PROFIBUS-DP INTERFACE MODULE

(for 62-point analog signals)

MODEL

R6-NP1

BEFORE USE

Thank you for choosing us. Before use, please check contents of the package you received as outlined below. If you have any problems or questions with the product, please contact our sales office or representatives.

■ PACKAGE INCLUDES:

Network interface module(1)

■ MODEL NO.

Confirm Model No. marking on the product to be exactly what you ordered.

■ INSTRUCTION MANUAL

This manual describes necessary points of caution when you use this product, including installation, connection and basic maintenance procedures.

■ GSD FILE

GSD files are downloadable at our web site.

POINTS OF CAUTION

■ CONFORMITY WITH EU DIRECTIVES

- The equipment must be mounted inside the instrument panel of a metal enclosure.
- The actual installation environments such as panel configurations, connected devices, connected wires, may affect the protection level of this unit when it is integrated in a panel system. The user may have to review the CE requirements in regard to the whole system and employ additional protective measures to ensure the CE conformity.

■ HOT INSERTION/REMOVAL OF MODULES

• It is possible to replace the module with the power is supplied. Be sure to replace it when the module is not communicating with a host, as it is possible to affect the system. However, replacing multiple modules at once may greatly change line voltage levels. We recommend that you replace them one by one.

■ GENERAL PRECAUTIONS

 Do not set the DIP switch on the side panel while the power is supplied. The DIP switch is selectable for maintenance without the power.

■ ENVIRONMENT

- ullet Indoor use.
- When heavy dust or metal particles are present in the air, install the unit inside proper housing with sufficient ventilation.
- Do not install the unit where it is subjected to continuous vibration. Do not subject the unit to physical impact.
- Environmental temperature must be within -10 to +55°C (14 to 131°F) with relative humidity within 30 to 90% RH in order to ensure adequate life span and operation.

■ WIRING

- Do not install cables close to noise sources (relay drive cable, high frequency line, etc.).
- Do not bind these cables together with those in which noises are present. Do not install them in the same duct.

■ AND ...

The unit is designed to function as soon as power is supplied, however, a warm up for 10 minutes is required for satisfying complete performance described in the data sheet.

INSTALLATION

Use the Base Model R6x-BSA or R6x-BSB.

Before mounting the Network Interface Module onto the Base, be sure to configure the module as explained below.

■ Station No.

See "COMPONENT IDENTIFICATION."

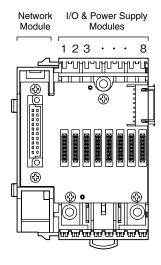
Station No. is selectable from 00 to 7D via the front rotary switches. It is programmed to 7D if a larger number is set on the switches.

■ NETWORK SLOTS ON THE BASE

Mount the Network Module to the dedicated slot on the base.

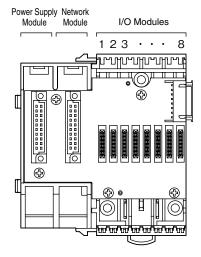
• R6x-BSA

The I/O and the power (model: R6x-PF1) modules can be positioned freely on whichever among the slots 1 through 8. Set a module address to each I/O module.

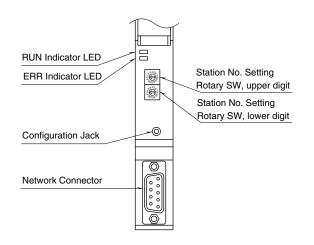


• R6x-BSB

The power module (model: R6-PSM) should be located on the extreme left, the I/O modules can be positioned freely on whichever among the slots 1 through 8. Set a module address to each I/O module.



COMPONENT IDENTIFICATION



■ PROFIBUS INTERFACE

PIN NO.	SIGNAL	SIGNIFICANCE
1	NC	Not used
2	NC	Not used
3	B_ine	Network, B-line
4	RTS	RTS signal
5	GND	0V
6	P5V	5V
7	NC	Not used
8	A_line	Network, A-line
9	NC	Not used
	-	

■ FRONT ROTARY SW

• Station No.: SA1, SA2

Station No. is set in Hexadecimal. (Setpoint adjustment: 00 - 7D)

■ INDICATOR LED

ID	STATE	EXPLANATION	
	Green ON	Transmitting	
RUN	Green blinking	Data hold	
RUN	OFF	Communication error	
	Red ON	Hardware error	
	OFF	Normal operating Transmitting	
ERR	Green ON/ blinking	I/O module error	
	Red ON	No master	
	Red blinking	Address error	

PC CONFIGURATOR

With configurator software, settings shown below are available. Refer to the software manual of R6CON for detailed operation.

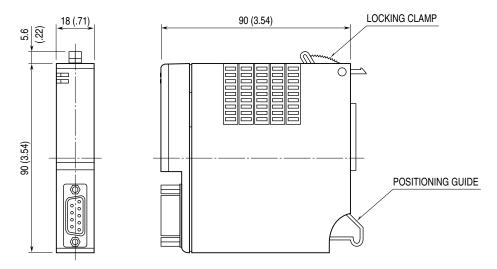
■ INTERFACE MODULE SETTING

PARAMETER	AVAILABLE RANGE	DEFAULT SETTING
Card map	1 to 31	1 to 31

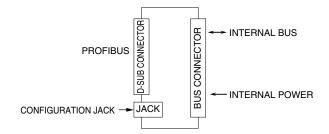
TERMINAL CONNECTIONS

Connect the unit as in the diagram below.

■ EXTERNAL DIMENSIONS unit: mm (inch)



■ CONNECTION DIAGRAM



I/O DATA DESCRIPTIONS

• 16-bit Analog Data

0 to 100% of the selected I/O range is converted into 0 to 10000 (binary).

With °C temperature unit, raw data is multiplied by 10. For example, 25.5°C is converted into 255.

With °F temperature unit, the integer section of raw data is directly converted into the data. For example, 135.4°F is converted into 135.

Negative values are represented in 2's complements.



Discrete Data

