

## Data Sheet

powered  
by 

# Ø 30 mm Push Button Switches



## S3PR / S3PF Series

### CATALOG

**For your safety, read and follow the considerations written in the instruction manual, other manuals and Autonics website.**

The specifications, dimensions, etc. are subject to change without notice for product improvement. Some models may be discontinued without notice.

#### Features

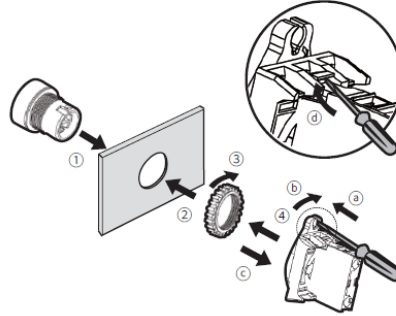
- Smooth operation
- High electrical conductivity
- Long-lasting durability

# Data Sheet

Specifications	
Series	S3PR Series S3PF Series
Actuation distance	5.0 to 5.5 mm
Actuation force	0.5 kgf (4.9 N) (per 1 contact)
Installation	Extended Flush
Shock	300 m/s <sup>2</sup> (≈ 30 G) in each X, Y, Z direction for 3 times
Shock (malfunction)	100 m/s <sup>2</sup> (≈ 10 G) in each X, Y, Z direction for 3 times
Vibration	1.5 mm amplitude at frequency of 10 to 55 Hz (for 1 min) in each X, Y, Z direction for 2 hours
Vibration (malfunction)	1.5 mm amplitude at frequency of 10 to 55 Hz (for 1 min) in each X, Y, Z direction for 10 minutes
Mechanical life cycle (control unit life cycle)	Returned: ≥ 1 million operations (20 operations/min)
Ambient temperature	-15 to 55 °C, storage: -25 to 65 °C (no freezing or condensation)
Ambient humidity	35 to 85 %RH, storage: 35 to 85 %RH (no freezing or condensation)
Protection structure	Control unit: IP52 (IEC standard)
Approval	CE RoHS REACH
Control unit weight	21.5 g
Housing weight	≈ 7 g

## Assembly / Disassembly

- Assembly order: ①→②→③→④
- Disassembly order: ④→③→②→①



Control Switches	Panel thickness	Tightening torque
Ø 22/25/30 mm	Max. 6 mm	≤ 1.47 N·m

Contact blocks	
Power supply / current	110 VAC ~ / 10 A, 250 VAC ~ / 6 A
Dielectric strength	2,500 VAC ~ 50/60 Hz for 1 minute
Insulation resistance	≥ 1,000 MΩ (500 VDC = megger)
Contact resistance	≤ 20 mΩ (initial)
Electrical life cycle	≥ 100,000 operations (20 operations/min)
Contact material	AgNi10
Approval	CE RoHS REACH
Weight	Modular type: ≈ 10 g, Singular type: ≈ 11 g

LED blocks	
Rated voltage	AC/DC voltage type: 12-24 VAC ~ 50/60 Hz, 12-24 VDC = AC voltage type: 110-220 VAC ~ 50/60 Hz
Current consumption	≤ 20 mA
Approval	CE RoHS REACH
Weight	AC/DC voltage type: ≈ 11 g, AC voltage type: ≈ 12 g

## Sold Separately

- Contact blocks (SA□-C□□)
- LED blocks (SA□-L□□□)
- Locking handle (SA□-LH)
- Switch washer (SA-SW□)

### ■ Non-illuminated

S3P	①	-	P	1	②	③	④
Control unit				Block			

- ① **Button type**  
R: Extended  
F: Flush
- ② **Button color**  
R: Red  
B: Blue  
G: Green  
Y: Yellow  
K: Black
- ③ **Contact block**  
A: 1 A contact  
2A: 2 A contacts  
3A: 3 A contacts  
B: 1 B contact  
2B: 2 B contacts  
3B: 3 B contacts  
AB: 1 A contact, 1 B contact  
2AB: 2 A contacts, 1 B contact  
A2B: 1 A contact, 2 B contacts
- ④ **Block**  
No mark: Singular type  
M: Modular type

Model	Contact block		LED block	
	A contact	B contact	AC/DC voltage	AC voltage
S3PR-P1□A(M)	1	-	-	-
S3PR-P1□2A(M)	2	-	-	-
S3PR-P1□3A(M)	3	-	-	-
S3PR-P1□B(M)	-	1	-	-
S3PR-P1□2B(M)	-	2	-	-
S3PR-P1□3B(M)	-	3	-	-
S3PR-P1□AB(M)	1	1	-	-
S3PR-P1□2AB(M)	2	1	-	-
S3PR-P1□A2B(M)	1	2	-	-
S3PF-P1□A(M)	1	-	-	-
S3PF-P1□2A(M)	2	-	-	-
S3PF-P1□3A(M)	3	-	-	-
S3PF-P1□B(M)	-	1	-	-
S3PF-P1□2B(M)	-	2	-	-
S3PF-P1□3B(M)	-	3	-	-
S3PF-P1□AB(M)	1	1	-	-
S3PF-P1□2AB(M)	2	1	-	-
S3PF-P1□A2B(M)	1	2	-	-

### ■ Illuminated

S3PF	①	-	P	3	②	③	④	⑤
Control unit				Block				

- ① **Letter marking**  
No mark: Push (control unit + singular type block)  
No mark: None (control unit + modular type block)  
U: None (control unit) <sup>25)</sup>
- ② **Contact block**  
A: 1 A contact  
2A: 2 A contacts  
B: 1 B contact  
2B: 2 B contacts  
AB: 1 A contact, 1 B contact
- ③ **LED block**  
D: 1 AC/DC voltage type  
L: 1 AC voltage type
- ④ **Block**  
No mark: Singular type  
M: Modular type
- ⑤ **Button color**  
R: Red  
B: Blue  
G: Green  
Y: Yellow  
W: White

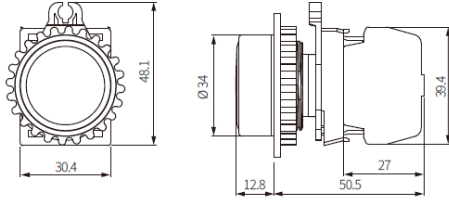
Model	Contact block		LED block	
	A contact	B contact	AC/DC voltage	AC voltage
S3PF-P3□AD(M)	1	-	-	-
S3PF-P3□2AD(M)	2	-	-	-
S3PF-P3□BD(M)	-	1	1	-
S3PF-P3□2BD(M)	-	2	-	-
S3PF-P3□ABD(M)	1	1	-	-
S3PF-P3□AL(M)	1	-	-	-
S3PF-P3□2AL(M)	2	-	-	-
S3PF-P3□BL(M)	-	1	-	1
S3PF-P3□2BL(M)	-	2	-	-
S3PF-P3□ABL(M)	1	1	-	-

# Data Sheet

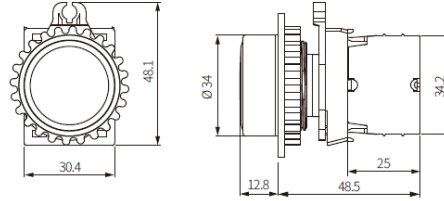
## Dimensions

- Unit: mm, For the detailed drawings, follow the Autonics website.
- Panel thickness: ≤ 6 mm

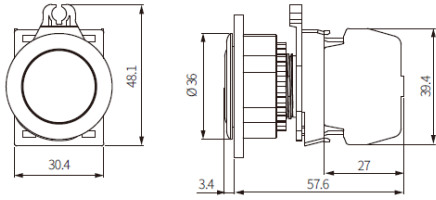
■ S3PR-P1 (non-illuminated, extended, singular type block)



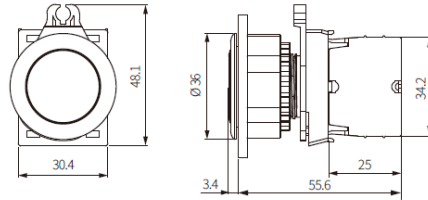
■ S3PR-P1 M (non-illuminated, extended, modular type block)



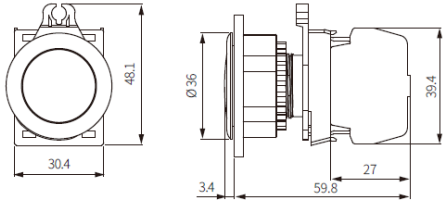
■ S3PF-P1 (non-illuminated, flush, singular type block)



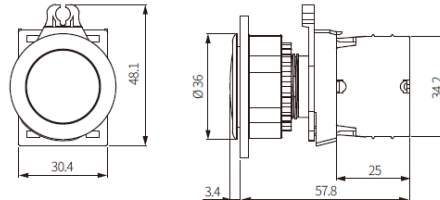
■ S3PF-P1 M (non-illuminated, flush, modular type block)



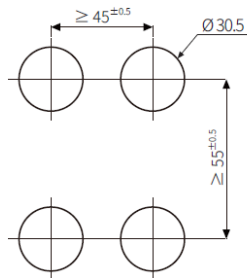
■ S3PF-P3 (illuminated, flush, singular type block)



■ S3PF-P3 M (illuminated, flush, modular type block)



■ Panel cut-out



Item No.	Model No.	Description	Illumination
2585993	S3PF-P1K	30 mm Push button, Black, Momentary	Non-illuminated
2585994	S3PFU-P3G	30 mm Push button, Green, Momentary	Illuminated
2585995	S3PFU-P3W	30 mm Push button, White, Momentary	Illuminated
2585996	S3PR-P1R	30 mm Push button, Red, Momentary	Non-illuminated
2585997	S3PR-P1G	30 mm Push button, Green, Momentary	Non-illuminated

## Data Sheet

### Contact blocks and LED blocks

Item No.	Model	Description
2465053	SA-CA	Contact block, A contact, Singular type
2465054	SA-CAM	Contact block, A contact, Modular type
2465055	SA-CB	Contact block, B contact, Singular type
2465056	SA-CBM	Contact block, B contact, Modular type
2465057	SA-LD	LED block, White, Singular type, 12-24 V/DC V/AC
2465058	SA-LDM	LED block, White, Modular type, 12-24 V/DC V/AC
2465059	SA-LA	LED block, White, Singular type, 110-240 V/AC
2465060	SA-LAM	LED block, White, Modular type, 110-240 V/AC
2465061	SA-LAB	LED block, Blue, Singular type, 110-240 V/AC
2465062	SA-LAG	LED block, Green, Singular type, 110-240 V/AC
2465063	SA-LAR	LED block, Red, Singular type, 110-240 V/AC
2465064	SA-LAY	LED block, Yellow, Singular type, 110-240 V/AC
2465065	SA-LABM	LED block, Blue, Modular type, 110-240 V/AC
2465066	SA-LAGM	LED block, Green, Modular type, 110-240 V/AC
2465067	SA-LARM	LED block, Red, Modular type, 110-240 V/AC
2465068	SA-LAYM	LED block, Yellow, Modular type, 110-240 V/AC
2465069	SA-LDBM	LED block, Blue, Modular type, 12-24 V/DC V/AC
2465070	SA-LDGM	LED block, Green, Modular type, 12-24 V/DC V/AC
2465071	SA-LDRM	LED block, Red, Modular type, 12-24 V/DC V/AC
2465072	SA-LDYM	LED block, Yellow, Modular type, 12-24 V/DC V/AC
2465073	SA-LDR	LED block, Red, Singular type, 12-24 V/DC V/AC
2465674	SA-LDG	LED block, Green, Singular type, 12-24 V/DC V/AC
2465074	SA-LDY	LED block, Yellow, Singular type, 12-24 V/DC V/AC
2465075	SA-LDB	LED block, Blue, Singular type, 12-24 V/DC V/AC