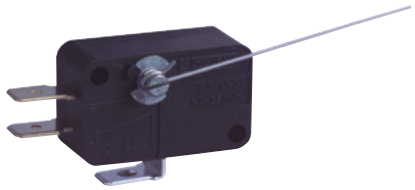
MINIATURE MICROSWITCHES - ROTARY ACTION

83137

- Highly sensitive snap-action mechanism with rotary action
- Operation by stainless steel wire, easily adaptable to the installation conditions
- Very low operating torques
- Ratings from 1 mA 4 V⎓ to 5 A 250 V~
- Very long mechanical life
- +125 °C max operating temperature



Main specifications

		Standard 831370		Increased torque 831375	
		With lever	Without lever	With lever	Without lever
Function	**Connections**				
I (changeover)	W3 (QC 6.3 x 0.8)	**83137004**	**83137019**	**83137507**	**83137502**
I (changeover)	W2 (solder)	**83137003**	**83137017**	●	●
I (changeover)	W6 (QC 4.8 x 0.5)	**83137055**	**83137020**	●	●
R (normally closed)	W3 (QC 6.3 x 0.8)	**83137008**	**83137028**	●	●
R (normally closed)	W2 (solder)	●	**83137027**	●	●
R (normally closed)	W6 (QC 4.8 x 0.5)	●	●	●	●
C (normally open)	W3 (QC 6.3 x 0.8)	**83137006**	**83137026**	**83137517**	**83137503**
C (normally open)	W2 (solder)	**83137005**	**83137025**	●	●
C (normally open)	W6 (QC 4.8 x 0.5°)	●	●	●	●
Electrical characteristics					
Rating nominal / 250 V AC (A)		5	5	5	5
Rating thermal / 250 V AC (A)		14	14	14	14
Mechanical characteristics					
Max. Operating torque (mN.m)		1.2	1.2	2	2
Min. Release torque (mN.m)		0.1	0.1	0.1	0.1
Max Pretravel (°)		26	26	26	26
Differential travel (°)		$10^{\pm 4}$	$10^{\pm 4}$	$10^{\pm 4}$	$10^{\pm 4}$
Min. Overtravel (°)		12	12	12	12
Ambient operating temperature (°C)		-20 → +125	-20 → +125	-20 → +125	-20 → +125
Mechanical life (operations)		10^7	10^7	10^7	10^7
Contact gap (mm)		0.8	0.8	0.8	0.8
Weight (g)		8.4	8.1	8.4	8.1

Additional specifications

- Case: PA66 GF (UL 94-V0 / GWFI 960 °C)
- Contacts: silver alloy (gold-plated silver alloy : on request)
- Terminals: brass (except W2: copper nickel), silver plated common
- Levers: stainless steel wire
- Degree of protection: IP40 (mechanism)
- Recommended min actuating speed: 1 °/s
- Protection against electric shock: wire lever has reinforced insulation for Ui 250V / Uimp 2,5kV / pollution 2
- Conformity / Certifications: c UL us on request / EAC CE

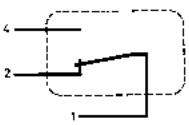
Product adaptations

- Special wire levers: special shapes and lengths
- Specific angular setting of the lever
- Lever supplied separately (length 100 mm: 70509034)
- Other connections: screw+clamp (W5), angled terminals, ...
- Low-current version with gold plated contacts for use from 1 to 100 mA at 4 to 30 V
- Specific switching hysteresis : increased or reduced differential travel
- High resistance to shock (SP2867)
- cURus approved versions

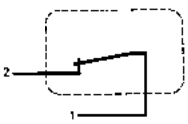
Principles

Single break snap-action switch

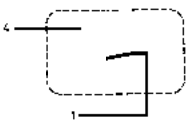
Changeover - SPDT (form C)



Normally closed - SPST-NC (form B)



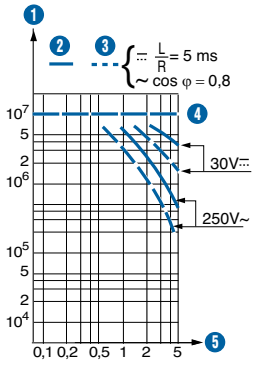
Normally open - SPST-NO (form A)



Standard product | Product made to order | ● Contact us

Curves

Operating curve for types 831370 - 831375

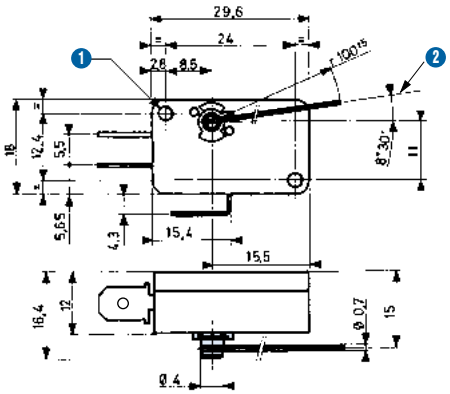


1. Number of cycles
2. Resistive circuit
3. Inductive circuit
4. Mechanical life limit
5. Current in Amps

Dimensions

Product

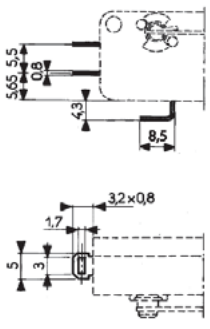
83137



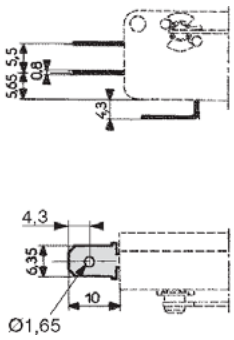
1. 2 holes Ø 3.2
2. Rest position

Connections

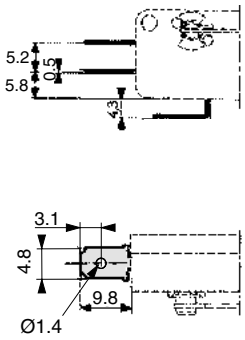
W2 solder



W3 quick-connect 6.3 x 0.8



W6 quick-connect 4.8 x 0.5



Installation recommendations

See “Basic technical concepts”.
For models supplied without lever: it is recommended to clamp the shaft after mounting the lever in order to secure the assembly

How to order

Use the 8 digit part numbers when they are defined

Other cases, precise: Type of microswitch - Function - Connection - Lever* - Adaptations*
* if needed
Example: 831375 I W2 LVR UL

Examples of special adaptations

Customized wire lever