


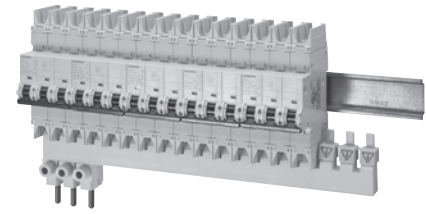


Selection and ordering data

5SJ4 Miniature Circuit Breaker Guide			
	Catalog Series	5SJ41...-HG40	5SJ4...-HG41
Rated Voltage	240, 120 VAC 60 VDC Same Polarity	240 VAC 60/125 VDC	480Y/277 VAC 60/125 VDC
Number of Poles	1-Pole	1-, 2- and 3-Poles	
Trip Characteristics	B, C, D	C, D	
Rated Current	B Characteristic: 6 to 63 A C and D Characteristic: 0.3 to 63 A		C Characteristic: 0.3 to 40 A D Characteristic: 0.3 to 32 A
Interrupting Ratings¹⁾	B Characteristic: 14 kA (6 to 63 A)	—	—
	C Characteristic: 14 kA (0.3 to 40 A) 10 kA (45 to 63 A)	C Characteristic: 10 kA (0.3 to 40 A) ²⁾	
	D Characteristic: 14 kA (0.3 to 20 A) 10 kA (25 to 63 A)	D Characteristic: 10 kA (0.3 to 32 A) ²⁾	



5SJ4...-HG41 Miniature Circuit Breakers

Certifications:

CE
UL Listed and Certified to Canadian
Standards
HACR Rated

1) 14 kA = Type HSJ; 10 kA = Type NSJ.

2) At 240 VAC the Interrupting Rating is the same as the 5SJ4...-HG40 and .HG41.

Features

Features – UL 489

- Suitable for Branch Circuit Protection Applications up to 277 VAC and 60 VDC (1-pole); and, up to 480Y VAC and 125 VDC (2- and 3-pole)
- UL Listed and Certified to Canadian Standards, File E243414
- HACR Rated
- High AC Interrupting Ratings of up to 14,000 (Type HSJ) or 10,000 (Type NSJ) Maximum RMS Symmetrical Amps and, DC interrupting ratings of 10,000 Amps
- 40°C Calibration Base (Industrial Applications)
- Can be used for "field wiring" applications; AWG 14 to AWG 4, Copper (Cu) Only
- Suitable for "reverse feed" applications

Features – EN/IEC 60 898

- 30°C Calibration Base
- Trip Characteristic B, C and D
B: Designed for the protection of computers and electronic equipment. Magnetic trip point is 3 to 5 times the MCB rating.
C: Designed for general device protection in control circuits and all other miniature circuit breaker systems. Magnetic trip point is 5 to 10 times the MCB rating.
D: Designed for high inrush loads. Magnetic trip point is 10 to 20 times the MCB rating.
- Rated voltage of 24 VAC minimum, 440 VAC Maximum and 60 VDC per pole
- High Interrupting Rating (I_{cn}) of up to 10,000 Amps
- 0.75 to 35 mm² solid and stranded conductors

Features – Common

- Depending on the device selected
- Available with 1-, 2- or 3-poles
- Available from 0.3 to 63 amps
- Visible Indicator for ON and OFF/Trip
- Touch Protection to EN50274
- DIN Rail Mounting (Standard 35 mm)
- Identical Wire Screw Connections on Line and Load Sides
- Smaller Size than traditional MCCB's

Auxiliary Circuit Switches (AS) are available with One Normally Open + One Normally Closed, Two Normally Open or Two Normally Closed contacts. They are primarily used to signal the miniature circuit breaker's trip mechanism position.

Fault Signal Contacts (FC) are available with One Normally Open + One Normally Closed, Two Normally Open or Two Normally Closed contacts. They are primarily used to signal the automatic tripping of the miniature circuit breaker's trip mechanism; and, trip position.

Shunt Trip Switches (ST) are available in voltages of 110 to 480 VAC and 24 to 60 V AC/DC. They are used for remote tripping of a miniature circuit breaker.

5ST366...-HG busbars, touch protection covers and terminal connectors are intended for use with Siemens lines of 5SJ4...-HG4. UL 489 Miniature Circuit Breakers. They are UL Recognized (File E32159) with a rating of 115 Amps maximum at 480Y/277 VAC. Busbars are available in 1-, 2- or 3-pole versions.

Touch Protection Covers are used to cover any unused busbar terminals. They are intended to protect a user from live electrical parts.

Terminal Connectors are used to connect electrical conductors up to 1 AWG (50mm²) to the busbar terminals. Two versions are available; connect directly to the miniature circuit breaker or direct connection to the busbar.

Control Circuit Protection

General Data

5SJ4 Branch Circuit Protection

Technical data

		5SJ41...HG40	5SJ4...HG41	5SJ4...HG42
Standards		EN 60898; EN 60947-2; UL 489; CSA C22.2 No. 5-02		
Certifications		CE; cULus, UL File No. E243414		
Tripping characteristic		B, C, D	C, D	
Number of poles		1	1, 2 & 3	
Operating voltage	Min. V AC/DC	24		
- IEC 60898	Max. V DC/pole	60		
	Max. V AC	440		
- UL 489 and CSA C22.2 No. 5-02	Max. V AC	240 Same Polarity	240	480Y/277
	V DC/1P	60	60	60
	V DC/2P, 3P	-	125	125
Interrupting rating ¹⁾		10		
- I _{cn} to IEC 60898-1	kA AC	Type NSJ: 10kA		
- UL 489 and CSA C22.2 No. 5-02		Type HSJ: 14kA		
AC: Max. RMS Symmetrical	kA AC	Type NSJ: 10kA		
Touch protection to EN 50274		Yes		
Degree of protection to EN 60529		IP20, with connected conductors		
CFC and silicone free		Yes		
Mounting		On standard mounting rail (DIN 35 mm)		
Device depth	mm	70		
Terminals		Yes		
- Identical screw terminals on both line and load sides		31		
- Terminal tightening torque	lb. in.	3.5		
	Nm			
Conductor cross sections	mm ²	Solid and Stranded: 0.75 to 35		
	mm ²	Finely Stranded, with end sleeve: 0.75 to 25		
	AWG	14 to 4, 60/75°C, Cu Only		
Calibration Base	°C	40 (UL 489) 30 (EN 60898)		
Average service life, with rated load		20,000 actuations		
Ambient temperature	°C	-25 to 45, occasionally +55, max. 95% humidity		
Storage Temperature	°C	-40 to +75		
Resistance to vibration to IEC 60068-2-6	m/s ²	60 at 10 Hz to 150 Hz		

1) See Selection and ordering data for specific device interrupting rating

Busbar & Connecting Terminals

Material Version		Busbars	Connecting Terminals	
		5ST3663	5ST3666-0HG	5ST3666-2HG
		5ST3664		
		5ST3665		
Standards		UL 489		
Certifications		UL Listed, File No. E243414		
Operating voltage		690		
- IEC 60898	VAC	480Y/277 and 240		
- UL 489	VAC			
Rated current to 40°C	A	115		
Busbar cross section	mm ²	16 (Copper)		
Conductor cross sections	Solid and Stranded mm ²	-	2.5 to 35	2.5 to 50
	AWG	-	14 to 2	14 to 1
Terminal tightening torque	lb. in.	-	30	30
	Nm	-	3.3	3.3
Temperature Resistance	°C	200 - UL 94-V0/0.4mm		

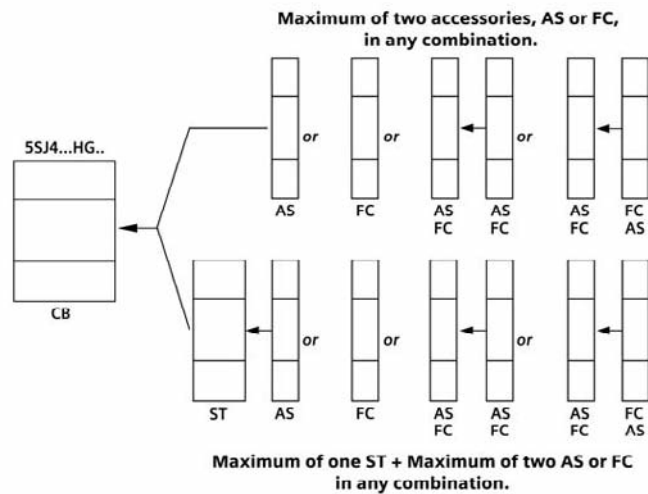
Technical data

Auxiliary Switch (AS), Fault Signal Contacts (FC) and Shunt Trip (ST)

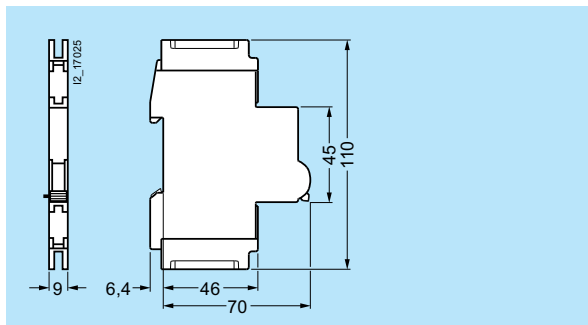
Material Version	AS		FC		ST	
	5ST301-0HG		5ST302-0HG		5ST3030-0HG	5ST3032-0HG
Standards	UL 489; CSA C22.2 No. 5-02 IEC/EN 62019, IEC/EN 60947-5-1				IEC/EN 60947-1	
Certifications	CE, UL 489, CSA, UL File No. E321559					
Rated voltages/-load	IEC AC V 400 230				110 to 415	24 to 60
	AC A 2 6 (NC:AC13, NO: AC14)				-	-
	DC V 220 110 60 24				110	24 to 60
	DC A 1 1 3 6 (DC 13)				-	-
	UL AC V 480 277 240 120				110 to 480	24 to 60
	AC A 1.5 3 4 6				-	-
Contact load	min. 50 mA, 24 V				-	-
	Conductor cross-sections	AWG	22 ... 14		22 ... 14	
		mm ²	0.5 ... 2.5		0.5 ... 2.5	
Terminals - terminal tightening torque	Nm	0.5 max.		0.8 max.		
	lb/in.	4.5		6.8		

Applications

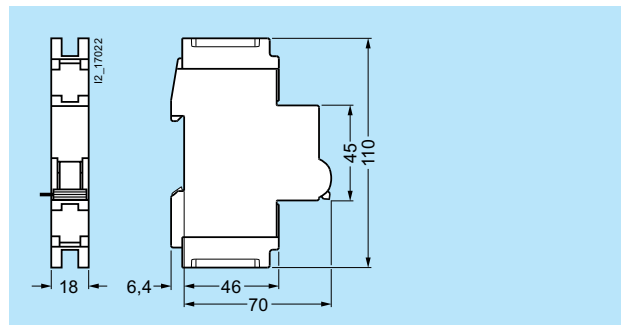
Auxiliary Switch (AS), Fault Signal Contact (FC) and Shunt Trip (ST) accessories are used with 5SJ4...-HG4. miniature circuit breakers (CB) and are mounted to the right of them.



Dimensions



5ST3 010-0HG 5ST3 011-0HG 5ST3 012-0HG
5ST3 020-0HG 5ST3 021-0HG 5ST3 022-0HG

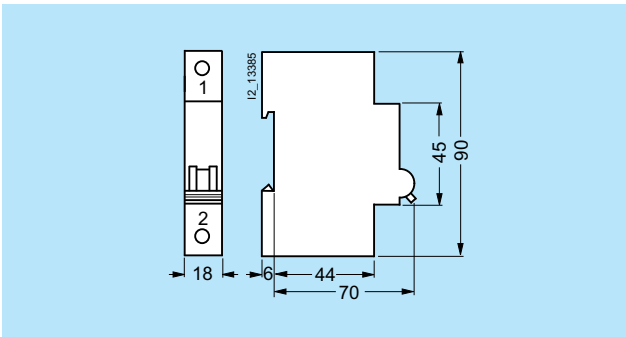


5ST3 030-0HG 5ST3 031-0HG

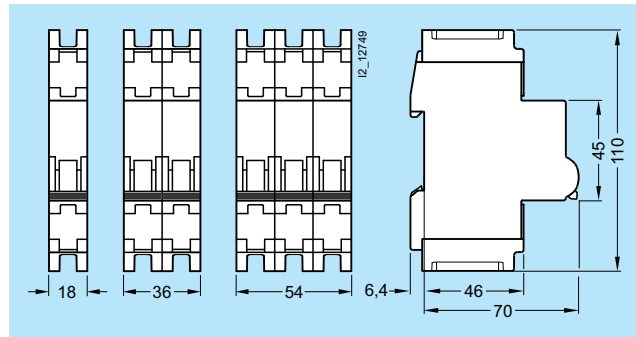
Control Circuit Protection

General Data

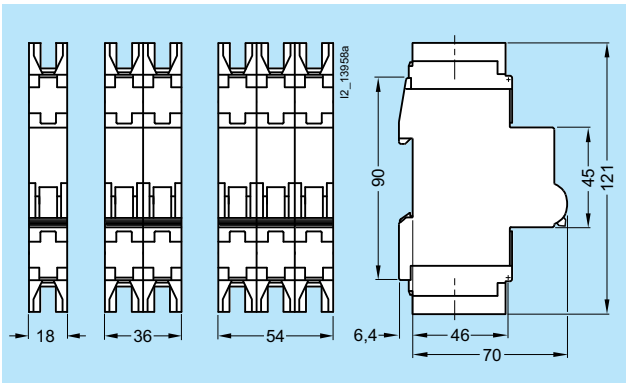
Dimensions



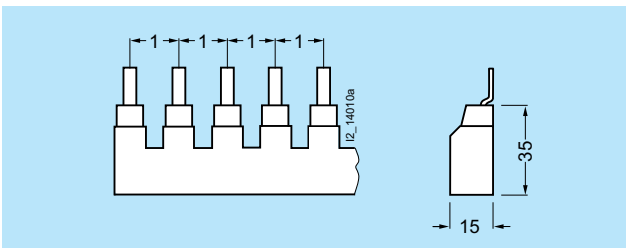
5SJ4...-HG40



5SJ4...-HG41



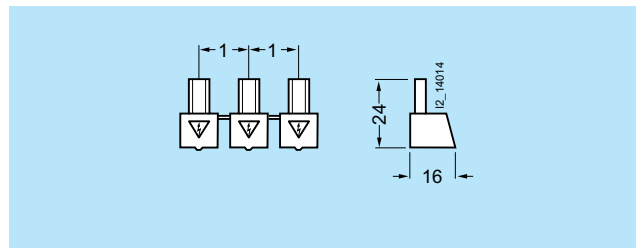
5SJ4...-HG42



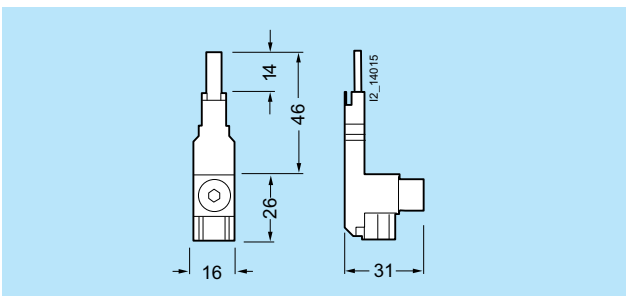
5ST3 663-0HG
5ST3 663-1HG
5ST3 663-2HG

5ST3 664-0HG
5ST3 664-1HG
5ST3 664-2HG

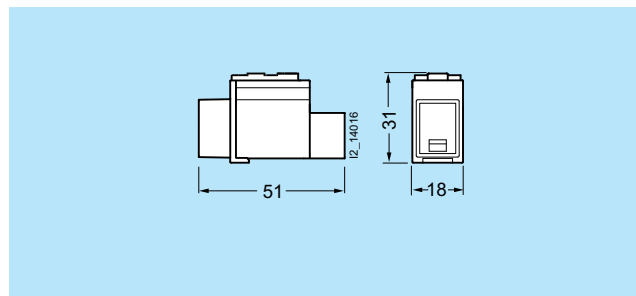
5ST3 665-0HG
5ST3 665-1HG
5ST3 665-2HG



5ST3 666-1HG



5ST3 666-0HG



5ST3 666-2HG