TYPE APPROVAL CERTIFICATE

N. ELE178616CS012

This is to certify that the product below is found to be in compliance with the applicable requirements of the RINA type approval system.

Description	**Monitoring and Control System**
Type	**UNS10195 (Monitoring)** **UNS10195/P (Protection)**
Applicant	**SAN GIORGIO S.E.I.N. Srl** **Via A. Pedullà 59** **16165 Genova** **Italy**
Manufacturer	**SAN GIORGIO S.E.I.N. Srl** **Via A. Pedullà 59** **16165 Genova** **Italy**
Testing Standards	**Rules for the Classification of Ships – Part C – Machinery Systems and fire protection – Ch. 3 Sect.6, Tab. 1**

Issued in **Genova** on **January 15, 2018**

This certificate is valid until **January 14, 2023**

RINA Services S.p.A.

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TYPE APPROVAL CERTIFICATE

N. ELE178616CS012

Monitoring and control system type UNS10195, UNS10195/P

Main features:

7" Colour TFT display with capacitive touch-screen; resolution 800x400;
LED backlight 800 cd, sunlight readable. Integrated data and alarm logger.
Mechanical protection IP 56

Inputs:
8 Analogue resistive inputs 0-300 ohm
8 Analogue inputs resistive multirange (0-300 ohm, 0-100 Kohm, PT100, Pt1000)
16 Analogue inputs 0-10Vdc / 4-20mA
8 Thermocouple inputs (J or K type)
6 Battery voltage inputs 0-36V
3 Frequency inputs- Min 5Vpp , 15kHz (engine RPM, W Alternator, 3 / 2 wire pick up)
8 ON / OFF digital alarm inputs (N.C.)

Outputs:
8 Relay outputs (500 mA) including:
n.1 d.o. for external buzzer control
n.1 d.o. for cumulative alarm
n.1 d.o. for fault alarm
1 Auxiliary 9V output for sensors (100mA)

Communication Ports:
4 Can Bus J1939 (N.1 NMEA2000 ready).
1 RS485
1 RS232
1 NMEA 0183 input
1 USB OTG
1 Ethernet

Power supply
Main power supply 12-24V
Auxiliary power supply 12-24V

Test Reports:
TesLab report n. 16B249F (15/12/2017);
ACS Electronics report n. RPT12110001 Rev. 0 (12/12/2017)

Technical Specifications:
User Manual M151106 ver. 1.0 (05/12/2017)

Remarks:
UNS10195 and UNS10195/P are suitable to be installed on the open decks of a Ship.
UNS10195/P version has a special setup suitable for engine protection (safety) using analogue inputs to perform line monitoring for safety measurements and engine automatic stop relay.
According to Solas Requirement UNS10195 and UNS10195/P devices are not allowed to perform both alarm / monitoring and engine protection simultaneously.

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