CTS Electrocomponents®

Series 212 Data Sheet
Rotary Switch

Industrial Rotary Switch

Features

- Hill and valley detent
- Balanced double bump detent spring
- 30˚ or 60˚ indexing
- Spring return styles available
- Adjustable stop available
- Solder lug and printed circuit terminals available
- Molded stator prevents solder from flowing into the circuit
- Custom switching patterns available
- Index or wafers are available separately
- RoHS compliant

Electrical and Mechanical Specifications

Indexing
Double bump spring hill and valley detent with standand 30° indexing for 2 through 12 positions or with special 60° indexing from 2 to 6 positions.
Special 90° indexing consult CTS

Voltage and Current Rating
UL Rating: 3/4 amp at 125 VAC (shorting type only)
Special Rating: 1/4 amp at 28 VDC (shorting or non shorting)
1 amp at 28 VDC (shorting type only)

Contact Resistance
.015 ohm max. when measured from adjacent terminals

Stop Strength
15 in-lb (17.3 Kgf-cm)

Torque
Up to 48 in-oz. (3.4 Kgf-cm)

Detent Rotational Life
25,000 cycles

Materials
Shaft: Aluminum or unplated brass at CTS option
Bushing: Brass
Detent Spring: Spring brass or nickel silver depending on torque requirements
Front Plate: Zinc plated or nickel plated steel
Rotor Contacts, Stator Contacts and Terminals: Silver plated brass standard
Stator Insulator: Glass reinforced thermoset material

Bushing Lengths
Standard: 3/8"-32 UNEF-2A Thread,1/4" (6.35mm) or 3/8" (9.53mm) long.
Special Lengths: Available as required

Locating Lugs
Standard: Left side .531" (13.5mm) radius
Special: Right side .531" (13.5mm) radius or no lug

Shaft Trim
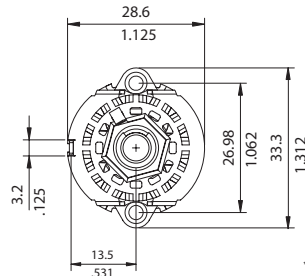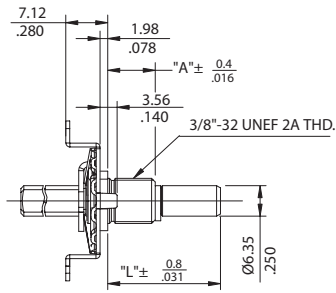Standard: Plain round, Flat, Slot, Knurl, or mixed (Flat with Slot)
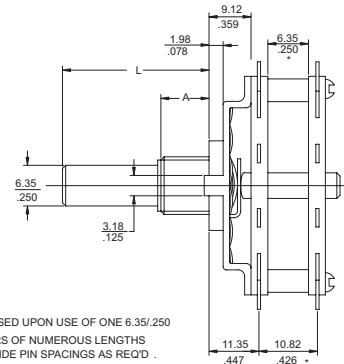Special: Available as request

Frames
Machine screw, bolt & nut, or rivet construction

IP67 Compliant - Product meets IP67 requirements when optional waterseal construction is specified and product is installed in a sealed housing.

1 - 3
CTS Electrocomponents

© 2010 CTS Corporation. All rights reserved. Information subject to change.

03/17/10
www.ctscorp.com

Downloaded from Elcodis.com electronic components distributor

Physical Dimensions

Detent Only

Typical Assembled Switch

* NOTE :
10.82/.426 DIMENSION BASED UPON USE OF ONE 6.35/.250
NO SPACERS OR SPACERS OF NUMEROUS LENGTHS
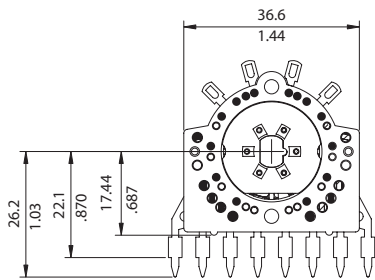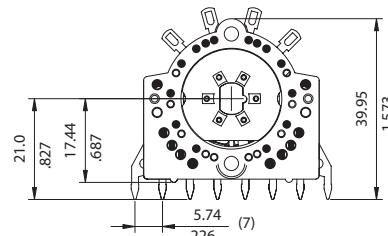ARE AVAILABLE TO PROVIDE PIN SPACINGS AS REQ'D .

Available Terminal Styles

Y-Style

X-Style

U-Style
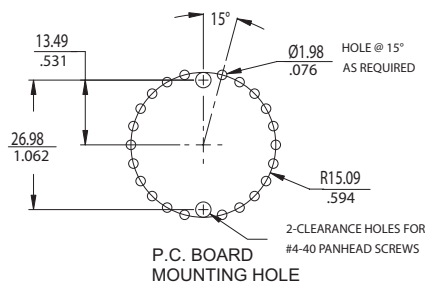
T-Style

P-Style

P.C. BOARD
MOUNTING HOLE
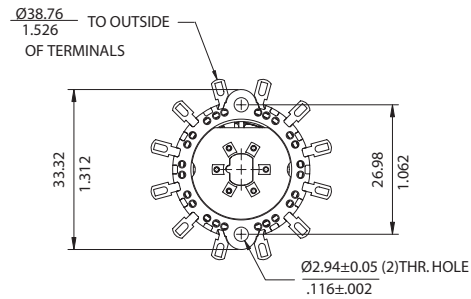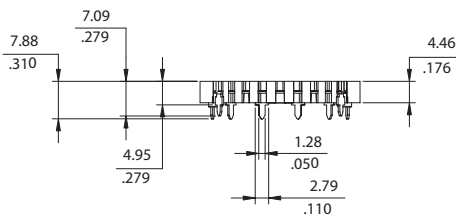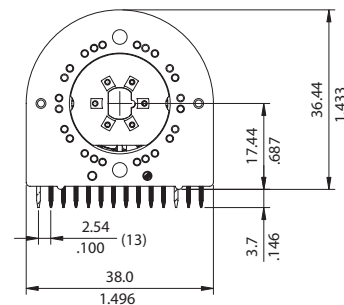
DIMENSION: mm/inch

Ordering Information

212 T 01 02 N 2 20 R N 1

POLES
- **01** – 1 POLE
- **10** – 10 POLES
ETC.

CONTACT TYPE
- **N** – NON SHORTING (BREAK BEFORE MAKE)
- **S** – SHORTING (MAKE BEFORE BREAK)

* Maximum of 11 shorting changes (make before break) on one wafer, maximum of 12 non-shorting changes (break before make) on one wafer.

SHAFT FMS 1/32" INCREMENTS
- **20** – .625" (15.9mm)
- **24** – .750" (19.1mm)
- **28** – .875" (22.2mm)
- **32** – 1.000" (25.4mm)

SPECIALS
- **N** – NONE
- **D** – NO LOCATING LUG
- **E** – LOCATING LUG RIGHT SIDE

INDEX OR ADJUSTABLE STOP
- **BLANK** – STANDARD
- **1** – 60° INDEX
- **2** – 30° INDEX WITH ADJUSTABLE STOP
- **3** – 60° INDEX WITH ADJUSTABLE STOP

TERMINAL STYLE
- **T** – SOLDER LUG
- **X** – PC
- **U** – PC FORMED TO REAR
- **P** – PC WITH .100" (2.54mm) SPACING
- **Y** – X STYLE WITH .870" (22.1mm) HEIGHT STAND OFF

POSITIONS
- **02** – 2 POSITIONS
- **12** – 12 POSITIONS
ETC.

MOUNTING STYLE

BUSHING LENGTH: 1/8" INCREMENTS

EXAMPLES:
- **2** – .250" (6.35mm)
- **3** – .375" (9.5mm)

BUSHING MOUNT SUPPLIED WITH LOCATING LUG LEFT SIDE TERMINALS DOWN

SHAFT TRIM
- **R** – ROUND
- **F** – FLATTED .375" X .156" (9.53mm X 4.0mm)
- **K** – KNURLED EIA S148(24 TEETH)
- **S** – SD SLOT .047" WIDE X .063" DEEP (1.2mm X 1.6mm)
- **M** – FLATTED .375" X .218" (9.53mm X 5.54mm) WITH SLOT