

Protective Devices for SINAMICS G120X

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1 IEC applications

1.1 IEC general notes

Protection for safety must be provided in accordance with

- IEC 60364 standard series
- any additional local standards and regulations for electrical installations.

The tables below provide information for each drive type and article number on the following items:

- Suitable protective devices.
The specification includes the type and the maximum rated current of the branch circuit protective devices.
- Maximum I_{cc} (conditional short circuit current)
This is the maximum RMS value of a prospective short circuit current, available from a supply source.
- Minimum enclosure volume.
In the end application, the drive shall be installed in an outer enclosure or control cabinet which shall meet the minimum enclosure volume requirement.

Selection of protective devices

- Protective devices of the same type as specified in the tables with a lower ampere rating may be used, if suitable for the application.
- Protective devices of the same type as specified in the tables with a lower interrupting rating may be used, if suitable for the application. In such case, this lower interrupting current rating of a protective device shall be specified as the I_{cc} of a drive and protective device combination.
- The voltage rating of the protective device must be at least the voltage rating of the supply circuit.

The converter provides:

- Integral Motor Overload Protection which reduces the output current flow under overload conditions. Refer to manual for adjustments.
- Integral Output Short-Circuit Protection.

1.2 IEC fuses

1.2.1 IEC fuses, 200 V ... 240 V

Converter			Fuse			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 240 V AC	Metric	Imperial (USA)
FSA	0.75 kW	6SL32...-YC10-...0	16 A	3NA3805	100 kA	0.05 m ³	1.8 ft ³
	1.1 kW	6SL32...-YC12-...0	16 A	3NA3805	100 kA		
	1.5 kW	6SL32...-YC14-...0	16 A	3NA3805	100 kA		
FSB	2.2 kW	6SL32...-YC16-...0	32 A	3NA3812	100 kA	0.06 m ³	2.12 ft ³
	3.0 kW	6SL32...-YC18-...0	32 A	3NA3812	100 kA		
	4.0 kW	6SL32...-YC20-...0	32 A	3NA3812	100 kA		
FSC	5.5 kW	6SL32...-YC22-...0	50 A	3NA3820	100 kA	0.14 m ³	5.08 ft ³
	7.5 kW	6SL32...-YC24-...0	50 A	3NA3820	100 kA		
FSD	11.0 kW	6SL32...-YC26-...0	63 A	3NA3822	100 kA	no restriction	no restriction
	15.0 kW	6SL32...-YC28-...0	80 A	3NA3824	100 kA		
	18.5 kW	6SL32...-YC30-...0	100 A	3NA3830	100 kA		
FSE	22.0 kW	6SL32...-YC32-...0	100 A	3NA3830	100 kA	0.37 m ³	13.07 ft ³
	30.0 kW	6SL32...-YC34-...0	160 A	3NA3836	100 kA		
			160 A	3NA3836-8	100 kA		
FSF	37.0 kW	6SL32...-YC36-...0	200 A	3NA3140	100 kA	0.37 m ³	13.07 ft ³
	45.0 kW	6SL32...-YC38-...0	200 A	3NA3140	100 kA		
	55.0 kW	6SL32...-YC40-...0	224 A	3NA3142	100 kA		

Note:

Siemens 3NA low-voltage fuses are recommended.

1.2.2 IEC fuses, 380 V ... 480 V

Converter			Fuse			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 400 V AC	Metric	Imperial (USA)
FSA	0.75 kW	6SL32.0-.YE10-...	16 A	3NA3805	100 kA	0.05 m ³	1.8 ft ³
	1.1 kW	6SL32.0-.YE12-...	16 A	3NA3805	100 kA		
	1.5 kW	6SL32.0-.YE14-...	16 A	3NA3805	100 kA		
	2.2 kW	6SL32.0-.YE16-...	16 A	3NA3805	100 kA		
	3.0 kW	6SL32.0-.YE18-...	16 A	3NA3805	100 kA		
FSB	4.0 kW	6SL32.0-.YE20-...	32 A	3NA3812	100 kA	0.06 m ³	2.12 ft ³
	5.5 kW	6SL32.0-.YE22-...	32 A	3NA3812	100 kA		
	7.5 kW	6SL32.0-.YE24-...	32 A	3NA3812	100 kA		
FSC	11.0 kW	6SL32.0-.YE26-...	50 A	3NA3820	100 kA	0.14 m ³	5.08 ft ³
	15.0 kW	6SL32.0-.YE28-...	50 A	3NA3820	100 kA		
FSD	18.5 kW	6SL32...-YE30-...0	63 A	3NA3822	100 kA	no restriction	no restriction
	22.0 kW	6SL32...-YE32-...0	80 A	3NA3824	100 kA		
	30.0 kW	6SL32...-YE34-...0	100 A	3NA3830	100 kA		
	37.0 kW	6SL32...-YE36-...0	100 A	3NA3830	100 kA		
FSE	45.0 kW	6SL32...-YE38-...0	125 A	3NA3832	100 kA	0.37 m ³	13.07 ft ³
	55.0 kW	6SL32...-YE40-...0	160 A	3NA3836	100 kA		
FSF	75.0 kW	6SL32...-YE42-...0	200 A	3NA3140	100 kA	0.37 m ³	13.07 ft ³
	90.0 kW	6SL32...-YE44-...0	224 A	3NA3142	100 kA		
	110.0 kW	6SL32...-YE46-...0	300 A	3NA3250	100 kA		
	132.0 kW	6SL32...-YE48-...0	315 A	3NA3252	100 kA		
FSG	160.0 kW	6SL32...-YE50-...0	355 A	3NA3254	100 kA	0.6 m ³	21.19 ft ³
	200.0 kW	6SL32...-YE52-...0	400 A	3NA3260	100 kA		
	250.0 kW	6SL32...-YE54-...0	630 A	3NA3372	100 kA		
FSH	315.0 kW	6SL32.0-.YE56-...	710 A	3NE1437-2	100 kA		
			710 A	3NE1437-3	100 kA		
	355.0 kW	6SL32.0-.YE58-...	800 A	3NE1438-2	100 kA		
			800 A	3NE1438-3	100 kA		
	400.0 kW	6SL32.0-.YE60-...	850 A	3NE1448-2	100 kA		
			850 A	3NE1448-3	100 kA		
FSJ	450.0 kW	6SL32.0-.YE62-...	1000 A	3NB3350-1KK26	100 kA		
			1000 A	2 x 3NE1234-3	100 kA		
	500.0 kW	6SL32.0-.YE64-...	1100 A	3NB3351-1KK26	100 kA		
			1100 A	2 x 3NE1435-3	100 kA		
	560.0 kW	6SL32.0-.YE66-...	1250 A	3NB3352-1KK26	100 kA		
			1250 A	2 x 3NE1436-3	100 kA		

Note:

Siemens 3NA low-voltage fuses are recommended for frame sizes A to G.

Siemens 3NE low-voltage fuses are recommended for frame size H.

Siemens 3NB low-voltage fuses are recommended for frame size J.

1.2.3 IEC fuses, 500 V ... 690 V

Converter			Fuse			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 500 V AC	Metric	Imperial (USA)
FSD	3.0 kW	6SL32...-YH18-...0	10 A	3NA3803-6	100 kA	no restriction	no restriction
	4.0 kW	6SL32...-YH20-...0	10 A	3NA3803-6	100 kA		
	5.5 kW	6SL32...-YH22-...0	16 A	3NA3805-6	100 kA		
	7.5 kW	6SL32...-YH24-...0	16 A	3NA3805-6	100 kA		
	11.0 kW	6SL32...-YH26-...0	20 A	3NA3807-6	100 kA		
	15.0 kW	6SL32...-YH28-...0	25 A	3NA3810-6	100 kA		
	18.5 kW	6SL32...-YH30-...0	32 A	3NA3812-6	100 kA		
	22.0 kW	6SL32...-YH32-...0	40 A	3NA3817-6KJ	100 kA		
	30.0 kW	6SL32...-YH34-...0	50 A	3NA3820-6KJ	100 kA		
FSE	37.0 kW	6SL32...-YH36-...0	63 A	3NA3822-6	100 kA	0.37 m ³	13.07 ft ³
	45.0 kW	6SL32...-YH38-...0	80 A	3NA3824-6	100 kA		
FSF	55.0 kW	6SL32...-YH40-...0	80 A	3NA3824-6	100 kA	0.37 m ³	13.07 ft ³
	75.0 kW	6SL32...-YH42-...0	100 A	3NA3830-6	100 kA		
	90.0 kW	6SL32...-YH44-...0	125 A	3NA3132-6	100 kA		
	110.0 kW	6SL32...-YH46-...0	160 A	3NA3136-6	100 kA		
FSG	132.0 kW	6SL32...-YH48-...0	200 A	3NA3140-6	100 kA	0.6 m ³	21.19 ft ³
	160.0 kW	6SL32...-YH50-...0	250 A	3NA3244-6	100 kA		
	200.0 kW	6SL32...-YH52-...0	315 A	3NA3252-6	100 kA		
FSH	250.0 kW	6SL32...-YH54-...0	355 A	3NA3354-6	100 kA	0.6 m ³	21.19 ft ³
			450 A	3NE1333-2	100 kA		
	315.0 kW	6SL32.0-.YH56-...	450 A	3NE1333-3	100 kA		
			500 A	3NE1334-2	100 kA		
	355.0 kW	6SL32.0-.YH58-...	500 A	3NE1334-3	100 kA		
			560 A	3NE1435-2	100 kA		
	400.0 kW	6SL32.0-.YH60-...	560 A	3NE1435-3	100 kA		
			630 A	3NE1436-2	100 kA		
450.0 kW	6SL32.0-.YH62-...	630 A	3NE1436-3	100 kA			
		710 A	3NE1437-2	100 kA			
FSJ	500.0 kW	6SL32.0-.YH64-...	710 A	3NE1437-3	100 kA	0.6 m ³	21.19 ft ³
			800 A	3NE1438-2	100 kA		
	560.0 kW	6SL32.0-.YH66-...	800 A	3NE1438-3	100 kA		
			850 A	3NE1448-2	100 kA		
	630.0 kW	6SL32.0-.YH68-...	850 A	3NE1448-3	100 kA		

Note:

Siemens 3NA low-voltage fuses are recommended for frame sizes D to F.

Siemens 3NE low-voltage fuses are recommended for frame sizes H and J.

1.3 IEC Motor Starter Protectors

1.3.1 IEC Motor Starter Protectors, 200 V ... 240 V

Converter			MSP			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 240 V AC	Metric	Imperial (USA)
FSA	0.75 kW	6SL32...-YC10-...0	16 A	3RV20.1-4AA..	55 kA	0.05 m ³	1.8 ft ³
			17 A	3RV2031-4TA..	5 kA		
	1.1 kW	6SL32...-YC12-...0	16 A	3RV20.1-4AA..	55 kA		
			17 A	3RV2031-4TA..	5 kA		
	1.5 kW	6SL32...-YC14-...0	16 A	3RV20.1-4AA..	55 kA		
			17 A	3RV2031-4TA..	5 kA		
FSB	2.2 kW	6SL32...-YC16-...0	32 A	3RV2021-4EA..	55 kA	0.09 m ³	3.18 ft ³
				3RV2031-4EA..	65 kA		
	3.0 kW	6SL32...-YC18-...0	32 A	3RV2021-4EA..	55 kA	up to 5 kA	up to 5 kA
				3RV2031-4EA..	65 kA		
	4.0 kW	6SL32...-YC20-...0	32 A	3RV2021-4EA..	55 kA	0.14 m ³	5.08 ft ³
				3RV2031-4EA..	65 kA		
FSC	6.0 kW	6SL32...-YC22-...0	52 A	3RV2031-4WA..	5 kA	0.14 m ³	5.08 ft ³
			50 A	3RV2041-4HA..	5 kA		
	7.5 kW	6SL32...-YC24-...0	52 A	3RV2031-4WA..	5 kA		
			50 A	3RV2041-4HA..	5 kA		
FSD	11.0 kW	6SL32...-YC26-...0	65 A	3RV2031-4JA..	65 kA	no restriction	no restriction
			65 A	3RV2032-4JA..	65 kA		
			63 A	3RV2041-4JA*	65 kA		
			63 A	3RV2042-4JA*	65 kA		
	15.0 kW	6SL32...-YC28-...0	73 A	3RV2031-4KA..	65 kA		
			73 A	3RV2032-4KA..	65 kA		
			75 A	3RV2041-4KA*	65 kA		
			75 A	3RV2042-4KA*	65 kA		
	18.5 kW	6SL32...-YC30-...0	73 A	3RV2031-4KA..	65 kA		
			73 A	3RV2032-4KA..	65 kA		
			93 A	3RV2041-4YA*	65 kA		
			93 A	3RV2042-4YA*	65 kA		

Note:

I_{cc} values are only valid for supply grids with grounded star point (solidly grounded wye TN or TT systems).

1.3.2 IEC Motor Starter Protectors, 380 V ... 480 V

Converter			MSP			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 400 V AC	Metric	Imperial (USA)
FSA	0.75 kW	6SL32.0-.YE10-...	16 A	3RV20.1-4AA..	55 kA	0.05 m ³	1.8 ft ³
			17 A	3RV2031-4TA..	5 kA		
	1.1 kW	6SL32.0-.YE12-...	16 A	3RV20.1-4AA..	55 kA		
			17 A	3RV2031-4TA..	5 kA		
	1.5 kW	6SL32.0-.YE14-...	16 A	3RV20.1-4AA..	55 kA		
			17 A	3RV2031-4TA..	5 kA		
	2.2 kW	6SL32.0-.YE16-...	16 A	3RV20.1-4AA..	55 kA		
			17 A	3RV2031-4TA..	5 kA		
	3.0 kW	6SL32.0-.YE18-...	16 A	3RV20.1-4AA..	55 kA		
			17 A	3RV2031-4TA..	5 kA		
FSB	4.0 kW	6SL32.0-.YE20-...	32 A	3RV2021-4EA..	55 kA	0.09 m ³	3.18 ft ³
			32 A	3RV2031-4EA..	65 kA	up to 5 kA	up to 5 kA
	5.5 kW	6SL32.0-.YE22-...	32 A	3RV2021-4EA..	55 kA	0.14 m ³	5.08 ft ³
			32 A	3RV2031-4EA..	65 kA		
	7.5 kW	6SL32.0-.YE24-...	32 A	3RV2021-4EA..	55 kA	above 5 kA	above 5 kA
			32 A	3RV2031-4EA..	65 kA		
FSC	11.0 kW	6SL32.0-.YE26-...	52 A	3RV2031-4WA..	5 kA	0.14 m ³	5.08 ft ³
			50 A	3RV2041-4HA..	5 kA		
	15.0 kW	6SL32.0-.YE28-...	52 A	3RV2031-4WA..	5 kA		
			50 A	3RV2041-4HA..	5 kA		
FSD	18.5 kW	6SL32...-YE30-...0	65 A	3RV2031-4JA..	65 kA	no restriction	no restriction
			65 A	3RV2032-4JA..	65 kA		
			63 A	3RV2041-4JA*	65 kA		
			63 A	3RV2042-4JA*	65 kA		
	22.0 kW	6SL32...-YE32-...0	73 A	3RV2031-4KA..	65 kA		
			73 A	3RV2032-4KA..	65 kA		
			75 A	3RV2041-4KA..	65 kA		
			75 A	3RV2042-4KA..	65 kA		
	30.0 kW	6SL32...-YE34-...0	93 A	3RV2041-4YA..	65 kA		
			93 A	3RV2042-4YA..	65 kA		
	37.0 kW	6SL32...-YE36-...0	100 A	3RV2041-4MA..	65 kA		
			100 A	3RV2042-4MA..	65 kA		

Note:

I_{cc} values are only valid for supply grids with grounded star point (solidly grounded wye TN or TT systems).

1.3.3 IEC Motor Starter Protectors, 500 V ... 690 V

Converter			MSP			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 500 V AC	Metric	Imperial (USA)
FSD	3.0 kW	6SL32...YH18-...0	8 A	3RV2011-1HA..	42 kA	no restriction	no restriction
			8 A	3RV2021-1HA..	42 kA		
			14 A	3RV2031-4SA..	12 kA		
			14 A	3RV2032-4SA..	18 kA		
	4.0 kW	6SL32...YH20-...0	10 A	3RV2011-1JA..	42 kA		
			10 A	3RV2021-1JA..	42 kA		
			14 A	3RV2031-4SA..	12 kA		
			14 A	3RV2032-4SA..	18 kA		
	5.5 kW	6SL32...YH22-...0	12.5 A	3RV2011-1KA..	42 kA		
			12.5 A	3RV2021-1KA..	42 kA		
			14 A	3RV2031-4SA..	12 kA		
			17 A	3RV2031-4TA..	18 kA		
			14 A	3RV2032-4SA..	12 kA		
			17 A	3RV2032-4TA..	18 kA		
	7.5 kW	6SL32...YH24-...0	16 A	3RV2011-4AA..	42 kA		
			16 A	3RV2021-4AA..	42 kA		
			14 A	3RV2031-4SA..	12 kA		
			17 A	3RV2031-4TA..	18 kA		
			14 A	3RV2032-4SA..	12 kA		
			17 A	3RV2032-4TA..	18 kA		
	11.0 kW	6SL32...YH26-...0	20 A	3RV2031-4BA..	12 kA		
			20 A	3RV2032-4BA..	18 kA		
	15.0 kW	6SL32...YH28-...0	32 A	3RV2031-4EA..	10 kA		
			32 A	3RV2032-4EA..	15 kA		
	18.5 kW	6SL32...YH30-...0	32 A	3RV2031-4EA..	10 kA		
			32 A	3RV2032-4EA..	15 kA		
	22.0 kW	6SL32...YH32-...0	40 A	3RV2031-4UA..	10 kA		
			40 A	3RV2032-4UA..	15 kA		
			40 A	3RV2041-4FA..	12 kA		
			40 A	3RV2042-4FA..	18 kA		
	30.0 kW	6SL32...YH34-...0	52 A	3RV2031-4WA..	8 kA		
			52 A	3RV2032-4WA..	10 kA		
50 A			3RV2041-4HA..	12 kA			
50 A			3RV2042-4HA..	15 kA			
52 A			3RV2031-4WA..	10 kA			
37.0 kW	6SL32...YH36-...0	52 A	3RV2032-4WA..	15 kA			
		59 A	3RV2031-4XA..	8 kA			
		59 A	3RV2032-4XA..	10 kA			
		63 A	3RV2041-4JA..	12 kA			
		63 A	3RV2042-4JA..	15 kA			
		63 A	3RV2042-4JA..	15 kA			

Note:

I_{cc} values are only valid for supply grids with grounded star point (solidly grounded wye TN or TT systems).

1.4 IEC Circuit Breakers

1.4.1 IEC Circuit Breakers, 200 V ... 240 V

Converter			Circuit Breaker			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Type	I _{cc} @ 240 V	Metric	Imperial (USA)
FSB	2.2 kW	6SL32...-YC16-...0	35 A	3RV2742-5FD..	5 kA	0.09 m ³	3.18 ft ³
			32 A	3VA1032-.E	5 kA		
			32 A	3VA1132-.E...	5 kA		
	3.0 kW	6SL32...-YC18-...0	35 A	3RV2742-5FD..	5 kA		
			32 A	3VA1032-.E	5 kA		
			32 A	3VA1132-.E...	5 kA		
	4.0 kW	6SL32...-YC20-...0	35 A	3RV2742-5FD..	5 kA		
			32 A	3VA1032-.E	5 kA		
			32 A	3VA1132-.E...	5 kA		
FSC	5.5 kW	6SL32...-YC22-...0	50 A	3RV2742-5JD..	5 kA	0.14 m ³	5.08 ft ³
			50 A	3VA1050-.E	5 kA		
			50 A	3VA1150-.E...	5 kA		
	7.5 kW	6SL32...-YC24-...0	50 A	3RV2742-5JD..	5 kA		
			50 A	3VA1050-.E	5 kA		
			50 A	3VA1150-.E...	5 kA		
FSD	11.0 kW	6SL32...-YC26-...0	63 A	3VA1063-4ED...	55 kA	no restriction	no restriction
			63 A	3VA1163-6E...	100 kA		
	15.0 kW	6SL32...-YC28-...0	80 A	3VA1080-4ED..	55 kA		
			80 A	3VA1180-6E...	100 kA		
	18.5 kW	6SL32...-YC30-...0	100 A	3VA1010-4ED...	55 kA		
			100 A	3VA1110-6E...	100 kA		
FSE	22.0 kW	6SL32...-YC32-...0	125 A	3VA1112-6E...	100 kA	0.37 m ³	13.07 ft ³
	30.0 kW	6SL32...-YC34-...0	160 A	3VA1116-6E...	100 kA		
			160 A	3VA1216-6EF...	100 kA		
FSF	37.0 kW	6SL32...-YC36-...0	200 A	3VA1220-6EF...	100 kA	0.37 m ³	13.07 ft ³
	45.0 kW	6SL32...-YC38-...0	200 A	3VA1220-6EF...	100 kA		
	55.0 kW	6SL32...-YC40-...0	250 A	3VA1225-6EF...	100 kA		

1.4.2 IEC Circuit Breakers, 380 V ... 480 V

Converter			Circuit Breaker			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 400 V AC	Metric	Imperial (USA)
FSB	4.0 kW	6SL32.0-.YE20-...	35 A	3RV2742-5FD..	5 kA	0.09 m ³	3.18 ft ³
			32 A	3VA1032-.E	5 kA		
			32 A	3VA1132-.E...	5 kA		
	5.5 kW	6SL32.0-.YE22-...	35 A	3RV2742-5FD..	5 kA		
			32 A	3VA1032-.E	5 kA		
			32 A	3VA1132-.E...	5 kA		
	7.5 kW	6SL32.0-.YE24-...	35 A	3RV2742-5FD..	5 kA		
			32 A	3VA1032-.E	5 kA		
			32 A	3VA1132-.E...	5 kA		
FSC	11.0 kW	6SL32.0-.YE26-...	50 A	3RV2742-5JD..	5 kA	0.14 m ³	5.08 ft ³
			50 A	3VA1050-.E	5 kA		
			50 A	3VA1150-.E...	5 kA		
	15.0 kW	6SL32.0-.YE28-...	50 A	3RV2742-5JD..	5 kA		
			50 A	3VA1050-.E	5 kA		
			50 A	3VA1150-.E...	5 kA		
FSD	18.5 kW	6SL32...-YE30-...0	60 A	3RV2742-5FD..	100 kA	no restriction	no restriction
			63 A	3VA1063-4ED...	36 kA		
				3VA1163-6E...	70 kA		
	22.0 kW	6SL32...-YE32-...0	80 A	3RV2742-5QD..	100 kA		
			80 A	3VA1080-4ED...	36 kA		
				3VA1180-6E...	70 kA		
	30.0 kW	6SL32...-YE34-...0	100 A	3VA1010-4ED...	36 kA		
				3VA1110-6E...	70 kA		
				3VA2010-7...	100 kA		
				3VA2110-7...	100 kA		
	37.0 kW	6SL32...-YE36-...0	100 A	3VA1010-4ED...	36 kA		
				3VA1110-6E...	70 kA		
FSE	45.0 kW	6SL32...-YE38-...0	125 A	3VA1112-6E...	70 kA	0.37 m ³	13.07 ft ³
			160 A	3VA2016-7...	100 kA		
			160 A	3VA2116-7...	100 kA		
	55.0 kW	6SL32...-YE40-...0	160 A	3VA1116-6E...	70 kA		
			160 A	3VA2016-7...	100 kA		
			160 A	3VA2116-7...	100 kA		
FSF	75.0 kW	6SL32...-YE42-...0	200 A	3VA1220-6EF...	70 kA	0.37 m ³	13.07 ft ³
			250 A	3VA2225-7...	100 kA		
			250 A	3VA2325-7...	100 kA		
	90.0 kW	6SL32...-YE44-...0	250 A	3VA1225-6EF...	70 kA		
			250 A	3VA2225-7...	100 kA		
			250 A	3VA2325-7...	100 kA		
	110.0 kW	6SL32...-YE46-...0	315 A	3VA2340-8...	100 kA		
			400 A	3VA2440-7...	100 kA		
	132.0 kW	6SL32...-YE48-...0	400 A	3VA2340-8...	100 kA		
			400 A	3VA2440-7...	100 kA		
400 A				3VA2440-7...	100 kA		
FSG	160.0 kW	6SL32...-YE50-...0	400 A	3VA2340-8..	100 kA	0.6 m ³	21.19 ft ³
			400 A	3VA2440-8..	100 kA		
	200.0 kW	6SL32...-YE52-...0	500 A	3VA2450-8..	100 kA		
	250.0 kW	6SL32...-YE54-...0	630 A	3VA2463-8..	100 kA		

1.4.3 IEC Circuit Breakers, 500 V ... 690 V

Converter			Circuit Breaker			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	I _{cc} @ 400 V AC	Metric	Imperial (USA)
FSD	5.5 kW	6SL32...-YH22-...0	16 A	3VA1096-4ED...	16 kA	0.37 m ³	13.07 ft ³
			16 A	3VA1196-6E...	20 kA		
	7.5 kW	6SL32...-YH24-...0	16 A	3VA1096-4ED...	16 kA		
			16 A	3VA1196-6E...	20 kA		
	11.0 kW	6SL32...-YH26-...0	20 A	3VA1020-4ED...	16 kA		
			20 A	3VA1120-6E...	20 kA		
	15.0 kW	6SL32...-YH28-...0	32 A	3VA1032-4ED...	16 kA		
			32 A	3VA1132-6E...	20 kA		
	18.5 kW	6SL32...-YH30-...0	32 A	3VA1032-4ED...	16 kA		
			32 A	3VA1132-6E...	20 kA		
	22.0 kW	6SL32...-YH32-...0	40 A	3VA1040-4ED...	16 kA		
			40 A	3VA1140-6E...	20 kA		
	30.0 kW	6SL32...-YH34-...0	50 A	3VA1050-4ED...	16 kA		
			50 A	3VA1150-6E...	20 kA		
37.0 kW	6SL32...-YH36-...0	63 A	3VA1063-4ED...	16 kA			
		63 A	3VA1163-6E...	20 kA			
FSE	45.0 kW	6SL32...-YH38-...0	80 A	3VA1080-4ED...	16 kA	0.37 m ³	13.07 ft ³
			80 A	3VA1180-6E...	20 kA		
	55.0 kW	6SL32...-YH40-...0	100 A	3VA1010-4ED...	16 kA		
			100 A	3VA1110-6E...	20 kA		
FSF	75.0 kW	6SL32...-YH42-...0	100 A	3VA2010-7E.	24 kA	0.37 m ³	13.07 ft ³
			100 A	3VA2110-7E.	24 kA		
			125 A	3VA1112-4ED...	20 kA		
	90.0 kW	6SL32...-YH44-...0	160 A	3VA2116-7E.	24 kA		
			160 A	3VA2216-7E.	24 kA		
			160 A	3VA2216-7E.	24 kA		
	110.0 kW	6SL32...-YH46-...0	160 A	3VA1116-6E...	10 kA		
			160 A	3VA1216-6E...	24 kA		
			160 A	3VA2116-7E...	24 kA		
			160 A	3VA2216-7E...	24 kA		
132.0 kW	6SL32...-YH48-...0	200 A	3VA1220-6E.	10 kA			
		200 A	3VA2220-7E.	24 kA			
		200 A	3VA2320-7E.	24 kA			
FSG	160.0 kW	6SL32...-YH50-...0	250 A	3VA1225-6EF...	15 kA	0.6 m ³	21.19 ft ³
			250 A	3VA2225-8..	85 kA		
	200.0 kW	6SL32...-YH52-...0	400 A	3VA2340-8..	85 kA		
FSH	250.0 kW	6SL32...-YH54-...0	400 A	3VA2340-8..	85 kA		
	315.0 kW	6SL32.0-YH56-...					
	355.0 kW	6SL32.0-YH58-...					
	400.0 kW	6SL32.0-YH60-...					
FSJ	450.0 kW	6SL32.0-YH62-...					
	500.0 kW	6SL32.0-YH64-...					
	560.0 kW	6SL32.0-YH66-...					

2 UL/CSA applications

2.1 UL/CSA general notes

Branch circuit protection must be provided in accordance with

- the National Electrical Code (NEC) for USA
- the Canadian Electrical Code (CEC) Part I for Canada
- any additional local codes and regulations.

The tables below provide information for each drive type and article number on the following items:

- Suitable protective devices.

The specification includes the type and the maximum rated current of the branch circuit protective devices.

- Maximum SCCR (Short-Circuit Current Rating).

This is the maximum prospective symmetrical fault current at the specified voltage to which the drive system can be connected without sustaining damage exceeding defined acceptance criteria. The specified SCCR applies to the complete drive module including built-in EMI filters and pluggable terminals (where applicable).

- Minimum enclosure volume.

In the end application, the drive shall be installed in an outer enclosure or control cabinet which shall meet the minimum enclosure volume requirement.

Selection of protective devices (in accordance with NEC and CEC)

- Suitable Protective devices of the same type as specified in the tables with a lower ampere rating as permitted by NEC and/or CEC may be used, if suitable for the application.
- Protective devices of the same type as specified in the tables with a lower interrupting rating than the specified SCCR may be used, if suitable for the application. In such case, this lower interrupting current rating of a protective device shall be specified as the SCCR of a drive and protective device combination.
- The voltage rating of the protective device must be at least the voltage rating of the supply circuit.

The converter provides:

- Integral Motor Overload Protection which reduces the output current flow under overload conditions. Refer to manual for adjustments.
- Integral Output Short-Circuit Protection.
According to UL 508A Edition 3, components on the load side of a drive module with built-in short circuit protection are not required to have a short-circuit current rating.

UL File-Numbers

- FSA, FSB, FSC: UL file E121068 Vol 2 Sec 33 and Vol 7 Sec 9
- FSD, FSE, FSF, FSG: UL file E355661 Vol 5 Sec 1
- FSH, FSJ: UL file E192450 Vol 1 Sec 18

2.2 UL/CSA non-semiconductor fuses

2.2.1 UL/CSA non-semiconductor fuses, 200 V ... 240 V

Converter			Fuse		Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	SCCR @ 240 V	Metric	Imperial (USA)
FSA	0.75 kW	6SL32...YC10-...0	15 A	100 kA	0.05 m ³	1.8 ft ³
	1.1 kW	6SL32...YC12-...0	15 A	100 kA		
	1.5 kW	6SL32...YC14-...0	15 A	100 kA		
FSB	2.2 kW	6SL32...YC16-...0	35 A	100 kA	0.06 m ³	2.12 ft ³
	3.0 kW	6SL32...YC18-...0	35 A	100 kA		
	4.0 kW	6SL32...YC20-...0	35 A	100 kA		
FSC	5.5 kW	6SL32...YC22-...0	50 A	100 kA	0.14 m ³	5.08 ft ³
	7.5 kW	6SL32...YC24-...0	50 A	100 kA		
FSD	11.0 kW	6SL32...YC26-...0	60 A	100 kA	no restriction	no restriction
	15.0 kW	6SL32...YC28-...0	70 A	100 kA		
	18.5 kW	6SL32...YC30-...0	90 A	100 kA		
FSE	22.0 kW	6SL32...YC32-...0	110 A	100 kA	0.37 m ³	13.07 ft ³
	30.0 kW	6SL32...YC34-...0	150 A	100 kA		
FSF	37.0 kW	6SL32...YC36-...0	175 A	100 kA	0.37 m ³	13.07 ft ³
	45.0 kW	6SL32...YC38-...0	200 A	100 kA		
	55.0 kW	6SL32...YC40-...0	250 A	100 kA		

Note:

Any non-semiconductor fuse Class J, CF, T, or L (JDDZ) from any manufacturer may be used for all frame sizes. Additionally, Class CC and G fuses may be used for frame size A to frame size C.

2.2.2 UL/CSA non-semiconductor fuses, 380 V ... 480 V

Converter			Fuse		Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	SCCR @ 480 V	Metric	Imperial (USA)
FSA	0.75 kW	6SL32.0-.YE10-...	15 A	100 kA	0.05 m ³	1.8 ft ³
	1.1 kW	6SL32.0-.YE12-...	15 A	100 kA		
	1.5 kW	6SL32.0-.YE14-...	15 A	100 kA		
	2.2 kW	6SL32.0-.YE16-...	15 A	100 kA		
	3.0 kW	6SL32.0-.YE18-...	15 A	100 kA		
FSB	4.0 kW	6SL32.0-.YE20-...	35 A	100 kA	0.06 m ³	2.12 ft ³
	5.5 kW	6SL32.0-.YE22-...	35 A	100 kA		
	7.5 kW	6SL32.0-.YE24-...	35 A	100 kA		
FSC	11.0 kW	6SL32.0-.YE26-...	50 A	100 kA	0.14 m ³	5.08 ft ³
	15.0 kW	6SL32.0-.YE28-...	50 A	100 kA		
FSD	18.5 kW	6SL32...-YE30-...0	60 A	100 kA	no restriction	no restriction
	22.0 kW	6SL32...-YE32-...0	70 A	100 kA		
	30.0 kW	6SL32...-YE34-...0	90 A	100 kA		
	37.0 kW	6SL32...-YE36-...0	100 A	100 kA		
FSE	45.0 kW	6SL32...-YE38-...0	125 A	100 kA	0.37 m ³	13.07 ft ³
	55.0 kW	6SL32...-YE40-...0	150 A	100 kA		
FSF	75.0 kW	6SL32...-YE42-...0	200 A	100 kA	0.37 m ³	13.07 ft ³
	90.0 kW	6SL32...-YE44-...0	250 A	100 kA		
	110.0 kW	6SL32...-YE46-...0	300 A	100 kA		
	132.0 kW	6SL32...-YE48-...0	350 A	100 kA		
FSG	160.0 kW	6SL32...-YE50-...0	400 A	100 kA	0.6 m ³	21.19 ft ³
	200.0 kW	6SL32...-YE52-...0	500 A	100 kA		
	250.0 kW	6SL32...-YE54-...0	600 A	100 kA		

Note:

Any non-semiconductor fuse Class J, CF, T, or L (JDDZ) from any manufacturer may be used for all frame sizes. Additionally, Class CC and G fuses may be used for frame size A to frame size C.

2.2.3 UL/CSA non-semiconductor fuses, 500 V ... 600 V

Converter			Fuse		Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	SCCR @ 600 V	Metric	Imperial (USA)
FSD	3.0 kW	6SL32...YH18-...0	8 A	100 kA	no restriction	no restriction
	4.0 kW	6SL32...YH20-...0	10 A	100 kA		
	5.5 kW	6SL32...YH22-...0	15 A	100 kA		
	7.5 kW	6SL32...YH24-...0	15 A	100 kA		
	11.0 kW	6SL32...YH26-...0	20 A	100 kA		
	15.0 kW	6SL32...YH28-...0	25 A	100 kA		
	18.5 kW	6SL32...YH30-...0	30 A	100 kA		
	22.0 kW	6SL32...YH32-...0	35 A	100 kA		
	30.0 kW	6SL32...YH34-...0	50 A	100 kA		
	37.0 kW	6SL32...YH36-...0	60 A	100 kA		
FSE	45.0 kW	6SL32...YH38-...0	80 A	100 kA	0.37 m ³	13.07 ft ³
	55.0 kW	6SL32...YH40-...0	80 A	100 kA		
FSF	75.0 kW	6SL32...YH42-...0	110 A	100 kA	0.37 m ³	13.07 ft ³
	90.0 kW	6SL32...YH44-...0	150 A	100 kA		
	110.0 kW	6SL32...YH46-...0	150 A	100 kA		
	132.0 kW	6SL32...YH48-...0	200 A	100 kA		
FSG	160.0 kW	6SL32...YH50-...0	250 A	100 kA	0.6 m ³	21.19 ft ³
	200.0 kW	6SL32...YH52-...0	300 A	100 kA		
	250.0 kW	6SL32...YH54-...0	350 A	100 kA		

Note:

Any non-semiconductor fuse Class J, CF, T, or L (JDDZ) from any manufacturer may be used for frame sizes D to G. Additionally, Class CC and G fuses may be used for FSD.

2.3 UL/CSA semiconductor fuses

2.3.1 UL/CSA semiconductor fuses, 380 V ... 480 V

Converter			Fuse			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	SCCR @ 480 V	Metric	Imperial (USA)
FSD	18.5 kW	6SL32.0-.YE30-...	63 A	3NE1818-0	100 kA	0.38 m ³	13.4 ft ³
	22.0 kW	6SL32.0-.YE32-...	80 A	3NE1820-0	100 kA		
	30.0 kW	6SL32.0-.YE34-...	100 A	3NE1821-0	100 kA		
	37.0 kW	6SL32.0-.YE36-...	100 A	3NE1821-0	100 kA		
FSE	45.0 kW	6SL32.0-.YE38-...	125 A	3NE1822-0	100 kA	0.38 m ³	13.4 ft ³
	55.0 kW	6SL32.0-.YE40-...	160 A	3NE1824-0	100 kA		
FSF	75.0 kW	6SL32.0-.YE42-...	200 A	3NE1825-0	100 kA	0.38 m ³	13.4 ft ³
	90.0 kW	6SL32.0-.YE44-...	250 A	3NE1827-0	100 kA		
	110.0 kW	6SL32.0-.YE46-...	315 A	3NE1230-0	100 kA		
	132.0 kW	6SL32.0-.YE48-...	350 A	3NE1331-0	100 kA		
FSG	160.0 kW	6SL32.0-.YE50-...	500 A	3NE1334-2	100 kA		
	200.0 kW	6SL32.0-.YE52-...	500 A	3NE1334-2	100 kA		
	250.0 kW	6SL32.0-.YE54-...	630 A	3NE1336-2	100 kA		
FSH	315.0 kW	6SL32.0-.YE56-...	710 A	3NE1437-2	100 kA		
			710 A	3NE1437-3	100 kA		
	355.0 kW	6SL32.0-.YE58-...	800 A	3NE1438-2	100 kA		
			800 A	3NE1438-3	100 kA		
	400.0 kW	6SL32.0-.YE60-...	850 A	3NE1448-2	100 kA		
			850 A	3NE1448-3	100 kA		
FSJ	450.0 kW	6SL32.0-.YE62-...	1000 A	3NB3350-1KK26	100 kA		
	500.0 kW	6SL32.0-.YE64-...	1100 A	3NB3351-1KK26	100 kA		
	560.0 kW	6SL32.0-.YE66-...	1250 A	3NB3352-1KK26	100 kA		

2.3.2 UL/CSA semiconductor fuses, 500 V ... 600 V

Converter			Fuse			Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Article no.	SCCR @ 600 V	Metric	Imperial (USA)
FSD	3.0 kW	6SL32.0-.YH18-...			100 kA		
	4.0 kW	6SL32.0-.YH20-...			100 kA		
	5.5 kW	6SL32.0-.YH22-...			100 kA		
	7.5 kW	6SL32.0-.YH24-...			100 kA		
FSD	11.0 kW	6SL32.0-.YH26-...	25 A	3NE1815-0	100 kA		
	15.0 kW	6SL32.0-.YH28-...	25 A	3NE1815-0	100 kA		
	18.5 kW	6SL32.0-.YH30-...	35 A	3NE1803-0	100 kA		
	22.0 kW	6SL32.0-.YH32-...	35 A	3NE1803-0	100 kA		
	30.0 kW	6SL32.0-.YH34-...	50 A	3NE1817-0	100 kA		
	37.0 kW	6SL32.0-.YH36-...	63 A	3NE1818-0	100 kA		
FSE	45.0 kW	6SL32.0-.YH38-...	80 A	3NE1820-0	100 kA		
	55.0 kW	6SL32.0-.YH40-...	80 A	3NE1820-0	100 kA		
FSF	75.0 kW	6SL32.0-.YH42-...	100 A	3NE1021-0	100 kA		
	90.0 kW	6SL32.0-.YH44-...	125 A	3NE1022-0	100 kA		
	110.0 kW	6SL32.0-.YH46-...	160 A	3NE1224-0	100 kA		
	132.0 kW	6SL32.0-.YH48-...	200 A	3NE1225-0	100 kA		
FSG	160.0 kW	6SL32.0-.YH50-...	250 A	3NE1227-0	100 kA		
	200.0 kW	6SL32.0-.YH52-...	315 A	3NE1230-0	100 kA		
	250.0 kW	6SL32.0-.YH54-...	350 A	3NE1331-0	100 kA		
FSH	315.0 kW	6SL32.0-.YH56-...	450 A	3NE1333-2	100 kA		
			450 A	3NE1333-3	100 kA		
	355.0 kW	6SL32.0-.YH58-...	500 A	3NE1334-2	100 kA		
			500 A	3NE1334-3	100 kA		
	400.0 kW	6SL32.0-.YH60-...	560 A	3NE1335-2	100 kA		
			560 A	3NE1335-3	100 kA		
450.0 kW	6SL32.0-.YH62-...	630 A	3NE1336-2	100 kA			
		630 A	3NE1336-3	100 kA			
FSJ	500.0 kW	6SL32.0-.YH64-...	710 A	3NE1437-2	100 kA		
			710 A	3NE1437-3	100 kA		
	560.0 kW	6SL32.0-.YH66-...	800 A	3NE1438-2	100 kA		
			800 A	3NE1438-3	100 kA		
	630.0 kW	6SL32.0-.YH68-...	850 A	3NE1448-2	100 kA		
			850 A	3NE1448-3	100 kA		

2.4 UL/CSA Type E Combination Motor Controllers

2.4.1 UL/CSA Type E Combination Motor Controllers, 200 V ... 240 V

Converter			CMC					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Rated power @		Article no.	SCCR @ 240 V	Metric	Imperial (USA)
				1 AC 230 V	3 AC 230 V				
FSA	0.75 kW	6SL32...-YC10-...0	16 A	---	10 HP	3RV20.1-4AA..	65 kA	0.05 m ³	1.8 ft ³
			17A	---	15 HP	3RV2031-4TA..	5 kA		
	1.1 kW	6SL32...-YC12-...0	16 A	---	10 HP	3RV20.1-4AA..	65 kA		
			17A	---	15 HP	3RV2031-4TA..	5 kA		
	1.5 kW	6SL32...-YC14-...0	16 A	---	10 HP	3RV20.1-4AA..	65 kA		
			17A	---	15 HP	3RV2031-4TA..	5 kA		
FSB	2.2 kW	6SL32...-YC16-...0	32A	---	20 HP	3RV2021-4EA..	50 kA	0.09 m ³	3.18 ft ³
				---	25 HP	3RV2031-4EA..	65 kA		
	3.0 kW	6SL32...-YC18-...0	32A	---	20 HP	3RV2021-4EA..	50 kA	up to 5 kA	up to 5 kA
				---	25 HP	3RV2031-4EA..	65 kA		
	4.0 kW	6SL32...-YC20-...0	32A	---	20 HP	3RV2021-4EA..	50 kA	0.14 m ³	5.08 ft ³
				---	25 HP	3RV2031-4EA..	65 kA		
FSC	5.5 kW	6SL32...-YC22-...0	50A	---	40 HP	3RV2031-4WA..	5 kA	0.14 m ³	5.08 ft ³
				---	40 HP	3RV2041-4HA..	5 kA		
	7.5 kW	6SL32...-YC24-...0	50A	---	40 HP	3RV2031-4WA..	5 kA		
				---	40 HP	3RV2041-4HA..	5 kA		
FSD	11.0 kW	6SL32...-YC26-...0	65 A	---	25 HP	3RV2031-4JA..	62 kA	no restriction	no restriction
			65 A	---	25 HP	3RV2032-4JA..	65 kA		
			63 A	---	25 HP	3RV2041-4JA*	65 kA		
			63 A	---	25 HP	3RV2042-4JA*	65 kA		
	15.0 kW	6SL32...-YC28-...0	73 A	---	30 HP	3RV2031-4KA..	65 kA		
			73 A	---	30 HP	3RV2032-4KA..	65 kA		
			75 A	---	30 HP	3RV2041-4KA*	65 kA		
			75 A	---	30 HP	3RV2042-4KA*	65 kA		
	18.5 kW	6SL32...-YC30-...0	93 A	---	40 HP	3RV2041-4YA*	65 kA		
			93 A	---	40 HP	3RV2042-4YA*	65 kA		

Note:

3RV20 motor starter protectors are approved in accordance with UL 508/UL60947-4-1 in combination with the terminal blocks listed below:

- 3RV2011 and 3RV2021 with 3RV2928-1H
- 3RV203. with 3RV2938-1K
- 3RV204. with 3RT2946-4GA07

Not necessary for CSA

2.4.2 UL/CSA Type E Combination Motor Controllers, 380 V ... 480 V

Converter			CMC				Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Rated power @ 3 AC 460 V	Article no.	SCCR @ 480 Y / 277 V	Metric	Imperial (USA)
FSA	0.75 kW	6SL32.0-.YE10-...	16 A	10 HP	3RV20.1-4AA..	65 kA	0.05 m³	1.8 ft³
			17 A	15 HP	3RV2031-4TA..	5 kA		
	1.1 kW	6SL32.0-.YE12-...	16 A	10 HP	3RV20.1-4AA..	65 kA		
			17 A	15 HP	3RV2031-4TA..	5 kA		
	1.5 kW	6SL32.0-.YE14-...	16 A	10 HP	3RV20.1-4AA..	65 kA		
			17 A	15 HP	3RV2031-4TA..	5 kA		
	2.2 kW	6SL32.0-.YE16-...	16 A	10 HP	3RV20.1-4AA..	65 kA		
			17 A	15 HP	3RV2031-4TA..	5 kA		
	3.0 kW	6SL32.0-.YE18-...	16 A	10 HP	3RV20.1-4AA..	65 kA		
			17 A	15 HP	3RV2031-4TA..	5 kA		
FSB	4.0 kW	6SL32.0-.YE20-...	32 A	20 HP	3RV2021-4EA..	50 kA	0.09 m³	3.18 ft³
			32 A	25 HP	3RV2031-4EA..	65 kA		
	5.5 kW	6SL32.0-.YE22-...	32 A	20 HP	3RV2021-4EA..	50 kA	0.14 m³	5.08 ft³
			32 A	25 HP	3RV2031-4EA..	65 kA		
	7.5 kW	6SL32.0-.YE24-...	32 A	20 HP	3RV2021-4EA..	50 kA	up to 50 / 65 kA	up to 50 / 65 kA
			32 A	25 HP	3RV2031-4EA..	65 kA		
FSC	11.0 kW	6SL32.0-.YE26-...	52 A	40 HP	3RV2031-4WA..	5 kA	0.14 m³	5.08 ft³
			50 A	40 HP	3RV2041-4HA..	5 kA		
	15.0 kW	6SL32.0-.YE28-...	52 A	40 HP	3RV2031-4WA..	5 kA		
			50 A	40 HP	3RV2041-4HA..	5 kA		
FSD	18.5 kW	6SL32...-YE30-...0	65 A	50 HP	3RV2031-4JA..	20 kA	no restriction	no restriction
			65 A	50 HP	3RV2032-4JA..	30 kA		
			63 A	50 HP	3RV2041-4JA*	65 kA		
			63 A	50 HP	3RV2042-4JA*	65 kA		
	22.0 kW	6SL32...-YE32-...0	73 A	60 HP	3RV2031-4KA..	20 kA		
			73 A	60 HP	3RV2032-4KA..	30 kA		
			75 A	60 HP	3RV2041-4KA..	65 kA		
			75 A	60 HP	3RV2042-4KA..	65 kA		
	30.0 kW	6SL32...-YE34-...0	93 A	75 HP	3RV2041-4YA..	65 kA		
			93 A	75 HP	3RV2042-4YA..	65 kA		
	37.0 kW	6SL32...-YE36-...0	100 A	75 HP	3RV2041-4MA..	65 kA		
			100 A	75 HP	3RV2042-4MA..	65 kA		

Note:

3RV20 motor starter protectors are approved in accordance with UL 508/UL60947-4-1 in combination with the terminal blocks listed below:

- 3RV2011 and 3RV2021 with 3RV2928-1H
- 3RV203. with 3RV2938-1K
- 3RV204. with 3RT2946-4GA07

Not necessary for CSA

2.4.3 UL/CSA Type E Combination Motor Controllers, 500 V ... 600 V

Converter			CMC				Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	Rated power @ 3 AC 575 V	Article no.	SCCR @ 600 Y / 347 V	Metric	Imperial (USA)
FSD	3.0 kW	6SL32...YH18-...0	8 A	5 HP	3RV2011-1HA..	30 kA	no restriction	no restriction
			8 A	5 HP	3RV2021-1HA..	30 kA		
			14 A	15 HP	3RV2031-4SA..	25 kA		
			14 A	15 HP	3RV2032-4SA..	25 kA		
	4.0 kW	6SL32...YH20-...0	10 A	7.5 HP	3RV2011-1JA..	30 kA		
			10 A	7.5 HP	3RV2021-1JA..	30 kA		
			14 A	15 HP	3RV2031-4SA..	25 kA		
			14 A	15 HP	3RV2032-4SA..	25 kA		
	5.5 kW	6SL32...YH22-...0	12.5 A	10 HP	3RV2011-1KA..	30 kA		
			12.5 A	10 HP	3RV2021-1KA..	30 kA		
			14 A	15 HP	3RV2031-4SA..	25 kA		
			17 A	15 HP	3RV2031-4TA..	25 kA		
			14 A	15 HP	3RV2032-4SA..	25 kA		
	7.5 kW	6SL32...YH24-...0	17 A	15 HP	3RV2032-4TA..	25 kA		
			14 A	15 HP	3RV2031-4SA..	25 kA		
			17 A	15 HP	3RV2031-4TA..	25 kA		
			14 A	15 HP	3RV2032-4SA..	25 kA		
	11.0 kW	6SL32...YH26-...0	20 A	20 HP	3RV2031-4BA..	25 kA		
			20 A	20 HP	3RV2032-4BA..	25 kA		
	15.0 kW	6SL32...YH28-...0	32 A	30 HP	3RV2031-4EA..	25 kA		
			32 A	30 HP	3RV2032-4EA..	25 kA		
	18.5 kW	6SL32...YH30-...0	32 A	30 HP	3RV2031-4EA..	25 kA		
			32 A	30 HP	3RV2032-4EA..	25 kA		
	22.0 kW	6SL32...YH32-...0	40 A	40 HP	3RV2031-4UA..	22 kA		
			40 A	40 HP	3RV2032-4UA..	22 kA		
			40 A	40 HP	3RV2041-4FA..	30 kA		
			40 A	40 HP	3RV2042-4FA..	30 kA		
	30.0 kW	6SL32...YH34-...0	52 A	50 HP	3RV2031-4WA..	22 kA		
52 A			50 HP	3RV2032-4WA..	22 kA			
50 A			50 HP	3RV2041-4HA..	30 kA			
50 A			50 HP	3RV2042-4HA..	30 kA			
37.0 kW	6SL32...YH36-...0	52 A	50 HP	3RV2031-4WA..	22 kA			
		52 A	50 HP	3RV2032-4WA..	22 kA			
		63 A	60 HP	3RV2041-4JA..	30 kA			
		63 A	60 HP	3RV2042-4JA..	30 kA			

Note:

3RV20 motor starter protectors are approved in accordance with UL 508/UL60947-4-1 in combination with the terminal blocks listed below:

- 3RV2011 and 3RV2021 with 3RV2928-1H
- 3RV203. with 3RV2938-1K
- 3RV204. with 3RT2946-4GA07

Not necessary for CSA

2.5 UL/CSA Circuit Breakers

2.5.1 UL/CSA Circuit Breakers, 200 V ... 240 V

Converter			Circuit Breaker				Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA Type ¹⁾	Article no. example (European) ²⁾	SCCR@ 240 V	Metric	Imperial (USA)
FSB	2.2 kW	6SL32...YC16-...0	35 A	3RV2742	3RV2742-5FD...	5 kA	0.09 m ³	3.18 ft ³
			35 A	SEAS (3VA51)	3VA5135-4..	5 kA		
			35 A	MEAS (3VA51)	3VA5135-5..	5 kA		
			35 A	HEAS (3VA51)	3VA5135-6..	5 kA		
	3.0 kW	6SL32...YC18-...0	35 A	3RV2742	3RV2742-5FD...	5 kA		
			35 A	SEAS (3VA51)	3VA5135-4..	5 kA		
			35 A	MEAS (3VA51)	3VA5135-5..	5 kA		
			35 A	HEAS (3VA51)	3VA5135-6..	5 kA		
	4.0 kW	6SL32...YC20-...0	35 A	3RV2742	3RV2742-5FD...	5 kA		
			35 A	SEAS (3VA51)	3VA5135-4..	5 kA		
			35 A	MEAS (3VA51)	3VA5135-5..	5 kA		
			35 A	HEAS (3VA51)	3VA5135-6..	5 kA		
FSC	5.5 kW	6SL32...YC22-...0	40 A	MDAE (3VA61)	3VA6140-5..	5 kA	0.14 m ³	5.08 ft ³
			40 A	HDAE (3VA61)	3VA6140-6..	5 kA		
			40 A	CDAE (3VA61)	3VA6140-7..	5 kA		
			40 A	LDAE (3VA61)	3VA6140-8..	5 kA		
			50 A	3RV2742	3RV2742-5JD...	5 kA		
			50 A	SEAS (3VA51)	3VA5150-4..	5 kA		
			50 A	MEAS (3VA51)	3VA5150-5..	5 kA		
			50 A	HEAS (3VA51)	3VA5150-6..	5 kA		
			7.5 kW	6SL32...YC24-...0	40 A	MDAE (3VA61)		
	40 A	HDAE (3VA61)			3VA6140-6..	5 kA		
	40 A	CDAE (3VA61)			3VA6140-7..	5 kA		
	40 A	LDAE (3VA61)			3VA6140-8..	5 kA		
	50 A	3RV2742			3RV2742-5JD...	5 kA		
	50 A	SEAS (3VA51)			3VA5150-4..	5 kA		
	50 A	MEAS (3VA51)			3VA5150-5..	5 kA		
	50 A	HEAS (3VA51)			3VA5150-6..	5 kA		

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

Converter			Circuit Breaker				Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA Type ¹⁾	Article no. example (European) ²⁾	SCCR @ 240 V	Metric	Imperial(USA)
FSD	11.0 kW	6SL32...YC26-...0	60 A	NGG	-	65 kA	no restriction	no restriction
			60 A	HGG	-	65 kA		
			60 A	LGG	-	65 kA		
			60 A	CED6	-	100 kA		
			60 A	3RV2742	3RV2742-5LD..	65 kA		
			60 A	SEAS (3VA51)	3VA5160-4..	65 kA		
			60 A	MEAS (3VA51)	3VA5160-5..	85 kA		
			60 A	HEAS (3VA51)	3VA5160-6..	100 kA		
			60 A	EDAE (3VA61)	3VA6160-0..	100 kA		
			60 A	MFAS (3VA52)	3VA5260-5..	85 kA		
			60 A	HFAS (3VA52)	3VA5260-6..	100 kA		
	60 A	CFAS (3VA52)	3VA5260-7..	100 kA				
	15.0 kW	6SL32...YC28-...0	70 A	NGG	-	65 kA		
			70 A	HGG	-	65 kA		
			70 A	LGG	-	65 kA		
			70 A	CED6	-	100 kA		
			70 A	3RV2742	3RV2742-5QD..	65 kA		
			70 A	FXD6-A	-	65 kA		
			70 A	FD6-A	-	65 kA		
			70 A	HFD6	-	100 kA		
			70 A	HFXD6	-	100 kA		
			70 A	HHFD6	-	100 kA		
			70 A	HHFXD6	-	100 kA		
			70 A	CFD6	-	100 kA		
			70 A	SEAS (3VA51)	3VA5170-4..	65 kA		
			70 A	MEAS (3VA51)	3VA5170-5..	85 kA		
	70 A	HEAS (3VA51)	3VA5170-6..	100 kA				
	70 A	MFAS (3VA52)	3VA5270-5..	85 kA				
	70 A	HFAS (3VA52)	3VA5270-6..	100 kA				
	70 A	CFAS (3VA52)	3VA5270-7..	100 kA				
	18.5 kW	6SL32...YC30-...0	90 A	NGG	-	65 kA		
			90 A	HGG	-	65 kA		
			90 A	LGG	-	65 kA		
			90 A	CED6	-	100 kA		
			90 A	FXD6-A	-	65 kA		
			90 A	FD6-A	-	65 kA		
			90 A	HFD6	-	100 kA		
			90 A	HFXD6	-	100 kA		
			90 A	HHFD6	-	100 kA		
			90 A	HHFXD6	-	100 kA		
			90 A	CFD6	-	100 kA		
			90 A	SEAS (3VA51)	3VA5190-4..	65 kA		
			90 A	MEAS (3VA51)	3VA5190-5..	85 kA		
			90 A	HEAS (3VA51)	3VA5190-6..	100 kA		
			90 A	MFAS (3VA52)	3VA5290-5	85 kA		
90 A			HFAS (3VA52)	3VA5290-6	100 kA			
90 A			CFAS (3VA52)	3VA5290-7	100 kA			
100 A			MDAE (3VA61)	3VA6110-5..	100 kA			
100 A			HDAE (3VA61)	3VA6110-6..	100 kA			
100 A			CDAE (3VA61)	3VA6110-7..	100 kA			
100 A			LDAE (3VA61)	3VA6110-8..	100 kA			
100 A			EDAE (3VA61)	3VA6110-0..	100 kA			
100 A			MFAE (3VA62)	3VA6210-5..	100 kA			
100 A			HFAE (3VA62)	3VA6210-6..	100 kA			
100 A	CFAE (3VA62)	3VA6210-7..	100 kA					
100 A	LFAE (3VA62)	3VA6210-8..	100 kA					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

Converter			Circuit Breaker				Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA Type ¹⁾	Article no. example (European) ²⁾	SCCR @ 240 V	Metric	Imperial (USA)
FSE	22.0 kW	6SL32...YC32-...0	110 A	NGG	-	65 kA	0.37 m ³	13.07 ft ³
			110 A	HGG	-	65 kA		
			110 A	LGG	-	65 kA		
			110 A	CED6	-	100 kA		
			110 A	FXD6-A	-	65 kA		
			110 A	FD6-A	-	65 kA		
			110 A	HFD6	-	100 kA		
			110 A	HFXD6	-	100 kA		
			110 A	HHFD6	-	100 kA		
			110 A	HHFXD6	-	100 kA		
			110 A	CFD6	-	100 kA		
			110 A	SEAS (3VA51)	3VA5111-4..	65 kA		
			110 A	MEAS (3VA51)	3VA5111-5..	85 kA		
			110 A	HEAS (3VA51)	3VA5111-6..	100 kA		
	110 A	MFAS (3VA52)	3VA5211-5..	85 kA				
	110 A	HFAS (3VA52)	3VA5211-6..	100 kA				
	110 A	CFAS (3VA52)	3VA5211-7..	100 kA				
	30.0 kW	6SL32...YC34-...0	150 A	FXD6-A	-	65 kA		
			150 A	FD6-A	-	65 kA		
			150 A	HFD6	-	100 kA		
			150 A	HFXD6	-	100 kA		
			150 A	HHFD6	-	100 kA		
			150 A	HHFXD6	-	100 kA		
			150 A	CFD6	-	100 kA		
			150 A	MDAE (3VA61)	3VA6115-5..	100 kA		
			150 A	HDAE (3VA61)	3VA6115-6..	100 kA		
			150 A	CDAE (3VA61)	3VA6115-7..	100 kA		
			150 A	LDAE (3VA61)	3VA6115-8..	100 kA		
150 A			EDAE (3VA61)	3VA6115-0..	100 kA			
150 A			MFAS (3VA52)	3VA5215-5..	85 kA			
150 A			HFAS (3VA52)	3VA5215-6..	100 kA			
150 A	CFAS (3VA52)	3VA5215-7..	100 kA					
FSF	37.0 kW	6SL32...YC36-...0	175 A	FXD6-A	-	65 kA		
			175 A	FD6-A	-	65 kA		
			175 A	HFD6	-	100 kA		
			175 A	HFXD6	-	100 kA		
			175 A	HHFD6	-	100 kA		
			175 A	HHFXD6	-	100 kA		
			175 A	CFD6	-	100 kA		
			175 A	MFAS (3VA52)	3VA5217-5..	85 kA		
			175 A	HFAS (3VA52)	3VA5217-6..	100 kA		
			175 A	CFAS (3VA52)	3VA5217-7..	100 kA		

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

Converter			Circuit Breaker				Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA Type ¹⁾	Article no. example (European) ²⁾	SCCR @ 240 V	Metric	Imperial (USA)
FSF	45.0 kW	6SL32...YC38-...0	200 A	FXD6-A	-	65 kA	0.37 m ³	13.07 ft ³
			200 A	FD6-A	-	65 kA		
			200 A	HFD6	-	100 kA		
			200 A	HFXD6	-	100 kA		
			200 A	HHFD6	-	100 kA		
			200 A	HHFXD6	-	100 kA		
			200 A	CFD6	-	100 kA		
			200 A	JXD6-A	-	65 kA		
			200 A	JD6-A	-	65 kA		
			200 A	HJD6-A	-	65 kA		
			200 A	HJXD6-A	-	65 kA		
			200 A	HHJD6	-	100 kA		
			200 A	HHJXD6	-	100 kA		
			200 A	CJD6-A	-	100 kA		
			200 A	MFAS (3VA52)	3VA5220-5..	85 kA		
			200 A	HFAS (3VA52)	3VA5220-6..	100 kA		
			200 A	CFAS (3VA52)	3VA5220-7..	100 kA		
			200 A	MJAS (3VA53)	3VA5320-5..	85 kA		
			200 A	HJAS (3VA53)	3VA5320-6..	100 kA		
			200 A	CJAS (3VA53)	3VA5320-7..	100 kA		
	55.0 kW	6SL32...YC40-...0	250 A	FXD6-A	-	65 kA		
			250 A	FD6-A	-	65 kA		
			250 A	HFD6	-	100 kA		
			250 A	HFXD6	-	100 kA		
			250 A	HHFD6	-	100 kA		
			250 A	HHFXD6	-	100 kA		
			250 A	CFD6	-	100 kA		
			250 A	JXD6-A	-	65 kA		
			250 A	JD6-A	-	65 kA		
			250 A	HJD6-A	-	65 kA		
			250 A	HJXD6-A	-	65 kA		
			250 A	HHJD6	-	100 kA		
			250 A	HHJXD6	-	100 kA		
			250 A	CJD6-A	-	100 kA		
			250 A	MFAS (3VA52)	3VA5225-5..	85 kA		
			250 A	HFAS (3VA52)	3VA5225-6..	100 kA		
			250 A	CFAS (3VA52)	3VA5225-7..	100 kA		
			250 A	MFAE (3VA62)	3VA6225-5..	100 kA		
			250 A	HFAE (3VA62)	3VA6225-6..	100 kA		
			250 A	CFAE (3VA62)	3VA6225-7..	100 kA		
250 A	LFAE (3VA62)	3VA6225-8..	100 kA					
250 A	EFAE (3VA62)	3VA6225-0..	100 kA					
250 A	MJAS (3VA53)	3VA5325-5..	85 kA					
250 A	HJAS (3VA53)	3VA5325-6..	100 kA					
250 A	CJAS (3VA53)	3VA5325-7..	100 kA					
250 A	MJAE (3VA63)	3VA6325-5..	100 kA					
250 A	HJAE (3VA63)	3VA6325-6..	100 kA					
250 A	CJAE (3VA63)	3VA6325-7..	100 kA					
250 A	LJAE (3VA63)	3VA6325-8..	100 kA					
250 A	EJAE (3VA63)	3VA6325-0..	100 kA					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

2.5.2 UL/CSA Circuit Breakers, 380 V ... 480 V

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSB	4.0 kW	6SL32.0-.YE20-...	35 A	3RV2742	3RV2742-5FD...	---	5 kA	0.09 m ³	3.18 ft ³
			35 A	SEAS (3VA51)	3VA5135-4..	5 kA	³⁾		
			35 A	MEAS (3VA51)	3VA5135-5..	5 kA	³⁾		
			35 A	HEAS (3VA51)	3VA5135-6..	5 kA	³⁾		
	5.5 kW	6SL32.0-.YE22-...	35 A	3RV2742	3RV2742-5FD...	---	5 kA		
			35 A	SEAS (3VA51)	3VA5135-4..	5 kA	³⁾		
			35 A	MEAS (3VA51)	3VA5135-5..	5 kA	³⁾		
			35 A	HEAS (3VA51)	3VA5135-6..	5 kA	³⁾		
	7.5 kW	6SL32.0-.YE24-...	35 A	3RV2742	3RV2742-5FD...	---	5 kA		
			35 A	SEAS (3VA51)	3VA5135-4..	5 kA	³⁾		
			35 A	MEAS (3VA51)	3VA5135-5..	5 kA	³⁾		
			35 A	HEAS (3VA51)	3VA5135-6..	5 kA	³⁾		
FSC	11.0 kW	6SL32.0-.YE26-...	40 A	MDAE (3VA61)	3VA6140-5..	5 kA	³⁾	0.14 m ³	5.08 ft ³
			40 A	HDAE (3VA61)	3VA6140-6..	5 kA	³⁾		
			40 A	CDAE (3VA61)	3VA6140-7..	5 kA	³⁾		
			40 A	LDAE (3VA61)	3VA6140-8..	5 kA	³⁾		
			50 A	3RV2742	3RV2742-5JD...	---	5 kA		
			50 A	SEAS (3VA51)	3VA5150-4..	5 kA	³⁾		
			50 A	MEAS (3VA51)	3VA5150-5..	5 kA	³⁾		
			50 A	HEAS (3VA51)	3VA5150-6..	5 kA	³⁾		
	15.0 kW	6SL32.0-.YE28-...	40 A	MDAE (3VA61)	3VA6140-5..	5 kA	³⁾		
			40 A	HDAE (3VA61)	3VA6140-6..	5 kA	³⁾		
			40 A	CDAE (3VA61)	3VA6140-7..	5 kA	³⁾		
			40 A	LDAE (3VA61)	3VA6140-8..	5 kA	³⁾		
			50 A	3RV2742	3RV2742-5JD...	---	5 kA		
			50 A	SEAS (3VA51)	3VA5150-4..	5 kA	³⁾		
			50 A	MEAS (3VA51)	3VA5150-5..	5 kA	³⁾		
			50 A	HEAS (3VA51)	3VA5150-6..	5 kA	³⁾		

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSD	18.5 kW	6SL32...YE30-...0	60 A	3RV2742	3RV2742-5LD..	---	65 kA	no restriction	no restriction
			60 A	NGG	-	25 kA	³⁾		
			60 A	HGG	-	35 kA	³⁾		
			60 A	LGG	-	65 kA	³⁾		
			60 A	CED6	-	100 kA	³⁾		
			60 A	SEAS (3VA51)	3VA5160-4..	25 kA	³⁾		
			60 A	MEAS (3VA51)	3VA5160-5..	35 kA	³⁾		
			60 A	HEAS (3VA51)	3VA5160-6..	65 kA	³⁾		
			60 A	EDAE (3VA61)	3VA6160-0..	100 kA	³⁾		
			60 A	MFAS (3VA52)	3VA5260-5..	35 kA	³⁾		
			60 A	HFAS (3VA52)	3VA5260-6..	65 kA	³⁾		
			60 A	CFAS (3VA52)	3VA5260-7..	100 kA	³⁾		
	22.0 kW	6SL32...YE32-...0	70 A	3RV2742	3RV2742-5QD..	---	65 kA		
			70 A	NGG	-	25 kA	³⁾		
			70 A	HGG	-	35 kA	³⁾		
			70 A	LGG	-	65 kA	³⁾		
			70 A	CED6	-	100 kA	³⁾		
			70 A	FXD6-A	-	35 kA	³⁾		
			70 A	FD6-A	-	35 kA	³⁾		
			70 A	HFD6	-	65 kA	³⁾		
			70 A	HFXD6	-	65 kA	³⁾		
			70 A	HHFD6	-	100 kA	³⁾		
			70 A	HHFXD6	-	100 kA	³⁾		
			70 A	CFD6	-	100 kA	³⁾		
			70 A	SEAS (3VA51)	3VA5170-4..	25 kA	³⁾		
			70 A	MEAS (3VA51)	3VA5170-5..	35 kA	³⁾		
70 A	HEAS (3VA51)	3VA5170-6..	65 kA	³⁾					
70 A	MFAS (3VA52)	3VA5270-5..	35 kA	³⁾					
70 A	HFAS (3VA52)	3VA5270-6..	65 kA	³⁾					
70 A	CFAS (3VA52)	3VA5270-7..	100 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSD	30.0 kW	6SL32...-YE34-...0	90 A	NGG	-	25 kA	³⁾	no restriction	no restriction
			90 A	HGG	-	35 kA	³⁾		
			90 A	LGG	-	65 kA	³⁾		
			90 A	CED6	-	100 kA	³⁾		
			90 A	FXD6-A	-	35 kA	³⁾		
			90 A	FD6-A	-	35 kA	³⁾		
			90 A	HFD6	-	65 kA	³⁾		
			90 A	HFXD6	-	65 kA	³⁾		
			90 A	HHFD6	-	100 kA	³⁾		
			90 A	HHFXD6	-	100 kA	³⁾		
			90 A	CFD6	-	100 kA	³⁾		
			100 A	SEAS (3VA51)	3VA5110-4..	25 kA	³⁾		
			100 A	MEAS (3VA51)	3VA5110-5..	35 kA	³⁾		
			100 A	HEAS (3VA51)	3VA5110-6..	65 kA	³⁾		
			100 A	MDAE (3VA61)	3VA6110-5..	35 kA	³⁾		
			100 A	HDAE (3VA61)	3VA6110-6..	65 kA	³⁾		
			100 A	CDAE (3VA61)	3VA6110-7..	100 kA	³⁾		
			100 A	LDAE (3VA61)	3VA6110-8..	100 kA	³⁾		
			100 A	EDAE (3VA61)	3VA6110-0..	100 kA	³⁾		
			100 A	MFAS (3VA52)	3VA5210-5	35 kA	³⁾		
			100 A	HFAS (3VA52)	3VA5210-6	65 kA	³⁾		
			100 A	CFAS (3VA52)	3VA5210-7	100 kA	³⁾		
			100 A	MFAE (3VA62)	3VA6210-5..	35 kA	³⁾		
			100 A	HFAE (3VA62)	3VA6210-6..	65 kA	³⁾		
			100 A	CFAE (3VA62)	3VA6210-7..	100 kA	³⁾		
			100 A	LFAE (3VA62)	3VA6210-8..	100 kA	³⁾		

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSD	37.0 kW	6SL32...-YE36-...0	100 A	NGG	-	25 kA	³⁾	no restriction	no restriction
			100 A	HGG	-	35 kA	³⁾		
			100 A	LGG	-	65 kA	³⁾		
			100 A	CED6	-	100 kA	³⁾		
			100 A	FXD6-A	-	35 kA	³⁾		
			100 A	FD6-A	-	35 kA	³⁾		
			100 A	HFD6	-	65 kA	³⁾		
			100 A	HFXD6	-	65 kA	³⁾		
			100 A	HHFD6	-	100 kA	³⁾		
			100 A	HHFXD6	-	100 kA	³⁾		
			100 A	CFD6	-	100 kA	³⁾		
			100 A	SEAS (3VA51)	3VA5110-4..	25 kA	³⁾		
			100 A	MEAS (3VA51)	3VA5110-5..	35 kA	³⁾		
			100 A	HEAS (3VA51)	3VA5110-6..	65 kA	³⁾		
			100 A	MDAE (3VA61)	3VA6110-5..	35 kA	³⁾		
			100 A	HDAE (3VA61)	3VA6110-6..	65 kA	³⁾		
			100 A	CDAE (3VA61)	3VA6110-7..	100 kA	³⁾		
			100 A	LDAE (3VA61)	3VA6110-8..	100 kA	³⁾		
			100 A	EDAE (3VA61)	3VA6110-0..	100 kA	³⁾		
			100 A	MFAS (3VA52)	3VA5210-5	35 kA	³⁾		
			100 A	HFAS (3VA52)	3VA5210-6	65 kA	³⁾		
			100 A	CFAS (3VA52)	3VA5210-7	100 kA	³⁾		
			100 A	MFAE (3VA62)	3VA6210-5..	35 kA	³⁾		
100 A	HFAE (3VA62)	3VA6210-6..	65 kA	³⁾					
100 A	CFAE (3VA62)	3VA6210-7..	100 kA	³⁾					
100 A	LFAE (3VA62)	3VA6210-8..	100 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSE	45.0 kW	6SL32...-YE38-...0	125 A	NGG	-	25 kA	³⁾	0.37 m ³	13.07 ft ³
			125 A	HGG	-	35 kA	³⁾		
			125 A	LGG	-	65 kA	³⁾		
			125 A	CED6	-	100 kA	³⁾		
			125 A	FXD6-A	-	35 kA	³⁾		
			125 A	FD6-A	-	35 kA	³⁾		
			125 A	HFD6	-	65 kA	³⁾		
			125 A	HFXD6	-	65 kA	³⁾		
			125 A	HHFD6	-	100 kA	³⁾		
			125 A	HHFXD6	-	100 kA	³⁾		
			125 A	CFD6	-	100 kA	³⁾		
			125 A	SEAS (3VA51)	3VA5112-4..	25 kA	³⁾		
			125 A	MEAS (3VA51)	3VA5112-5..	35 kA	³⁾		
			125 A	HEAS (3VA51)	3VA5112-6..	65 kA	³⁾		
			125 A	MFAS (3VA52)	3VA5212-5..	35 kA	³⁾		
			125 A	HFAS (3VA52)	3VA5212-6..	65 kA	³⁾		
	125 A	CFAS (3VA52)	3VA5212-7..	100 kA	³⁾				
	55.0 kW	6SL32...-YE40-...0	150 A	FXD6-A	-	35 kA	³⁾		
			150 A	FD6-A	-	35 kA	³⁾		
			150 A	HFD6	-	65 kA	³⁾		
			150 A	HFXD6	-	65 kA	³⁾		
			150 A	HHFD6	-	100 kA	³⁾		
			150 A	HHFXD6	-	100 kA	³⁾		
			150 A	CFD6	-	100 kA	³⁾		
			150 A	MDAE (3VA61)	3VA6115-5..	35 kA	³⁾		
			150 A	HDAE (3VA61)	3VA6115-6..	65 kA	³⁾		
			150 A	CDAE (3VA61)	3VA6115-7..	100 kA	³⁾		
			150 A	LDAE (3VA61)	3VA6115-8..	100 kA	³⁾		
150 A			EDAE (3VA61)	3VA6115-0..	100 kA	³⁾			
150 A	MFAS (3VA52)	3VA5215-5..	35 kA	³⁾					
150 A	HFAS (3VA52)	3VA5215-6..	65 kA	³⁾					
150 A	CFAS (3VA52)	3VA5215-7..	100 kA	³⁾					

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²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSF	75.0 kW	6SL32...-YE42-...0	200 A	FXD6-A	-	35 kA	³⁾	0.37 m ³	13.07 ft ³
			200 A	FD6-A	-	35 kA	³⁾		
			200 A	HFD6	-	65 kA	³⁾		
			200 A	HFXD6	-	65 kA	³⁾		
			200 A	HHFD6	-	100 kA	³⁾		
			200 A	HHFXD6	-	100 kA	³⁾		
			200 A	CFD6	-	100 kA	³⁾		
			200 A	JXD6-A	-	35 kA	³⁾		
			200 A	JD6-A	-	35 kA	³⁾		
			200 A	HJD6-A	-	65 kA	³⁾		
			200 A	HJXD6-A	-	65 kA	³⁾		
			200 A	HHJD6	-	100 kA	³⁾		
			200 A	HHJXD6	-	100 kA	³⁾		
			200 A	CJD6-A	-	100 kA	³⁾		
			200 A	MFAS (3VA52)	3VA5220-5..	35 kA	³⁾		
			200 A	HFAS (3VA52)	3VA5220-6..	65 kA	³⁾		
			200 A	CFAS (3VA52)	3VA5220-7..	100 kA	³⁾		
			200 A	MJAS (3VA53)	3VA5320-5..	35 kA	³⁾		
			200 A	HJAS (3VA53)	3VA5320-6..	65 kA	³⁾		
			200 A	CJAS (3VA53)	3VA5320-7..	100 kA	³⁾		
	250 A	FXD6-A	-	35 kA	³⁾				
	250 A	FD6-A	-	35 kA	³⁾				
	250 A	HFD6	-	65 kA	³⁾				
	250 A	HFXD6	-	65 kA	³⁾				
	250 A	HHFD6	-	100 kA	³⁾				
	250 A	HHFXD6	-	100 kA	³⁾				
	250 A	CFD6	-	100 kA	³⁾				
	250 A	JXD6-A	-	35 kA	³⁾				
	250 A	JD6-A	-	35 kA	³⁾				
	250 A	HJD6-A	-	65 kA	³⁾				
	250 A	HJXD6-A	-	65 kA	³⁾				
	250 A	HHJD6	-	100 kA	³⁾				
	250 A	HHJXD6	-	100 kA	³⁾				
	250 A	CJD6-A	-	100 kA	³⁾				
	250 A	MFAS (3VA52)	3VA5225-5..	35 kA	³⁾				
	250 A	HFAS (3VA52)	3VA5225-6..	65 kA	³⁾				
	250 A	CFAS (3VA52)	3VA5225-7..	100 kA	³⁾				
	250 A	MFAE (3VA62)	3VA6225-5..	35 kA	³⁾				
	250 A	HFAE (3VA62)	3VA6225-6..	65 kA	³⁾				
	250 A	CFAE (3VA62)	3VA6225-7..	100 kA	³⁾				
	250 A	LFAE (3VA62)	3VA6225-8..	100 kA	³⁾				
	250 A	EFAE (3VA62)	3VA6225-0..	100 kA	³⁾				
250 A	MJAS (3VA53)	3VA5325-5..	35 kA	³⁾					
250 A	HJAS (3VA53)	3VA5325-6..	65 kA	³⁾					
250 A	CJAS (3VA53)	3VA5325-7..	100 kA	³⁾					
250 A	MJAE (3VA63)	3VA6325-5..	35 kA	³⁾					
250 A	HJAE (3VA63)	3VA6325-6..	65 kA	³⁾					
250 A	CJAE (3VA63)	3VA6325-7..	100 kA	³⁾					
250 A	LJAE (3VA63)	3VA6325-8..	100 kA	³⁾					
250 A	EJAE (3VA63)	3VA6325-0..	100 kA	³⁾					
90.0 kW	6SL32...-YE44-...0								

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³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y/277 V		
FSF	110.0 kW	6SL32...-YE46-...0	300 A	JXD6-A	-	35 kA	³⁾	0.37 m ³	13.07 ft ³
			300 A	JD6-A	-	35 kA	³⁾		
			300 A	HJD6-A	-	65 kA	³⁾		
			300 A	HJXD6-A	-	65 kA	³⁾		
			300 A	HHJD6	-	100 kA	³⁾		
			300 A	HHJXD6	-	100 kA	³⁾		
			300 A	CJD6-A	-	100 kA	³⁾		
			300 A	LD6-A	-	35 kA	³⁾		
			300 A	HLD6-A	-	65 kA	³⁾		
			300 A	HLXD6-A	-	65 kA	³⁾		
			300 A	HHLD6	-	100 kA	³⁾		
			300 A	HHLXD6	-	100 kA	³⁾		
			300 A	MJAS (3VA53)	3VA5330-5..	35 kA	³⁾		
			300 A	HJAS (3VA53)	3VA5330-6..	65 kA	³⁾		
			300 A	CJAS (3VA53)	3VA5330-7..	100 kA	³⁾		
			400 A	MJAE (3VA63)	3VA6340-5..	35 kA	³⁾		
			400 A	HJAE (3VA63)	3VA6340-6..	65 kA	³⁾		
			400 A	CJAE (3VA63)	3VA6340-7..	100 kA	³⁾		
			400 A	LJAE (3VA63)	3VA6340-8..	100 kA	³⁾		
			400 A	EJAE (3VA63)	3VA6340-0..	100 kA	³⁾		
			400 A	MLAE (3VA64)	3VA6440-5..	35 kA	³⁾		
400 A	HLAE (3VA64)	3VA6440-6..	65 kA	³⁾					
400 A	CLAE (3VA64)	3VA6440-7..	100 kA	³⁾					
400 A	LLAE (3VA64)	3VA6440-8..	100 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSF	132.0 kW	6SL32...-YE48-...0	350 A	JXD6-A	-	35 kA	³⁾	0.37 m ³	13.07 ft ³
			350 A	JD6-A	-	35 kA	³⁾		
			350 A	HJD6-A	-	65 kA	³⁾		
			350 A	HJXD6-A	-	65 kA	³⁾		
			350 A	HHJD6	-	100 kA	³⁾		
			350 A	HHJXD6	-	100 kA	³⁾		
			350 A	CJD6-A	-	100 kA	³⁾		
			350 A	LD6-A	-	35 kA	³⁾		
			350 A	HLD6-A	-	65 kA	³⁾		
			350 A	HLXD6-A	-	65 kA	³⁾		
			350 A	HHLD6	-	100 kA	³⁾		
			350 A	HHLXD6	-	100 kA	³⁾		
			350 A	MJAS (3VA53)	3VA5335-5..	35 kA	³⁾		
			350 A	HJAS (3VA53)	3VA5335-6..	65 kA	³⁾		
			350 A	CJAS (3VA53)	3VA5335-7..	100 kA	³⁾		
			400 A	MJAE (3VA63)	3VA6340-5..	35 kA	³⁾		
			400 A	HJAE (3VA63)	3VA6340-6..	65 kA	³⁾		
			400 A	CJAE (3VA63)	3VA6340-7..	100 kA	³⁾		
			400 A	LJAE (3VA63)	3VA6340-8..	100 kA	³⁾		
			400 A	EJAE (3VA63)	3VA6340-0..	100 kA	³⁾		
400 A	MLAE (3VA64)	3VA6440-5..	35 kA	³⁾					
400 A	HLAE (3VA64)	3VA6440-6..	65 kA	³⁾					
400 A	CLAE (3VA64)	3VA6440-7..	100 kA	³⁾					
400 A	LLAE (3VA64)	3VA6440-8..	100 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y/277 V		
FSG	160.0 kW	6SL32...-YE50-...0	400 A	JXD6-A	-	35 kA	³⁾	0.6 m ³	21.19 ft ³
			400 A	JD6-A	-	35 kA	³⁾		
			400 A	HJD6-A	-	65 kA	³⁾		
			400 A	HJXD6-A	-	65 kA	³⁾		
			400 A	HHJD6	-	100 kA	³⁾		
			400 A	HHJXD6	-	100 kA	³⁾		
			400 A	CJD6-A	-	100 kA	³⁾		
			400 A	LD6-A	-	35 kA	³⁾		
			400 A	HLD6-A	-	65 kA	³⁾		
			400 A	HLXD6-A	-	65 kA	³⁾		
			400 A	HHLD6	-	100 kA	³⁾		
			400 A	HHLXD6	-	100 kA	³⁾		
			400 A	MJAS (3VA53)	3VA5340-5..	35 kA	³⁾		
			400 A	HJAS (3VA53)	3VA5340-6..	65 kA	³⁾		
			400 A	CJAS (3VA53)	3VA5340-7..	100 kA	³⁾		
			400 A	MJAE (3VA63)	3VA6340-5..	35 kA	³⁾		
			400 A	HJAE (3VA63)	3VA6340-6..	65 kA	³⁾		
			400 A	CJAE (3VA63)	3VA6340-7..	100 kA	³⁾		
			400 A	LJAE (3VA63)	3VA6340-8..	100 kA	³⁾		
			400 A	EJAE (3VA63)	3VA6340-0..	100 kA	³⁾		
			400 A	MLAE (3VA64)	3VA6440-5..	35 kA	³⁾		
			400 A	HLAE (3VA64)	3VA6440-6..	65 kA	³⁾		
			400 A	CLAE (3VA64)	3VA6440-7..	100 kA	³⁾		
			400 A	LLAE (3VA64)	3VA6440-8..	100 kA	³⁾		
450 A	LXD6-A	-	35 kA	³⁾					
450 A	CLD6-A	-	100 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @ 480V		Metric	Imperial (USA)
						480 V	480 Y / 277 V		
FSG	200.0 kW	6SL32...YE52-...0	500 A	LD6-A	-	35 kA	³⁾	0.6 m ³	21.19 ft ³
			500 A	LXD6-A	-	35 kA	³⁾		
			500 A	HLD6-A	-	65 kA	³⁾		
			500 A	HLXD6-A	-	65 kA	³⁾		
			500 A	HHL6	-	100 kA	³⁾		
			500 A	HHLXD6	-	100 kA	³⁾		
			500 A	CLD6-A	-	100 kA	³⁾		
			500 A	MLAS (3VA54)	3VA5450-5..	35 kA	³⁾		
			500 A	HLAS (3VA54)	3VA5450-6..	65 kA	³⁾		
			500 A	CLAS (3VA54)	3VA5450-7..	100 kA	³⁾		
			600 A	MLAE (3VA64)	3VA6460-5..	35 kA	³⁾		
			600 A	HLAE (3VA64)	3VA6460-6..	65 kA	³⁾		
			600 A	CLAE (3VA64)	3VA6460-7..	100 kA	³⁾		
			600 A	LLAE (3VA64)	3VA6460-8..	100 kA	³⁾		
	600 A	ELAE (3VA64)	3VA6460-0..	100 kA	³⁾				
	250.0 kW	6SL32...YE54-...0	600 A	LD6-A	-	35 kA	³⁾		
			600 A	LXD6-A	-	35 kA	³⁾		
			600 A	HLD6-A	-	65 kA	³⁾		
			600 A	HLXD6-A	-	65 kA	³⁾		
			600 A	HHL6	-	100 kA	³⁾		
			600 A	HHLXD6	-	100 kA	³⁾		
			600 A	CLD6-A	-	100 kA	³⁾		
			600 A	MLAS (3VA54)	3VA5460-5..	35 kA	³⁾		
			600 A	HLAS (3VA54)	3VA5460-6..	65 kA	³⁾		
			600 A	CLAS (3VA54)	3VA5460-7..	100 kA	³⁾		
			600 A	MLAE (3VA64)	3VA6460-5..	35 kA	³⁾		
			600 A	HLAE (3VA64)	3VA6460-6..	65 kA	³⁾		
			600 A	CLAE (3VA64)	3VA6460-7..	100 kA	³⁾		
600 A			LLAE (3VA64)	3VA6460-8..	100 kA	³⁾			
600 A	ELAE (3VA64)	3VA6460-0..	100 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 480V AC supply systems can also be applied to a 3 phase center point grounded (slash rated) supply systems of 480Y/277 V AC. However, vice versa or conversely CANNOT be done i.e. the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply systems CANNOT be applied to a straight rated supply systems.

2.5.3 UL/CSA Circuit Breakers, 500 V ... 600 V

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y/347 V		
FSD	3.0 kW	6SL32...YH18-...0	8 A	3RV2711	3RV2711-1HD..	---	10 kA	no restriction	no restriction
			10 A	3RV2742	3RV2742-5AD..	---	20 kA		
			15 A	NGG	-	---	14 kA		
			15 A	HGG	-	---	14 kA		
			15 A	LGG	-	---	14 kA		
			15 A	CED6	-	100 kA	³⁾		
			15 A	SEAS (3VA51)	3VA5195-4..	---	14 kA		
			15 A	MEAS (3VA51)	3VA5195-5..	---	18 kA		
			15 A	HEAS (3VA51)	3VA5195-6..	---	25 kA		
	4.0 kW	6SL32...YH20-...0	10 A	3RV2742	3RV2742-5AD..	---	20 kA		
			10 A	3RV2711	3RV2711-1JD..		10 kA		
			15 A	NGG	-	---	14 kA		
			15 A	HGG	-	---	14 kA		
			15 A	LGG	-	---	14 kA		
			15 A	CED6	-	100 kA	³⁾		
			15 A	SEAS (3VA51)	3VA5195-4..	---	14 kA		
			15 A	MEAS (3VA51)	3VA5195-5..	---	18 kA		
			15 A	HEAS (3VA51)	3VA5195-6..	---	25 kA		
	5.5 kW	6SL32...YH22-...0	12.5 A	3RV2711	3RV2711-1KD..		10 kA		
			15 A	3RV2742	3RV2742-5BD..	---	20 kA		
			15 A	NGG	-	---	14 kA		
			15 A	HGG	-	---	14 kA		
			15 A	LGG	-	---	14 kA		
			15 A	CED6	-	100 kA	³⁾		
			15 A	SEAS (3VA51)	3VA5195-4..	---	14 kA		
			15 A	MEAS (3VA51)	3VA5195-5..	---	18 kA		
			15 A	HEAS (3VA51)	3VA5195-6..	---	25 kA		
	7.5 kW	6SL32...YH24-...0	15 A	3RV2711	3RV2711-4AD..	---	10 kA		
			15 A	3RV2742	3RV2742-5BD..	---	20 kA		
			15 A	NGG	-	---	14 kA		
			15 A	HGG	-	---	14 kA		
			15 A	LGG	-	---	14 kA		
			15 A	CED6	-	100 kA	³⁾		
			15 A	SEAS (3VA51)	3VA5195-4..	---	14 kA		
			15 A	MEAS (3VA51)	3VA5195-5..	---	18 kA		
			15 A	HEAS (3VA51)	3VA5195-6..	---	25 kA		

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR@		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSD	11.0 kW	6SL32...-YH26-...0	20 A	3RV2742	3RV2742-5CD..	---	20 kA	no restriction	no restriction
			20 A	NGG	-	---	14 kA		
			20 A	HGG	-	---	14 kA		
			20 A	LGG	-	---	14 kA		
			20 A	CED6	-	100 kA	³⁾		
			20 A	SEAS (3VA51)	3VA5120-4..	---	14 kA		
			20 A	MEAS (3VA51)	3VA5120-5..	---	18 kA		
			20 A	HEAS (3VA51)	3VA5120-6..	---	25 kA		
	15.0 kW	6SL32...-YH28-...0	25 A	3RV2742	3RV2742-5DD..	---	20 kA		
			30 A	NGG	-	---	14 kA		
			30 A	HGG	-	---	14 kA		
			30 A	LGG	-	---	14 kA		
			30 A	CED6	-	100 kA	³⁾		
			30 A	SEAS (3VA51)	3VA5130-4..	---	14 kA		
			30 A	MEAS (3VA51)	3VA5130-5..	---	18 kA		
	18.5 kW	6SL32...-YH30-...0	30 A	HEAS (3VA51)	3VA5130-6..	---	25 kA		
			30 A	3RV2742	3RV2742-5ED..	---	20 kA		
			30 A	NGG	-	---	14 kA		
			30 A	HGG	-	---	14 kA		
			30 A	LGG	-	---	14 kA		
			30 A	CED6	-	100 kA	³⁾		
30 A			SEAS (3VA51)	3VA5130-4..	---	14 kA			
30 A			MEAS (3VA51)	3VA5130-5..	---	18 kA			
30 A	HEAS (3VA51)	3VA5130-6..	---	25 kA					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSD	22.0 kW	6SL32...YH32-...0	40 A	3RV2742	3RV2742-5GD..	---	20 kA	no restriction	no restriction
			40 A	NGG	-	---	14 kA		
			40 A	HGG	-	---	14 kA		
			40 A	LGG	-	---	14 kA		
			40 A	CED6	-	100 kA	³⁾		
			40 A	SEAS (3VA51)	3VA5140-4..	---	14 kA		
			40 A	MEAS (3VA51)	3VA5140-5..	---	18 kA		
			40 A	HEAS (3VA51)	3VA5140-6..	---	25 kA		
			40 A	MDAE (3VA61)	3VA6140-5..	18 kA	³⁾		
			40 A	HDAE (3VA61)	3VA6140-6..	22 kA	³⁾		
			40 A	CDAE (3VA61)	3VA6140-7..	35 kA	³⁾		
			40 A	LDAE (3VA61)	3VA6140-8..	50 kA	³⁾		
	30.0 kW	6SL32...YH34-...0	50 A	3RV2742	3RV2742-5JD..	---	20 kA		
			50 A	NGG	-	---	14 kA		
			50 A	HGG	-	---	14 kA		
			50 A	LGG	-	---	14 kA		
			50 A	CED6	-	100 kA	³⁾		
			50 A	SEAS (3VA51)	3VA5150-4..	---	14 kA		
			50 A	MEAS (3VA51)	3VA5150-5..	---	18 kA		
			50 A	HEAS (3VA51)	3VA5150-6..	---	25 kA		
	37.0 kW	6SL32...YH36-...0	60 A	3RV2742	3RV2742-5LD..	---	20 kA		
			60 A	NGG	-	---	14 kA		
			60 A	HGG	-	---	14 kA		
			60 A	LGG	-	---	14 kA		
			60 A	CED6	-	100 kA	³⁾		
			60 A	SEAS (3VA51)	3VA5160-4..	---	14 kA		
			60 A	MEAS (3VA51)	3VA5160-5..	---	18 kA		
			60 A	HEAS (3VA51)	3VA5160-6..	---	25 kA		
			60 A	EDAE (3VA61)	3VA6160-0..	100 kA	³⁾		
			60 A	MFAS (3VA52)	3VA5260-5..	18 kA	³⁾		
60 A	HFAS (3VA52)	3VA5260-6..	25 kA	³⁾					
60 A	CFAS (3VA52)	3VA5260-7..	35 kA	³⁾					

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y/ 347 V		
FSE	45.0 kW	6SL32...-YH38-...0	80 A	NGG	-	---	14 kA	0.37 m ³	13.07 ft ³
			80 A	HGG	-	---	14 kA		
			80 A	LGG	-	---	14 kA		
			80 A	CED6	-	100 kA	³⁾		
			80 A	FXD6-A	-	22 kA	³⁾		
			80 A	FD6-A	-	22 kA	³⁾		
			80 A	HFD6	-	25 kA	³⁾		
			80 A	HFXD6	-	25 kA	³⁾		
			80 A	HHFD6	-	25 kA	³⁾		
			80 A	HHFXD6	-	25 kA	³⁾		
			80 A	CFD6	-	100 kA	³⁾		
			80 A	SEAS (3VA51)	3VA5180-4..	---	14 kA		
			80 A	MEAS (3VA51)	3VA5180-5..	---	18 kA		
			80 A	HEAS (3VA51)	3VA5180-6..	---	25 kA		
			80 A	MFAS (3VA52)	3VA5280-5..	18 kA	³⁾		
			80 A	HFAS (3VA52)	3VA5280-6..	25 kA	³⁾		
	80 A	CFAS (3VA52)	3VA5280-7..	35 kA	³⁾				
	55.0 kW	6SL32...-YH40-...0	90 A	NGG	-	---	14 kA		
			90 A	HGG	-	---	14 kA		
			90 A	LGG	-	---	14 kA		
			90 A	CED6	-	100 kA	³⁾		
			90 A	FXD6-A	-	22 kA	³⁾		
			90 A	FD6-A	-	22 kA	³⁾		
			90 A	HFD6	-	25 kA	³⁾		
			90 A	HFXD6	-	25 kA	³⁾		
			90 A	HHFD6	-	25 kA	³⁾		
			90 A	HHFXD6	-	25 kA	³⁾		
			90 A	CFD6	-	100 kA	³⁾		
			90 A	SEAS (3VA51)	3VA5190-4..	---	14 kA		
			90 A	MEAS (3VA51)	3VA5190-5..	---	18 kA		
			90 A	HEAS (3VA51)	3VA5190-6..	---	25 kA		
			100 A	MFAS (3VA52)	3VA5210-5..	18 kA	³⁾		
			100 A	HFAS (3VA52)	3VA5210-6..	25 kA	³⁾		
			100 A	CFAS (3VA52)	3VA5210-7..	35 kA	³⁾		
100 A			MDAE (3VA61)	3VA6110-5..	18 kA	³⁾			
100 A			HDAE (3VA61)	3VA6110-6..	22 kA	³⁾			
100 A			CDAE (3VA61)	3VA6110-7..	35 kA	³⁾			
100 A			LDAE (3VA61)	3VA6110-8..	50 kA	³⁾			
100 A			EDAE (3VA61)	3VA6110-0..	100 kA	³⁾			
100 A			MFAE (3VA62)	3VA6210-5..	18 kA	³⁾			
100 A			HFAE (3VA62)	3VA6210-6..	22 kA	³⁾			
100 A			CFAE (3VA62)	3VA6210-7..	35 kA	³⁾			
100 A			LFAE (3VA62)	3VA6210-8..	50 kA	³⁾			

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSF	75.0 kW	6SL32...YH42-...0	100 A	MDAE (3VA61)	3VA6110-5..	18 kA	³⁾	0.37 m ³	13.07 ft ³
			100 A	HDAE (3VA61)	3VA6110-6..	22 kA	³⁾		
			100 A	CDAE (3VA61)	3VA6110-7..	35 kA	³⁾		
			100 A	LDAE (3VA61)	3VA6110-8..	50 kA	³⁾		
			100 A	EDAЕ (3VA61)	3VA6110-0..	100 kA	³⁾		
			100 A	MFAE (3VA62)	3VA6210-5..	18 kA	³⁾		
			100 A	HFAE (3VA62)	3VA6210-6..	22 kA	³⁾		
			100 A	CFAE (3VA62)	3VA6210-7..	35 kA	³⁾		
			100 A	LFAE (3VA62)	3VA6210-8..	50 kA	³⁾		
			110 A	NGG	-	---	14 kA		
			110 A	HGG	-	---	14 kA		
			110 A	LGG	-	---	14 kA		
			110 A	CED6	-	100 kA	³⁾		
			110 A	FXD6-A	-	22 kA	³⁾		
			110 A	FD6-A	-	22 kA	³⁾		
			110 A	HFD6	-	25 kA	³⁾		
			110 A	HFXD6	-	25 kA	³⁾		
			110 A	HHFD6	-	25 kA	³⁾		
			110 A	HHFXD6	-	25 kA	³⁾		
			110 A	CFD6	-	100 kA	³⁾		
			110 A	SEAS (3VA51)	3VA5111-4..	---	14 kA		
			110 A	MEAS (3VA51)	3VA5111-5..	---	18 kA		
			110 A	HEAS (3VA51)	3VA5111-6..	---	25 kA		
			110 A	MFAS (3VA52)	3VA5211-5..	18 kA	³⁾		
			110 A	HFAS (3VA52)	3VA5211-6..	25 kA	³⁾		
			110 A	CFAS (3VA52)	3VA5211-7..	35 kA	³⁾		

¹⁾ Protective devices of the same type with lower current ratings in accordance with and as permitted by the existing applicable local electrical code (e.g. NEC or CEC) and regulations may be used, if suitable for the application.

²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSF	90.0 kW	6SL32...YH44-...0	125 A	NGG	-	---	14 kA	0.37 m ³	13.07 ft ³
			125 A	HGG	-	---	14 kA		
			125 A	LGG	-	---	14 kA		
			125 A	CED6	-	100 kA	³⁾		
			125 A	SEAS (3VA51)	3VA5112-4..	---	14 kA		
			125 A	MEAS (3VA51)	3VA5112-5..	---	18 kA		
			125 A	HEAS (3VA51)	3VA5112-6..	---	25 kA		
			150 A	FXD6-A	-	22 kA	³⁾		
			150 A	FD6-A	-	22 kA	³⁾		
			150 A	HFD6	-	25 kA	³⁾		
			150 A	HFXD6	-	25 kA	³⁾		
			150 A	HHFD6	-	25 kA	³⁾		
			150 A	HHFXD6	-	25 kA	³⁾		
			150 A	CFD6	-	100 kA	³⁾		
			150 A	MDAE (3VA61)	3VA6115-5..	18 kA	³⁾		
			150 A	HDAE (3VA61)	3VA6115-6..	22 kA	³⁾		
			150 A	CDAE (3VA61)	3VA6115-7..	35 kA	³⁾		
			150 A	LDAE (3VA61)	3VA6115-8..	50 kA	³⁾		
	150 A	EDAE (3VA61)	3VA6115-0..	100 kA	³⁾				
	150 A	MFAS (3VA52)	3VA5215-5..	18 kA	³⁾				
	150 A	HFAS (3VA52)	3VA5215-6..	25 kA	³⁾				
	150 A	CFAS (3VA52)	3VA5215-7..	35 kA	³⁾				
	110.0 kW	6SL32...YH46-...0	150 A	FXD6-A	-	22 kA	³⁾		
			150 A	FD6-A	-	22 kA	³⁾		
			150 A	HFD6	-	25 kA	³⁾		
			150 A	HFXD6	-	25 kA	³⁾		
			150 A	HHFD6	-	25 kA	³⁾		
			150 A	HHFXD6	-	25 kA	³⁾		
150 A			CFD6	-	100 kA	³⁾			
150 A			MDAE (3VA61)	3VA6115-5..	18 kA	³⁾			
150 A			HDAE (3VA61)	3VA6115-6..	22 kA	³⁾			
150 A			CDAE (3VA61)	3VA6115-7..	35 kA	³⁾			
150 A			LDAE (3VA61)	3VA6115-8..	50 kA	³⁾			
150 A			EDAE (3VA61)	3VA6115-0..	100 kA	³⁾			
150 A	MFAS (3VA52)	3VA5215-5..	18 kA	³⁾					
150 A	HFAS (3VA52)	3VA5215-6..	25 kA	³⁾					
150 A	CFAS (3VA52)	3VA5215-7..	35 kA	³⁾					

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²⁾ For more breaker article numbers, please refer to the European circuit breaker catalog IC 10.

³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSF	132.0 kW	6SL32...YH48-...0	200 A	FXD6-A	-	22 kA	³⁾	0.37 m ³	13.07 ft ³
			200 A	FD6-A	-	22 kA	³⁾		
			200 A	HFD6	-	25 kA	³⁾		
			200 A	HFXD6	-	25 kA	³⁾		
			200 A	HHFD6	-	25 kA	³⁾		
			200 A	HHFXD6	-	25 kA	³⁾		
			200 A	CFD6	-	100 kA	³⁾		
			200 A	JXD6-A	-	25 kA	³⁾		
			200 A	JD6-A	-	25 kA	³⁾		
			200 A	HJD6-A	-	35 kA	³⁾		
			200 A	HJXD6-A	-	35 kA	³⁾		
			200 A	HHJD6	-	50 kA	³⁾		
			200 A	HHJXD6	-	50 kA	³⁾		
			200 A	CJD6-A	-	100 kA	³⁾		
			200 A	MFAS (3VA52)	3VA5220-5..	18 kA	³⁾		
			200 A	HFAS (3VA52)	3VA5220-6..	25 kA	³⁾		
			200 A	CFAS (3VA52)	3VA5220-7..	35 kA	³⁾		
			200 A	MJAS (3VA53)	3VA5320-5..	18 kA	³⁾		
			200 A	HJAS (3VA53)	3VA5320-6..	25 kA	³⁾		
			200 A	CJAS (3VA53)	3VA5320-7..	35 kA	³⁾		

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³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSG	160.0 kW	6SL32...YH50-...0	250 A	FXD6-A	-	22 kA	³⁾	0.6 m ³	21.19 ft ³
			250 A	FD6-A	-	22 kA	³⁾		
			250 A	HFD6	-	25 kA	³⁾		
			250 A	HFXD6	-	25 kA	³⁾		
			250 A	HHFD6	-	25 kA	³⁾		
			250 A	HHFXD6	-	25 kA	³⁾		
			250 A	CFD6	-	100 kA	³⁾		
			250 A	JXD6-A	-	25 kA	³⁾		
			250 A	JD6-A	-	25 kA	³⁾		
			250 A	HJD6-A	-	35 kA	³⁾		
			250 A	HJXD6-A	-	35 kA	³⁾		
			250 A	HHJD6	-	50 kA	³⁾		
			250 A	HHJXD6	-	50 kA	³⁾		
			250 A	CJD6-A	-	100 kA	³⁾		
			250 A	MFAS (3VA52)	3VA5225-5..	18 kA	³⁾		
			250 A	HFAS (3VA52)	3VA5225-6..	25 kA	³⁾		
			250 A	CFAS (3VA52)	3VA5225-7..	35 kA	³⁾		
			250 A	MFAE (3VA62)	3VA6225-5..	18 kA	³⁾		
			250 A	HFAE (3VA62)	3VA6225-6..	22 kA	³⁾		
			250 A	CFAE (3VA62)	3VA6225-7..	35 kA	³⁾		
			250 A	LFAE (3VA62)	3VA6225-8..	50 kA	³⁾		
			250 A	EFAE (3VA62)	3VA6225-0..	100 kA	³⁾		
			250 A	MJAS (3VA53)	3VA5325-5..	18 kA	³⁾		
			250 A	HJAS (3VA53)	3VA5325-6..	25 kA	³⁾		
			250 A	CJAS (3VA53)	3VA5325-7..	35 kA	³⁾		
			250 A	MJAE (3VA63)	3VA6325-5..	18 kA	³⁾		
			250 A	HJAE (3VA63)	3VA6325-6..	22 kA	³⁾		
			250 A	CJAE (3VA63)	3VA6325-7..	35 kA	³⁾		
250 A	LJAE (3VA63)	3VA6325-8..	50 kA	³⁾					
250 A	EJAE (3VA63)	3VA6325-0..	100 kA	³⁾					

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³⁾ The SCCR shown in the table for 3 phase straight rated 600V AC supply can also be applied to a 3 phase center point grounded (slash rated) supply of 600Y/347 V AC. However, the SCCR shown in the table for a 3 phase center point grounded (slash rated) supply CANNOT be applied to a straight rated supply.

Converter			Circuit Breaker					Min. enclosure volume	
Frame size	Rated power, (LO)	Article no.	Max. rated current	UL/CSA type ¹⁾	Article no. example (European) ²⁾	SCCR @		Metric	Imperial (USA)
						600 V	600 Y / 347 V		
FSG	200.0 kW	6SL32...-YH52-...0	300 A	JXD6-A	-	25 kA	3)	0.6 m ³	21.19 ft ³
			300 A	JD6-A	-	25 kA	3)		
			300 A	HJD6-A	-	35 kA	3)		
			300 A	HJXD6-A	-	35 kA	3)		
			300 A	HHJD6	-	50 kA	3)		
			300 A	HHJXD6	-	50 kA	3)		
			300 A	CJD6-A	-	100 kA	3)		
			300 A	LD6-A	-	25 kA	3)		
			300 A	HLD6-A	-	35 kA	3)		
			300 A	HLXD6-A	-	35 kA	3)		
			300 A	HHLD6	-	50 kA	3)		
			300 A	HHLXD6	-	50 kA	3)		
			300 A	MJAS (3VA53)	3VA5330-5..	18 kA	3)		
			300 A	HJAS (3VA53)	3VA5330-6..	25 kA	3)		
			300 A	CJAS (3VA53)	3VA5330-7..	35 kA	3)		
			400 A	MJAE (3VA63)	3VA6340-5..	18 kA	3)		
			400 A	HJAE (3VA63)	3VA6340-6..	22 kA	3)		
			400 A	CJAE (3VA63)	3VA6340-7..	35 kA	3)		
			400 A	LJAE (3VA63)	3VA6340-8..	50 kA	3)		
			400 A	EJAE (3VA63)	3VA6340-0..	100 kA	3)		
			400 A	MLAE (3VA64)	3VA6440-5..	18 kA	3)		
			400 A	HLAE (3VA64)	3VA6440-6..	22 kA	3)		
			400 A	CLAE (3VA64)	3VA6440-7..	35 kA	3)		
			400 A	LLAE (3VA64)	3VA6440-8..	50 kA	3)		
	450 A	LXD6-A	-	25 kA	3)				
	450 A	CLD6-A	-	100 kA	3)				
	250.0 kW	6SL32...-YH54-...0	350 A	JXD6-A	-	25 kA	3)		
			350 A	JD6-A	-	25 kA	3)		
			350 A	HJD6-A	-	35 kA	3)		
			350 A	HJXD6-A	-	35 kA	3)		
			350 A	HHJD6	-	50 kA	3)		
			350 A	HHJXD6	-	50 kA	3)		
			350 A	CJD6-A	-	100 kA	3)		
			350 A	LD6-A	-	25 kA	3)		
			350 A	HLD6-A	-	35 kA	3)		
			350 A	HLXD6-A	-	35 kA	3)		
			350 A	HHLD6	-	50 kA	3)		
			350 A	HHLXD6	-	50 kA	3)		
			350 A	MJAS (3VA53)	3VA5335-5..	18 kA	3)		
			350 A	HJAS (3VA53)	3VA5335-6..	25 kA	3)		
			350 A	CJAS (3VA53)	3VA5335-7..	35 kA	3)		
			400 A	MJAE (3VA63)	3VA6340-5..	18 kA	3)		
400 A			HJAE (3VA63)	3VA6340-6..	22 kA	3)			
400 A			CJAE (3VA63)	3VA6340-7..	35 kA	3)			
400 A			LJAE (3VA63)	3VA6340-8..	50 kA	3)			
400 A			EJAE (3VA63)	3VA6340-0..	100 kA	3)			
400 A			MLAE (3VA64)	3VA6440-5..	18 kA	3)			
400 A			HLAE (3VA64)	3VA6440-6..	22 kA	3)			
400 A			CLAE (3VA64)	3VA6440-7..	35 kA	3)			
400 A			LLAE (3VA64)	3VA6440-8..	50 kA	3)			
450 A			LXD6-A	-	25 kA	3)			
450 A			CLD6-A	-	100 kA	3)			

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3 Further Information



Further information is available on the internet:

- Siemens SENTRON fuses / 3NA fuses
<https://support.industry.siemens.com/cs/ww/en/view/45314810>
- Low-Voltage Power Distribution and Electrical Installation Technology
<https://support.industry.siemens.com/cs/ww/en/view/109482234>
- SIRIUS Industrial Controls
<https://support.industry.siemens.com/cs/ww/en/view/109747945>
- Motor starter protectors, 3RV series
<https://support.industry.siemens.com/cs/ww/en/view/60279172>
- IEC Circuit Breakers, 3VA1 series
<https://support.industry.siemens.com/cs/us/en/view/90318775>
- UL Molded Case Circuit Breakers, 3VA5 series Circuit Breakers
<https://support.industry.siemens.com/cs/us/en/view/109758561>
- UL Molded Case Circuit Breakers, SENTRON & VL series, see Siemens SPEEDFAX Product Catalog, Section 7
<https://w3.usa.siemens.com/powerdistribution/us/en/speedfax-product-catalog/Pages/speedfax-product-catalog.aspx>