

SEALED, ILLUMINATED ROCKER SWITCHES

K5
SEALED
ROCKERS

ATTRACTIVE & RUGGED FOR WET & DUSTY ENVIRONMENTS

The OTTO K5 series is a quality, precision switch designed to comply with standards established for appliance, marine (ignition protection) and off-road vehicles along with other demanding applications where rugged rocker switches are required.

K5 series sealed rocker switches snap into industry-standard panel cutouts. Choose illuminated and printed legends, thru-panel drain option and switching compatibility from logic level up to 20 amps.

The K5 series offers a choice of LED, incandescent and neon illumination. Legends can be stamped onto a non-illuminated button, stamped onto an illuminated lens or laser etched into the lens and backlit.

Available in standard and logic level contact ratings, the K5 rockers will fit a wide range of applications. Expect a minimum of 25,000 cycles at a full rated load of 20 amps resistive or 15 amps inductive. 100,000 cycles mechanical. A full complement of switch operation is available including momentary and maintained action in 2 or 3-position switches in SPST, SPDT, SPTT, DPST and DPDT circuit arrangements.

OTTO can provide custom colors upon request. Value-added assemblies with wire leads are also available. Please consult the factory for assistance.

Features:

- Sealed watertight per IP68S and IP69K
- Snap-in panel mounting into industry standard panel cutout
- Optional panel seal gasket
- LED, neon & incandescent lighting
- 0.250" Quick Connect terminals
- Optional one-piece connector
- Optional terminal barriers
- Logic level up to 20 amp switch
- Configurable Single Pole Triple Throw (SPTT) with external jumpers
- Soft Touch button available
- RoHS compliant



Raised Bars Shown

Standard Characteristics/Ratings:

ELECTRICAL RATINGS:

Load	Sea Level @ 28VDC	Sea Level @ 125VAC, 60/400Hz
Resistive	20A	16A
Inductive	15A	15A
Lamp	5A	5A
Motor	0.5HP @ 110VAC	
DWV	1000Vrms except across light terminals	
Logic Level	10mA @ 5VDC, max D.C. logic level ratings (void if logic level load(s) exceeded at any time)	

Electrical Life: 25,000 cycles

LIGHTING:

Light Source	Rating
Incandescent	(VDC) 6V, 12V, 24V
Neon	(VAC) 125V, 250V
LED	(VDC) 2V, 6V, 12V, 24V

Mechanical Life: 100,000 cycles

Seal: IP68S and IP69K

Operating Temp Range: -40°C to +85°C

MATERIALS:

Case:	Thermoplastic
Button:	Thermoplastic
Terminals/Contact:	Brass, silver alloy with silver plate, gold flash for logic level
Terminal Hardware:	K5 series recommended Quick Connect terminals: AMP 60253-2 for 12-16 AWG AMP 42100-2 for 14-18 AWG
Mounting Hardware:	None provided

Ihr offizieller Vertriebspartner



ALDERS[®]
Indicate. Control. Connect.

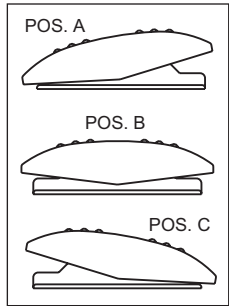
ALDERS electronic GmbH
Arnoldstraße 19
47906 Kempen

+49 2152 8955-0
vertrieb@alders.de / www.alders.de

SNAP-IN PANEL MOUNTING

K5 SERIES PART NUMBER CODE

K5		X	X	X	X	XX	X	X	Part Number Code Continued Below			
Base Options		Rocker Color*/Style		Rocker Features		Switch Action/Circuit		Light Source Type*		Light Circuit		
A. With Keying Pin Only Standard Rating Silver Plate	A. Black Plastic Rocker	B. Black "Soft Touch" Rocker	C. Red Plastic Rocker	D. Red "Soft Touch" Rocker	E. White Plastic Rocker	F. White "Soft Touch" Rocker	H. Green Plastic Rocker	J. Orange Plastic Rocker	K. Blue Plastic Rocker	L. Gray "Soft Touch" Rocker	M. Gray Plastic Rocker	
B. Without Barriers or Pin Standard Rating Silver Plate	D. 2 Lens	3. Raised Bars	4. Raised Lit Bars	NOTE: Raised Lit Bars are available with the Soft Touch rocker styles. Soft Touch rockers require same color lenses/lit bars for both positions.		1A. 3-4	2A. 3-4/8-9	1B. 3-4	2B. 3-4/8-9	1C. (3-4)	2C. (3-4)/(8-9)	
C. With Terminal Barriers Only Standard Rating Silver Plate	E. 2 Lens	3. Raised Bars	4. Raised Lit Bars			1D. (3-4)	2D. (3-4)/(8-9)	1E. (3-4)	2E. (3-4)/(8-9)	1F. (3-4)	2F. (3-4)/(8-9)	
D. With Keying Pin Only Logic Level Rating Gold Plate	F. 2 Lens	3. Raised Bars	4. Raised Lit Bars			1G. (3-4)	2G. (3-4)/(8-9)	1H. 3-4/8-9	2H. 3-4/8-9	1I. (3-4)	2I. (3-4)/(8-9)	
E. Without Barriers or Pin Logic Level Rating Gold Plate	G. 2 Lens	3. Raised Bars	4. Raised Lit Bars			1J. 3-4/8-9	2J. 3-4/8-9	1K. (3-4)/(8-9)	2K. (3-4)/(8-9)	1L. (3-4)/(8-9)	2L. (3-4)/(8-9)	
F. With Terminal Barriers Only Logic Level Rating Gold Plate	I. 2 Lens	3. Raised Bars	4. Raised Lit Bars			1M. 3-4/8-9	2M. 3-4/8-9	1N. (3-4)/(8-9)	2N. (3-4)/(8-9)	1P. (3-4)/(8-9)	2P. (3-4)/(8-9)	
G. With Keying Pin Only Standard Rating No Plate	M. Gray Plastic Rocker					1Q. 3-4/8-9	2Q. 3-4/8-9	1R. 3-4/8-9	2R. 3-4/8-9	1S. (3-4)/(8-9)	2S. (3-4)/(8-9)	
H. Without Barrier or Pin Standard Rating No Plate	*Additional colors available. Contact factory.											
J. With Terminal Barriers Only Standard Rating No Plate												
NOTE: All code combinations are not feasible. Consult factory for product availability.												



Position "A"	Position "B"	Position "C"	Special Circuits
1H. 3-4/8-9	8-9	OFF	ON/ON/OFF
1J. 3-4/8-9	8-9	NONE	ON/ON/NONE
1K. (3-4)/(8-9)	8-9	OFF	(ON)/ON/OFF
1L. (3-4)/(8-9)	8-9	NONE	(ON)/ON/NONE
1M. 3-4/8-9	3-2/8-9	3-2/8-7	ON/ON/ON
1N. (3-4)/(8-9)	3-2/8-9	3-2/8-7	(ON)/ON/ON
1P. (3-4)/(8-9)	3-2/8-9	(3-2)/(8-7)	(ON)/ON/(ON)
2R. 3-4/8-9	OFF/8-9	OFF/OFF	ON/OFF/OFF
2S. (3-4)/(8-9)	OFF/8-9	OFF/OFF	ON/OFF/OFF

Light Source Type*		Light Circuit	
A. No Illumination	Circuit	Terminal Connections	
B. 6V Incandescent	A. NONE	NONE	
C. 12V Incandescent	B. Dep. in "A"	1(-) & 4(+)	
D. 24V Incandescent	C. Dep. in "C"	2(+) & 5(-)	
E. 125VAC Neon	D. Ind. in "A"	1(-) & 6(+)	
F. 250VAC Neon	E. Ind. in "C"	5(-) & 10(+)	
G. 2V Red LED	F. Dep. in "A"	1(-) & 4(+)	
H. 2V Green LED	Dep. in "C"	2(+) & 5(-)	
J. 2V Amber LED	G. Dep. in "A"	1(-) & 4(+)	
K. 6V Red LED	Ind. in "C"	5(-) & 10(+)	
L. 6V Green LED	H. Ind. in "A"	1(-) & 6(+)	
M. 6V Amber LED	Dep. in "C"	2(+) & 5(-)	
N. 12V Red LED	J. Ind. in "A"	1(-) & 6(+)	
P. 12V Green LED	Ind. in "C"	5(-) & 10(+)	
Q. 12V Amber LED	NOTE: Polarity only applies to LED circuits.		
R. 24V Red LED			
S. 24V Green LED			
T. 24V Amber LED			

*See appendix for complete voltage/ratings table

K5 PART NUMBER CODE - CONTINUED FROM ABOVE

X		X	XX	XX	X	X	X		
Lens Color		Legend Style		Legend Color		Legend Orientation			
Position "A"	Position "C"	Position "A"	Position "C"	Position "A"	Position "C"	Position "A"	Position "C"		
1. Transparent Red	1. Transparent Red	ZZ. No Legend	ZZ. No Legend	1. Red	1. Red	1. Std.	A C		
2. Transparent Green	2. Transparent Green	NOTE: For all other legend options, refer to the legend table in the appendix, , find the two digit code and enter the code in the appropriate position(s).		2. Black	2. Black			2. 90°	A C
3. Transparent Amber ①	3. Transparent Amber ①			9. White	9. White				
4. Clear ①	4. Clear ①			B. Backlight/ Daylight White ③	B. Backlight/ Daylight White ③			4. 270°	A C
5. Translucent White ②	5. Translucent White ②			D. Backlight/ Deadfront ③	D. Backlight/ Deadfront ③				
Z. No Lens	Z. No Lens			Z. No Legend	Z. No Legend				

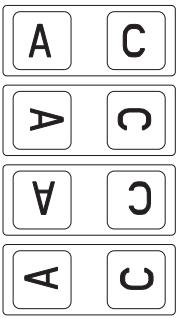
NOTE: It is not recommended to use green LEDs with translucent white lenses. This will reduce light intensity. Use clear lenses with green LEDs for maximum light intensity.

① Recommended for neon lamps.
② Special Order: Ultra bright green LEDs to be used with translucent white lenses.

STOP HERE for **lighted** switches **without legends.**

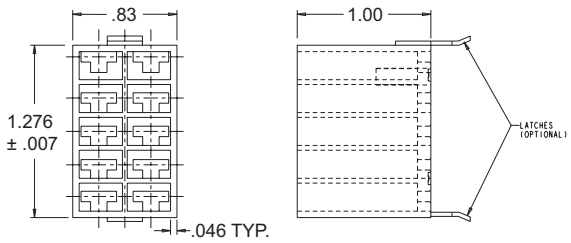
Example:
K5AA331FNH-44

③ Only available on Rocker Style "A" & Rocker Features "1" and lens color "Z" for each position.



STOP HERE for **unlighted** switches **without legends.**

Example:
K5AA331BAA



K5 Connector
P/N C801775-2A Without Latches
P/N C801775-2B With Latches

Recommended Quick Connect Terminals
AMP 60253-2 for 12-16 AWG
AMP 42100-2 for 14-18 AWG

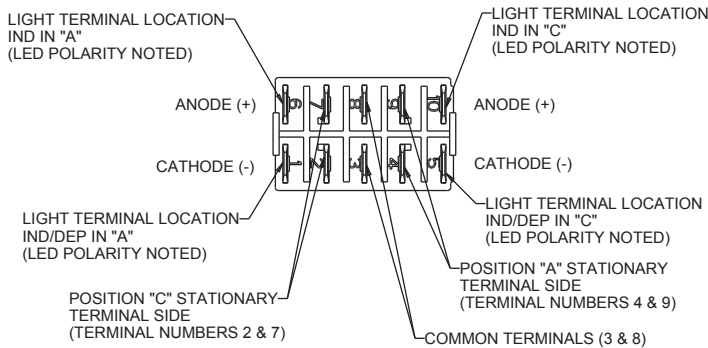
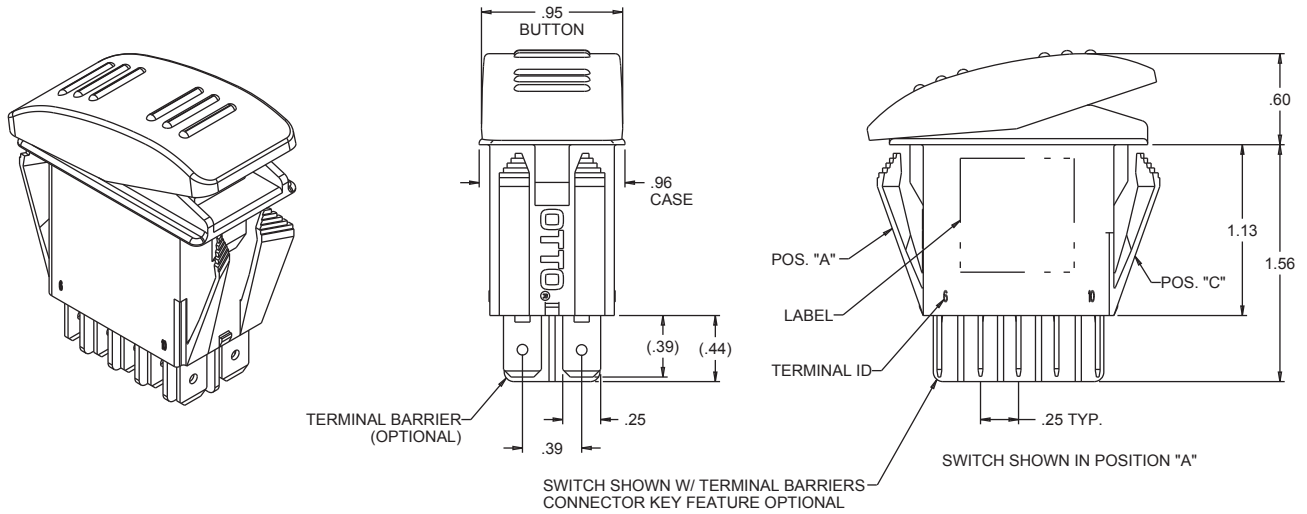
Panel Seal Gasket
Silicone: P/N C807109-25-1
Buna-N: P/N C807618-25-1

• K5 panel plugs available as shown in Panel Plugs (PP) section.

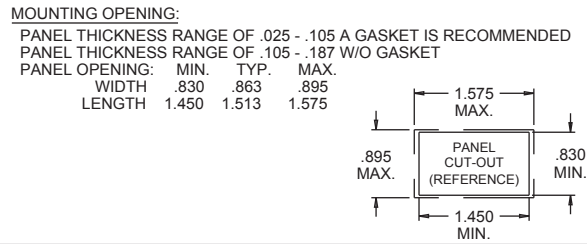
SEALED, ILLUMINATED ROCKER SWITCHES

K5
SEALED
ROCKERS

ATTRACTIVE & RUGGED FOR WET & DUSTY ENVIRONMENTS



TERMINAL LOCATIONS AS VIEWED FROM BOTTOM OF SWITCH
(CASE REMOVED FOR CLARITY)
CONTACT MADE IN OPPOSITE DIRECTION OF ROCKER TRAVEL



SPECIAL CIRCUIT - ON-ON-ON SCHEMATIC			DPST - ON-NONE-OFF SCHEMATIC	DPDT - ON-NONE-ON SCHEMATIC	DPST - (ON) - NONE-OFF SCHEMATIC	DPDT - (ON) - NONE-ON SCHEMATIC
<p>GENERAL SCHEMATIC INFORMATION</p> <p>○ ○ INDICATES MAINTAIN ACTION (FIXED POSITION) ▼ ○ INDICATES MOMENTARY ACTION (AUTOMATIC RETURN POSITION)</p> <p>FOR OTHER LIGHTING SCHEMATICS REPLACE FOLLOWING SYMBOLS:</p> <p> INCANDESCENT (REPLACE RESISTOR & LED) NEON (REPLACE LED)</p>						
		DPDT - (ON) - OFF - (ON) SCHEMATIC	DPDT - ON-OFF-ON SCHEMATIC	DPDT - (ON) - OFF-ON SCHEMATIC	DPDT - ON-NONE-ON SCHEMATIC W/DEPENDENT LED IN "A"	DPDT - ON-NONE-ON SCHEMATIC W/DEPENDENT LED IN "C"
DPDT - ON-NONE-ON SCHEMATIC W/INDEPENDENT LED IN "A"	DPDT - ON-NONE-ON SCHEMATIC W/INDEPENDENT LED IN "C"	DPDT - ON-NONE-ON SCHEMATIC W/DEPENDENT LED IN "A" & "C"	DPDT - ON-NONE-ON SCHEMATIC W/DEPENDENT LED IN "A" & INDEPENDENT LED IN "C"	DPDT - ON-NONE-ON SCHEMATIC W/DEPENDENT LED IN "A" & INDEPENDENT LED IN "C"	DPDT - ON-NONE-ON SCHEMATIC W/INDEPENDENT LED IN "A" & "C"	