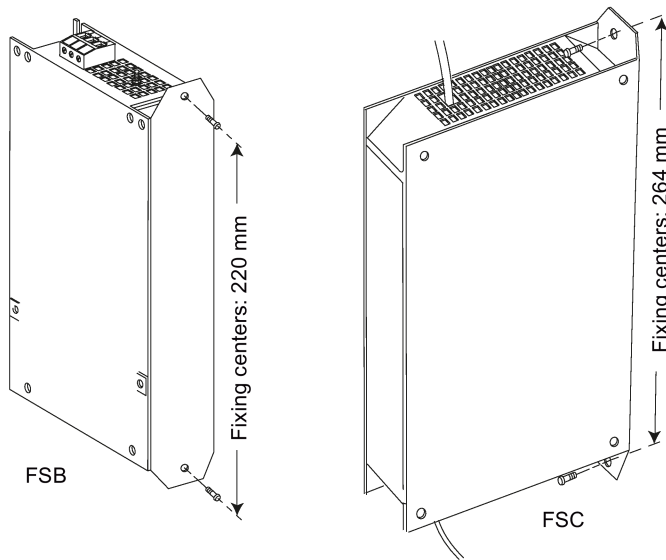



B.1 Options



Order number 6SE6400-...	Dimensions (mm)						Weight (kg)	Fixing screw		Cable cross section (mm ²)	
	A	B	C	D	E	F		Size	Tightening torque (Nm)	Min.	Max.
3CC00-4AB3	200	75.5	50	56	56	187	0.5	M4 (2)	1.1	1.0	2.5
3CC01-0AB3	200	75.5	50	56	56	187	0.5	M4 (2)			
3CC02-6BB3	213 (233*)	150	50	138	120	200	1.2	M4 (4)	1.5	1.5	6.0
3CC03-5CB3	245 (280*)	185	50 (50/80*)	174	156	230	1.0	M5 (4)	2.25	2.5	10

* Height with side-mounting bracket

B.1.7 Output reactor

 CAUTION
<p>Pulse frequency restriction</p> <p>The output reactor works only at 4kHz switching frequency. Before the output reactor is used, parameters P1800 and P0290 must be modified as follows: P1800 = 4 and P0290 = 0 or 1.</p>

Functionality

The output reactors reduce the voltage stress on the motor windings. At the same time, the capacitive charging / discharging currents, which place an additional load on the inverter output when long motor cables are used, are reduced.

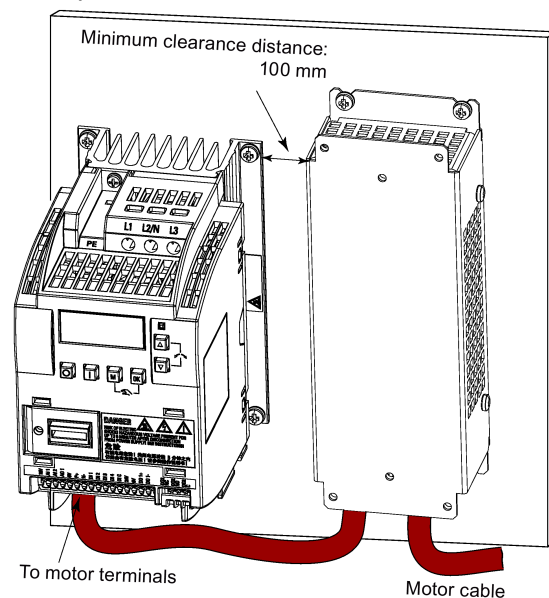
Make sure you use a shielded cable (maximum length: 100 m) to connect the output reactor.

Ordering data

Frame size	Inverter power rating	Output reactor		
		Order number	Voltage	Current
Three phase AC 400 V inverters				
FSA	0.37 kW	6SL3202-0AE16-1CA0	380 V to 480 V	6.1 A
	0.55 kW			
	0.75 kW			
	1.1 kW			
	1.5 kW			
	2.2 kW			
FSB	3 kW	6SL3202-0AE18-8CA0	380 V to 480 V	9.0 A
	4 kW	6SL3202-0AE21-8CA0	380 V to 480 V	18.5 A
FSC	5.5 kW			
FSD	7.5 kW	6SL3202-0AE23-8CA0	380 V to 480 V	39.0 A
	11 kW			
	15 kW			
FSE	18.5 kW	6SE6400-3TC03-8DD0	200 V to 480 V	45.0 A
	22 kW	6SE6400-3TC05-4DD0	200 V to 480 V	68.0 A
Single phase AC 230 V inverters				
FSA	0.12 kW	6SE6400-3TC00-4AD3	200 V to 240 V	4.0 A
	0.25 kW			
	0.37 kW			
	0.55 kW			
	0.75 kW			
FSB	1.1 kW	6SE6400-3TC01-0BD3	200 V to 480 V	10.4 A
	1.5 kW			
FSC	2.2 kW	6SE6400-3TC03-2CD3	200 V to 480 V	26.0 A
	3 kW			

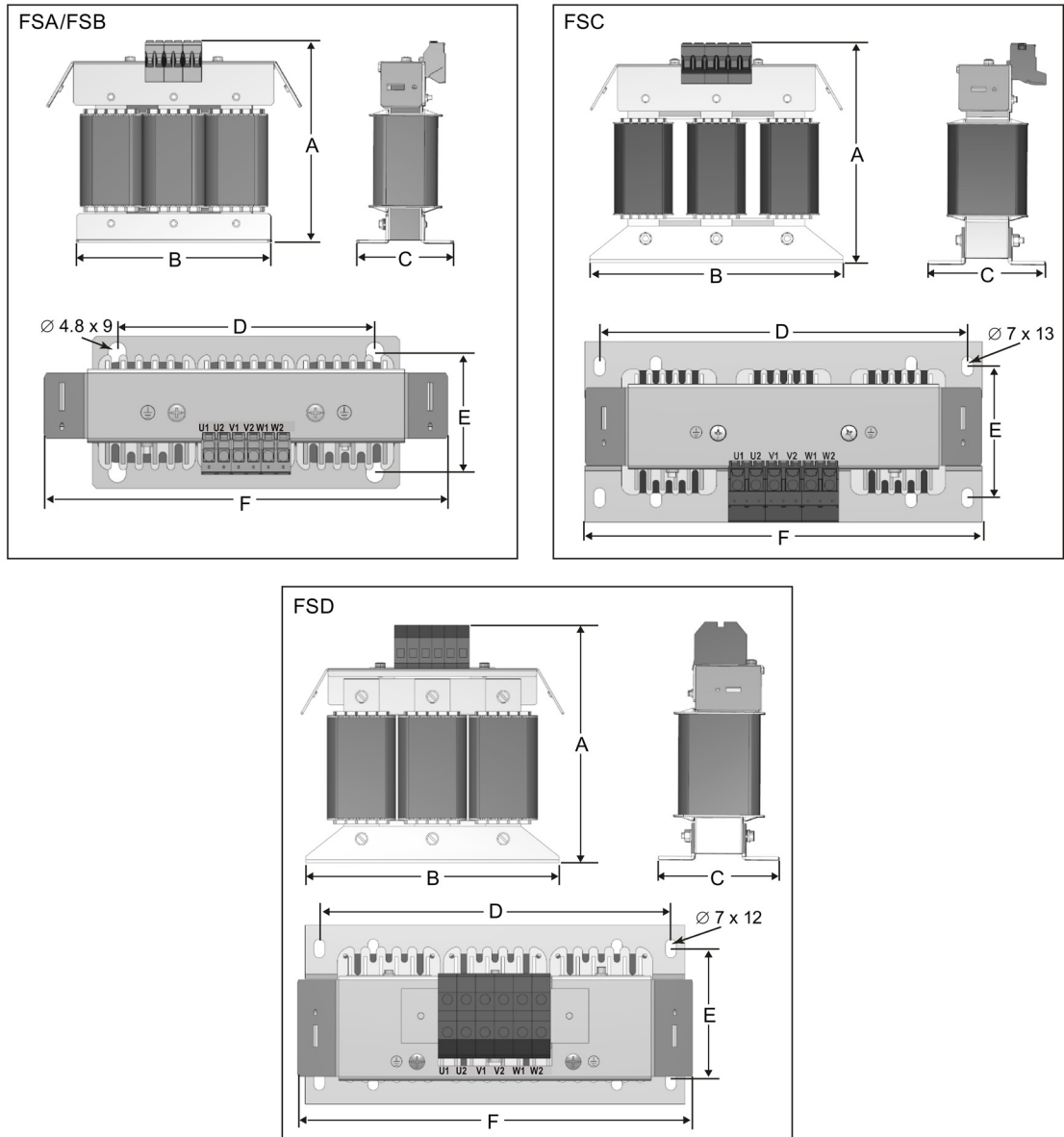
Connecting the output reactor to the inverter

The following illustration takes the output reactors for the 230 V variants of inverters as an example.



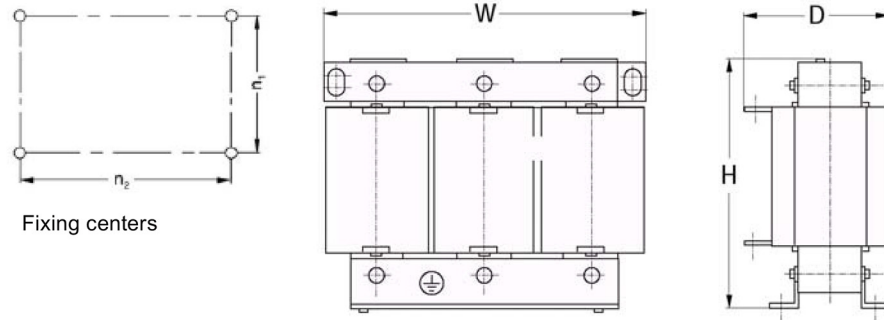
Mounting dimensions

For three phase AC 400 V inverters FSA to FSD



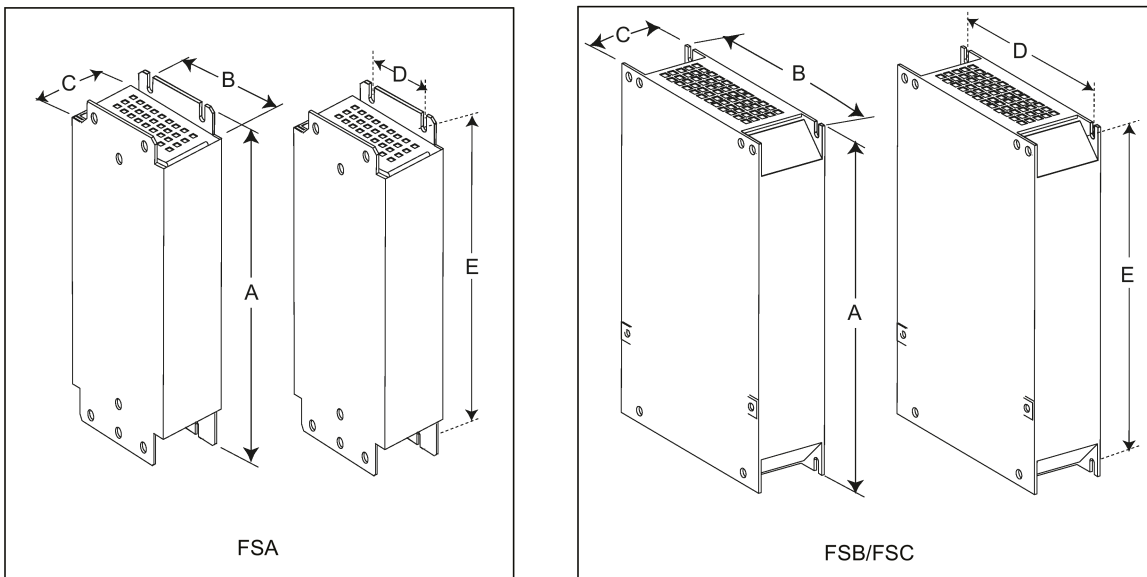
Order number	Dimensions (mm)						Weight (kg)	Fixing screw		Cable cross section (mm ²)
	A	B	C	D	E	F		Size	Tightening torque (Nm)	
6SL3202-...										
0AE16-1CA0	175	178	72.5	166	56.5	207	3.4	M4 (4)	3.0	4.0
0AE18-8CA0	180	178	72.5	166	56.5	207	3.9	M4 (4)	3.0	4.0
0AE21-8CA0	215	243	100	225	80.5	247	10.1	M5 (4)	5.0	10.0
0AE23-8CA0	235	243	114.7	225	84.7	257	11.2	M5 (4)	5.0	16.0

For three phase AC 400 V inverter FSE




Order number	Electrical characteristics			Connecting bolt	Overall dimensions (mm)			Fixing dimensions (mm)		Fixing screw	Weight (kg)
	Voltage (V)	Current (A)	Torque (Nm)		H	W	D	n1	n2		
6SE6400 -	200 to 480	54	3.5 to 4.0	M5	210	225	150	70	176	M6	10.7

For single phase AC 230 V inverters



Order number 6SE6400-...	Dimensions (mm)					Weight (kg)	Fixing screw		Cable cross section (mm ²)	
	A	B	C	D	E		Size	Tightening torque (Nm)	Min.	Max.
3TC00-4AD3	200	75.5	50	56	187	1.3	M4 (4)	1.1	1.0	2.5
3TC01-0BD3	213	150	80	120	200	4.1	M4 (4)	1.5	1.5	6.0
3TC03-2CD3	245	185	80	156	232	6.6	M4 (4)	2.25	2.5	10

B.1.8 External EMC filter class B

 WARNING
<p>Risk of equipment damage and electric shocks</p> <p>Some of the EMC filters in the table below have pin crimps for the connection to the inverter's PE and mains terminals.</p> <p>Use of these pin crimps can cause damage to the equipment and even electric shocks.</p> <p>For safety reasons, replace the pin crimps using appropriately sized UL/cUL-certified fork or ring crimps for PE terminal connection, and using UL/cUL-certified fork crimps or stranded cables for mains terminal connection.</p>

Note

The EMC filter with an order number of 6SE6400-2FL02-6BB0 in the following table has two DC terminals (DC+, DC-) that are not used and should not be connected. The cables of these terminals need to be cut back and suitably insulated (for example, with heat shrink shroud).

Functionality

In order to achieve EN61800-3 Category C2 Radiated and Conducted Emission, the external EMC filters shown below are required for the SINAMICS V20 inverters (400 V filtered and unfiltered variants, as well as 230 V unfiltered variants). In this case, only a screened output cable can be used, and the maximum cable length is 25 m for the 400 V variants or 5 m for the 230 V variants.