

Description

Series 59

MINIATURE SEALED PUSHBUTTON

The series 59 is a miniature, rugged, panel sealed push button switch. This series comes in standard square and round bezel versions. Other standard features include a choice of six button colours, solder terminals and momentary action switching. PCB terminals, a high round bezel, surface and sublimation printing and an overboot for protection against icing (on the standard round bezel only) are available as non-standard options.

A locknut is supplied with each switch. The body of the series 59 is made of a high creep strength non-spark zinc alloy, making this suitable for use in the mining industry and potentially explosive atmospheres. It is panel sealed to IP67 and is designed to be impact resistant. The small size, robustness and being panel sealed make this series ideal for harsh environmental applications.

Features

- Non-spark material – To NCB 481/1965
- Wide temperature range – Up to 125°C
- Panel sealed – To IP67
- High environmental specification
- Gold contacts

Non-standard features:

- Overboot for protection against icing
- PCB terminals
- High round bezel
- Surface and sublimation printing

Specification

Mechanical

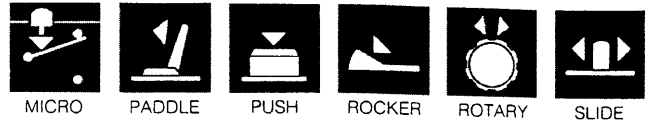
Travel (nom)	2,3mm
Life (max)	1,000,000 cycles
Operating force (nom)	3N
Contact bounce (nom)	1ms
Panel thickness (max)	3mm

Electrical

Dielectric strength	1000 VAC
Insulation resistance	1GΩ
Contact resistance (initial)	50mΩ
Current rating (typical)	400mA at 32 VAC resistive 100mA at 50 VDC resistive 125mA at 125 VAC resistive
Life (max)	500,000 cycles
Switching power (max)	16 VA AC

Environmental & Physical

Ingress protection	IP67
Shock	100G
Vibration	DEF STD 07-55
Operating temperature range	-55°C to + 125°C
Body material	Zinc Alloy
Button material	PBT
Contacts	Gold plated palladium nickel
Terminals	Gold plated brass
Salt mist	BS2011 Part 2:1
Soldering information	320°C max for 3s



Ordering information

Body style

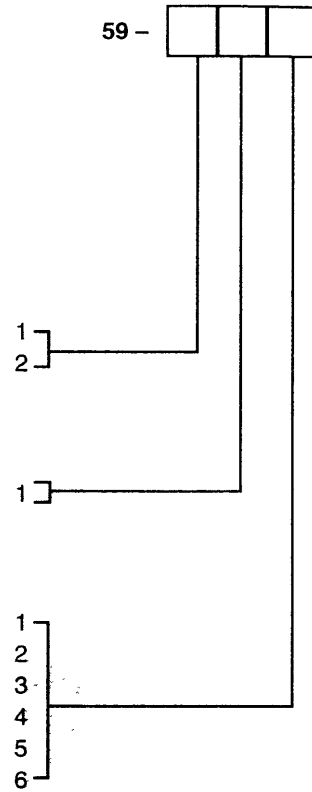
Standard round bezel
Standard square bezel

Termination

Solder

Button Colour

Black
Red
Green
White
Yellow
Blue

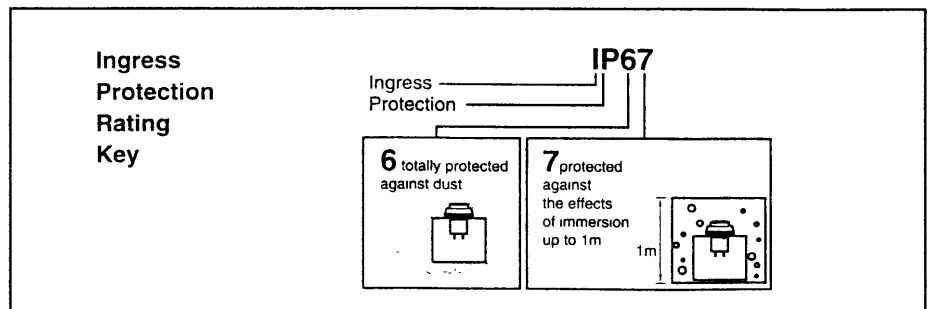


Panel mounting and construction information

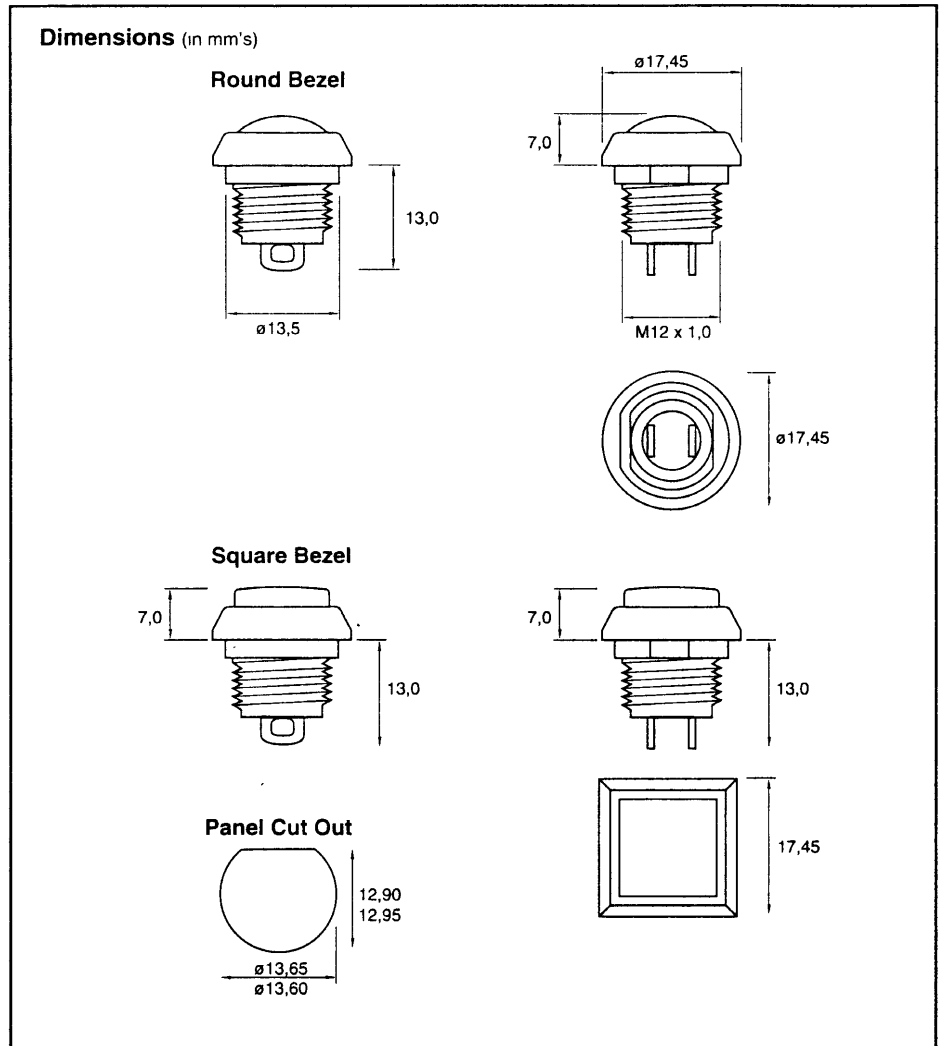
The series 59 mounts easily into panels of minimum 1,5 mm and maximum 3 mm thickness. Front panel sealing to IP67 is achieved by the use of a sealing 'O' ring which is fitted into a cast groove on the body of the switch before it is inserted into the panel hole cut out. It is

held onto the panel by means of a brass lock nut, tightened down by a 14 mm spanner, to a torque of between 1,5 Nm to 3,0 Nm to achieve the correct sealing pressure.

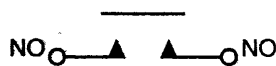
A 'D' flat is provided to prevent rotation.



Product dimensions



Circuit form



Typical applications

- Communications
- Instrumentation
- Data entry
- Military environments
- Environmentally demanding keypads
- Mass transport controls

For information on our complete range of switch products, please contact the Sales Office.

ITW Switches

ITW Switches
 A Division of ITW Limited
 Norway Road
 Portsmouth, England PO3 5HT
 Telephone: (0705) 694971 (INT +44 705 694971)
 Facsimile: (0705) 666352 (INT +44 705 666352)

Due to our policy of continuous product development, ITW Switches retain the right to change the specification at any time without prior notice