

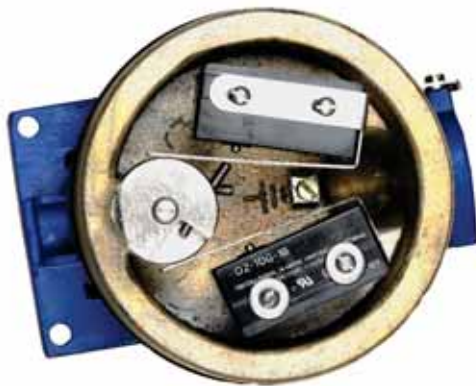
## MIL 496 Rotary Electric Switches





## Table of Contents

Introduction	01
Technical Information	01 - 02
<ul style="list-style-type: none"> <li>• Model Decodification</li> <li>• General Data</li> <li>• Electrical Safety and Enclosures</li> </ul>	
Construction & Dimensions	02



## Introduction

MIL 496 rotary switches are used for electrically indicating one or two predetermined positions in the stroke of a control valve. They may be connected to audible alarms or signal lights for warning of valve or system malfunction. These switches may also be used to actuate solenoids, relays and other electrical devices. Basic switches in the unit are single pole double throw snap acting and are individually adjusted by cams on the rotating shaft. Vernier adjustment is made by means of locking type set screws in the cams and these screws actuate the switches by contacting the switch spring levers. The spring lever provide over travel protection and allow maintained contact when required. The cam is adjustable to properly set the switches to operate at required stroke.

Incase of proximity model instruments, the proximity switch or sensor is mounted in the case, with suitable bracket. The sensing element or lever is mounted on the cam which can be adjusted in the rotary shaft to required position.

As the cam moves, the lever cuts the magnetic field created by the proximity sensor and a signal is generated.

The addition of a standard back lever and linkage permits its use with the linear motion valves. This instrument is made water proof by providing O-rings between the case and cover and on the rotary shaft.

## Technical Information

### Model Decodification

496.1	:	1 SPDT <sup>(1)</sup> Switch
496.2	:	2 SPDT Switches
496.4	:	1 Proximity Switch
496.5	:	2 Proximity Switches
496.6	:	1 DPDT <sup>(2)</sup> Switch
496.7 <sup>(3)</sup>	:	2 DPDT Switches
496.7A <sup>(3)</sup>	:	4 SPDT Switches

### General Data

Rotary travel	:	360°
Maximum linear travel	:	6"
Repeatability	:	0.2%
Ambient temperature	:	-50° C to +80° C
Electrical conduit entry	:	1/2" or 3/4" NPT(F)
Weight	:	1.6 kg

### Electrical Safety and Enclosures

#### Enclosure

Ingress protection IP 65 as per IS /IEC 60529

#### Hazardous Area

Flame proof : Ex d IIA, IIB, IIC  
as per IS/IEC 60079-1

<sup>(1)</sup>: Single Pole Double Throw

<sup>(2)</sup>: Double Pole Double Throw

<sup>(3)</sup>: Required electrical conduit entry is 3/4" NPT(F)



## Switch Ratings \*

SPDT	:	0.02A, 0.2A	220 V DC
		0.03A	110 V DC
		0.2A	220 V DC
		0.25A	220, 250 VDC
		0.4A	110, 125 VDC
		0.5A	125, 250 VDC
		1A, 2A	24 VDC
		1A	125 V AC
		5A	125, 440 V AC
		10A, 15A	125, 250, 480 V AC
DPDT	:	0.15A, 0.25A	250 VDC
		0.3A, 0.5A	125 VDC
		10A	30 VDC
		10A	125, 250 V AC
Proximity	:		24 VDC, 20-253 VAC

\* Other ratings would be given on request depending on the availability

## Construction & Dimensions (mm)

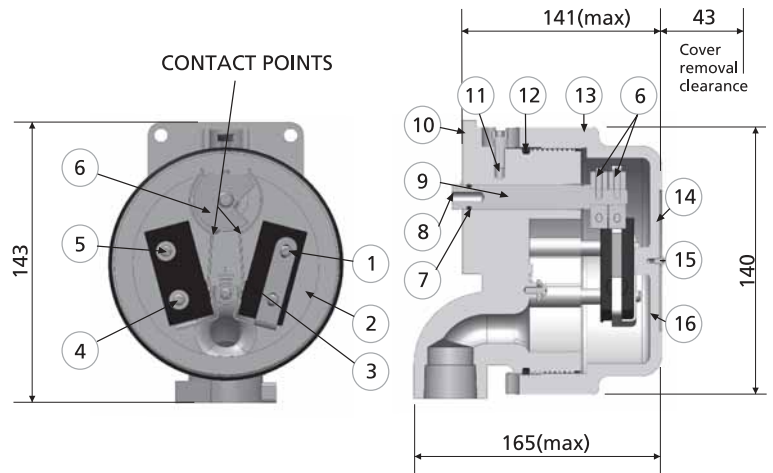
### Material of Construction

Housing and cover	:	Anodized Aluminum
Shaft	:	304 Stainless Steel
O-ring seals	:	Buna-N

All internal parts are of Stainless Steel or Zinc plated Steel or Nickel plated Brass. No Copper bearing alloys are exposed to atmosphere.

## Parts of Construction

REF No.	PART NAME	REF No.	PART NAME
1	Screw	9	Shaft
2	Microswitch	10	Body
3	Lever	11	Screw
4	Washer	12	O-Ring
5	Screw	13	Cover
6	Cam	14	Serial Plate
7	O-Ring	15	Drive Screw
8	Snap Ring	16	Insulator



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