

# Switch Modules – ESM & DSM

The single switch module ESM and the double switch module DSM are ready-to-install units, consisting of:

- Switches:  
K12 (for both ESM or DSM)  
K12G (DSM only with two switching-points)  
PVA1H4 (ESM only)
- PC board
- Rubber cap
- Optional cable or connector

The rubber cap offers the possibility to use both switch modules under severe ambient conditions where dust, water, oil, solvents etc. can effect or destroy the function of standard switches.

With the rubber cap the two modules are sealed to IP 65 when mounted.

## Typical Applications

- Tractors
- Harvesting equipment
- Industrial controls



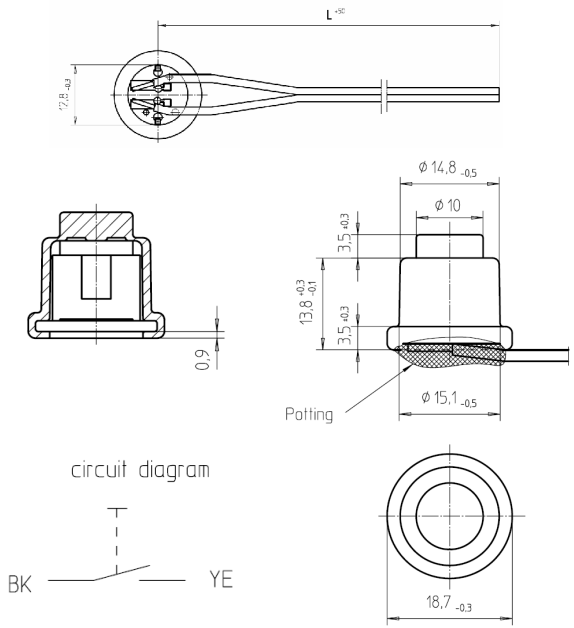
### Technical Data

Cap Material	Silicone rubber	
Protection Level	IP 65 (with cap when mounted)	
Cable	FLK/FLY 0.5 mm <sup>2</sup>	
Switches	K12	(both ESM or DSM)
	K12G	(DSM only, two switching-points)
	PVA1H4	(ESM only)
	Operating force	Travel (mm/inch)
	K12	5 N      1 / 0.039
	K12G	3.5 / 7 N    1.5 / 0.0591
	PVA1H4	3 N      2.2 / 0.087

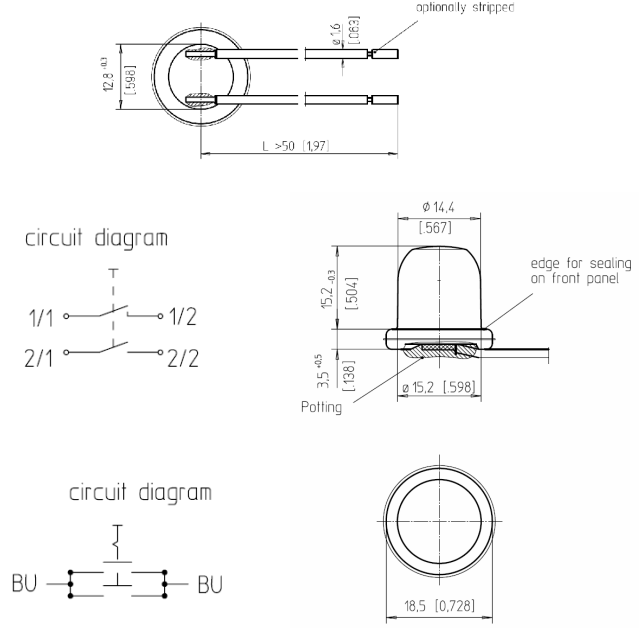
Ordering code		1	2	3	4	6	7	8
	<b>Example</b>	DSM	K12	1	5N	C	L130	Pu Po
<b>1</b> Designation	ESM = single switch module DSM = double switch module							
<b>2</b> Switch	K12 = (for ESM and DSM) K12G = with 2 switching-points (DSM only) PVA = PVA1H4 (ESM only)							
<b>3</b> Travel of Switch	1 = 1 mm (K12) 1.5 = 1.5 mm (K12G) 2.2 = 2.2 mm (PVA1H4)							
<b>4</b> Operating force	5N = 5 N (K12) 3.5N = 3.5 / 7 N (K12G) 3N = 3 N (PVA1H4)							
<b>6</b> Cap	N = none C = with cap							
<b>7</b> Cable	- = none L130 = 130 mm cable length							
<b>8</b> Cap decals (DSM)*	- = none P = arrows: U (down), O (Up), L (left), R (right)							

\* see drawing overleaf

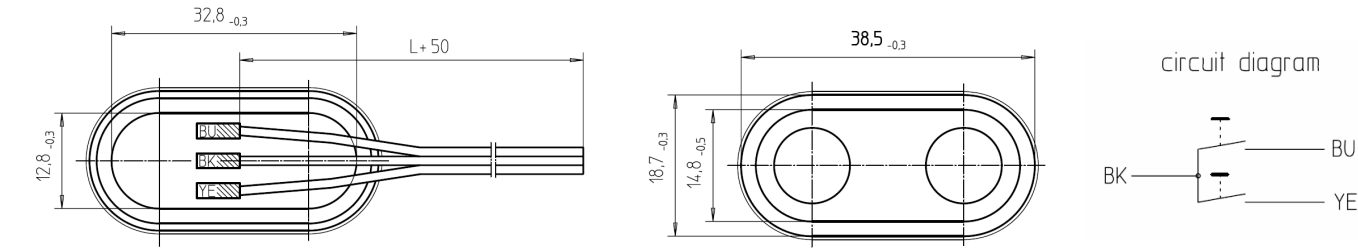
**ESM single switch with K12**



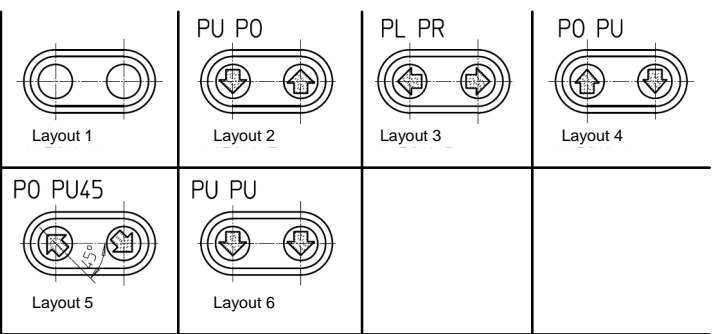
**ESM single switch with PVA1H4**



**DSM double switch module with K12**



**Decals:**





# Single & Double Switch Modules – ESM / DSM

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