

The success of the Clipsal 1439 Series has led to an expansion of the insulated pin range. This unique safety feature has now extended to 418 Series side entry plugs and 439 Series Flexible Plugs. Clipsal plugs are the first to offer the extra safety of insulated pins in the flat pin configuration, which will be required by law on all plugs within the next 5 years. The unique Clipsal design provides full protection against accidental pin contact, without increasing the size of the pins or affecting plug operation in any way. The insulation is robust and resilient and colour coded to further assist correct wiring.

### Range:

<b>418 Series</b>	Side entry plugs - all colours.
<b>439 Series</b>	Flexible plugs - grey only. Other colours available to special order.
<b>1439 Series</b>	Quick connect plugs - transparent only.
<b>1439HD Series</b>	Quick Connect Plugs - transparent only.



# The new thin twins

COMING SOON

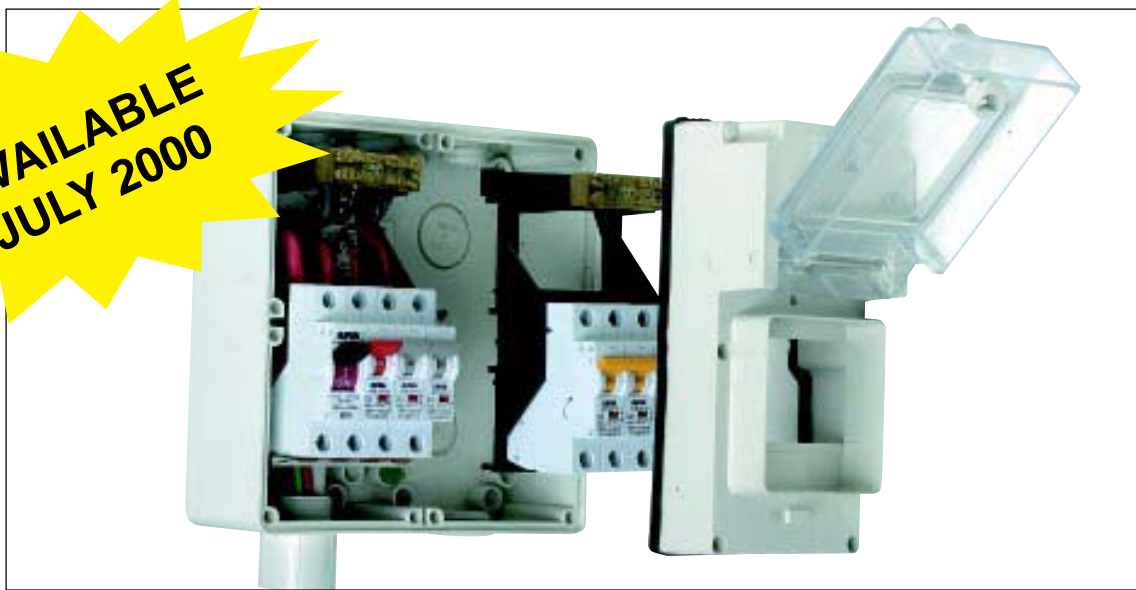


4mm of elegance & innovation.

# 56 Series has circuit breakers covered

*Clipsal Industrial's 56 Series covers make installation fast, safe and simple.*

**AVAILABLE  
JULY 2000**



It is 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). And you can make your own switchboard by fixing 4 module devices together.

#### Extra features.

- 4 modules wide to suit DIN Rail RCDs, MCBs, MCB/RCDs 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.
- Time saving drop in cradle for easier cable installation.
- 563/10 Earth and Neutral terminator accommodating 3 x 6mm<sup>2</sup> cables.

Cat. No.	Desc.
<b>56RC4N</b>	Cover assembly 4 Modules Full DIN complete with Neon (IP66). Available in (GY) and (RO). Suitable for Wilco and Clipsal RCDs and accessories.
<b>56SB4</b>	Consumer switchboard 4 Modules Full DIN with Neutral Bar and Earth Connector (IP66). Available less enclosure (LE) in GY and RO.
<b>56SBLK</b>	Field fittable Key Lock Kit available for 56SB4.

**Dimensions: 204H x 101W x 140(125)D**

#### Choice of covers:



#### 56RC4N

**Cover 1** - Features a spring loaded transparent flap and uniquely designed mounting bracket. Also comes with power available neon.



#### 56SB4

**Cover 2** - Features a lockable cover for padlocking up to 7mm diameter clasp. Full size heavy-duty neutral bar to accept 1 x 35sq.mm, 4 x 16sq.mm and 1 x 35sq.mm. Specially raised above the base for easy termination.



# Heavy armoured J-Box

Junction Box for steel wired armoured applications.

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 3 x 563G2 Active Terminals, 1 x 563N10 Neutral Terminals and 1 x 563E10 Earth Terminals (suitable for 3 x 6sq.mm). The box also comes with 3 x 20mm screwed conduit entries complete with blanking plugs.

**Dimensions: 107H x 101W x 90D**

Cat. No.	Desc.
56JB1SWA	Available in GY and RO



**NOTE:** Comes complete with cover, glands sold separately.

## Don't let your buttons come undone

Protect them with this new silicon rubber boot



Coming soon - a translucent silicon rubber boot than can be fitted to the 6 Series 40mm diameter Mushroom Head Push-Buttons for complete protection. The new covers are ideal in mining applications, where dust, water, mud and slurry can sometimes damage the push-button mechanisms.

### The new boots fit onto the following mushroom-head push-buttons:

<b>6PBMM404</b>	Spring Return Mushroom-Head Actuator
<b>6PBMM404</b>	Latching, Twist to Reset Mushroom-Head Actuator
<b>6PBMM404ES</b>	Latching, Twist to Reset Mushroom-Head Actuator, engraved 'EMERGENCY STOP'
<b>6PBMMPP404</b>	Latching, Pull to Reset Mushroom-Head Actuator
<b>6PNM404</b>	Illuminated, Spring Return Mushroom-Head Actuator

Note: The only buttons that the boot cannot be fitted to are the 6PBPSL404 (Snap action), 6PBMMK404 (Key reset) and the 6PBMM604 (60mm diameter).

# 4 SERIES circuit protection

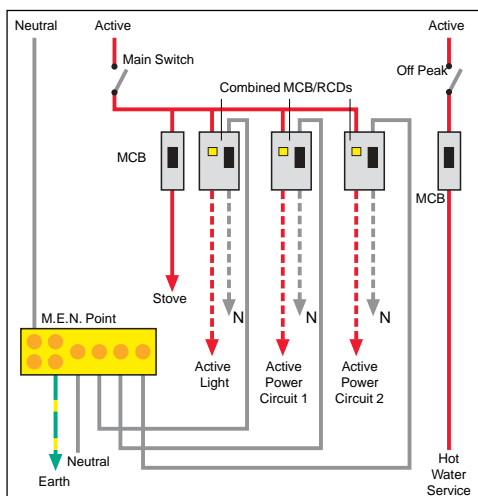
## and a few tips for avoiding customer call-backs.

The new AS/NZS3000 Wiring Rules mean you could be installing a lot more safety switches from now on. Residual Current Devices (RCDs) must be fitted for all lighting and socket outlets in new domestic and residential developments.

But simply installing an RCD is often only part of the solution. The electrical contractor with the new rules must give a duty of care when making recommendations to a customer. And there's a few things to consider before you can give the best advice.

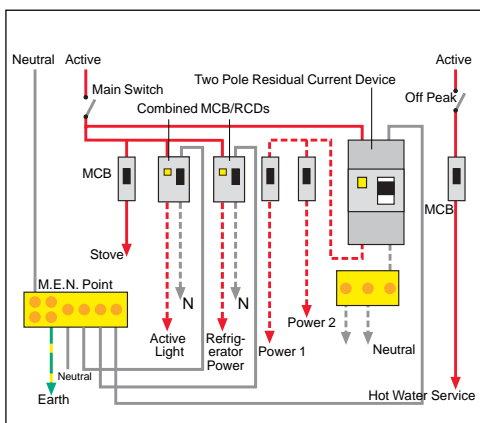
For instance, a single RCD for everything in the house leaves the switch vulnerable to regular nuisance tripping. Which means everything goes off at once - including the contents of the fridge. Not to mention the hazard of resetting the switch in the dark. Unsatisfied customers and annoying call-backs will almost certainly follow. So here's a few tips to save you the hassle.

**Tip 1** - One solution is to install a separate MCB/RCD combination on each circuit. It allows a single RCD to trip without impacting on the entire installation, although the material costs can be higher.

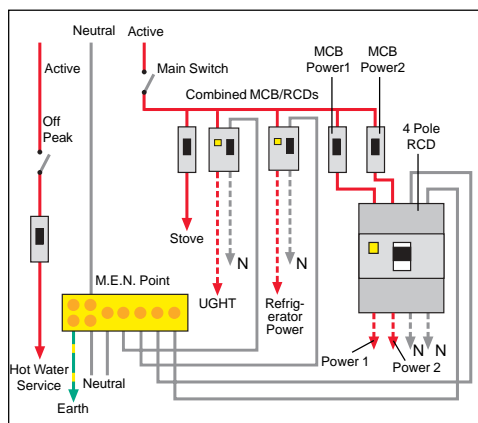


Individual GPO and lighting circuits protected by combined MCB/RCD

**Tip 2** - A less expensive option is to install an MCB/RCD combination on each light and/or refrigerator circuit and the remaining socket outlets on a common RCD. It's a cost-effective way of having safe, discriminating residual current protection.



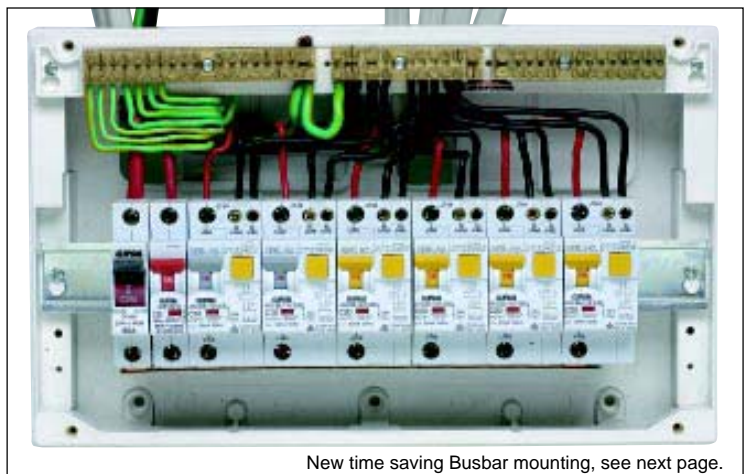
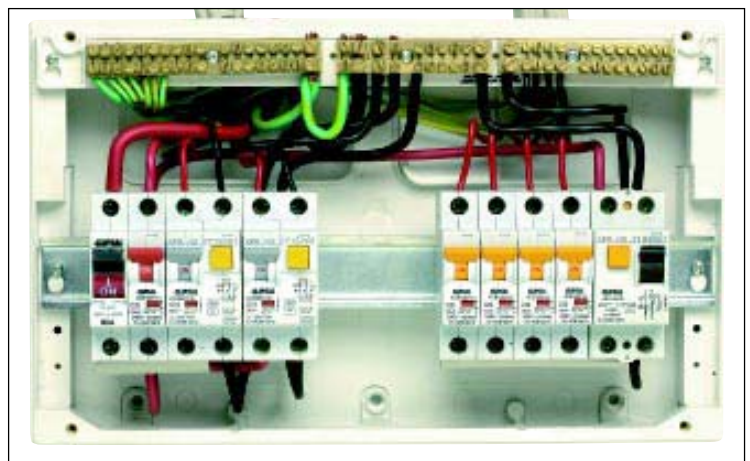
Multiple GPO circuits protected by 2 pole RCD and lighting combination RCD/MCB



Two GPO circuits protected by 4 pole RCD and/or refrigerator circuits protected by combination RCD/MCB

**Tip 3** - Another way is to install the unique G-Type RCD. Using a 10 millisecond time delay the G-Type RCD monitors residual current and trips the switch only when it needs to, reducing nuisance tripping. Surge protected to 3000A, the G-Type RCD will not trip on a short spike in power supply.

But the best advice we can give you is to always use quality products. Here are some new products which form part of Clipsal's extensive 4 Series Power Range to help with your selection.



New time saving Busbar mounting, see next page.

### Installation and wiring options

There are a number of types of RCDs that provide overall protection to an installation.

All Clipsal RCDs are available as G-Type, which have additional protection against unwanted tripping. Contact your Clipsal Representative for more information.



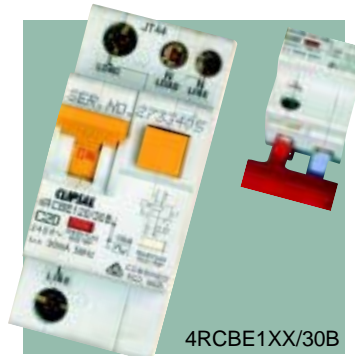
# Time saving

## electronic MCB/RCD for busbar mounting

This is a newly developed product designed for continuous busbar mounting on the line side of the device. Plus, all out going circuits appear at the top of the device enabling quick, easy and safe circuit termination.

### Special features:

- Combined residual current and circuit breaker protection.
- 10kA interruption capacity with 30mA residual current for outstanding protection.
- Fast fault finding indicator shows both RCD and MCB trip.
- Unique serial number for faultless identification.
- Complies with Australian standards AS/NZS 1009.
- Colour coded dollies for fast visual current rating identification.
- Individual circuit discrimination reduces nuisance tripping.
- Compatible with Clipsal 4SWLD and 4LD lock off devices.
- Standard power range features like large terminal bores, super fast reaction times, cog rails and backed off terminal screws.



4RCBE1XX/30B

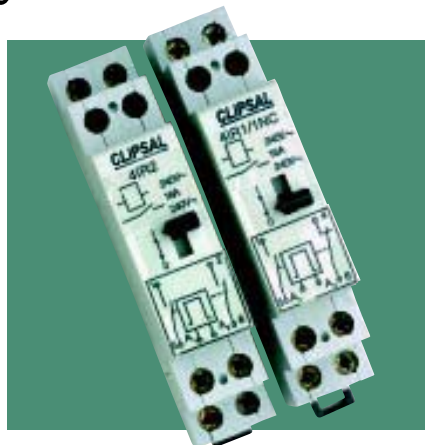


4RCBE2XX/30

Cat. No	In	U	B.C.	R.C.	No.M	No.P	Cable Size	Colours
4RCBE110/30B	10A	240V	10kA	30mA	2M	1P	2 x 25sq.mm + 2 x 16sq.mm	Grey dolly
4RCBE116/30B	16A	240V	10kA	30mA	2M	1P	2 x 25sq.mm + 2 x 16sq.mm	Blue dolly
4RCBE120/30B	20A	240V	10kA	30mA	2M	1P	2 x 25sq.mm + 2 x 16sq.mm	Yellow dolly
RRCBE125/30B	25A	240V	10kA	30mA	2M	1P	2 x 25sq.mm + 2 x 16sq.mm	Black dolly
4RCBE132/30B	32A	240V	10kA	30mA	2M	1P	2 x 25sq.mm + 2 x 16sq.mm	Red dolly
4RCBE140/30B	40A	240V	10kA	30mA	2M	1P	2 x 25sq.mm + 2 x 16sq.mm	Orange dolly
4RCBE210/30	10A	240V	10kA	30mA	2M	2P	25sq.mm	Grey dolly
4RCBE216/30	16A	240V	10kA	30mA	2M	2P	25sq.mm	Blue dolly
4RCBE220/30	20A	240V	10kA	30mA	2M	2P	25sq.mm	Yellow dolly
RRCBE225/30	25A	240V	10kA	30mA	2M	2P	25sq.mm	Black dolly
4RCBE232/30	32A	240V	10kA	30mA	2M	2P	25sq.mm	Red dolly
4RCBE240/30	40A	240V	10kA	30mA	2M	2P	25sq.mm	Orange dolly

# Impulse

## Relays for multi-switch needs



Impulse relays are great for lighting that needs to be controlled from more than one location. Likewise they allow for starting motors from a number of push-button locations.

How they work: An impulse relay operates with an electromagnetic latching switch with open and closed contacts. Switching occurs through brief energisation of the coil. Manual operation is also possible.

### Coil Specifications

Coil power loss	11VA
Coil pick up power	14.5VA
Direct current dc	7.6W
Control Voltage	90-110
Range (as % of Un)	
Maximum coil holding time	1 hour

### Maximum lamp load

Incandescent lamps	3000W
Fluorescent compensated	(cos=0.9) 2500W
Series	
Compensated Parallel	2500W
Maximum cable termination	10sq.mm
Minimum cable termination	1.5sq.mm
Min/Max ambient temperature	-20degrees/ +45 degrees C

### Impulse Delays

Minimum impulse time	0.050s
Minimum impulse time	0.100s
Minimum time between impulses	0.150s
Maximum number of impulses per minute	250

### Rated Current

250Vac	16A
30Vdc	16A
Width	1M

Cat. No	I(A)	Coil(V)	No. of Contacts
4IR1	16	240	1NO
4IR2	16	240	2NO
4IR1/1NC	16	240	1NO/1NC
4IR1AC24	16	24	1NO
4IR2AC24	16	24	2NO
4IR1AC12	16	12	1NO
4IR2AC12	16	12	2NO

# Make light work of heavy duty connections

## 3PV SERIES plugs & sockets



The 3PV Series Range of Couplers consists of 3-phase, high performance plugs and sockets for heavy duty industrial applications.

There are 250, 400, 640 & 800A models, all ideal for use as feeders for portable equipment or wherever high power is required in an industrial environment.

The plugs and sockets are housed in lightweight, tempered cast aluminium with Neoprene rubber gaskets and seals.

### Features:

- Very high insulation voltage ensures durability and high insulation properties
- Maximum operational voltage 3.3kV ~
- Pilot circuit amperage 2 x 20A
- Contact resistance of 1mV ensures very low contact losses
- Strong, lightweight housings of tempered cast Aluminium
- Neoprene rubber seals for IP67 rating
- All fasteners are Stainless Steel grade 316
- Pin retainers of glass fibre reinforced high-temperature material
- The long and short Pin Retainers are interchangeable in the Plugs and Sockets
- Silver plated Copper alloy Contact Pins
- Detachable cable terminals, compression (crimp) type
- All contact Pins are floating and self locating to avoid stressing the Pin Retainers
- The 'male' Contact Pins are fitted with an insulated tip for IP20 'finger proof' rating when fitted in its Pin Retainer
- The two late make, early break 20A Pilot Contacts fitted as standard are ideal for electrical interlocking (control of the upstream feeder)
- Two extra auxiliary 20A Contact Pins can be fitted to the 4 pole versions for signal transmission, control or low power circuit applications



# The easiest way to prevent expensive motor damage

## Soft Starters

### 6ADXM

#### **Small in size, big on features!**

6ADXM Soft Starters reduce the mechanical load on motors, shafts, gearboxes and drive belts, substantially increasing their working life.

Very easily installed and set up, they are compact, DIN rail mountable and suitable for 3 phase motors up to 11kW (415V) with rated load currents of up to 25A.

Starting/stopping times and initial torque can be independently adjusted by using the built-in potentiometer.

The soft stop feature can be disabled by selecting a zero ramp down time.

#### **Features:**

- Compact size
- Easy to set up
- 12 and 25A
- DIN rail mountable
- Soft start and soft stop standard
- Multivoltage control
- Integrated by-pass relay

#### **Models**

<b>6ADXM12B</b>	5.5kW	12A	415VAC
<b>6ADXM25B</b>	11.0kW	25A	415VAC

#### **Applications:**

Ideal for conveyor belts, compressors, fans, pumps, hoisting devices, blowers, mixers, etc.

### 6ADX

#### **Easy to use in anyone's language!**

The 6ADX Series consists of reduced voltage soft starters with torque control, maximum starting current limit and multi-language display. Easy to install and set up, they are used for reducing stresses in asynchronous three-phase squirrel-cage motors that start and stop regularly.

The 6ADX...B versions include an integrated bypass contactor which drastically limits power loss. This reduces the need for forced cooling and therefore allows a smaller sized panel to be used.

#### **Features:**

- Easy to set up
- Liquid crystal, backlit, two line, 16 character display
- Basic Advanced and Function programming menus
- Keypad stop start
- Motor and mains parameter readings
- Communications via RS232 and RS485
- Events logging and downloading
- Multi language capability
- Clock calendar with battery back up

#### **Models**

6ADX...B Series with internal by-pass contactor  
11 Models in just 3 frame sizes from 6ADX17B 7.5W (17A) up to 6ADX245B 132kW (245A)

6ADX...Series with out internal by-pass contactor  
7 Models in 3 frame sizes from 6ADX310 160 kW (310A) up to 6ADX1200 630kW (1200A)

For more information on this range, please refer to the new 6 Series Soft Starter brochure



# A new round of 7 Series Rotary Cam Switches

Clipsal's popular 7 Series Cam Switches Range is now bursting at the seams after the addition of three new ranges plus extensions to our existing ranges.

The three new ranges (10A, 80A and 125A) are available in the following standard configurations:



10A



80A



125A

Cat. No.	Description
7GF10/54/U	1 Pole 10A 90 Changeover Switch 1-2
7GF10/D90/U	1 Pole 10A 60 Isolating Switch OFF-ON
7GF10/D91/U	2 Pole 10A 60 Isolating Switch OFF-ON
7GF10/D10/U	3 Pole 10A 60 Isolating Switch OFF-ON
7GF10/51/U	1 Pole 10A 60 Changeover Switch 1-O-2
7GF10/D51/U	1 Pole 10A 60 Changeover Switch MAN-OFF-AUTO
7GF10/52/U	2 Pole 10A 60 Changeover Switch -1-O-2
7GF10/D52/U	2 Pole 10A 60 Changeover Switch MAN-OFF-AUTO
7GF10/D53/U	3 Pole 10A 60 Changeover Switch MAN-OFF-AUTO
7GF10/53/U	3 Pole 10A 60 Changeover Switch 1-O-2
7GF10/11/U	3 Pole 10A 60 Reversing Switch 1-O-2
7GF10/D11/U	3 Pole 10A 60 Reversing Switch FWD-OFF-REV
7GF10/66/U	10A Voltmeter Switch Ph-PH & Ph-N
7GF10/67/U	10A-Volt-O/L 1-L2/L2-L3/L3-L1
7GF10/68/U	10A-Volt-O/L1-N/L2-N/L3-N
7GF10/C98/U	10A-3 current Ammeter CT oper.
7G80/10/U	3 Pole 80A 60 Isolating Switch O-1
7G80/D10/U	3 Pole 80A 60 Isolating Switch OFF/ON
7G80/53/U	3 Pole 80A 60 Changeover Switch 1-O-2
7G80/D53/U	3 Pole 80A 60 Changeover Switch-MAN/OFF/AUTO
7GN125/10/U	3 Pole 125A 60 Isolating Switch O-1
7GN125/D10/U	3 Pole 125A 60 Isolating Switch - OFF/ON
7GN125/53/U	3 Pole 125A 60 Changeover Switch 1-O-2
7GN125/D53/U	3 Pole 125A 60 Changeover Switch - MAN/OFF/AUTO

The following products are additions to the existing 7 Series Cam Switches Range:

7GN12/11/U	3 Pole 12A 60 Reversing Switch 1-O-2
7GN12/D11/U	3 Pole 12A 60 Reversing Switch FWD/OFF/REV
7GN12/D52/U	2 Pole 12A 60 Changeover Switch MAN/OFF/AUTO
7GN12/D53/U	3 Pole 12A 60 Changeover Switch MAN/OFF/AUTO
7GF20/D52/U	2 Pole 20A 60 Changeover Switch MAN/OFF/AUTO
7GF20/D53/U	2 Pole 20A 60 Changeover Switch MAN/OFF/AUTO
7GN25/51/U	1 Pole 25A 60 Changeover Switch 1-O-2
7GN25/D51/U	1 Pole 25A 60 Changeover Switch MAN/OFF/AUTO
7GN25/52/U	2 Pole 25A 60 Changeover Switch 1-O-2
7GN25/D52/U	2 Pole 25A 60 Changeover Switch MAN/OFF/AUTO
7GN25/53/U	3 Pole 25A 60 Changeover Switch 1-O-2
7GN25/D53/U	3 Pole 25A 60 Changeover Switch MAN/OFF/AUTO
7GN25/11/U	3 Pole 25A 60 Reversing Switch 1-O-2
7GN25/D11/U	3 Pole 25A 60 Reversing Switch FWD/OFF/REV
7GN32/53/U	3 Pole 32A 60 Changeover Switch 1-O-2
7GN32/D53/U	3 Pole 32A 60 Changeover Switch MAN/OFF/AUTO
7GN32/11/U	3 Pole 32A 60 Reversing Switch 1-O-2
7GN32/D11/U	3 Pole 32A 60 Reversing Switch FWD/OFF/REV
7GN32/52/U	2 Pole 32A 60 Changeover Switch 1-O-2
7GN32/D52/U	2 Pole 32A 60 Changeover Switch MAN/OFF/AUTO
7GN63/D90/U	1 Pole 63A



New  
**CLIPSAL**  
products

# Safe Bets *for Hazardous Locations*



Emergency Exit Light (EXDN Series)

**EXDN110** - 1 x 10W PLC Maintained  
**EXDN210** - 2 x 10W PLC Sustained  
Suitable for use in Hazardous Locations  
and DIP areas - Zones 2, 21 & 22  
Complies with AS/NZS 2293 for Exit signs.  
Exn IIC DIP IP66  
All gear integral



Street Light (SLXN Series)

**SLXN70HPS**  
**SLXN70MH**  
**SLXN80MV**  
Suitable for use in Hazardous Location  
areas - Zone 2  
Exn IIC IP55  
All gear integral



Small Bulkhead (BSDN Series)

**BSDN118 PLC**  
**BSDN218 PLC**

Suitable for use in Hazardous Locations  
and DIP areas - Zones 2, 21 & 22  
Exn IIC DIP IP66  
All gear integral  
Low Profile Hi-Impact Resistant



Key Operated Switch (FCSOA Series)

**FCSOA-8**  
Suitable for Hazardous Locations areas  
Zone 1  
Exd IIB IP66  
Key removable in various positions



A4 Industrial Glands

These Glands are an addition to the Industrial Gland range and suit EMC cables, especially Olex Varolex Cable. This Nickel plated brass gland offers the IP66 seal on the outer sheath as well as a lead clamping cone on the tape screen for earth continuity without tearing the tape screen. Glands are available in 10 sizes to suit cable from 1.5 mm<sup>2</sup> to 300 mm<sup>2</sup>.



**CLIPSAL**  
**HomeSafe™**  
 The Complete Home Security System

## More bad news for intruders - Clipsal's HomeSafe Security System



A comprehensive catalogue is available  
 from your nearest Clipsal office.



Electrical contractors agree, the Clipsal range of security and access control products combine quality and affordability. Clipsal HomeSafe is a complete security package for residential and commercial installations.

The base controller allows for up to 8 detection zones and has a keypad, heavy-duty battery backup and onboard dialler compatible with most monitoring companies.

The range of high quality motion detectors feature frenal lenses, infrared technology, corner detectors (90°) and ceiling mounts (360°). Dual detectors use microwave and infrared technologies. And a mounting bracket is available for neat installation.

The access control system features keyless coded entry for outstanding security and convenience for studies, cellars and commercial offices.





# Advanced C-Bus



This second generation of C-Bus products is brimming with new features. Designed for easier installation and faster programming, each DIN Rail unit combines:

- 12M width and designed to fit into a standard switchboard
- 70% less volume than previous generation C-Bus products
- High density switching modules, 12 channels for relays and 8 channels for dimmer products
- A software selecting Network Burden and System Clock
- Relay modules incorporating magnetically latching relays
- Load, unit and C-Bus status indicators

Cat. No.	Desc.
5512RVF	12 Channel Relay, 10A, 200mA Power Supply
5512RVFB	12 Channel Relay, 1A, 200mA Power Supply
5512RVFP	12 Channel Relay, 10A
5512RVFBP	12 Channel Relay, 1A
5508D1A	8 Channel Dimmer, 1A, 200mA Power Supply
5508D1AP	8 Channel Dimmer, 1A

*Some models also feature a 200mA power supply which can source a current to the network. A comprehensive catalogue is available from your nearest Clipsal office.*



# The dramatic C-Bus Professional Series



Inspired by its surroundings, these architectural dimmers create dramatic lighting effects in auditoriums, conference centres, hotels, cinemas and theatres. They have been specially developed for high power lighting applications.

For best results the C-Bus Professional Series offers:

- 4 channels of 5A, suitable for incandescent and low voltage lighting.
- Current monitoring for each channel.
- Voltage and frequency stability, to compensate for mains voltage and ensure output remains constant.
- Local and remote overrides to toggle outputs.
- Thermal and over current protection with automatic shutdown.
- A C-Bus power supply to source 60mA to the network.
- Emergency lighting interface which can signal this system on loss of mains power to the C-Bus unit.
- Linear brightness output over the complete range 0-100%.

Cat No.	Desc.
5104D5	4 Channel Dimmer, 5A

The C-Bus Professional Series is fully compliant with Australian and European electromagnetic compatibility standards.



# *Extra fast* **Network Analyser**

The Network Analyser is a diagnostic tool designed to measure C-Bus parameters and report to the user. The Analyser incorporates a microprocessor with smart algorithms to measure system capacitance, network voltage, burden and clock signal, all critical to the performance of any C-Bus network

The unit provides instant results and may be used to verify system parameters or test a network for compliance to design rules as stated in the operating manuals.

**The Network Analyser connects easily to test:**

- C-Bus power supply
- System Clock
- C-Bus voltage level
- Network burden
- Cable capacitance

Combined with a fault finding flow chart this tool quickly identifies any problem situations. Easy to read flow charts show you exactly how to rectify the problem. And no batteries are required because the Network Analyser is powered by the C-Bus network.

Cat. No.	Desc.
5100NA	Network Analyser

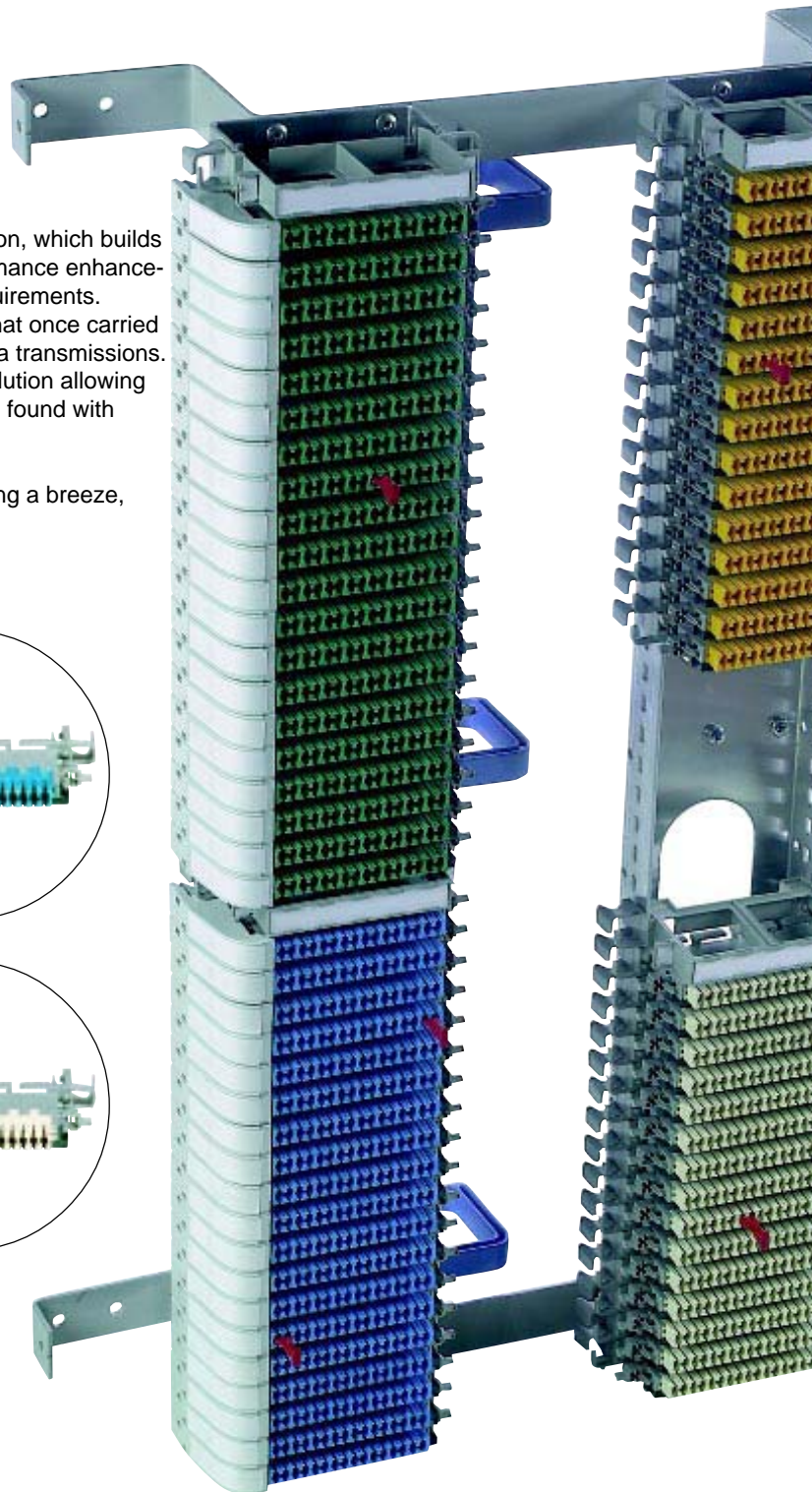
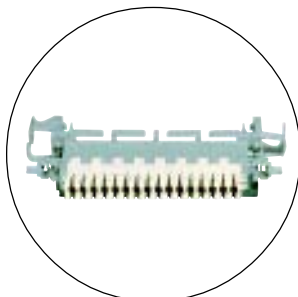
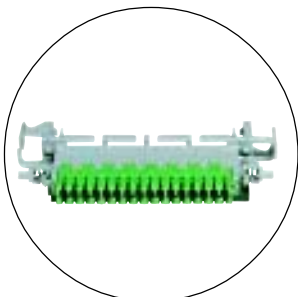
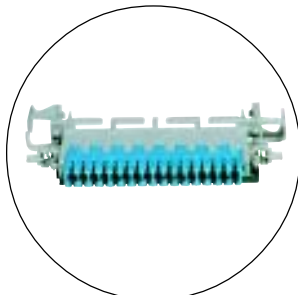
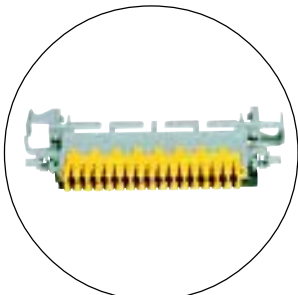


# Eliminate messy wiring data ins

## ***Patch by Exception***

Patch by Exception is Clipsal's new category 6 connection solution, which builds on the strengths of previous IDC and RJ45 technologies. Performance enhancements ensure that the new range will meet future bandwidth requirements. These products utilise the same space saving modular system that once carried only voice transmissions, but is now available for high speed data transmissions. Clipsal Patch by Exception is a versatile jumpered or patched solution allowing single pair administration while solving the 'spaghetti mess' often found with similar installations.

Easily identifiable labels and colour coded modules make patching a breeze, which is also good news for the End User.



### ***Range***

The Clipsal Patch by Exception solution offers a complete connection range:

- Colour coded modules
- Frames and covers
- Patch and test cords
- 4 labelling options
- Accessories



# from your next voice and installation



*No more messy  
'spaghetti wiring'*



## Features

- Space saving, world's highest density jumpered solution
- Colour coded modules for easy identification of services
- 4 labelling options
- Jumpered and patching facility
- Neat and Clean solution without the need for messy patch cords
- Disconnect facility for protection of services
- Overvoltage protection available
- Single pair administration
- Controlled access to services
- Test access through disconnect facility
- Compatible with multi stand or solid core cables
- Simple record management
- Shielded solution available
- 20 Year Performance warranty

## What does Patch by Exception mean?

Research shows that over 75% of services, once connected, never change. When this is a totally patched solution with a patch cord for every service, the result is reduced performance and a mess of wires that is a nightmare to administer.

Patch by Exception, on the other hand, means that although the modules are hard wired (jumpered), these jumpers can be overridden with the simple insertion of a patch cord. By removing the patch cord the services are restored to their original form.

## Contact protection

With previous technologies the constant insertion and removal of patch cords erodes the contact surface which, over time, reduces performance.

Clipsal Patch by Exception has a unique insertion design, which opens the contact as the patch cord is inserted, eliminating insertion wear.



## Performance

As mentioned earlier, the RJ45 is limited in bandwidth. This is due to the pins within the connector being in very close proximity to each other. This allows easy induction of crosstalk between pairs and limits bandwidth capacity.

Modules however have a greater separation of pairs at the termination point, which greatly reduces crosstalk. As the attached data demonstrates, the Clipsal link far exceeds performance criteria as specified in 150 11801 documentation.

The Clipsal module has many other features that aid superior performance. The cable guides for the jumper cabling ensure that pairs remain untwisted all the way to the point of termination.

# TOWER OF STRENGTH

Built from tough (316 grade) stainless steel, Marina SEA56 bollards are ideal for harsh and corrosive environments like marinas, caravan parks and ocean frontages.

A Simes Blitz GLS luminaire is supplied as a standard fitting but the bollards are suitable for halogen and energy saving lights as well. Infill panels are useful for colour decoration or signage.

The Marina SEA56 takes a range of Clipsal C56 switchgear, 4 x 4 gang boxes, power points, RCD switches, telephones or even pay TV connections.



Have them custom designed to suit your needs and budget. Contact Pierlite for a custom assembly order form.



## New

## *commercial lighting with style.*



Newly designed Corcovado delivers spectacular lighting through an innovative blend of design and function. It is the perfect lighting solution for prestigious showrooms, corporate reception areas, commercial retail complexes or exclusive boutiques.

Corcovado, the sleek new pendant luminaire from Hoffmeister, is flowing with features:

- available in three different sizes
- replace lamps without tools
- wide photometric range
- integrated ballast or transformer
- tough die-cast aluminium body
- silver anodised aluminium reflector

*Ask us about the decorative ceiling mount.*

Pierlite is the exclusive distributor for the Hoffmeister range of luminaires in Australia.

Cat. No.	Desc.
0.55117.00-906	Corcovado GLS Medium
0.55117.43-906	Corcovado 26W PLC Medium
0.55117.44-906	Corcovado 26W Medium
0.55177.46-906	Corcovado 50W MV Medium
0.55122.73-906	Corcovado 70W MH Large
0.55122.75-906	Corcovado 150MH CDM-T Large
0.55126.00-906	Corcovado 50GLS Small
0.55127.42-906	Corcovado 1 x 13W Small
0.55128.00-906	Corcovado 50W GY 6.35 Small



# Smoother illumination with Cenera.



Just as water is purified for drinking, Cenera creates high quality glare-free light using advanced double-reflection optics - light is shined upward before being reflected more evenly below.

Precise measurements of light pass up through small slits on the Cenera's primary optic tube and are then reflected downward by the curved upper canopy. Resulting in a flow of light that is breathtakingly smooth.

Cenera is made from a combination of modern recycled steel, aluminium and synthetic materials, with pure white and gunmetal grey surface finishes. All models are wired with energy efficient electronic ballasts as standard.

## Notes

- 363 Series is only available in single tube configuration.
- Standard 363 Series is supplied less flex and plug.
- When mounting the 363 Series in a recessed situation, an optional recessing kit must also be ordered.



Cat. No.	Lamp Type	Nom. T-Bar Sp.	Overall Size
<b>T3631 PST/14</b>	1x14W T5	600 x 300	623 x 311
<b>T3631 PST/28</b>	1x28W T5	1200 x 300	1247 x 311
<b>T3631 PST/35</b>	1x35W T5	1500 x 300	1547 x 311
<b>T3633 PST/55</b>	1x55W TC-L	600 x 600	623 x 623

# Round Shoplight

The newest complement to the rectangular shoplight metal halide fitting is this Round Metal Halide variation. It comes complete with 70W or 150W gear, lamp and flex & plug for easy installation and service.

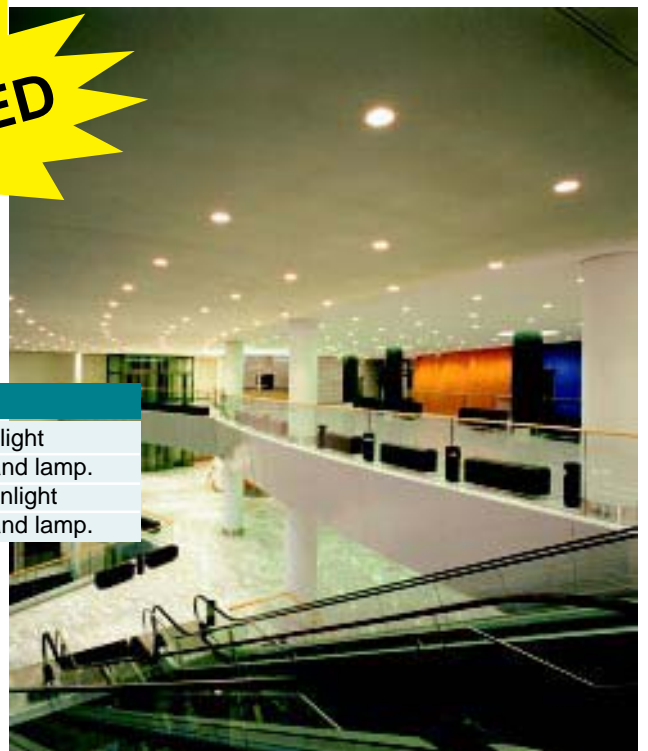
For a subtle appeal with performance, Round Metal Halide Shoplights rest flush with the ceiling's surface and have a cut out hole size of just 215mm.

**JUST RELEASED**



Cat. No.	Desc.
<b>PSLKR70MH</b>	Round, fixed 70W MH downlight complete with control gear and lamp.
<b>PSLKR150MH</b>	Round, fixed 150W MH downlight complete with control gear and lamp.

*Supplied with European, 4000°K double ended metal halide lamp.*



# New products at a glance

## CLIPSAL<sup>®</sup> ELECTRICAL ACCESSORIES



EMC Compliant Dimmers



Lifesaver DC Smoke Alarm



Heritage Switch & Socket Range



O.erre Exhaust Fans



Airflow Bathroom Heaters



New Safety Insulated Clipsal Pin Plugs



Eclipse & Slimline Switches & Sockets

## CLIPSAL<sup>®</sup> INDUSTRIAL



56 Series Circuit Breakers Covers



SWA Cable J-Box



4 Series Circuit Protection



Impulse Relays for Multi-Switch needs



3PV Series Plugs & Sockets



6ADXM & 6ADX Soft Starters



7 Series Rotary Cam Switches

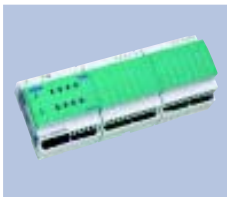


New Clipsal Ex Products

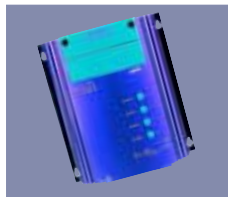
## CLIPSAL<sup>®</sup> INTEGRATED SYSTEMS



Clipsal HomeSafe Security System



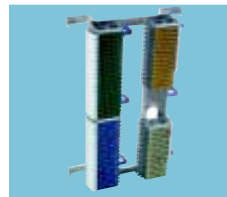
C-Bus Din Rail Range



C-Bus Professional Series 4 Channel Dimmer



C-Bus Network Analyser



Patch By Exception

## CLIPSAL<sup>®</sup> DATA COMMS

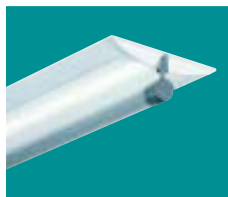
## PIERLITE<sup>®</sup> LIGHTING



Marina SEA56 Bollards



Corcovado Lighting



Cenera Glare Free Lighting



Round Metal Halide

### Products of Gerard Industries Pty Ltd ACN 007 873 529

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	Albury	(02) 6041 2377
<b>VIC</b>	Melbourne	(03) 9207 3200
	Country Areas	1800 653 893
<b>QLD</b>	Brisbane	(07) 3244 7444
	Townsville	(07) 4725 1822

<b>SA</b>	Adelaide	(08) 8269 0555
<b>WA</b>	Perth	(08) 9442 4444
<b>TAS</b>	Hobart	(03) 6272 3177
	Launceston	(03) 6331 6951
<b>NT</b>	Darwin	(08) 8947 0278