Siemens □□□ Series Service Manual

3RW4055-6BB44

1. Description

3RW40 55-6BB44 3RW4055-6BB44

2. Specifications

Specification	Value
product	brand name SIRIUS
Product	feature
●	integrated bypass contact system Yes
●	Thyristors Yes
Product	function
●	Intrinsic device protection Yes
●	motor overload protection Yes
●	Evaluation of thermistor motor protection No
●	External reset Yes
●	Adjustable current limitation 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 starters for standard applications
Operating	current
●	at 40 °C Rated value A 134
●	at 50 °C Rated value A 117
●	at 60 °C Rated value A 100
Mechanical	power output for three-phase motors
●	at 230 V

3. Product Information

3RW40 55-6BB44 3RW4055-6BB44 | Siemens | SIRIUS Soft Starter

Manufacturer : Siemens

Product No: 3RW4055-6BB44

Product type : SIRIUS Soft Starter

yielded mechanical performance [hp] for three-phase AC motor at 200/208 V at standard circuit at 50 °C Rated value: 30 hp

Product designation: Soft starters for standard applications

Operating frequency rated value: 50 ... 60 Hz

Operating voltage with standard circuit rated value : 200 ... 460 V

Type of voltage of the control supply voltage: AC

Size of engine control device: S6

Dimensions (L x W x H): 2.50 cm x 1.20 cm x 1.98 cm

SIRIUS SOFT STARTER, S6, 134 A, 75 KW/400 V, 40

DEG., 200-460 V AC, 230 V AC, SCREW TERMINALS

General technical data:

product brand name SIRIUS

Product feature

● integrated bypass contact system Yes

● Thyristors Yes

Product function

● Intrinsic device protection Yes

● motor overload protection Yes

● Evaluation of thermistor motor protection No

● External reset Yes

● Adjustable current limitation 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 starters for standard applications

Operating current

● at 40 °C Rated value A 134

● at 50 °C Rated value A 117

● at 60 °C Rated value A 100

Mechanical power output for three-phase motors

● at 230 V

— at standard circuit at 40 °C Rated value W 37 000

● at 400 V

— at standard circuit at 40 °C Rated value W 75 000

yielded mechanical performance [hp] for three-phase

AC motor at 200/208 V at standard circuit at 50 °C

Rated value

metric

hp

30

Operating frequency Rated value Hz 50 ... 60

Relative negative tolerance of the operating

frequency

% -10

Relative positive tolerance of the operating frequency % 10

Operating voltage at standard circuit Rated value V 200 ... 460

Relative negative tolerance of the operating voltage

at standard circuit

% -15

Relative positive tolerance of the operating voltage at

standard circuit

% 10

Minimum load in % of I_M % 20

Adjustable motor current for motor overload

protection minimum rated value

A 59

Continuous operating current [% of Ie] at 40 °C % 115

Active power loss at operating current at 40 °C during

operation typical

W 60

Control electronics:

Type of voltage of the control supply voltage AC

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 with AC

● at 50 Hz Rated value V 230

● at 60 Hz Rated value V 230

Relative negative tolerance of the control supply

voltage with AC at 60 Hz

% -15

Relative positive tolerance of the control supply

voltage with AC at 60 Hz

% 10

Display version for fault signal red

Mechanical data:

Size of engine control device S6

Width mm 120

Height mm 198

Depth mm 250

Mounting type screw fixing

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 100

● at the side mm 5

● downwards mm 75

Installation altitude at height above sea level m 5 000

Cable length maximum m 300

Number of poles for main current circuit 3

Connections/ Terminals:

Type of electrical connection

● for main current circuit busbar connection

● for auxiliary and control current circuit 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-section for

main contacts for box terminal using the front

clamping point

● finely stranded with core end processing 16 ... 70 mm²

● finely stranded without core end processing 16 ... 70 mm²

● stranded 16 ... 70 mm²

Type of connectable conductor cross-section for
main contacts for box terminal using the back
clamping point
● finely stranded with core end processing 16 ... 70 mm²
● finely stranded without core end processing 16 ... 70 mm²
● stranded 16 ... 70 mm²
Type of connectable conductor cross-section for
main contacts for box terminal using both clamping
points
● finely stranded with core end processing max. 1x 50 mm², 1x 70 mm²
● finely stranded without core end processing max. 1x 50 mm², 1x 70 mm²
● stranded max. 2x 70 mm²
Type of connectable conductor cross-section for
AWG conductors for main contacts for box terminal
● using the back clamping point 6 ... 2/0
● using the front clamping point 6 ... 2/0
● using both clamping points max. 2x 1/0
Type of connectable conductor cross-section for DIN
cable lug for main contacts
● finely stranded 16 ... 95 mm²
● stranded 25 ... 120 mm²
Type of connectable conductor cross-section for
auxiliary contacts
● solid 2x (0.5 ... 2.5 mm²)
● finely stranded with core end processing 2x (0.5 ... 1.5 mm²)
Type of connectable conductor cross-section for
AWG conductors
● for main contacts 4 ... 250 kcmil
● for auxiliary contacts 2x (20 ... 14)
● for auxiliary contacts finely stranded with core
end processing
2x (20 ... 16)
Ambient conditions:
Ambient temperature
● during operation °C -25 ... +60
● during storage °C -40 ... +80
Derating temperature °C 40
Protection class IP IP00
UL/CSA ratings:
yielded mechanical performance [hp] for three-phase
AC motor
● at 220/230 V
— at standard circuit at 50 °C Rated value metric
hp
40
● at 460/480 V
— at standard circuit at 50 °C Rated value metric
hp
75