



SIRIUS SOFT STARTER, VALUES WITH 400 V, 40 DEG., STANDARD: 250A, 132KW, INSIDE-DELTA CIRCUIT 3: 433A, 250KW, 200-460 V AC, 230 V AC, SCREW TERMINALS

General technical data:

<b>product brand name</b>		SIRIUS
<ul style="list-style-type: none"> <li>• Product equipment Integrated bypass contact system</li> </ul>		Yes
<ul style="list-style-type: none"> <li>• Product feature Thyristors</li> </ul>		Yes
<b>Product function</b>		
<ul style="list-style-type: none"> <li>• Intrinsic device protection</li> </ul>		Yes
<ul style="list-style-type: none"> <li>• motor overload protection</li> </ul>		Yes
<ul style="list-style-type: none"> <li>• Evaluation of thermistor motor protection</li> </ul>		Yes
<ul style="list-style-type: none"> <li>• External reset</li> </ul>		Yes
<ul style="list-style-type: none"> <li>• Adjustable current limitation</li> </ul>		Yes
<ul style="list-style-type: none"> <li>• Inside-delta circuit</li> </ul>		Yes
<b>Product component Motor brake output</b>		Yes
<b>Equipment marking acc. to DIN EN 61346-2</b>		Q
<b>Equipment marking acc. to DIN 40719 extended according to IEC 204-2 acc. to IEC 750</b>		G

Power Electronics:

<b>Product designation</b>		soft starters for high feature applications
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<b>Operating current</b>		
• at 40 °C rated value	A	250
• at 50 °C rated value	A	215
• at 60 °C rated value	A	185
<b>Operating current for three-phase motors at inside-delta circuit</b>		
• at 40 °C rated value	A	433
• at 50 °C rated value	A	372
• at 60 °C rated value	A	320
<b>Mechanical power output for three-phase motors</b>		
• at 230 V		
— at standard circuit at 40 °C rated value	W	75 000
— at inside-delta circuit at 40 °C rated value	W	132 000
• at 400 V		
— at standard circuit at 40 °C rated value	W	132 000
— at inside-delta circuit at 40 °C rated value	W	250 000
<b>Yielded mechanical performance [hp] for three-phase AC motor at 200/208 V at standard circuit at 50 °C rated value</b>	hp	60
Operating frequency rated value	Hz	50 ... 60
<b>Relative negative tolerance of the operating frequency</b>	%	-10
<b>Relative positive tolerance of the operating frequency</b>	%	10
<b>Operating voltage at standard circuit rated value</b>	V	200 ... 460
<b>Relative negative tolerance of the operating voltage at standard circuit</b>	%	-15
<b>Relative positive tolerance of the operating voltage at standard circuit</b>	%	10
<b>Operating voltage at inside-delta circuit rated value</b>	V	200 ... 460
<b>Relative negative tolerance of the operating voltage at inside-delta circuit</b>	%	-15
<b>Relative positive tolerance of the operating voltage at inside-delta circuit</b>	%	10
<b>Minimum load [% of IM]</b>	%	8
<b>Adjustable motor current for motor overload protection minimum rated value</b>	A	50
<b>Continuous operating current [% of I<sub>e</sub>] at 40 °C</b>	%	115
<b>Power loss [W] at operating current at 40 °C during operation typical</b>	W	110
<b>Control electronics:</b>		
<b>Type of voltage of the control supply voltage</b>		AC
<b>Control supply voltage frequency 1 rated value</b>	Hz	50
<b>Control supply voltage frequency 2 rated value</b>	Hz	60

<b>Relative negative tolerance of the control supply voltage frequency</b>	%	-10
<b>Relative positive tolerance of the control supply voltage frequency</b>	%	10
Control supply voltage 1 at AC		
• at 50 Hz rated value	V	230
• at 60 Hz rated value	V	230
<b>Relative negative tolerance of the control supply voltage at AC at 60 Hz</b>	%	-15
<b>Relative positive tolerance of the control supply voltage at AC at 60 Hz</b>	%	10
<b>Display version for fault signal</b>		Display

#### Mechanical data:

<b>Width</b>	mm	210
<b>Height</b>	mm	230
<b>Depth</b>	mm	298
<b>Mounting type</b>		screw fixing
<b>Mounting position</b>		with vertical mounting surface +/-90° rotatable, with vertical mounting surface +/- 22.5° tiltable to the front and back
<b>Required spacing with side-by-side mounting</b>		
• upwards	mm	100
• at the side	mm	5
• downwards	mm	75
<b>Installation altitude at height above sea level</b>	m	5 000
<b>Wire length maximum</b>	m	500
<b>Number of poles for main current circuit</b>		3

#### Connections/ Terminals:

<b>Type of electrical connection</b>		
• for main current circuit		busbar connection
• for auxiliary and control current circuit		screw-type terminals
<b>Number of NC contacts for auxiliary contacts</b>		0
<b>Number of NO contacts for auxiliary contacts</b>		3
<b>Number of CO contacts for auxiliary contacts</b>		1
Type of connectable conductor cross-sections for main contacts for box terminal using the front clamping point		
• finely stranded with core end processing		70 ... 240 mm <sup>2</sup>
• finely stranded without core end processing		70 ... 240 mm <sup>2</sup>
• stranded		95 ... 300 mm <sup>2</sup>
Type of connectable conductor cross-sections for main contacts for box terminal using the back clamping point		

<ul style="list-style-type: none"> <li>• finely stranded with core end processing</li> <li>• finely stranded without core end processing</li> <li>• stranded</li> </ul>		120 ... 185 mm <sup>2</sup> 120 ... 185 mm <sup>2</sup> 120 ... 240 mm <sup>2</sup>
Type of connectable conductor cross-sections for main contacts for box terminal using both clamping points <ul style="list-style-type: none"> <li>• finely stranded with core end processing</li> <li>• finely stranded without core end processing</li> <li>• stranded</li> </ul>		min. 2x 50 mm <sup>2</sup> , max. 2x 185 mm <sup>2</sup> min. 2x 50 mm <sup>2</sup> , max. 2x 185 mm <sup>2</sup> max. 2x 70 mm <sup>2</sup> , max. 2x 240 mm <sup>2</sup>
Type of connectable conductor cross-sections at AWG conductors for main contacts for box terminal <ul style="list-style-type: none"> <li>• using the back clamping point</li> <li>• using the front clamping point</li> <li>• using both clamping points</li> </ul>		250 ... 500 kcmil 3/0 ... 600 kcmil min. 2x 2/0, max. 2x 500 kcmil
Type of connectable conductor cross-sections for DIN cable lug for main contacts <ul style="list-style-type: none"> <li>• finely stranded</li> <li>• stranded</li> </ul>		50 ... 240 mm <sup>2</sup> 70 ... 240 mm <sup>2</sup>
<b>Type of connectable conductor cross-sections for auxiliary contacts</b> <ul style="list-style-type: none"> <li>• solid</li> <li>• finely stranded with core end processing</li> </ul>		2x (0.5 ... 2.5 mm <sup>2</sup> ) 2x (0.5 ... 1.5 mm <sup>2</sup> )
<b>Type of connectable conductor cross-sections at AWG conductors</b> <ul style="list-style-type: none"> <li>• for main contacts</li> <li>• for auxiliary contacts</li> <li>• for auxiliary contacts finely stranded with core end processing</li> </ul>		2/0 ... 500 kcmil 2x (20 ... 14) 2x (20 ... 16)

#### Ambient conditions:

<b>Ambient temperature</b>		
<ul style="list-style-type: none"> <li>• during operation</li> <li>• during storage</li> </ul>	°C	60 -25 ... +80
<b>Derating temperature</b>	°C	40
<b>Protection class IP</b>		IP00

#### Certificates/ approvals:

General Product Approval	EMC	Declaration of Conformity
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Test Certificates	Shipping Approval
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[Typprüfbescheinigung/Werkszeugnis](#)

[spezielle Prüfbescheinigung](#)  
[n](#)



Shipping Approval	other
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[Umweltbestätigung](#)

[Bestätigungen](#)

#### UL/CSA ratings:

Yielded mechanical performance [hp] for three-phase AC motor		
• at 200/208 V		
— at inside-delta circuit at 50 °C rated value	hp	125
• at 220/230 V		
— at standard circuit at 50 °C rated value	hp	75
— at inside-delta circuit at 50 °C rated value	hp	150
• at 460/480 V		
— at standard circuit at 50 °C rated value	hp	150
— at inside-delta circuit at 50 °C rated value	hp	300
Contact rating of auxiliary contacts according to UL		B300 / R300

#### Further information

##### Simulation Tool for Soft Starters (STS)

<https://support.industry.siemens.com/cs/ww/en/view/101494917>

##### Information- and Downloadcenter (Catalogs, Brochures,...)

<http://www.siemens.com/industrial-controls/catalogs>

##### Industry Mall (Online ordering system)

<http://www.siemens.com/industrymall>

##### Cax online generator

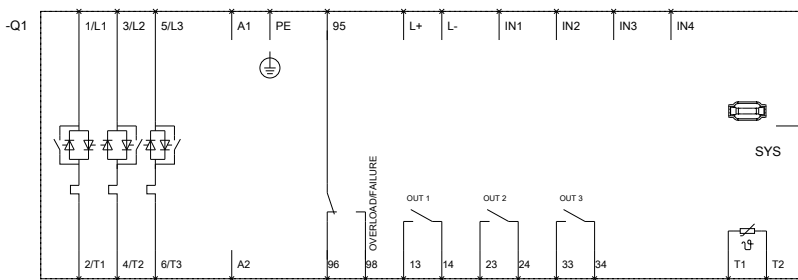
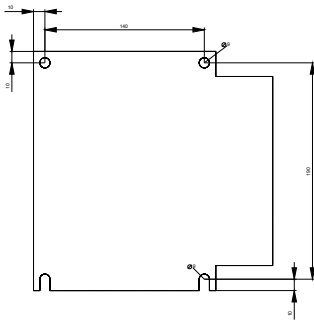
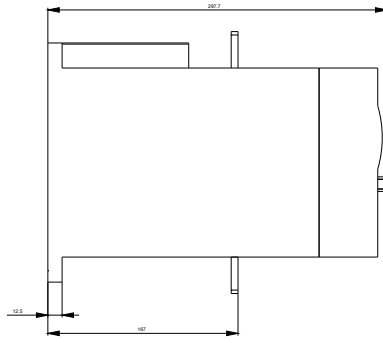
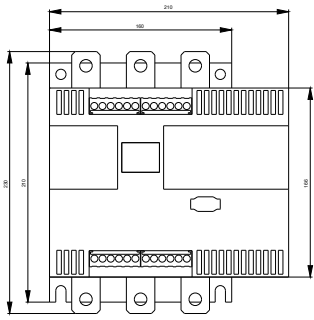
<http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RW4444-6BC44>

##### Service&Support (Manuals, Certificates, Characteristics, FAQs,...)

<https://support.industry.siemens.com/cs/ww/en/ps/3RW4444-6BC44>

##### Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, EPLAN macros, ...)

[http://www.automation.siemens.com/bilddb/cax\\_de.aspx?mlfb=3RW4444-6BC44&lang=en](http://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=3RW4444-6BC44&lang=en)



last modified:

07/07/2016