DATASHEET
Soft-Starter



Main Features

Reference	: SSW070045T5SZ
Product code	: 10194173
Product family	: SSW07

Basic data

Power	
- Rated current	: 45 A
- Power supply	: 220-575V
- Power supply type	: TT / TN / IT
- Frequency	: 50/60Hz
- Number of controlled phases	: 3 phases
- Integrated bypass	: Yes
Motor power - standard connection (cv/kW)	
- 220/230V	: 15 / 11
- 380/400V	: 30 / 22
- 440/460V	: 30 / 22
- 575V	: 40 / 30
- 690V	: No
Motor power - delta inside connection (cv/kW)	
- 220/230V	: No
- 380/400V	: No
- 440/460V	: No
- 575V	: No
Electronic and fan	
Supply voltage (control)	: 94-264V
Supply voltage (cooler)	: 94-264V
Connection to the motor	
- Standard (3 leads)	: Yes
- Inside delta (6 leads)	: No
Duty cycle	
- Standard [1]	: AC-53b 3-30:1170
- With ventilation kit [2]	: AC-53b 3-30:330
Digital inputs	
- Quantity (standard)	: 3
- Type	: AC
- Voltage	: 110 up to 240 Vac
- Minimum high level	: 93 Vac
- Maximum low level	: 10 Vac
- Maximum voltage	: 264 Vac
- Input current	: 1.1 mA @ 220 Vac
- Function	: Programmable via optional
- Reading via communication	: No
Input for motor thermistor	
- Quantity (standard)	: Available with optional
- Activation	: Available with optional
- Deactivation	: Available with optional
- Minimum resistance	: Available with optional
Analog outputs	
- Quantity (standard)	: No
- Level	: No
- Resolution	: No
- Function	: No
- Write via communication	: No
Digital outputs	
- Quantity	: 2
- Type	: NO relay
- Maximum voltage	: 250 Vac
- Maximum current	: 1 A
- Function	: Programmable via optional
- Write via communication	: No
Functions and Features	
Control type start and stop	
- Voltage ramp	: Yes
- Voltage ramp and current limit	: No
- Current limit	: Yes

- Current limitation ramp : Programammable via optional
- Pump control : Programmable via optional
- Torque control : No
- Direct on line start : Programmable via optional

Functions/Features

Specials functions

- Torque pulse at start (kick start) : Yes
- Jog : Programmable via optional
- DC braking (with contactor) : Programmable via optional
- Optimal Braking (without contactor) : No
- Reverse braking : No
- Changing of the rotation direction : Programmable via optional
- Multimotor application : No
- Emergency start (Fire Mode) : Programmable via optional

Diagnosis

- Latest faults : Yes, 4 last
- Starting and cycle diagnosis : No
- Last previous faults : No
- Last previous alarms : No
- Last previous events : No

Others

- Set-up of the programmable fan : Programmable via optional
- Copy of the parameters via keypad : Yes
- User 1 and user 2 : No
- Oriented Start-up : No
- Protections actuation in errors and alarms : No
- Fault auto reset : Yes
- Real time clock (RTC) : No
- SoftPLC (ladder programming) : No

Slots (para accessories options)

- Quantity : 1
- Digital inputs and outputs expansion : No
- PTC inputs : Yes
- Pt-100 inputs : No
- Current sensor (by extern bypass) : No

Comunications (see Comunication)

Protections

Voltage

- Power supply phase loss : Yes
- Overvoltage and undervoltage : No
- Voltage imbalance : No
- Electronic undervoltage (control) : Yes

Current

- Overcurrent and undercurrent : Programmable via optional
- Current imbalance : Programmable via optional

Torque

- Overtorque e undertorque : No

Power

- Overpower and underpower : No

Temperature

- Thyristor overheating : Yes
- PTC thermistor motor overheating : Available with optional
- PT100 thermocouple motor overheating : No

Overload

- Motor overload (thermal class) : Yes
- Thyristor overload : Yes
- Inverted phase sequence : Yes
- External fault : Programmable via optional
- Not connected motor : Yes
- Wrong motor connection : No
- Frequency out of range : Yes

Ground fault

- Ground fault : No

Bypass

- Bypass not opened : Yes
- Bypass not closed : Yes
- Overcurrent before closing the bypass : Yes
- Undercurrent before closing the bypass : Yes

Time

- Time before starting : No
- Time after starting : Programmable via optional
- Time between starting : No
- Locked rotor at start : Yes

Communications

- Programming error : Yes
- Communication faults : Yes

Power

- Power short circuit with motor switched off : Yes
- Thyristor fault : No
- Hardware self-diagnosis : No

Parameterization

- Parameterization via trimpots and dip switches : Yes
- Parameterization via keypad : Available with optional
- Parameterization via software : Superdrive G2

Local HMI

- Type : Optional

Remote HMI

- Type : Optional
- Frame for HMI : No
- HMI degree of protection : IP54
- Maximum cable length : 10 m / 32.8 ft

Local or remote HMI data

- Display : LED numeric
- Keys : 8 keys
- Password : Yes
- Language : No
- Help : No
- Copy function : Yes
- Status graphic (read) : No
- HMI USB : No

Communication

- Modbus-RTU RS-232 : Available with optional
- Modbus-RTU RS-485 : Available with optional
- Modbus-RTU USB : No
- WEG Bus : No
- Modbus-TCP : No
- Profibus-DP : No
- Profibus-DPV1 : No
- Profinet : No
- DeviceNet : Available with optional
- EtherNet/IP : No
- EtherNet/IP 2P : No
- Profinet IO 2P : No
- CANopen : No

Ambient conditions

- Enclosure : IP20
- Pollution degree (UL 508) : 2

Temperature

- Minimum : 0 °C / 32 °F
- Rated : 55 °C / 131 °F
- Current reduction factor above nominal [3] : 2% for each degree

Relative humidity (non-condensing)

- Minimum : 5 %
- Maximum : 90 %

Altitude

- Under rated operating conditions : 1000 m (3281 ft)
- Maximum allowed with reduction factor [4] : 4000 m (13123 ft)
- Current reduction factor above 1000 m [5] : 1 % for each 100 m (328 ft)
- Voltage reduction factor above 2000 m [6] : 1.1 % for each 100 m (328 ft)

Dimensions

- Frame : 2
- Height : 208 mm / 8.2 in
- Width : 144 mm / 5.7 in
- Depth : 203 mm / 8.0 in
- Weight : 3.3 kg / 7.3 lb

Sustentability Directives

- RoHS : Yes
- Conformal coating : 3C2

Standards Compliance

- Safety : UL 508
- Low voltage : EN 60947-4-2
- Overvoltage category : III (UL508 / EN61010)
- EMC : Directive 89/336/EEC

Certifications

- Product certification : UL, CE, CS, IRAM and C-TICK

Notes

1) Starting duty cicle AC-53b 3-30:1170:

- 3 x Rated current of the SSW07 during 30 s;
- 3 starts per hour;
- 100% of the time with rated current;
- With bypass;
- from 0 to 55 °C without current derating

3) For temperature over the rated value;
4) With reduction factor;
5) For altitude above 1000 m (3281 ft);
6) For altitude above 2000 m (6562 ft);
7) Image merely illustrative;
8) For further information consult the product manuals SSW07.