Keylock Rotary Switches

## SERIES 58

## Single Deck, Antistatic

## LOCK FEATURES

- Minimum Space Behind Panel
-15,000 Vdc Static Protection
- 5 Tumbler-Plate Security

SWITCH FEATURES

- Economical
- Solder Lug or PC Mount
- $36^{\circ}, 45^{\circ}, 60^{\circ}$, or $90^{\circ}$ Throws

- In-Panel Key Recoding
- 1 or 2 Poles Per Switch
- Up to 10 Positions for 1 Pole
- 200 mA for 25,000 Cycles

DIMENSIONS In inches (and millimeters)


TERMINAL DETAIL
Solder Lug Solder Lug Common

RECOMMENDED PANEL CUT


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## CIRCUITRY



## LOCK SPECIFICATIONS

## General Characteristics

Mounting: By bushing, nut and lockwasher Keying: All locks keyed alike except by special order
Orientation of Keylock Switch: Lock flats on both sides with key upright (cut side down) in position 1.

## Key Removals:

| $36^{\circ}$ Throw Switch | At every position or <br> At $0^{\circ} \& 180^{\circ}$ <br> At every position or <br> At $0^{\circ}, 90^{\circ}, 180^{\circ}, 270^{\circ}$ |
| :--- | :--- |
| $45^{\circ}$ Throw Switch | At every position or |
| $60^{\circ}$ Throw Switch | At $0^{\circ}, 180^{\circ}$ |
| $90^{\circ}$ Throw Switch | At every position or <br> At $0^{\circ}, 180^{\circ}$ |
| Optional pulls | Contact Grayhill |

## SWITCH SPECIFICATIONS

## Electrical Characteristics

Chart is shown for non-shorting contacts and resistive load and for the life limiting criteria indicated below. The data for the curve was measured at sea level, $25^{\circ} \mathrm{C}$ and $68 \%$ relative humidity. Contact Grayhill formore information if any of the following is true: life limiting criteria are more critical than those listed; more cycles of operation are required; a larger make and break current is required; the operating environment includes elevated temperatures or reduced pressures.


## SWITCH SPECIFICATIONS Continued

## Contact Resistance:

Initially: less than $10 \mathrm{~m} \Omega$
End of life: less than $50 \mathrm{~m} \Omega$
Insulation Resistance: (Between mutually insulated parts)

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\begin{array}{ll}
\text { Initially: } & 50,000 \mathrm{M} \Omega \\
\text { Minimum: } & 10,000 \mathrm{M} \Omega
\end{array}
$$

Breakdown Voltage: (Between mutually insulated parts) more than 600 Vac Life Expectancy: Per chart; cycle is 1 rotation thru all active positions plus a full return.
Carry Current: 6A; maximum temperature rise $20^{\circ} \mathrm{C}$

Anti-Static Voltage: Anti-static types tested to withstand $15,000 \mathrm{Vdc}$

## Mechanical Characteristics

Switching Mode: Shorting (make before break) or non-shorting (break before make) as limited by the Choices chart Type of Contact: Wiping
Number of Terminals: All switches are provided with the full circle of terminals regardless of the number of active positions
Stop Strength: 1.70 Nm maximum ( $15.0 \mathrm{in}-\mathrm{lbs}$ ) Switching Torque: 8 to 16 in-ozs

## Materials and Finishes

Switch Base: Thermoset plastic
Switch Housing: Nylon
Detent Rotor: Nylon
Detent Balls: Steel, nickel-plated
Detent Springs, and Contact Springs: Stainless steel
Common Ring: Brass, gold plate over silver plate
Terminals: Brass, gold over silver and nickel plate
Rotor Contact: Precious metal, gold alloy

CHOICES AND LIMITATIONS

| Lock Style and Description* |  | Switch Style and Description | Angle of Throw | No. Of Decks | Poles/ Deck | Positions <br> Per Pole** | Shorting or Non-Shrtg. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Series 58J Switches |  |  |  |  |  |  |  |
| J4: Standard-Key pulls at Position 1 and at 90 Degree Increments |  | $\begin{aligned} & \text { = Standard, Solder Lugs } \\ & \text { = Standard, PC Mount } \end{aligned}$ | $45^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | 02 to 08 02 to 04 | N or S N or S |
| J8: Standard-Key Pulls at Each Position |  | = Standard, Solder Lugs <br> = Standard, PC Mount | $36^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | $\begin{aligned} & 02 \text { to } 10 \\ & 02 \text { to } 05 \end{aligned}$ | N or S N or S |
|  |  |  | $45^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | 02 to 08 <br> 02 to 04 | N or S N or S |
|  |  |  | $90^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | $\begin{gathered} 02 \text { to } 04 \\ 02 \end{gathered}$ | $\begin{aligned} & \mathrm{N} \\ & \mathrm{~N} \end{aligned}$ |
| J9: Standard-Key Pulls at Position 1 and at 180 Degrees |  | $=$ Standard, Solder Lugs <br> = Standard, PC Mount | $36^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | $\begin{aligned} & 02 \text { to } 10 \\ & 02 \text { to } 05 \end{aligned}$ | N or S N or S |
|  |  |  | $45^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | 02 to 08 02 to 04 | N or S Nors |
|  |  |  | $60^{\circ}$ | 1 | $\begin{aligned} & 1 \\ & 2 \end{aligned}$ | $\begin{aligned} & 02 \text { to } 06 \\ & 02 \text { to } 03 \end{aligned}$ | $\begin{aligned} & \mathrm{N} \\ & \mathrm{~N} \end{aligned}$ |
|  |  |  | $90^{\circ}$ | 1 | 1 | $\begin{gathered} 02 \text { to } 04 \\ 02 \end{gathered}$ | $\begin{aligned} & \mathrm{N} \\ & \mathrm{~N} \end{aligned}$ |

*Standard Keylock has anti-static protection. All keylock versions available without anti-static protection, with a reduced overall body length. Contact Grayhill for more information.
${ }^{* *}$ For single pole switches with maximum positions, specify continuous rotation or fixed stop when ordering.

ORDERING INFORMATION


Available from your local Grayhill Distributor. For prices and discounts, contact a local Sales Office, an authorized local Distributor or Grayhill.


[^0]:    Rotary
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