



## Specifications

Electrical Ratings	Max Current : 15mA Max Voltage : 24VDC
Sealing Degree	IP68
Electrical Life	50,000,000 cycles typical
Contact Resistance	≤ 20mΩ initial

Actuation Force/Travel	0gF / 0mm
Dielectric Strength	250Vrms min between contacts
Insulation Resistance	≥ 10MΩ min @ 600VDC
Operating Temperature	-40°C to 85°C
Storage Temperature	-40°C to 85°C

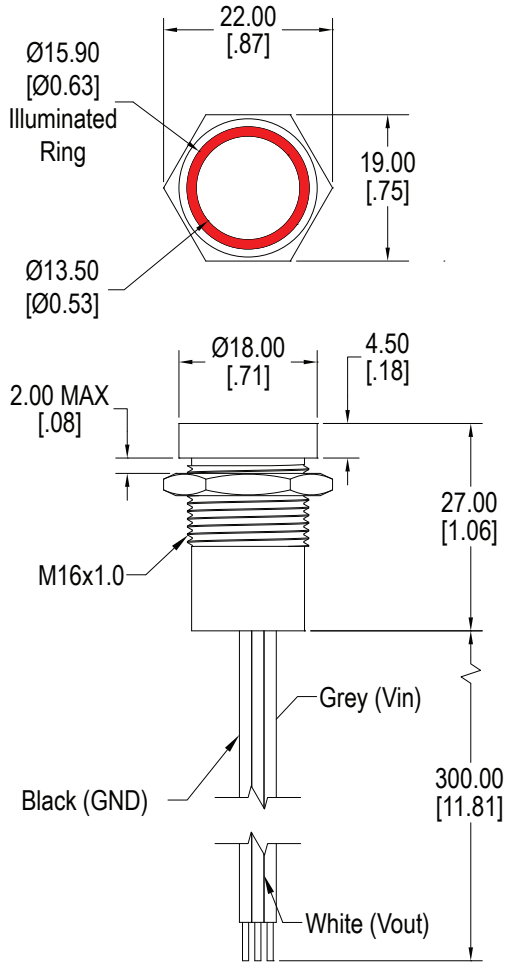
## Materials

Actuator	Stainless Steel
LED Lens	Polycarbonate (PC)
Threaded Body	Stainless Steel
Wire	UL1430 22AWG
Hardware	One Hex Nut & One "O" Ring Supplied

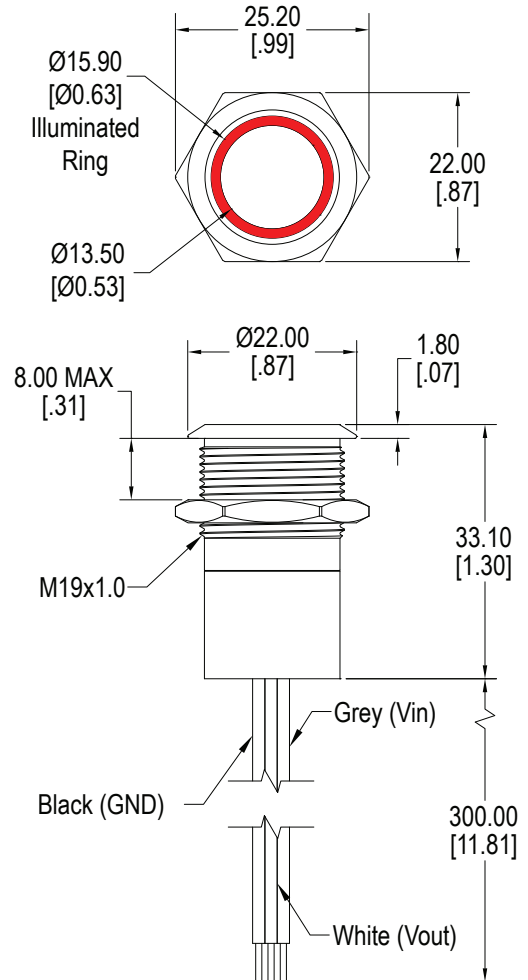
## Ordering Information

1. Series	TH22	L	B	S	RG	12V	S																						
TH16*																													
TH19																													
TH22																													
TH25																													
<i>*only available with momentary function</i>																													
2. Bezel Style	Blank = Standard Bezel <i>not available on 16mm</i> H = 4.5mm High Bezel <i>16mm only</i> <i>Contact Factory for custom bezel styles</i>																												
3. Latching Option	N = Momentary L = Latching D = 30 Second Hold																												
4. Actuator Style	B = Flush actuator, thick ring illuminated <i>not available on 16mm or 19mm</i> T = Flush actuator, thin ring illuminated <i>not available on 25mm</i>																												
5. Switch Finish	S = Brushed Stainless Steel <i>Contact Factory for custom finish options</i>																												
6. LED Color & State	<table border="0"> <tr> <td>Single LED</td> <td>Dual LED</td> </tr> <tr> <td>RN = Red / Off</td> <td>RG = Red / Green</td> </tr> <tr> <td>ON = Orange / Off</td> <td>RB = Red / Blue</td> </tr> <tr> <td>GN = Green / Off</td> <td>BG = Blue / Green</td> </tr> <tr> <td>BN = Blue / Off</td> <td>WO = White / Orange</td> </tr> <tr> <td>WN = White / Off</td> <td>GR = Green / Red</td> </tr> <tr> <td>NR = Off / Red</td> <td>BR = Blue / Red</td> </tr> <tr> <td>NO = Off / Orange</td> <td>GB = Green / Blue</td> </tr> <tr> <td>NG = Off / Green</td> <td>OW = Orange / White</td> </tr> <tr> <td>NB = Off / Blue</td> <td></td> </tr> <tr> <td>NW = Off / White</td> <td></td> </tr> </table>							Single LED	Dual LED	RN = Red / Off	RG = Red / Green	ON = Orange / Off	RB = Red / Blue	GN = Green / Off	BG = Blue / Green	BN = Blue / Off	WO = White / Orange	WN = White / Off	GR = Green / Red	NR = Off / Red	BR = Blue / Red	NO = Off / Orange	GB = Green / Blue	NG = Off / Green	OW = Orange / White	NB = Off / Blue		NW = Off / White	
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7. LED Voltage	5V = 5VDC 12V = 12VDC 24V = 24VDC																												
8. Wire Length	S = 300 mm length <i>Contact Factory for custom wire lengths</i>																												

**Dimensions**

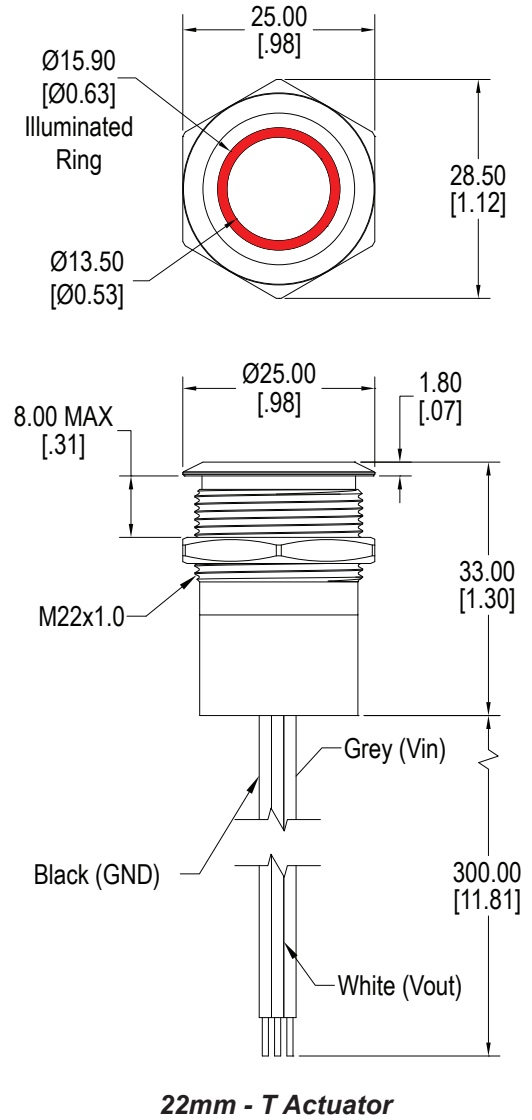
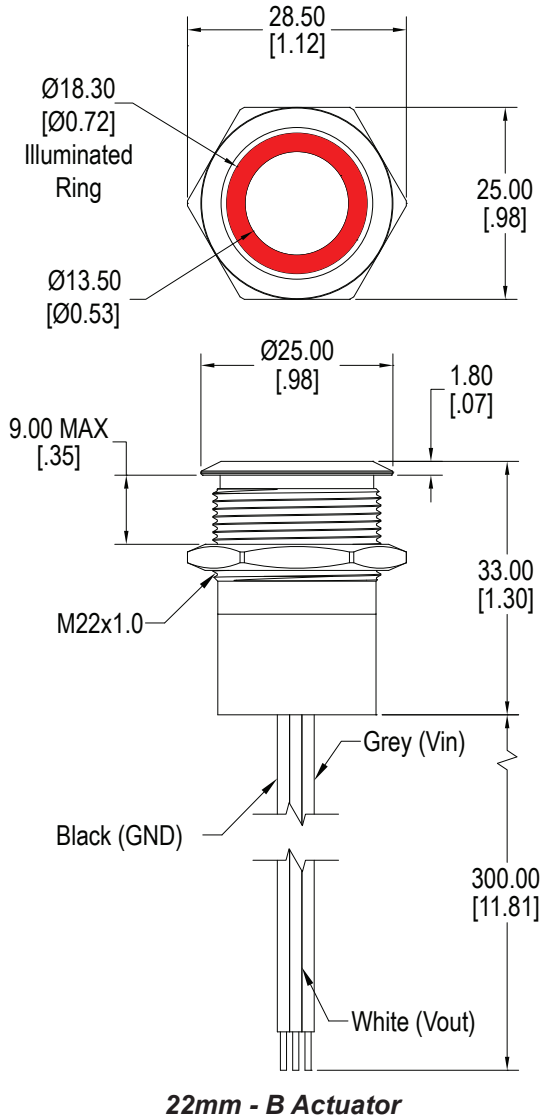


**16mm - T Actuator**

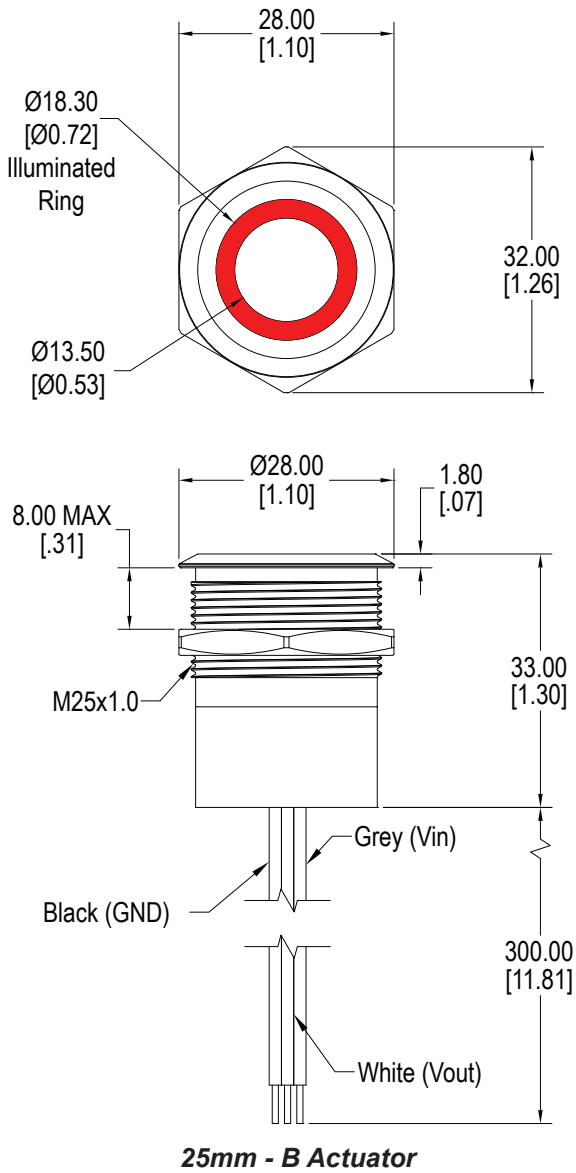


**19mm - T Actuator**

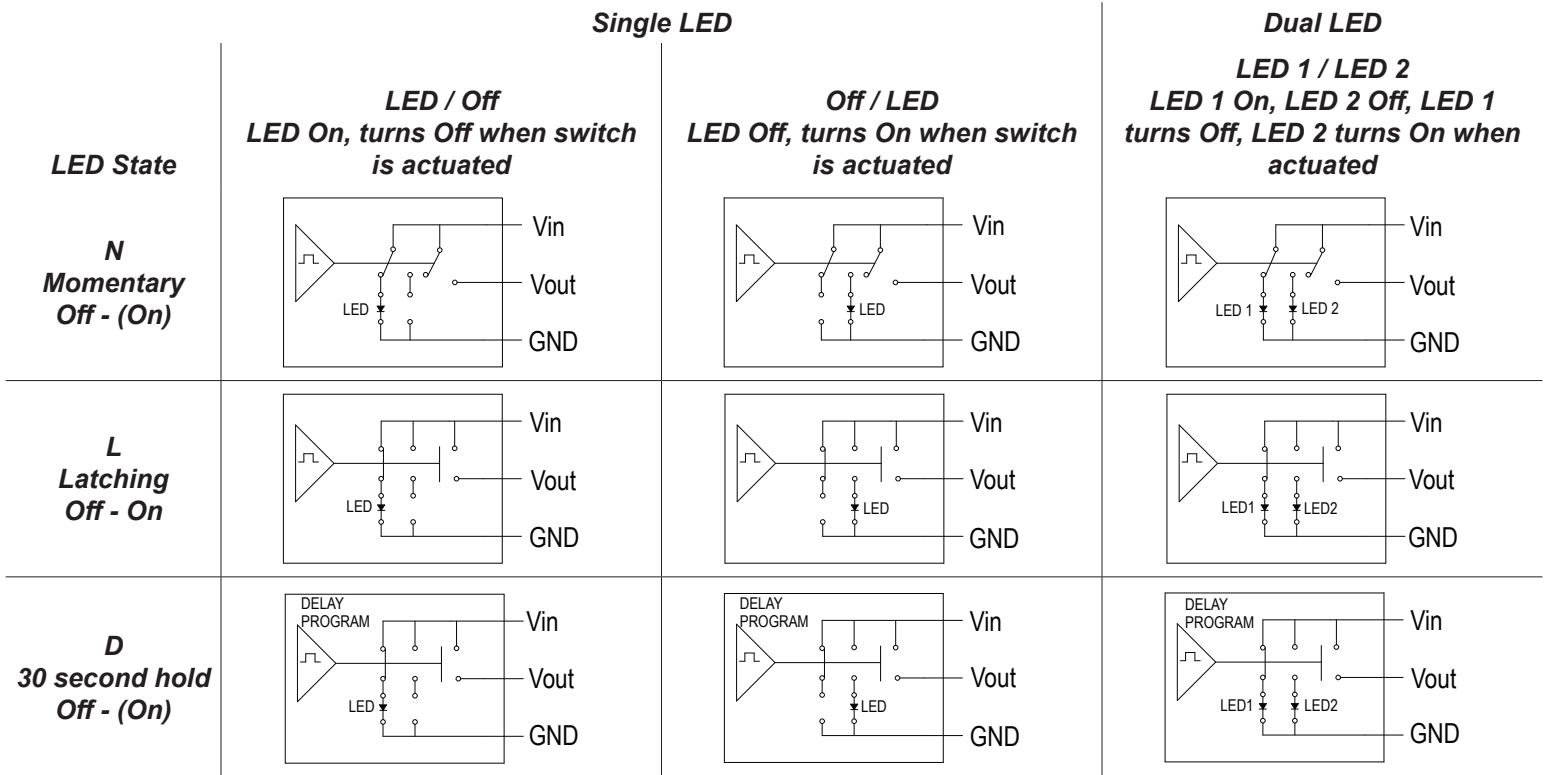
**Dimensions**



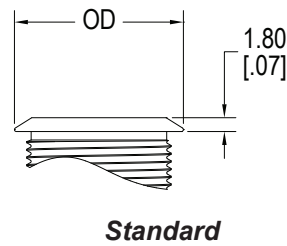
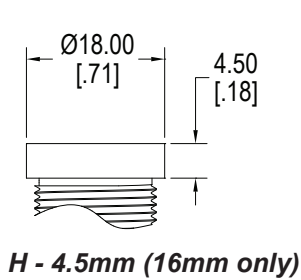
**Dimensions**



**Schematics**



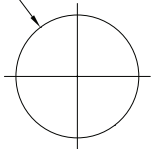
**Bezel Detail**



OD SIZE	
SWITCH SIZE	OD SIZE (mm)
TH19	22
TH22	25
TH25	28

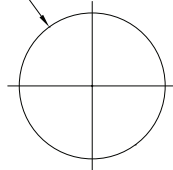
### Panel Cut-Outs

Ø16.00  
[Ø0.63]



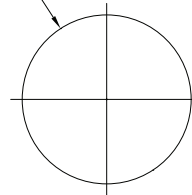
16mm

Ø19.00  
[Ø0.75]



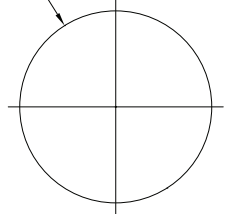
19mm

Ø22.00  
[Ø0.87]



22mm

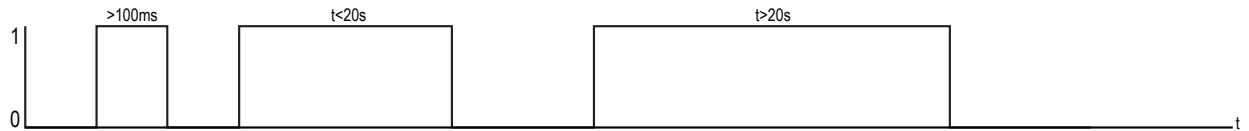
Ø25.00  
[Ø0.98]



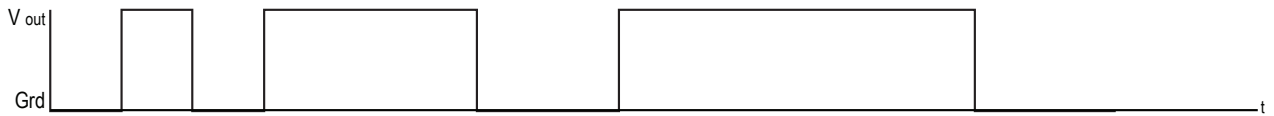
25mm

### Response Graphs

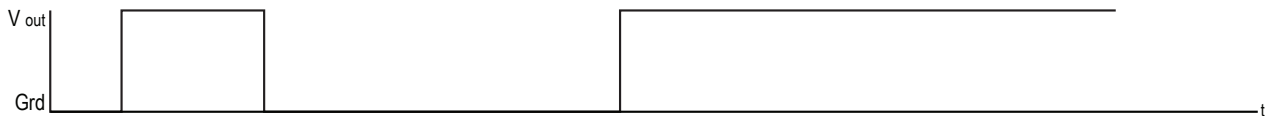
**Function Setup Graph**



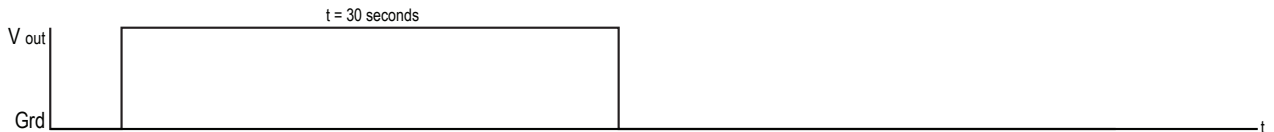
**N  
Momentary  
Off - (On)**



**L  
Latching  
Off - On**



**D  
30 second hold  
Off - (On)**



### LED Characteristics

LED Ratings		Color						Units
		R	Y	G	B	O	W	
Reverse Voltage	$V_R$	5	5	5	5	5	5	V
Forward Current (peak)	$I_{FS}$	120	120	160	160	120	160	mA
Reverse Current $V_R = 5V$	$I_R$	10	10	10	10	10	10	$\mu A$
Power Dissipation	$P_T$	80	80	120	120	80	120	mW
Forward Voltage (typ) $I_F = 20mA$	$V_F$	2.1	2.1	3.3	3.3	2.0	3.0	V
Luminous Intensity, $I_F = 20mA$	LI	120	120	170	100	120	700	mcd