



Switches

Manufactured from Stainless Steel, Bulgin's extensive range of vandal resistant security switches are designed with a high resistance to wear and tear, corrosion and harsh use in potentially hostile environments such as access control applications.

The front and rear panel mounted versions have three profiles – prominent, domed and low profile – with a choice of switching and IP66 & IP68 front panel sealing which combined together to meet the ergonomic, electrical and environmental demands of switch panel design. And where the ultimate strength of steel is not needed, there is a brass, chrome plated alternative. The low profile style switches are now also available with a latching, push on - push off, action.

The illuminated versions are available in dot and ring LED indication and a variety of illumination colours including bi-colour LED's. Newer versions also feature LED illumination driven by 6V, 12V & 24V together with rear of panel sealing, these options will add that extra dimension to control panel layouts and functionality.

The standard range of vandal resistant switches are complemented by a range of 16mm stainless steel switches of robust construction designed for use in applications where space is at a premium.

Type	Page
Low Profile Vandal Resistant	
MP0025	174
MP0027	174
MP0038	174
MP0031	175
MP0034	175
MP0037	175
Low Profile Vandal Resistant - Latching	
MPL025	176
MPL027	176
MPL038	176
MPL031	177
MPL034	177
Low Profile Vandal Resistant - Double Pole	
MPD0031	178
Illuminated Vandal Resistant	
MPI001	179
MPI002	180
MPI001, MPI002 through panel sealed	181
Brass Chrome Plated Vandal Resistant	
MPB038	182
MPB031	182
MPB037	182
Low Profile Vandal Resistant - Large Diameter	
MP0050	183
MP0050/2	183

Type	Page
Domed Vandal Resistant	
MP0027/3	184
MP0038/3	184
MP0025/3	184
MP0037/3	185
MP0031/3	185
MP0034/3	185
Prominent Vandal Resistant	
MP0027/2	186
MP0038/2	186
MP0025/2	186
MP0037/2	187
MP0031/2	187
MP0034/2	187
Push Button	
MP0013	188
MP0033	188
MP0013/2	188
MP0033/2	188
Stainless Steel - 16mm	
MP0042	189
MP0045	190-193
Push Button	
MP0012	194
MP0016	194
MP0022	195
Voltage Selectors	
VS0001	196
VS0002	196

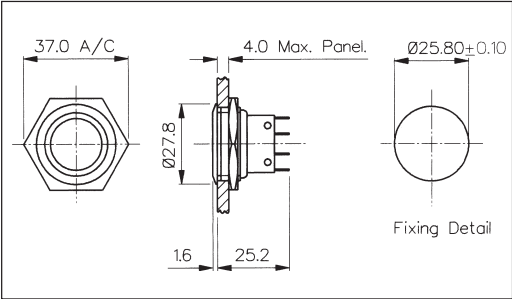
Stainless Steel Low Profile Vandal Resistant - Momentary

FRONT PANEL MOUNTING



MP0027

- 28mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac

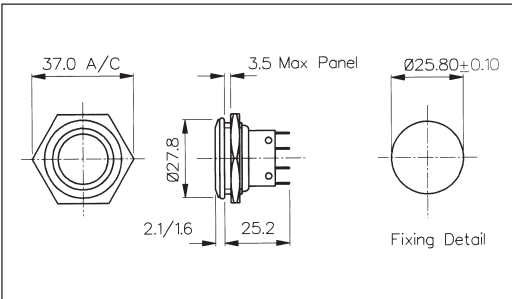


FRONT PANEL MOUNTING



MP0038
Sealed to IP66

- Front Panel Sealed to IP66
- 28mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac

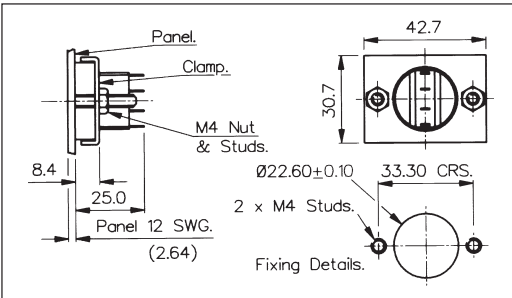


REAR PANEL MOUNTING



MP0025

- 22mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac



Specification	MP0027	MP0038	MP0025
Terminations:	Solder Tags	Solder Tags	Solder Tags
Switching:	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ³ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):		Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	1,000,000 (min)
Electrical:	35,000 (min)	35,000 (min)	35,000 (min)
Operating Pressure:	7.5N (typ)	12.5N (typ)	6.1N (typ)
Rear Nut Fixing Torque:	2.5Nm	1.13Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Fine Silver	Fine Silver	Fine Silver
Thread size:	1.0" x 26TPI	1.0" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

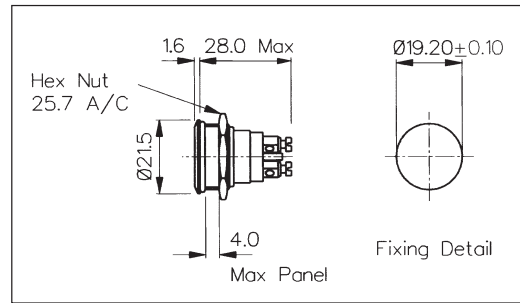
Stainless Steel Low Profile Vandal Resistant - Momentary

FRONT PANEL MOUNTING



MP0037
Sealed to IP68

- Front Panel Sealed to IP68
- 21.5mm diameter
- S.P. Push to Make
- 1A, 50Vac/dc
- Industry Standard Size

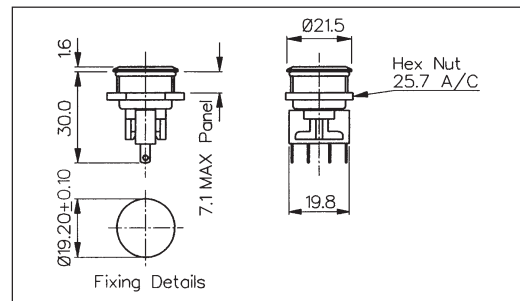


FRONT PANEL MOUNTING

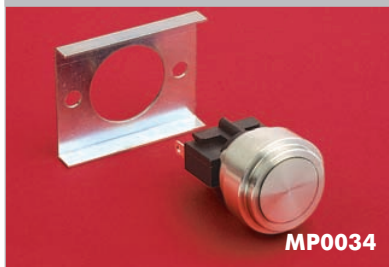


MP0031
Sealed to IP66

- Front Panel Sealed to IP66
- 21.5mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac

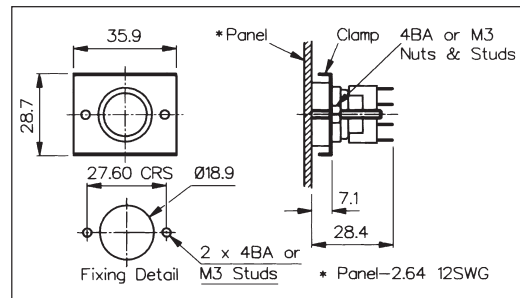


REAR PANEL MOUNTING



MP0034

- Rear Panel Mounting
- Flush with Panel
- 19mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac



Specification	MP0037	MP0031	MP0034
Terminations:	Screw Terminals	Solder Tags	Solder Tags
Switching:	S.P. Push to make Momentary action	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	1A, 50Vac/dc	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ⁵ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>1.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP68 EN60529 1992 (Terminals not sealed)	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	250,000 (min)
Electrical:	30,000 (min)	35,000 (min)	35,000 (min)
Operating Pressure:	7.5N (typ)	4.7N (typ)	2.7N (typ)
Rear Nut Fixing Torque:	0.57Nm	0.57Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Silver Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Brass, Silver Plated, Silver	Fine Silver	Fine Silver
Thread size:	0.747" x 26TPI	0.747" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

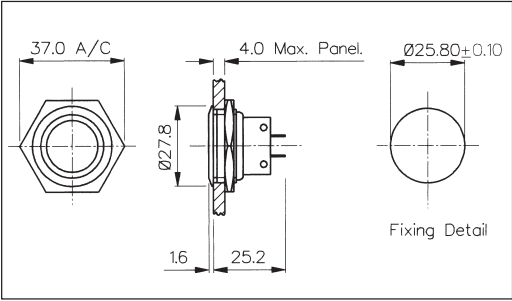
Stainless Steel Low Profile Vandal Resistant - Latching

FRONT PANEL MOUNTING



MPL027

- 28mm diameter
- 2A, 50Vac/dc
- Single pole push to make
- Latching switch

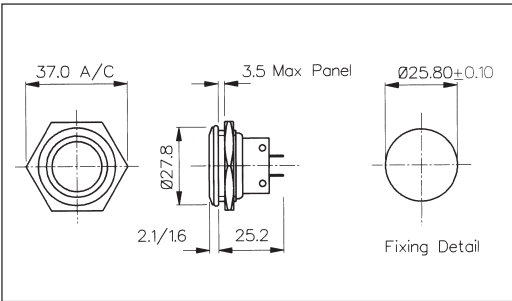


FRONT PANEL MOUNTING

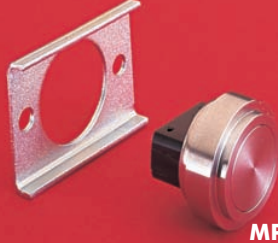


MPL038
Sealed to IP66

- Front Panel Sealed to IP66
- 28mm diameter
- 2A, 50Vac/dc
- Single pole push to make
- Latching switch

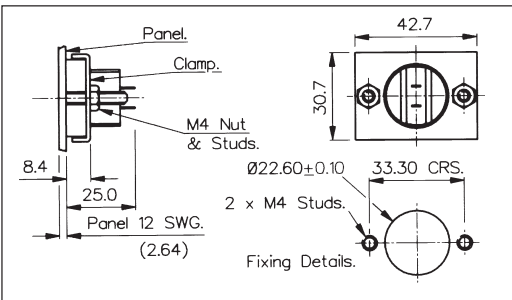


REAR PANEL MOUNTING



MPL025

- 22mm diameter
- 2A, 50Vac/dc
- Single pole push to make
- Latching switch



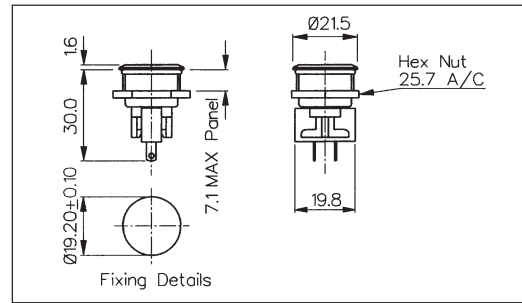
Specification	MPL027	MPL038	MPL025
Terminations:	Solder Tags	Solder Tags	Solder Tags
Switching:	S.P.M.B. - Latching	S.P.M.B. - Latching	S.P.M.B. - Latching
Max. Rating:	2A, 50Vac/dc	2A, 50Vac/dc	2A, 50Vac/dc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ³ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	-	Protection Classification: IP66 EN60529 1992 (Switch not sealed)	-
Operations			
Mechanical:	8,000 (min)	8,000 (min)	8,000 (min)
Electrical:	8,000 (min)	8,000 (min)	8,000 (min)
Operating Pressure:	5.5N (typ)	5.5N (typ)	5.5N (typ)
Rear Nut Fixing Torque:	2.5Nm	1.13Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Fine Silver	Fine Silver	Fine Silver
Thread size:	1.0" x 26TPI	1.0" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

Stainless Steel Low Profile Vandal Resistant - Latching

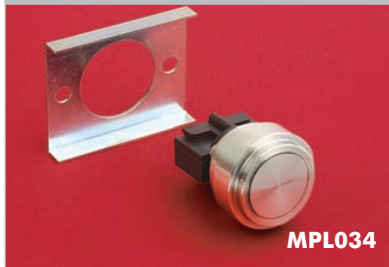
FRONT PANEL MOUNTING



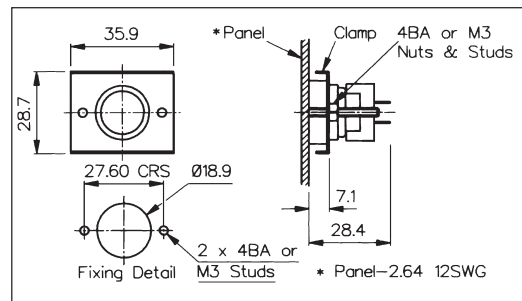
- Front Panel Sealed to IP66
- 21.5mm diameter
- 2A, 50Vac/dc
- Single pole push to make
- Latching switch



REAR PANEL MOUNTING



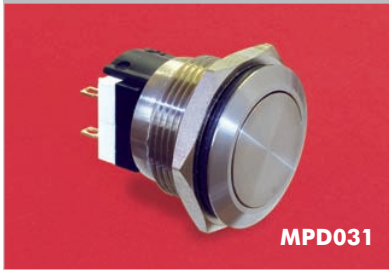
- Rear Panel Mounting
- Flush with Panel
- 19mm diameter
- 2A, 50Vac/dc
- Single pole push to make
- Latching switch



Specification	MPL031	MPL034
Terminations:	Solder Tags	Solder Tags
Switching:	S.P.M.B. - Latching	S.P.M.B. - Latching
Max. Rating:	2A, 50Vac/dc	2A, 50Vac/dc
Contact Resistance:	<10mΩ	<10mΩ
Insulation Resistance:	>10 ³ MΩ	>10 ³ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP66 EN60529 1992 (Switch not sealed)	
Operations		
Mechanical:	8,000 (min)	8,000 (min)
Electrical:	8,000 (min)	8,000 (min)
Operating Pressure:	5.5N (typ)	5.5N (typ)
Rear Nut Fixing Torque:	0.57Nm	-
Materials		
Mouldings:	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel
Contacts:	Fine Silver	Fine Silver
Thread size:	0.747" x 26TPI	-
RoHS	Compliant	Compliant

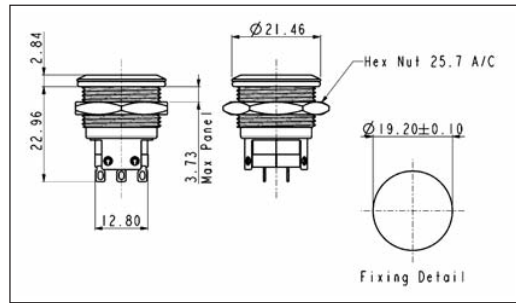
Stainless Steel Low Profile Vandal Resistant - Momentary - Double Pole

FRONT PANEL MOUNTING



MPD031

- Front Panel Sealed to IP66
- 21.5mm diameter
- D.P.C.O. Microswitch
- 3A, 125Vac



Specification	MPD031
Terminations:	Solder Tags
Switching:	D.P.C.O. Momentary Action (Microswitch)
Max. Rating:	3A, 125Vac
Contact Resistance:	30-100m Ω max.
Insulation Resistance:	100M Ω min.
Dielectric Strength:	1,000VacRMS
Operating Temp. Range:	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)
Operations	
Mechanical:	1,000,000
Electrical:	10,000 @ 3A, 125Vac
Rear Nut Fixing Torque:	0.57Nm
Materials	
Mouldings:	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated
Switch Body & Button:	Stainless Steel
Contacts:	Brass, Silver Plated
Thread size:	0.747" x 26TPI
RoHS	Compliant

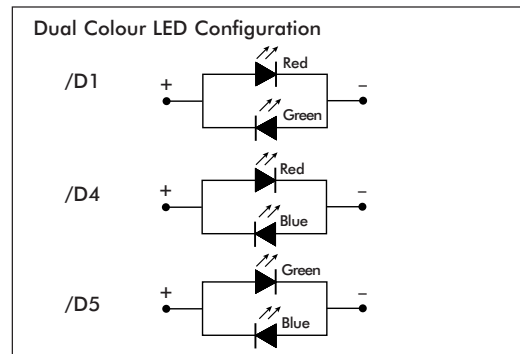
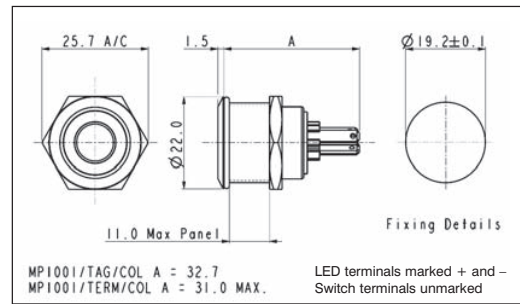
Stainless Steel Illuminated Vandal Resistant

FRONT PANEL MOUNTING



MPI001 - front panel seal to IP66

- Dot illumination
- 22mm diameter
- Single pole push to make
- 50mA, 24Vdc contact rating
- Red, Green, Amber, Blue, White or dual colour illumination
- Bright daylight LEDs
- Independent LED terminals
- Front panel seal to IP66
- Integral supply resistors
- TVS protection



Specification | MPI001/Termination/Colour/Voltage

<p>Illumination style: Dot</p> <p>Terminations: /28 (2.8mm tabs), /TERM or /TE (screw terminals)</p> <p>Switching: Single pole, push to make, tactile (momentary action)</p> <p>Max. Switch Rating: 50mA, 24Vdc</p> <p>LEDs (ratings @ 20mA)</p> <table border="1"> <thead> <tr> <th>Part No.</th> <th>/RD</th> <th>/GN</th> <th>/AM</th> <th>/BL</th> <th>/WH</th> <th>/D1</th> <th>/D4</th> <th>/D5</th> </tr> </thead> <tbody> <tr> <td>Colours</td> <td>Red</td> <td>Green</td> <td>Amber</td> <td>Blue</td> <td>White</td> <td>Red/Green</td> <td>Red/Blue</td> <td>Green/Blue</td> </tr> <tr> <td>Luminous Intensity</td> <td>900mcd</td> <td>2500mcd</td> <td>900mcd</td> <td>1500mcd</td> <td>900mcd</td> <td>2500mcd/5000mcd</td> <td>2000mcd/850mcd</td> <td>4000mcd/2000mcd</td> </tr> <tr> <td>Forward Voltage</td> <td>1.85V</td> <td>3.5V</td> <td>2.3V</td> <td>3.5V</td> <td>3.6V</td> <td>2.05V/3.6V</td> <td>2.0V/3.6V</td> <td>3.6V/3.6V</td> </tr> <tr> <td>Forward Current</td> <td>20mA</td> <td>20mA</td> <td>20mA</td> <td>20mA</td> <td>20mA</td> <td>20mA</td> <td>20mA</td> <td>20mA</td> </tr> <tr> <td>Moulding Colour</td> <td>Red</td> <td>Green</td> <td>Amber</td> <td>Blue</td> <td>White</td> <td>Black</td> <td>Black</td> <td>Black</td> </tr> </tbody> </table> <p>Illumination Voltage: /no suffix No resistor fitted. An appropriate resistor must be series connected by the user. Voltages as above. /6 6Vdc /12 12Vdc /24 24Vdc</p> <p>Contact Resistance: <100mΩ</p> <p>Insulation Resistance: >10³ MΩ</p> <p>Dielectric Strength: Contact to Panel >2.0kV Contact to Contact 1500V</p> <p>Operating Temp. Range: -30°C to +70°C</p> <p>Sealing (Front of panel only): Protection Classification: IP66 EN60529 1992</p> <p>Operations</p> <table border="1"> <tr> <td>Mechanical:</td> <td>750,000 (min)</td> </tr> <tr> <td>Electrical:</td> <td>35,000 (min)</td> </tr> </table> <p>Operating Pressure: 12N</p> <p>Rear Nut Fixing Torque: 0.57Nm</p> <p>Materials</p> <table border="1"> <tr> <td>Switch assembly:</td> <td>UL94V-0 rated Polyamide (Nylon)</td> </tr> <tr> <td>Tags:</td> <td>Copper Alloy</td> </tr> <tr> <td>Terminals:</td> <td>Copper Alloy</td> </tr> <tr> <td>Switch Body & Button:</td> <td>Stainless Steel</td> </tr> <tr> <td>Lens and Lens Body:</td> <td>Polycarbonate</td> </tr> <tr> <td>O ring:</td> <td>Nitrile</td> </tr> <tr> <td>Internal seal:</td> <td>Silicone</td> </tr> <tr> <td>Contact Plate:</td> <td>Gold Plated</td> </tr> </table> <p>Thread size: 18.97mm x 26TPI</p> <p> ESD Handling precautions must be taken</p> <p> Compliant</p>	Part No.	/RD	/GN	/AM	/BL	/WH	/D1	/D4	/D5	Colours	Red	Green	Amber	Blue	White	Red/Green	Red/Blue	Green/Blue	Luminous Intensity	900mcd	2500mcd	900mcd	1500mcd	900mcd	2500mcd/5000mcd	2000mcd/850mcd	4000mcd/2000mcd	Forward Voltage	1.85V	3.5V	2.3V	3.5V	3.6V	2.05V/3.6V	2.0V/3.6V	3.6V/3.6V	Forward Current	20mA	20mA	20mA	20mA	20mA	20mA	20mA	20mA	Moulding Colour	Red	Green	Amber	Blue	White	Black	Black	Black	Mechanical:	750,000 (min)	Electrical:	35,000 (min)	Switch assembly:	UL94V-0 rated Polyamide (Nylon)	Tags:	Copper Alloy	Terminals:	Copper Alloy	Switch Body & Button:	Stainless Steel	Lens and Lens Body:	Polycarbonate	O ring:	Nitrile	Internal seal:	Silicone	Contact Plate:	Gold Plated	
Part No.	/RD	/GN	/AM	/BL	/WH	/D1	/D4	/D5																																																																			
Colours	Red	Green	Amber	Blue	White	Red/Green	Red/Blue	Green/Blue																																																																			
Luminous Intensity	900mcd	2500mcd	900mcd	1500mcd	900mcd	2500mcd/5000mcd	2000mcd/850mcd	4000mcd/2000mcd																																																																			
Forward Voltage	1.85V	3.5V	2.3V	3.5V	3.6V	2.05V/3.6V	2.0V/3.6V	3.6V/3.6V																																																																			
Forward Current	20mA	20mA	20mA	20mA	20mA	20mA	20mA	20mA																																																																			
Moulding Colour	Red	Green	Amber	Blue	White	Black	Black	Black																																																																			
Mechanical:	750,000 (min)																																																																										
Electrical:	35,000 (min)																																																																										
Switch assembly:	UL94V-0 rated Polyamide (Nylon)																																																																										
Tags:	Copper Alloy																																																																										
Terminals:	Copper Alloy																																																																										
Switch Body & Button:	Stainless Steel																																																																										
Lens and Lens Body:	Polycarbonate																																																																										
O ring:	Nitrile																																																																										
Internal seal:	Silicone																																																																										
Contact Plate:	Gold Plated																																																																										

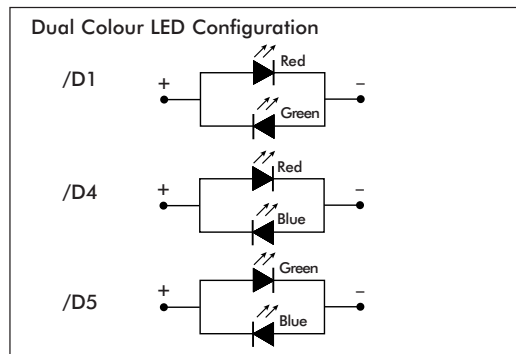
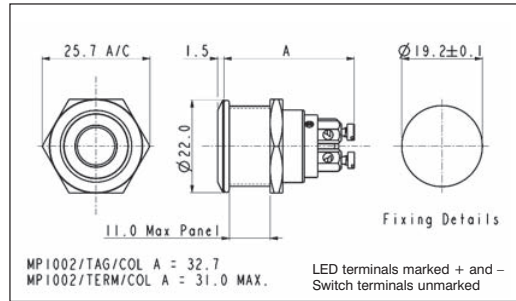
Stainless Steel Illuminated Vandal Resistant

FRONT PANEL MOUNTING



- Ring illumination
- 22mm diameter
- Single pole push to make
- 50mA, 24Vdc contact rating
- Red, Green, Amber, Blue, White or dual colour illumination
- Bright daylight LEDs
- Independent LED terminals
- Front panel seal to IP66
- Integral supply resistors
- TVS protection

MPI002- front panel seal to IP66



Specification	MPI002/Termination/Colour/Voltage
Illumination style:	Ring
Terminations:	/28 (2.8mm tabs), /TERM or /TE (screw terminals)
Switching:	Single pole, push to make, tactile (momentary action)
Max. Switch Rating:	50mA, 24Vdc
LEDs (ratings @ 20mA)	
Part No.	/RD /GN /AM /BL /WH /D1 /D4 /D5
Colours	Red Green Amber Blue White Red/Green Red/Blue Green/Blue
Luminous Intensity	900mcd 2500mcd 900mcd 1500mcd 900mcd 2500mcd/5000mcd 2000mcd/850mcd 4000mcd/2000mcd
Forward Voltage	1.85V 3.5V 2.3V 3.5V 3.6V 2.05V/3.6V 2.0V/3.6V 3.6V/3.6V
Forward Current	20mA 20mA 20mA 20mA 20mA 20mA 20mA 20mA
Moulding Colour	Red Green Amber Blue White Black Black Black
Illumination Voltage:	/no suffix No resistor fitted. An appropriate resistor must be series connected by the user. Voltages as above. /6 6Vdc /12 12Vdc /24 24Vdc
Contact Resistance:	<100mΩ
Insulation Resistance:	>10 ³ MΩ
Dielectric Strength:	Contact to Panel >2.0kV Contact to Contact 1500V
Operating Temp. Range:	-30°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP66 EN60529 1992
Operations	
Mechanical:	750,000 (min)
Electrical:	35,000 (min)
Operating Pressure:	12N
Rear Nut Fixing Torque:	0.57Nm
Materials	
Switch assembly:	UL94V-0 rated Polyamide (Nylon)
Tags:	Copper Alloy
Terminals:	Copper Alloy
Switch Body & Button:	Stainless Steel
Lens and Lens Body:	Polycarbonate
O ring:	Nitrile
Internal seal:	Silicone
Contact Plate:	Gold Plated
Thread size:	18.97mm x 26TPI
	ESD Handling precautions must be taken
	Compliant



RoHS

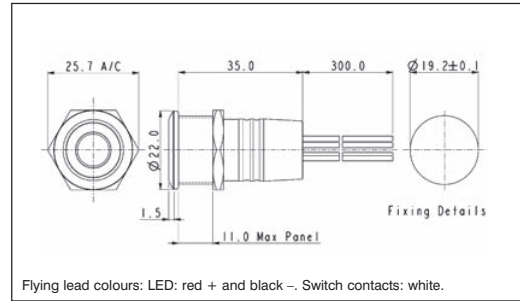
Stainless Steel Illuminated Vandal Resistant with rear of panel IP66 seal

REAR PANEL SEALED - FLYING LEADS



MPI002/FL/xx/x

- Dot or ring illumination
- 22mm diameter
- Single pole push to make
- 50mA, 24Vdc contact rating
- Red, Green, Amber, Blue & White illumination
- Bright daylight LEDs
- Independent LED terminals
- Front and rear panel seal to IP66
- Flying lead termination
- TVS protection

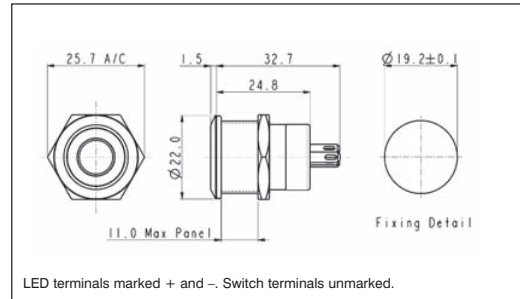


REAR PANEL SEALED - SOLDER TAG



MPI001/RP/xx/x


- Dot or ring illumination
- 22mm diameter
- Single pole push to make
- 50mA, 24Vdc contact rating
- Red, Green, Amber, Blue & White illumination
- Bright daylight LEDs
- Independent LED terminals
- Front and rear panel seal to IP66
- Solder tag termination
- TVS protection



Specification	MPI001/Termination/Colour/Voltage	MPI002/Termination/Colour/Voltage
Illumination style:	Dot	Ring
Terminations:	/FL (Flying leads) /RP (Solder tags)	/FL (Flying leads) /RP (Solder tags)
Switching:	Single pole, push to make, tactile (momentary action)	Single pole, push to make, tactile (momentary action)
Max. Switch Rating:	50mA, 24Vdc	50mA, 24Vdc
LEDs (ratings @ 20mA)		
Part No.	/RD /GN /AM /BL /WH	/RD /GN /AM /BL /WH
Colours	Red Green Amber Blue White	Red Green Amber Blue White
Luminous Intensity	900mcd 2500mcd 900mcd 1500mcd 900mcd	900mcd 2500mcd 900mcd 1500mcd 900mcd
Forward Voltage	1.85V 3.5V 2.3V 3.5V 3.6V	1.85V 3.5V 2.3V 3.5V 3.6V
Forward Current	20mA 20mA 20mA 20mA 20mA	20mA 20mA 20mA 20mA 20mA
Illumination Voltage:	/no suffix No resistor fitted. An appropriate resistor must be series connected by the user. Voltages as above.	/no suffix No resistor fitted. An appropriate resistor must be series connected by the user. Voltages as above.
	/6 6Vdc	/6 6Vdc
	/12 12Vdc	/12 12Vdc
	/24 24Vdc	/24 24Vdc
Contact Resistance:	<100mΩ	<100mΩ
Insulation Resistance:	>10 ³ MΩ.	>10 ³ MΩ.
Dielectric Strength:	Contact to panel >2.0kV Contact to contact 1500V	Contact to panel >2.0kV Contact to contact 1500V
Operating Temp. Range:	-30°C to +70°C	-30°C to +70°C
Sealing		
(Front & rear of panel):	Protection classification: IP66, EN60529 1992	Protection classification: IP66, EN60529 1992
Operations		
Mechanical:	750,000 (min)	750,000 (min)
Electrical:	35,000 (min)	35,000 (min)
Operating Pressure:	12N	12N
Rear Nut Fixing Torque:	0.57Nm	0.57Nm
Materials		
Switch assembly:	UL94V-0 rated Polyamide (Nylon)	UL94V-0 rated Polyamide (Nylon)
Tags:	Copper Alloy	Copper Alloy
Leads:	Tinned, stranded copper conductors	Tinned, stranded copper conductors
Switch Body & Button:	Stainless Steel	Stainless Steel
Lens and Lens Body:	Polycarbonate	Polycarbonate
O ring:	Nitrile	Nitrile
Internal seal:	Silicone	Silicone
Contact Plate:	Gold Plated	Gold Plated
Thread size:	18.97mm x 26TPI	18.97mm x 26TPI
	ESD Handling precautions must be taken	ESD Handling precautions must be taken
	Compliant	Compliant

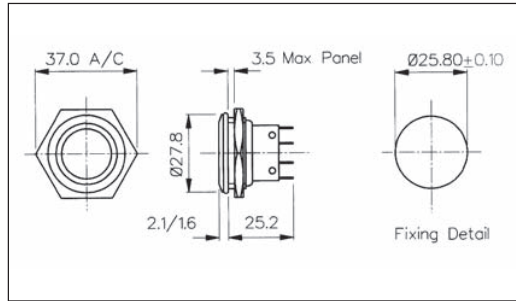
Low Profile Brass Chrome Plated Vandal Resistant

FRONT PANEL MOUNTING




MPB038
Sealed to IP66

- Front Panel Sealed to IP66
- 28mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac

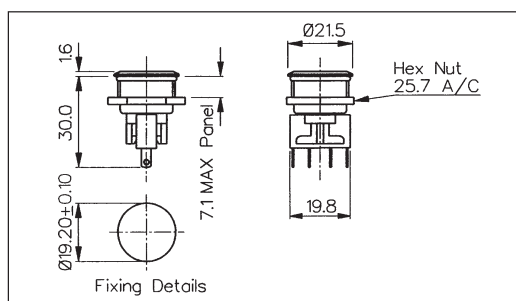


FRONT PANEL MOUNTING



MPB031
Sealed to IP66

- Front Panel Sealed to IP66
- 21mm diameter
- S.P.C.O. Microswitch
- 5A, 250Vac

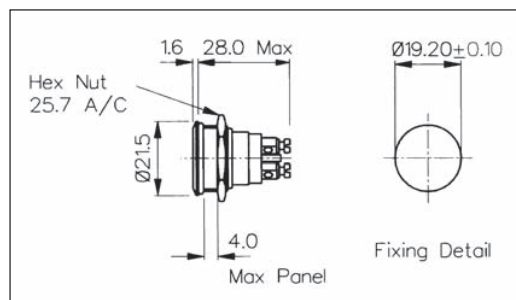


FRONT PANEL MOUNTING



MPB037
Sealed to IP68

- Front Panel Sealed to IP68
- 21.5mm diameter
- S.P. Push to Make
- 1A, 50Vac/dc



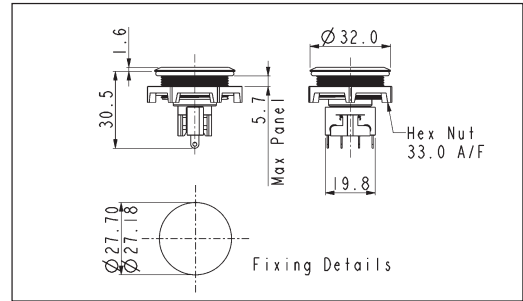
Specification	MPB038	MPB031	MPB037
Terminations:	Solder Tags	Solder Tags	Screw Terminals
Switching:	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)	S.P. Push to make Momentary action
Max. Rating:	5A, 250Vac. 2A, 28Vdc	5A, 250Vac 2A, 28Vdc	1A, 50Vac/dc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ³ MΩ.	>10 ³ MΩ	>10 ⁵ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac	>1.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	Protection Classification: IP68 EN60529 1992 (Terminals not sealed)
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	1,000,000 (min)
Electrical:	35,000 (min)	35,000 (min)	30,000 (min)
Operating Pressure:	12.5N (typ)	4.7N (typ)	7.5N (typ)
Rear Nut Fixing Torque:	1.13Nm	0.57Nm	0.57Nm
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated	Brass, Silver Plated
Switch Body & Button:	Brass, Chrome Plated	Brass, Chrome Plated	Brass, Chrome Plated
Contacts:	Fine Silver	Fine Silver	Brass, Silver Plated, Silver
Thread size:	1.0" x 26TPI	0.747" x 26TPI	0.747" x 26TPI
RoHS	Compliant	Compliant	Compliant

Stainless Steel Large Diameter Vandal Resistant - Momentary

FRONT PANEL MOUNTING - LOW PROFILE



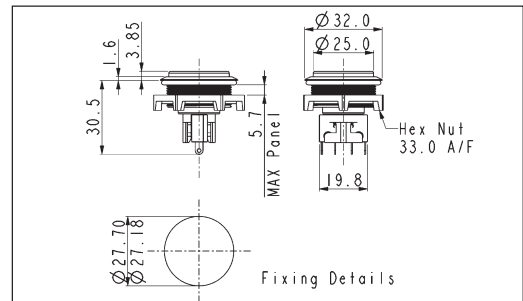
- Front Panel Sealed to IP68
- Flush button
- 32.0mm diameter
- S.P.C.O. switching
- Momentary action
- 5A, 250Vac



FRONT PANEL MOUNTING - PROTRUDING PROFILE



- Front Panel Sealed to IP68
- Protruding button
- 32.0mm diameter
- S.P.C.O. switching
- Momentary action
- 5A, 250Vac



Specification	MP0050	MP0050/2
Terminations:	Solder Tags	Solder Tags
Switching:	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	5A, 250Vac. 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	10mΩ	10mΩ
Insulation Resistance:	>10 ³ MΩ	>10 ³ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP68 EN60529 1992 (Micro switch not sealed)	Protection Classification: IP68 EN60529 1992 (Micro switch not sealed)
Operations		
Mechanical:	1,000,000 (min)	1,000,000 (min)
Electrical:	35,000 (min)	35,000 (min)
Operating pressure:	4.7Nm	4.7Nm
Rear Nut Fixing Torque:	0.57Nm	0.57Nm
Materials		
Mouldings:	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel
Contacts:	Fine Silver	Fine Silver
Thread size:	M27 x 1.0-6H	M27 x 1.0-6H
RoHS	Compliant	Compliant

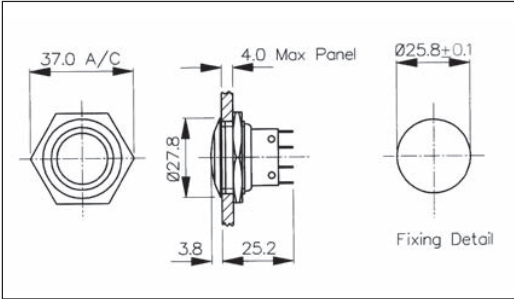
Stainless Steel Domed Vandal Resistant

FRONT PANEL MOUNTING



MP0027/3

- 28mm diameter
- Domed Profile
- S.P.C.O. Microswitch
- 5A, 250Vac

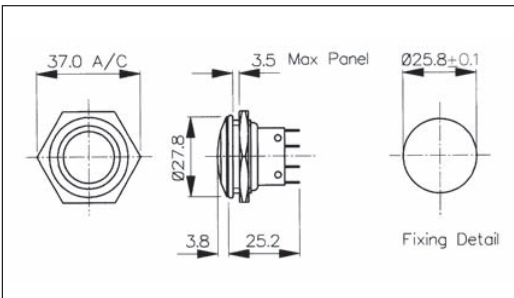


FRONT PANEL MOUNTING

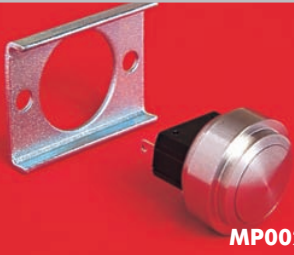


MP0038/3
Sealed to IP66

- Front Panel Sealed to IP66
- 28mm diameter
- Domed Profile
- S.P.C.O. Microswitch
- 5A, 250Vac

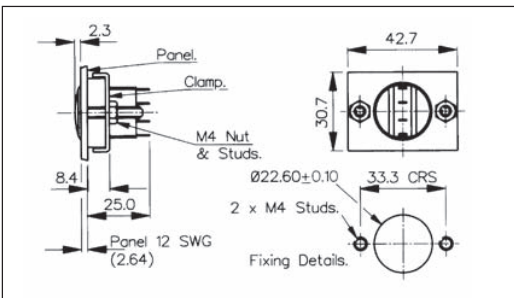


REAR PANEL MOUNTING



MP0025/3

- 22mm diameter
- Domed Profile
- S.P.C.O. Microswitch
- 5A, 250Vac



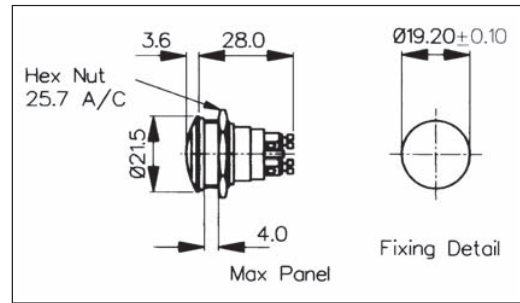
Specification	MP0027/3	MP0038/3	MP0025/3
Terminations:	Solder Tags	Solder Tags	Solder Tags
Switching:	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ³ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	-	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	-
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	1,000,000 (min)
Electrical:	35,000 (min)	35,000 (min)	35,000 (min)
Operating Pressure:	7.5N (typ)	12.5N (typ)	6.1N (typ)
Rear Nut Fixing Torque:	2.5Nm	1.13Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Fine Silver	Fine Silver	Fine Silver
Thread size:	1.0" x 26TPI	1.0" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

Stainless Steel Domed Vandal Resistant

FRONT PANEL MOUNTING



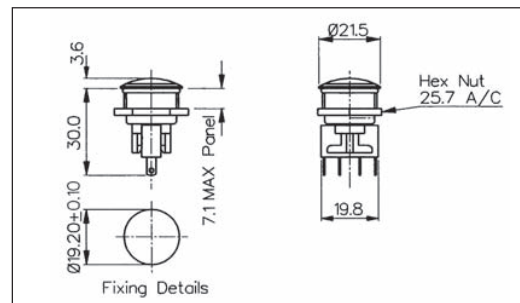
- Front Panel Sealed to IP68
- 21.5mm diameter
- Domed Profile
- S.P. Push to Make
- 1A, 50Vac/dc



FRONT PANEL MOUNTING



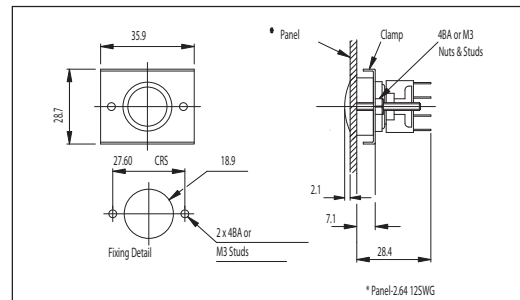
- Front Panel Sealed to IP66
- 21.5mm diameter
- Domed Profile
- S.P.C.O. Microswitch
- 5A, 250Vac



REAR PANEL MOUNTING



- Rear Panel Mounting
- 19mm diameter
- Domed Profile
- S.P.C.O. Microswitch
- 5A, 250Vac



Specification	MP0037/3	MP0031/3	MP0034/3
Terminations:	Screw Terminals	Solder Tags	Solder Tags
Switching:	S.P. Push to make Momentary action	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	1A, 50Vac/dc	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ⁵ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>1.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP68 EN60529 1992 (Terminals not sealed)	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	-
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	250,000 (min)
Electrical:	30,000 (min)	35,000 (min)	35,000 (min)
Operating Pressure:	7.5N (typ)	4.7N (typ)	2.7N (typ)
Rear Nut Fixing Torque:	0.57Nm	0.57Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Silver Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Brass, Silver Plated, Silver	Fine Silver	Fine Silver
Thread size:	0.747" x 26TPI	0.747" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

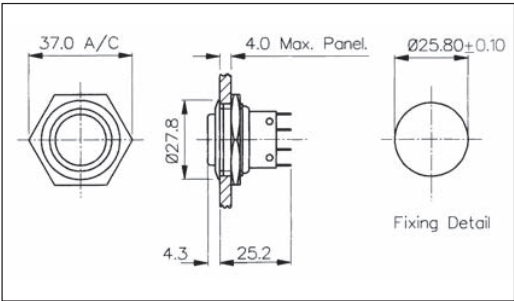
Stainless Steel Prominent Button Vandal Resistant

FRONT PANEL MOUNTING




MP0027/2

- 28mm diameter
- Prominent Button
- S.P.C.O. Microswitch
- 5A, 250Vac

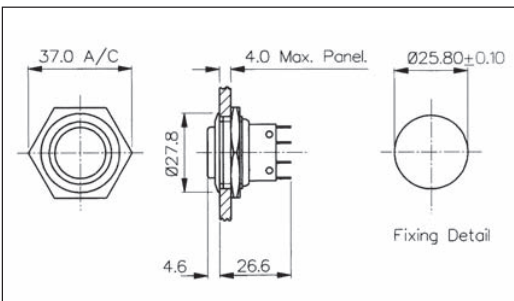


FRONT PANEL MOUNTING



MP0038/2
Sealed to IP66

- Front Panel Sealed to IP66
- 28mm diameter
- Prominent Button
- S.P.C.O. Microswitch
- 5A, 250Vac

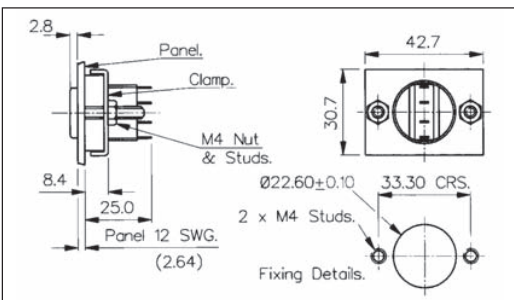


REAR PANEL MOUNTING



MP0025/2

- 22mm diameter
- Prominent Button
- S.P.C.O. Microswitch
- 5A, 250Vac



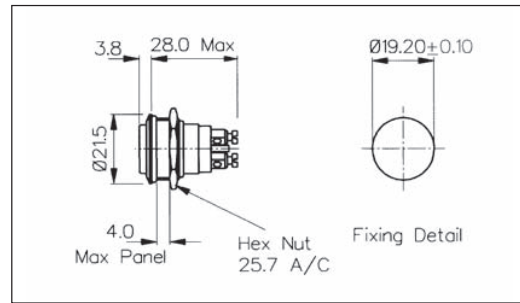
Specification	MP0027/2	MP0038/2	MP0025/2
Terminations:	Solder Tags	Solder Tags	Solder Tags
Switching:	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ³ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>2.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	-	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	-
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	1,000,000 (min)
Electrical:	35,000 (min)	35,000 (min)	35,000 (min)
Operating Pressure:	7.5N (typ)	12.5N (typ)	6.1N (typ)
Rear Nut Fixing Torque:	2.5Nm	1.13Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Fine Silver	Fine Silver	Fine Silver
Thread size:	1.0" x 26TPI	1.0" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

Stainless Steel Prominent Button Vandal Resistant

FRONT PANEL MOUNTING



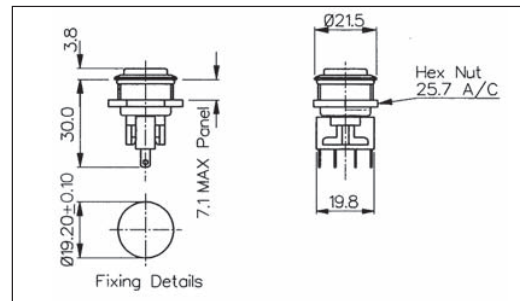
- Front Panel Sealed to IP68
- 21.5mm diameter
- Prominent Button
- S.P. Push to Make
- 1A, 50Vac/dc



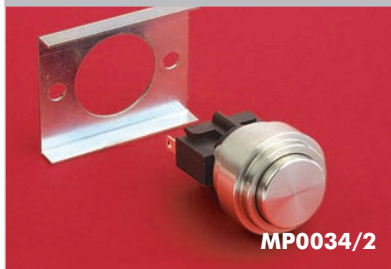
FRONT PANEL MOUNTING



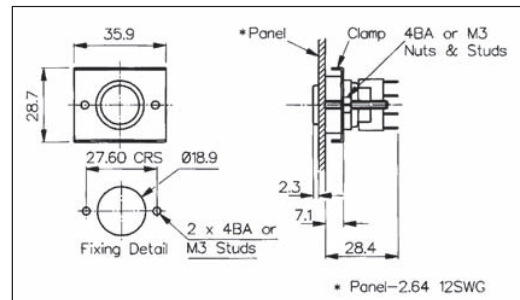
- Front Panel Sealed to IP66
- 21.5mm diameter
- Prominent Button
- S.P.C.O. Microswitch
- 5A, 250Vac



REAR PANEL MOUNTING



- 19mm diameter
- Prominent Button
- S.P.C.O. Microswitch
- 5A, 250Vac



Specification	MP0037/2	MP0031/2	MP0034/2
Terminations:	Screw Terminals	Solder Tags	Solder Tags
Switching:	S.P. Push to make Slow momentary action	S.P.C.O. Momentary Action (Microswitch)	S.P.C.O. Momentary Action (Microswitch)
Max. Rating:	1A, 50Vac/dc	5A, 250Vac 2A, 28Vdc	5A, 250Vac 2A, 28Vdc
Contact Resistance:	<10mΩ	<10mΩ	<10mΩ
Insulation Resistance:	>10 ⁵ MΩ	>10 ³ MΩ.	>10 ³ MΩ
Dielectric Strength:	>1.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +70°C	-20°C to +70°C	-20°C to +70°C
Sealing (Front of panel only):	Protection Classification: IP68 EN60529 1992 (Terminals not sealed)	Protection Classification: IP66 EN60529 1992 (Micro switch not sealed)	-
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	250,000 (min)
Electrical:	30,000 (min)	35,000 (min)	35,000 (min)
Operating Pressure:	7.5N (typ)	4.7N (typ)	2.7N (typ)
Rear Nut Fixing Torque:	0.57Nm	0.57Nm	-
Materials			
Mouldings:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Silver Plated	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel	Stainless Steel	Stainless Steel
Contacts:	Brass, Silver Plated, Silver	Fine Silver	Fine Silver
Thread size:	0.747" x 26TPI	0.747" x 26TPI	-
RoHS	Compliant	Compliant	Compliant

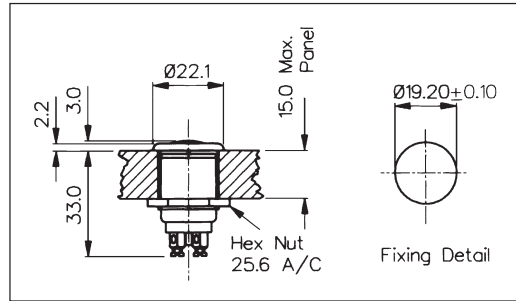
Push Button

FRONT PANEL MOUNTING



**MP0013
MP0033**

- Proud Fitting
- 22mm diameter
- S.P. Push to Make
- 1A, 50V
- Brass, Chrome Plated Body, Stainless Steel Button
- MP0033 Internally Sealed

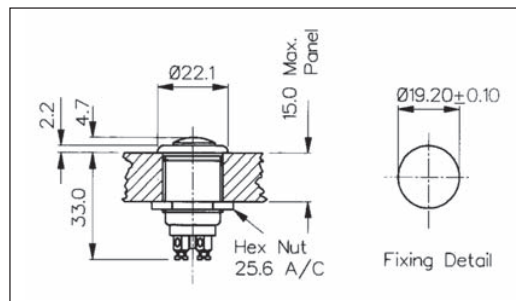


FRONT PANEL MOUNTING



**MP0013/2
MP0033/2**

- Prominent Button
- 22mm diameter
- S.P. Push to Make
- 1A, 50V
- Brass, Chrome Plated Body, Stainless Steel Button
- MP0033/2 Internally Sealed



Specification	MP0013, MP0033	MP0013/2, MP0033/2
Terminations:	Screw Terminals	Screw Terminals
Switching:	S.P. Push to make Slow momentary action	S.P. Push to make Slow momentary action
Max. Rating:	1A, 50Vac	1A, 50Vac
Contact Resistance:	<15mΩ	<15mΩ
Insulation Resistance:	>10 ⁴ MΩ	>10 ⁴ MΩ
Dielectric Strength:	>2.5kVac	>2.5kVac
Operating Temp. Range:	-20°C to +85°C	-20°C to +85°C
Sealing (Front of panel only):	MP0033 only - internally sealed against ingress of water and dust	MP0033/2 only - internally sealed against ingress of water and dust
Materials:		
Mouldings:	Glass Filled Nylon	Glass Filled Nylon
Tags/Terminations:	Brass, Silver Plated	Brass, Silver Plated
Switch Body & Button:	Body: Brass, Chrome Plated Button: Stainless Steel	Body: Brass, Chrome Plated Button: Stainless Steel
Contacts:	Copper, Silver Plated	Copper, Silver Plated
RoHS	Compliant	Compliant

SWITCHES

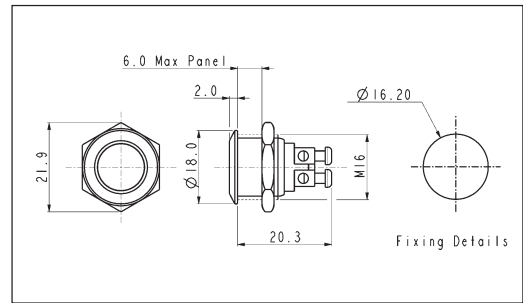
Downloaded from Elcodis.com electronic components distributor

Stainless Steel - Momentary

FLUSH PROFILE



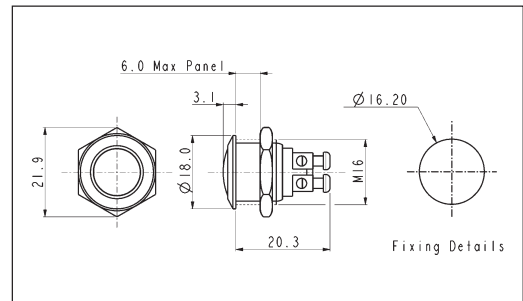
- 18mm bezel diameter
- 16mm panel hole
- S.P. Push to make
- Polished finish
- 2A, 48Vdc



DOMED PROFILE



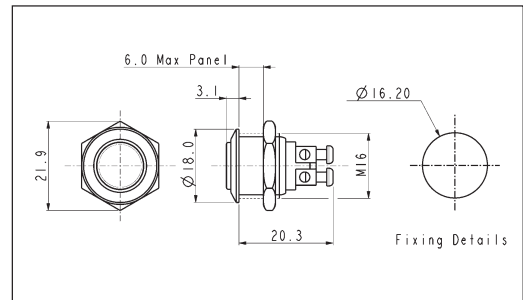
- 18mm bezel diameter
- 16mm panel hole
- S.P. Push to make
- Polished finish
- 2A, 48Vdc



PROMINENT BUTTON




- 18mm bezel diameter
- 16mm panel hole
- S.P. Push to make
- Polished finish
- 2A, 48Vdc



Specification	MP0042/1	MP0042/2	MP0042/3
Terminations:	Screw Terminals	Screw Terminals	Screw Terminals
Switching:	S.P. Push to Make	S.P. Push to Make	S.P. Push to Make
Max. Rating:	2A, 48Vdc	2A, 48Vdc	2A, 48Vdc
Contact Resistance:	50mΩ at 1A, 2V	50mΩ at 1A, 2V	50mΩ at 1A, 2V
Insulation Resistance:	>10 ³ MΩ @ 500Vdc	>10 ³ MΩ @ 500Vdc	>10 ³ MΩ @ 500Vdc
Dielectric Strength:	>2.0kVac	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +55°C	-20°C to +55°C	-20°C to +55°C
Operations			
Mechanical:	1,000,000 (min)	1,000,000 (min)	1,000,000 (min)
Electrical:	100,000 (min)	100,000 (min)	100,000 (min)
Rear Nut Fixing Torque:	12Nm	12Nm	12Nm
Materials			
Mouldings:	Nylon	Nylon	Nylon
Tags/Terminations:	Brass, Silver Plated	Brass, Silver Plated	Brass, Silver Plated
Switch Body & Button:	Stainless Steel (Polished)	Stainless Steel (Polished)	Stainless Steel (Polished)
Contacts:	Silver	Silver	Silver
Variants:	Gold Plated Brass version available	Gold Plated Brass version available	Gold Plated Brass version available
RoHS	Compliant	Compliant	Compliant

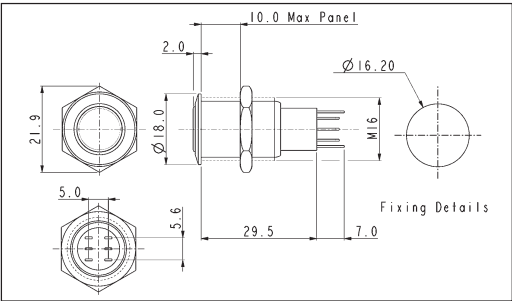
Stainless Steel - Momentary

LOW PROFILE




MP0045/1D

- 18mm bezel diameter
- 16mm fixing hole diameter
- D.P.C.O
- 3A, 250V

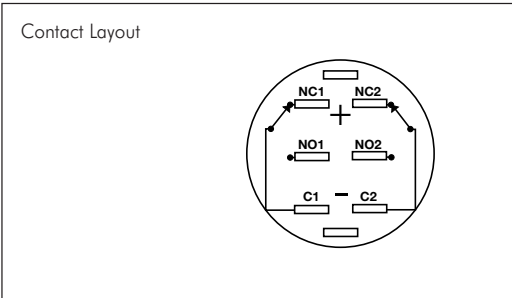
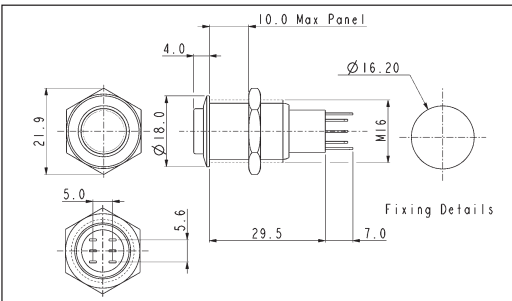


PROMINENT BUTTON



MP0045/3D

- 18mm bezel diameter
- 16mm fixing hole diameter
- D.P.C.O
- 3A, 250V



Specification	MP0045/1D0NN000	MP0045/3D0NN000
Terminations:	Solder tags	Solder Tags
Switching:	D.P.C.O Momentary Action	D.P.C.O Momentary Action
Max. Rating:	3A, 250V	3A, 250V
Contact Resistance:	50mΩ max. @ 1A, 2V	50mΩ max. @ 1A, 2V
Insulation Resistance:	> 10 ³ MΩ @ 500Vdc	> 10 ³ MΩ @ 500Vdc
Dielectric Strength:	> 2.0kVac	> 2.0kVac
Operating Temp. Range:	-20°C to +55°C	-20°C to +55°C
Operations		
Mechanical:	200,000 (min)	200,000 (min)
Electrical:	30,000 (min)	30,000 (min)
Rear Nut Fixing Torque:	12Nm max.	12Nm max.
Materials		
Mouldings:	Nylon	Nylon
Tags/Terminations:	Brass, Silver Plated	Brass, Silver Plated
Switch Body & Button:	Stainless Steel	Stainless Steel
Contacts:	Silver	Silver
Variants:	Nickel Plated Brass version available details on request	Nickel Plated Brass version available details on request
RoHS	Compliant	Compliant

SWITCHES

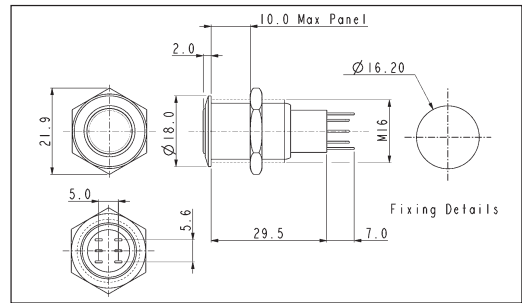
Downloaded from Elcodis.com electronic components distributor

Stainless Steel - Latching

LOW PROFILE



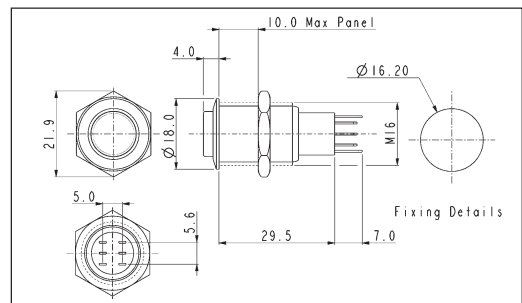
- 18mm bezel diameter
- 16mm fixing hole diameter
- D.P.C.O.
- 3A, 250Vac



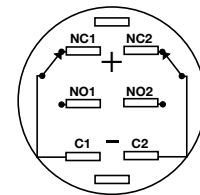
PROMINENT BUTTON



- 18mm bezel diameter
- 16mm fixing hole diameter
- D.P.C.O.
- 3A, 250Vac



Contact Layout



Specification	MP0045/1E0NN00	MP0045/3E0NN00
Terminations:	Solder Tags	Solder Tags
Switching:	D.P.C.O. - Latching Action	D.P.C.O. - Latching Action
Max. Rating:	3A, 250V	3A, 250V
Contact Resistance:	50mΩ max. @ 1A, 2V	50mΩ max. @ 1A, 2V
Insulation Resistance:	>10 ³ MΩ @ 500Vdc	>10 ³ MΩ @ 500Vdc
Dielectric Strength:	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +55°C	-20°C to +55°C
Operations		
Mechanical:	200,000 (min)	200,000 (min)
Electrical:	30,000 (min)	30,000 (min)
Rear Nut Fixing Torque:	12Nm max.	12Nm max.
Materials		
Mouldings:	Nylon	Nylon
Tags/Terminations:	Brass, Tin Plated	Brass, Tin Plated
Switch Body & Button:	Stainless Steel (Polished)	Stainless Steel (Polished)
Contacts:	Silver	Silver
Variants:	Nickel Plated Brass version details on request	Nickel Plated Brass version details on request
RoHS	Compliant	Compliant

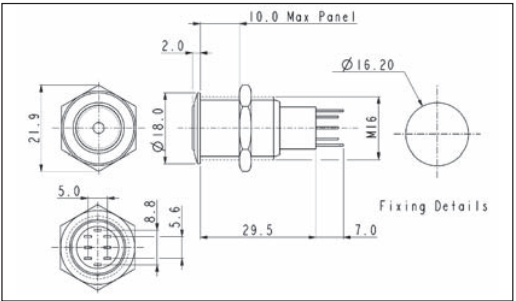
Stainless Steel Illuminated Momentary

FRONT PANEL MOUNTING



MP0045/1D1

- Dot Illuminated
- 18mm bezel diameter
- D.P.C.O.
- 3A, 250V ac
- Red, Green, Amber or Blue Illumination
- Separate LED Terminals

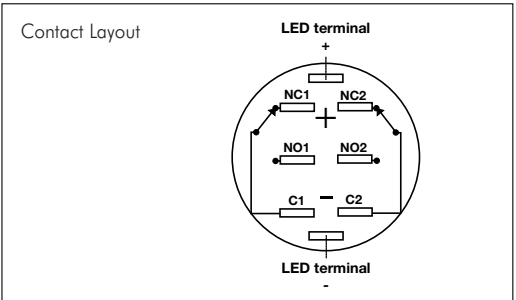
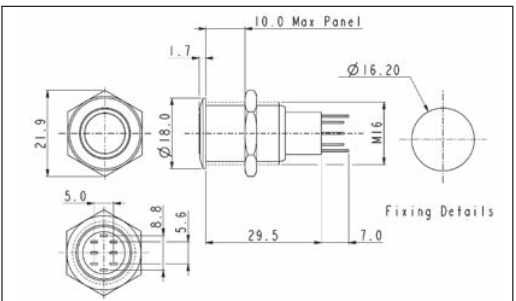


FRONT PANEL MOUNTING



MP0045/1D2

- Ring Illuminated
- 18mm bezel diameter
- D.P.C.O.
- 3A, 250V ac
- Red, Green, Amber or Blue Illumination
- Separate LED Terminals



Specification	MP0045/1D1/Colour/Voltage	MP0045/1D2/Colour/Voltage
Terminations:	Solder Tags	Solder Tags
Illumination:	Dot	Ring
Switching:	D.P.C.O. Momentary Action	D.P.C.O. Momentary Action
Max. Switch Rating:	3A, 250Vac	3A, 250Vac
LEDs		
Colours	Red Green Amber Blue	Red Green Amber Blue
Part No.	/RD /GN /AM /BL	/RD /GN /AM /BL
Voltage	12Vdc 220Vdc	12Vdc 220Vdc
Part No.	/012 /220	/012 /220
Contact Resistance:	50mΩ max. @ 1A, 2Vdc	50mΩ max. @ 1A, 2Vdc
Insulation Resistance:	>10 ³ MΩ @ 500Vac	>10 ³ MΩ @ 500Vac
Dielectric Strength:	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +55°C	-20°C to +55°C
Operations		
Mechanical:	200,000 (min)	200,000 (min)
Electrical:	30,000 (min)	30,000 (min)
Rear Nut Fixing Torque:	12Nm	12Nm
Materials		
Mouldings:	Nylon	Nylon
Tags:	Brass, Silver Plated	Brass, Silver Plated
Switch Body & Button:	Stainless Steel (Polished)	Stainless Steel (Polished)
Variants	Prominent Button, details on request	Prominent Button, details on request
RoHS	Compliant	Compliant

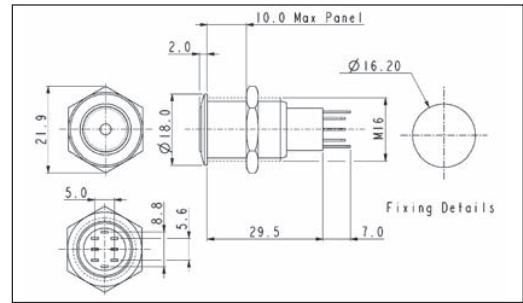
Stainless Steel Illuminated Latching

FRONT PANEL MOUNTING



MP0045/1E1

- Dot Illuminated
- 18mm bezel diameter
- D.P.C.O.
- 3A, 250V ac
- Red, Green, Amber or Blue Illumination
- Separate LED Terminals

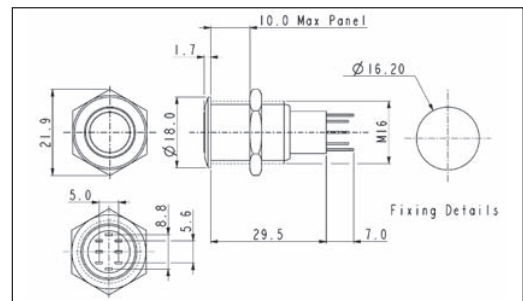


FRONT PANEL MOUNTING

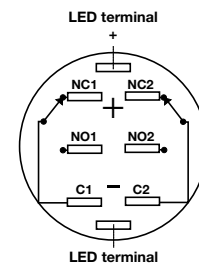


MP0045/1E2

- Ring Illuminated
- 18mm bezel diameter
- D.P.C.O.
- 3A, 250V ac
- Red, Green, Amber or Blue Illumination
- Separate LED Terminals



Contact Layout



Specification	MP0045/1E1/Colour/Voltage	MP0045/1E2/Colour/Voltage
Terminations:	Solder Tags	Solder Tags
Illumination:	Dot	Ring
Switching:	D.P.C.O. Latching Action	D.P.C.O. Latching Action
Max. Switch Rating:	3A, 250Vac	3A, 250Vac
LEDs		
Colours	Red Green Amber Blue	Red Green Amber Blue
Part No.	/RD /GN /AM /BL	/RD /GN /AM /BL
Voltage	12Vdc 220Vdc	12Vdc 220Vdc
Part No.	/012 /220	/012 /220
Contact Resistance:	50mΩ max. @ 1A, 2Vdc	50mΩ max. @ 1A, 2Vdc
Insulation Resistance:	>10 ³ MΩ @ 500Vac	>10 ³ MΩ @ 500Vac
Dielectric Strength:	>2.0kVac	>2.0kVac
Operating Temp. Range:	-20°C to +55°C	-20°C to +55°C
Operations		
Mechanical:	200,000 (min)	200,000 (min)
Electrical:	30,000 (min)	30,000 (min)
Rear Nut Fixing Torque:	12Nm	12Nm
Materials		
Mouldings:	Nylon	Nylon
Tags:	Brass, Silver Plated	Brass, Silver Plated
Switch Body & Button:	Stainless Steel (Polished)	Stainless Steel (Polished)
Variants	Prominent Button, details on request	Prominent Button, details on request
RoHS	Compliant	Compliant

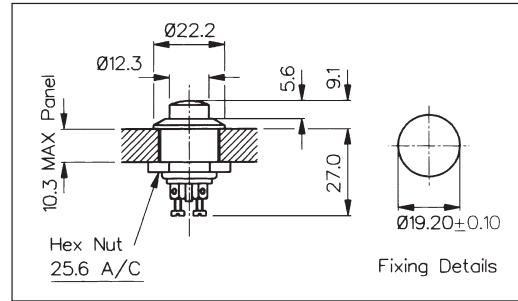
Push Button

FRONT PANEL MOUNTING



MP0012/Col

- 22mm diameter
- Prominent Button
- S.P. Push to Make
- Screw Terminals
- Brass, Chrome Plated Body, Glass Filled Nylon Button

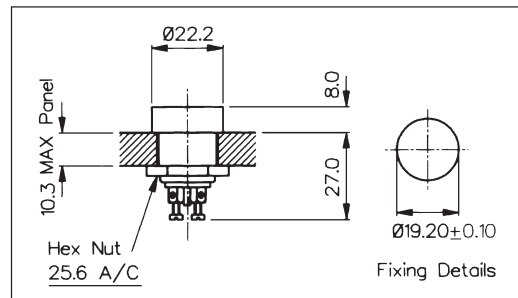


FRONT PANEL MOUNTING



MP0012/1/Col

- 22mm diameter
- Recessed Button
- S.P. Push to Make
- Screw Terminals
- Brass, Chrome Plated Body, Glass Filled Nylon Button

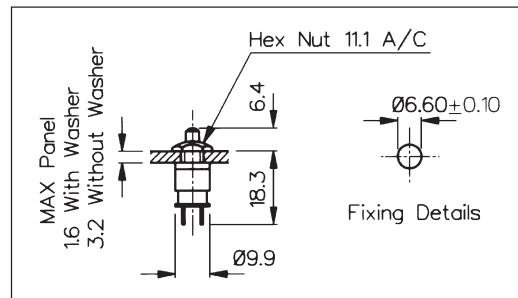


REAR PANEL MOUNTING



MP0016

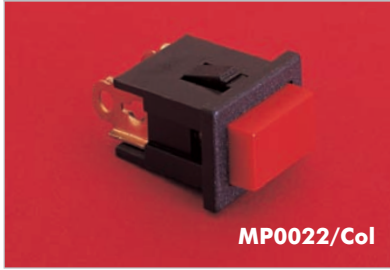
- S.P. Push to Make
- Solder Tags
- 1A, 28Vac/dc
- Brass Nickel Plated Body, Glass Filled Nylon Button



Specification	MP0012/Colour	MP0012/1/Colour	MP0016/Colour
Terminations:	Screw Terminals	Screw Terminals	Solder Tags
Switching:	S.P. Push to Make Slow Momentary Action	S.P. Push to Make Slow Momentary Action	S.P. Push to Make Slow Momentary Action
Max. Rating:	0.25A. 250Vac, 1A. 110Vac, 2A. 12Vac/dc	0.25A. 250Vac, 1A. 110Vac, 2A. 12Vac/dc	1A 28Vac/dc (non-inductive)
Contact Resistance:	<15mΩ	<15mΩ	<15mΩ
Insulation Resistance:	>10 ⁴ MΩ	>10 ⁴ MΩ.	>10 ⁴ MΩ
Dielectric Strength:	>2.5kVac	>2.5kVac	>2.0kVac
Operating Temp. Range:	-20°C to +85°C	-20°C to +85°C	-20°C to +85°C
Operating Pressure (typ):	936gms (33ozs)	936gms (33ozs)	634gms (22ozs)
Materials:			
Moulding:	Glass Filled Nylon	Glass Filled Nylon	Glass Filled Nylon
Body:	Brass, Chrome Plated	Brass, Chrome Plated	Brass, Chrome Plated
Contacts/Terms:	Brass, Silver Plated	Brass, Silver Plated	Brass, Silver Plated
Variants:	Button Colour: Standard - Black, /RD (Red)	Button Colour: Standard - Black, /RD (Red)	Button Colour: Standard - Black, /RD (Red)
RoHS	Compliant	Compliant	Compliant

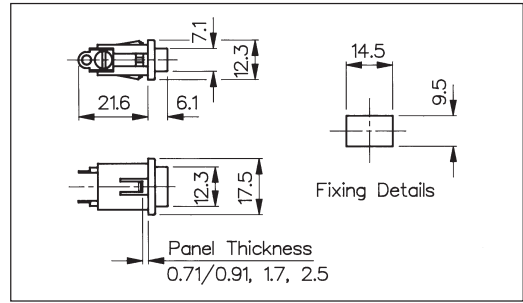
Push Button

FRONT PANEL MOUNTING

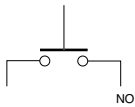


MP0022/Col

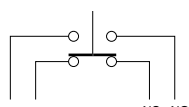
- S.P. Push to Make
- Solder Tags
- Nylon Body & Button



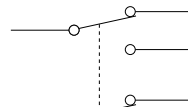
SWITCH CONTACT OPERATION



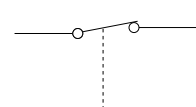
S.P. Push to Make
S.P.M.B.



S.P.C.O.



D.P.C.O.




D.P.M.B.

Specification	MP0022/Colour
Terminations:	Solder Tags
Switching:	S.P. Push to Make Slow Momentary Action
Max. Rating:	0.25A. 250Vac, 0.5A. 110Vac, 1A. 0.1 to 28Vac/dc
Contact Resistance:	<15mΩ
Insulation Resistance:	>10 ⁴ MΩ
Dielectric Strength:	>2.5kVac
Operating Temp. Range:	-20°C to +70°C
Sealing:	
Materials:	
Moulding:	Nylon
Tags:	Brass, Silver Plated
Body:	Nylon
Contacts/Terms:	Brass, Silver Plated
Variants:	Button Colours: Standard - Black, /WH (White) and /RD (Red). /TERM - (Screw terminals)
RoHS	Compliant

SWITCHES

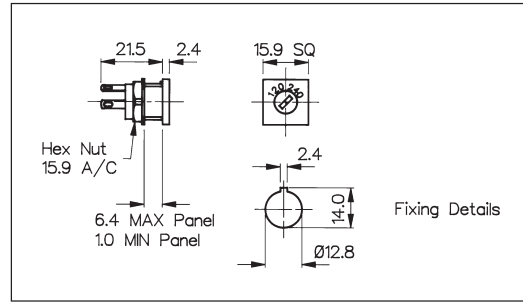
Voltage Selectors

120/240V VOLTAGE SELECTOR




VS0001

- 2.8 series tabs/solder tags
- Square Front Bezel
- 6.3A
- CSA & VDE approvals

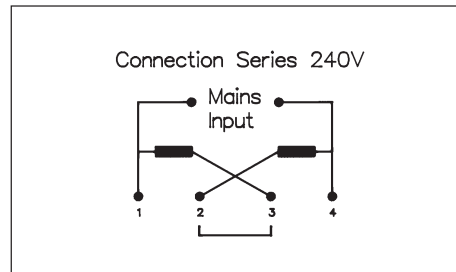
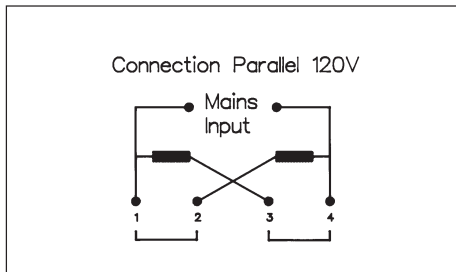
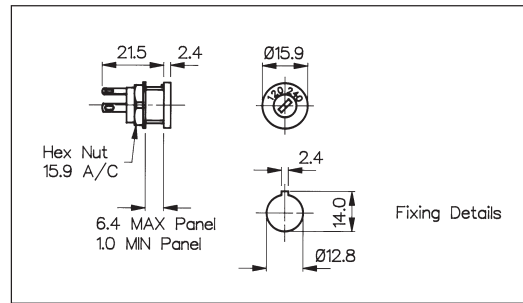




120/240V VOLTAGE SELECTOR



VS0002

- 2.8 series tabs/Solder tags
- Round Front Bezel
- 6.3A
- CSA & VDE approvals



Specification	VS0001	VS0002
Max. Rating:	6.3A, 120/240V	6.3A, 120/240V
Insulation Resistance:	>10 ⁶ MΩ	>10 ⁶ MΩ.
Termination:	2.8 series tabs/solder tags	2.8 series tabs/solder tags
Temperature Range:	-20°C to +85°C	-20°C to +85°C
Materials:		
Mouldings:	Glass Filled Nylon UL94V-1	Glass Filled Nylon UL94V-1
Tags:	Brass, Silver Plated	Brass, Silver Plated
Contacts:	Copper Silver Alloy	Copper Silver Alloy
Approvals:		
Variants:	Other markings, details on request	Other markings, details on request
	RoHS	Compliant

SWITCHES