## **SIEMENS**

## Data sheet

## 3RW40 38-1BB04



SIRIUS SOFT STARTER, S2, 72A, 37KW/400V, 40 DEGR., AC 200-480V, AC/DC 24V, SCREW TERMINALS

General technical data	
product brandname	SIRIUS
<ul> <li>Product equipment Integrated bypass contact system</li> </ul>	Yes
<ul> <li>Product feature Thyristors</li> </ul>	Yes
Product function	
<ul> <li>Intrinsic device protection</li> </ul>	Yes
<ul> <li>motor overload protection</li> </ul>	Yes
<ul> <li>Evaluation of thermistor motor protection</li> </ul>	No
• External reset	Yes
<ul> <li>Adjustable current limitation</li> </ul>	Yes
Inside-delta circuit	No
Product component Motor brake output	No
Equipment marking acc. to DIN EN 61346-2	Q
Equipment marking acc. to DIN 40719 extended according to IEC 204-2 acc. to IEC 750	G
Power Electronics	
Product designation	Soft starter

Operating current		
• at 40 °C rated value	A	72
• at 50 °C rated value	A	62
• at 60 °C rated value	A	60
Mechanical power output for three-phase motors		
• at 230 V		
— at standard circuit at 40 °C rated value	W	22 000
• at 400 V		
— at standard circuit at 40 °C rated value	W	37 000
Yielded mechanical performance [hp] for three-phase AC motor at 200/208 V at standard circuit at 50 °C rated value	hp	20
Operating frequency rated value	Hz	50 60
Relative negative tolerance of the operating	%	-10
frequency		
Relative positive tolerance of the operating frequency	%	10
Operating voltage at standard circuit rated value	V	200 480
Relative negative tolerance of the operating voltage at standard circuit	%	-15
Relative positive tolerance of the operating voltage at standard circuit	%	10
Minimum load [% of IM]	%	20
Adjustable motor current for motor overload protection minimum rated value	A	35
Continuous operating current [% of le] at 40 °C	%	115
Power loss [W] at operating current at 40 °C during operation typical	W	15
Control electronics		
Type of voltage of the control supply voltage		AC/DC
Control supply voltage frequency 1 rated value	Hz	50
Control supply voltage frequency 2 rated value	Hz	60
Relative negative tolerance of the control supply voltage frequency	%	-10
Relative positive tolerance of the control supply voltage frequency	%	10
Control supply voltage 1 at AC		
• at 50 Hz rated value	V	24
• at 60 Hz rated value	V	24
Relative negative tolerance of the control supply voltage at AC at 60 Hz	%	-20
Relative positive tolerance of the control supply voltage at AC at 60 Hz	%	20
Control supply voltage 1 at DC rated value	V	24

Relative negative tolerance of the control supply voltage at DC	%	-20
Relative positive tolerance of the control supply voltage at DC	%	20
Display version for fault signal		red

Mechanical data		
Size of engine control device		S2
Width	mm	55
Height	mm	160
Depth	mm	170
Mounting type		screw and snap-on mounting
Mounting position		With additional fan: With vertical mounting surface +/- 90° rotatable, with vertical mounting surface +/- 22.5° tiltable to the front and back Without additional fan: With vertical mounting surface +/-10° rotatable, with vertical mounting surface +/- 10° t
Required spacing with side-by-side mounting		
• upwards	mm	60
• at the side	mm	30
<ul> <li>downwards</li> </ul>	mm	40
Installation altitude at height above sea level	m	5 000
Wire length maximum	m	300
Number of poles for main current circuit		3

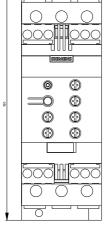
Connections/Terminals	
Type of electrical connection	
<ul> <li>for main current circuit</li> </ul>	screw-type terminals
<ul> <li>for auxiliary and control current circuit</li> </ul>	screw-type terminals
Number of NC contacts for auxiliary contacts	0
Number of NO contacts for auxiliary contacts	2
Number of CO contacts for auxiliary contacts	1
Type of connectable conductor cross-sections for main contacts for box terminal using the front clamping point	
• solid	2x (1.5 16 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>	0.75 25 mm²
• stranded	0.75 35 mm²
Type of connectable conductor cross-sections for main contacts for box terminal using the back clamping point	
• solid	2x (1.5 16 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>	1.5 25 mm²
• stranded	1.5 35 mm²

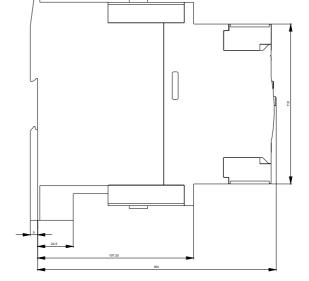
Type of connectable conductor cross-sections for		
main contacts for box terminal using both clamping		
points		
• solid		2x (1.5 16 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>		2x (1.5 16 mm²)
• stranded		2x (1.5 25 mm²)
Type of connectable conductor cross-sections at		
AWG conductors for main contacts for box terminal		
<ul> <li>using the back clamping point</li> </ul>		16 2
<ul> <li>using the front clamping point</li> </ul>		18 2
<ul> <li>using both clamping points</li> </ul>		2x (16 2)
Type of connectable conductor cross-sections for		
auxiliary contacts		
• solid		2x (0.5 2.5 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>		2x (0.5 1.5 mm²)
Type of connectable conductor cross-sections at AWG conductors		
<ul> <li>for auxiliary contacts</li> </ul>		2x (20 14)
<ul> <li>for auxiliary contacts finely stranded with core</li> </ul>		2x (20 16)
end processing		
Ambient conditions		
Ambient temperature		
• during operation	°C	-25 +60
• during storage	°C	-40 +80
Derating temperature	°C	40
Protection class IP		IP00
Certificates/approvals		

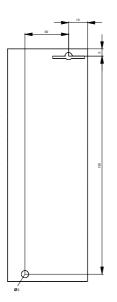
General Product	Approval			EMC	For use in hazardous locations
	CSA		EHC	C-Tick	ATEX
Declaration of Conformity	Test Certificates		Shipping App	roval	
EG-Konf.	Typprüfbescheinigu ng/Werkszeugnis	spezielle Prüfbescheinigunge <u>n</u>	GL	Lloyd's Register LRS	PRS
other					
Umweltbestätigung	Bestätigungen				

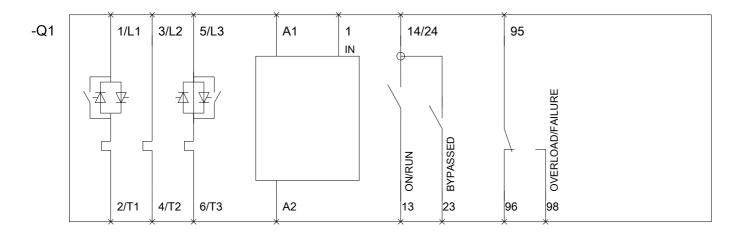
UL/CSA ratings		
Yielded mechanical performance [hp] for three-phase		
AC motor		
● at 220/230 V		
— at standard circuit at 50 °C rated value	hp	20
● at 460/480 V		
— at standard circuit at 50 °C rated value	hp	40
Contact rating of auxiliary contacts according to UL		B300 / R300

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) https://mall.industry.siemens.com/mall/en/en/Catalog/product?mlfb=3R	W4038-1BB04
Cax online generator http://support.automation.siemens.com/WW/CAXorder/default.aspx?la	ng=en&mlfb=3RW4038-1BB04
Service&Support (Manuals, Certificates, Characteristics, FAQs https://support.industry.siemens.com/cs/ww/en/ps/3RW4038-1BB04	 ,)









last modified:

04/13/2017