General Specifications

GS 32Q06D10-31E

Models SSC60S, SSC60D Safety Control Unit, Duplexed Safety Control Unit (for Vnet/IP, Rack Mountable Type)



GENERAL

This GS provides the hardware specifications of the safety control unit for Vnet/IP, which are intelligent parts of the safety control station (SCS).

HARDWARE SPECIFICATIONS

For the criteria for the installation environment, refer to "ProSafe-RS Safety Instrumented System Overview (for Vnet/IP)" (GS 32P01B10-01EN).

Module Configuration

Power Supply Module (SPW481, SPW482 or SPW484): 2 modules Processor Module (S2CP471 or SCP461): 2 modules

for dual-redundant configuration. (*1) *1. A dual-redundant configuration is enabled by

 A dual-redundant configuration is enabled by using 2 identical modules with same model code (S2CP471 or SCP461).

Memory Protection at Power Failure

Application program is stored in flash memory. Processor module operation data is stored in NVRAM (nonvolatile memory).

• Temperature Adaptability

A fan unit is provided for high temperature use where the safety control units (SSC60S-F/SSC60D-F) ambient temperature exceeds 40 °C.

Communications Interface

Vnet/IP interface: Dual-redundant ESB bus interface: Dual-redundant

Communication on Vnet/IP

Communication speed: 100 Mbps, Full duplex Connection: UTP cable (CAT5e or higher), RJ45 connector Interface: 100Base-TX compliance Max. distance: 100 m (distance between SSC60S/ SSC60D and Layer 2 switch)

Connecting Safety Node Units

Up to 13 safety node units can be connected to a safety control unit using SEC402 ESB bus coupler module and adding CFS1350 Node Expansion Package.

Up to 9 safety node units can be connected to a safety control unit using SEC401 ESB bus coupler module.

For installation, ESB bus coupler modules (SEC402/ SEC401) should be mounted on 7-th and 8-th slots. ESB bus can be extended by Optical ESB bus repeater modules.



Number of I/O Modules Mounted

Up to eight for each safety control unit

Up to 110 for each SCS (using SEC402 ESB bus coupler module and CFS1350 Node Expansion Package)

Up to 78 for each SCS (using SEC401 ESB bus coupler module)

Power Requirements

Specify suffix codes. Voltage: 100 to 120 V AC, 50 or 60 Hz Voltage: 220 to 240 V AC, 50 or 60 Hz Voltage: 24 V DC

Power Consumption

SSC60S-S/SSC60D-S
100 to 120 V AC model: 200 VA
200 to 240 V AC model: 230 VA
24 V DC model: 5.5 A
SSC60S-F/SSC60D-F

100 to 120 V AC model: 240 VA 200 to 240 V AC model: 290 VA 24 V DC model: 7.0 A

• Battery

• S2CP471 Part No. : S9450FE Battery's recommended replacement period: Three years under the average ambient temperature of 30 °C or less.

• SCP461

Part No. : S9185FA Battery's recommended replacement period: Three years under the average ambient temperature of 30 °C or less.



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Weight

Approximately 7.9 kg (for SSC60S-S) Approximately 13 kg (for SSC60S-F) Approximately 8.5 kg (for SSC60D-S) Approximately 13 kg (for SSC60D-F)

Mounting

Rack mounting: SSC60S-S/SSC60D-S rack mounted with eight M5 screws SSC60S-F/SSC60D-F rack mounted with twelve M5 screws Insulating Bushing: Supplied as accessories

The SCS is composed of a safety control unit, safety node units and an ESB bus connecting them.



I/O Signal Connections



Connections

Power Supply: Connected with M4 screws. Grounding: Connected with M4 screws.

• Conformity Standards

Refer to "ProSafe-RS Standards Compliant Models" (GS 32P01B60-01EN).

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