DG SUB-SUBMINIATURE SWITCH

DG sub-subminiature switch

Extremely small dimensions – only 12.8 × 5.8 × 6.5 mm. Breaking capacity ranges from small switching currents and voltages to low-voltage applications up to 3 A 125 V AC.

- Available with or without auxiliary actuator
- Use on circuit boards with connections to the left or right and standing
- High mechanical operating life, depending on model > 1,000.000 operations



Technical specifications

Series	**DG ❶**
Contact configuration	S.P.D.T.
Contact gap	< 3 mm
Switching voltage max.	125 VAC
Switching current max.	3 A AC
Operating voltage max.	75 cN oder 140 cN without auxiliary actuator
Total travel	0.7 mm without auxiliary actuator
Mechanical life	> 1 x 10^6 operations
Electrical life (max. load)	see table on page 35
Ambient temperature	−25°C to +85°C

Materials

Base	PPS (UL 94V-0)
Cover	PBT (UL 94V-0)
Actuator	PBT (UL 94V-0)
Auxiliary actuator	Stainless steel
Terminals	CuZn striped silver-plated
Contacts DG 1	AgNi
DG 2	AgNi, gal. Au
Approvals	cULus
Degree of protection Switch interior	IP40

Circuitry ❸

Model	Code
S.P.D.T.	3

Terminal type ❺

Model	Code
Solder terminal, straight	B1
PCB terminal, RH side	B2
PCB terminal, LH side	B3

Generation of order code (example)
The order code consists of 5 parameters:

❶ Series	❷ Electrical rating	❸ Circuitry	❹ Terminal type	❺ Auxiliary actuator
DG = sub-sub-miniature switch	1 = 3 A, 125 VAC 2 A, 30 VDC	3 = S.P.D.T.	B1 = PCB terminal, straight	AA = without auxiliary actuator

- Not every configurable variant is available for order. Please contact us.
- The final two digits of article numbers on commercial documents refer to the index of the respective drawing.

Electrical rating and operating life ❷

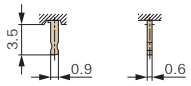
Electrical rating according to UL and CSA	Operating life		
	Nominal load UL and CSA	mechanical	Code
3 A, 125 VAC 2 A, 30 VDC	6,000	1 x 10^6	1
0.05 A, 30 VDC	6,000	1 x 10^6	2

Auxiliary actuator ❺

Model	Type	Operating force max.(cN)	Max. pretravel (mm)	Min. overtravel (mm)	Differential travel max. (mm)	Max. rest position (mm)	Operating point (mm)	Code
Without auxiliary actuator	DG 1.2 B	140	0.5	0.2	0.1	5.9	5.4 ± 0.2	AA
	DG 2 C	75	0.5	0.2	0.1	5.9	5.4 ± 0.2	
Auxiliary actuator, straight	DG 1.2 B	45	1.8	0.55	0.5	9.4	6.8 + 0.8/-0.4	LA
	DG 2 C	30	1.8	0.55	0.5	9.4	6.8 + 0.8/-0.4	
Auxiliary actuator roller	DG 1.2 B	60	1.5	0.55	0.5	13.9	12.4 ± 0.5	RA
	DG 2 C	35	1.5	0.55	0.5	13.9	12.4 ± 0.5	

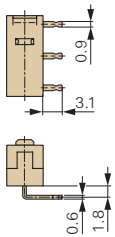
Terminals

Solder terminal

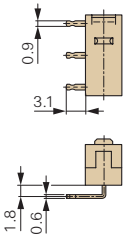


Dimensions in mm

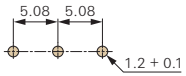
PCB terminal RH side



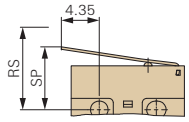
PCB terminal LH side



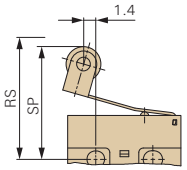
Drilling pattern

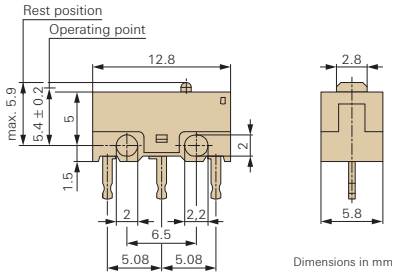


Auxiliary actuator



Dimensions in mm





Dimensions in mm

For detailed information please note the technical specifications which you can find in the download section of our website **www.switches-sensors.zf.com**.