MITSUBISHI

A8GT-RS4-EU
Serial Communication Module

Mitsubishi Graphics Operation Terminal
User's Manual

Thank you for choosing the Mitsubishi General Purpose PC MELSEC-GOT series. To ensure correct use of this equipment, please read this manual carefully before operating it.

GOT MELSEC

IB(NA)-66702-A (9607) MEE

Related Manuals

The following manuals are available for this equipment. Refer to the table given below to choose suitable manuals.

Related Manual

Manual Name	Manual No. (Type Code)
Model A870GOT Graphic Operation Terminal EMC Specification Compatible Product Addition Instruction Manual (Packaged with the A870GOTEMC specification compatible product)	IB-66699 (13J861)
Model A870GOT Graphic Operation Terminal User's Manual (Packaged with the A870GOTEMC specification compatible product)	IB-66628 (13J830)
Model A8GT-STN/EL-BOX-EU EMC Box User's Manual (Packaged with the EMC Box)	IB-66703 (13J865)

Model Name	A8GT-RS4-EU-U-E
Model Name Code	13J864

● Precautions Regarding Safety ●

(Please read carefully before using your equipment)

When using this product, please read the manuals that are supplied with each of the products, as well as any related manuals available as supplementary manuals. Make sure careful attention is paid to safety, and that the equipment is handled correctly.

These precaution items only apply to this product. For information regarding safety information for the PC system and Graphics Operation Terminal, please refer to the user's manual for each module.

In this manual, safety precautions concerning more hazardous items are labeled "DANGER", and those concerning more general safety items are labeled "CAUTION".

DANGER : Improper handling could cause hazardous conditions resulting in severe injury or death.

CAUTION : Improper handling could cause hazardous conditions resulting in moderate or light injury, or in physical damage.

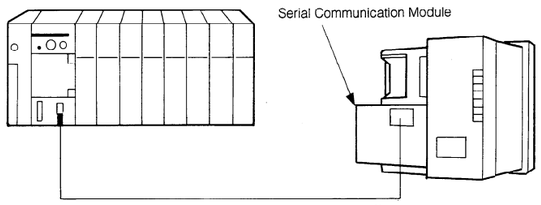
Items marked with an exclamation point in a triangle ⚠ could also cause severe consequences, depending on the circumstances, if not handled properly. They indicate information that should be taken seriously and observed conscientiously.

Manuals supplied with the products should be stored carefully where they can be accessed whenever necessary, and should always be passed on to the end user along with the equipment.

1. Introduction

This manual explains how to handle the model A8GT-RS4-EU Serial Communication Module EMC specification compatible product (hereafter Serial Communication Module).
The Serial Communication Module is an EMC specification compatible product and is the communication module that is required to monitor the following listed A870GOT that are directly connected to the CPU.

A8GT-70GOT-EW-EU A8GT-70GOT-EB-EU
A8GT-70GOT-SW-EU A8GT-70GOT-SB-EU
(Hereafter abbreviated as GOT.)



Point

If a system is configured differently from that described in this manual it will not comply with EMC specifications, so be sure to follow the instructions given in this manual and configure the system using the EMC Box and other MELSEC-GOT series components.
The instructions in this manual do not guarantee that all of the equipment configured with MELSEC-GOT series components, including other electrical components, will comply with EMC specifications.
To check if all the equipment complies with EMC specifications, consult with the manufacturers who produced the equipment.

2. Specifications

Item	Specifications
Type of connection	For CPU direct connection
Power consumption (DC 5V)	70 mA (TYP)
Weight	200g (0.44 lb)

3. Connection Cable

The EMC specification compatible RS-422 connection cables are shown below.
EMC specification compatible RS-422 cable.
Model A8GT-AC30R4-EU RS-422 cable (3 m (118.11 inch))

4. Handling and Installation Method

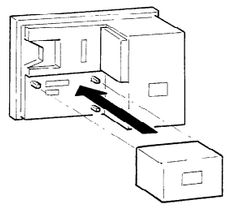
(1) Handling

CAUTION

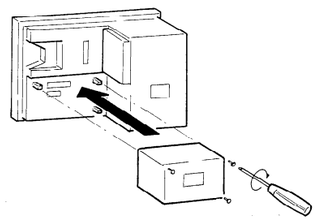
- Use this module in the general specification environment prescribed in the GOT User's Manual.
  If this module is used outside of the general specification environment, electric shock, fire, malfunction or damage and degradation to the product could result.
- Turn the power off when removing a unit. Trying to remove the unit while the power is on could damage the unit or result in erroneous operation.
- Do not bunch the communication cables with the main circuit or power wires, or install them close to each other.
  They should be installed 100 mm(3.94 inch) or more from each other.
  Not doing so could result in noise that would cause erroneous operation.
- Follow the guide when installing the screws in the GOT installation area and conduct the installation using the module fixing screws. If the module is not correctly installed then malfunction or trouble could result or the module could fall off.
- It is necessary to verify the kind of the unit before connecting cable. Do not connect cable to incorrect unit. Doing so could cause trouble.
- Take precautions so that debris, such as sawdust or wiring debris, does not get inside the module. If such debris does get inside it could cause fire, trouble, or malfunction.
- Do not disassemble or modify the module. Doing so could cause trouble, malfunction, injury, or fire.
- Do not directly touch the module's conductive parts or electronic components. Doing so could cause malfunction of or trouble in the module.
- The module is made of plastic so do not drop it or subject it to strong impacts. Doing so could cause trouble.
- Do not remove the module printed circuit boards from the case. Doing so could cause trouble.
- When discarding the product treat it as industrial waste.

(2) Installation method

① Follow the screw guides and insert the Serial Communication Module into the GOT installation area.



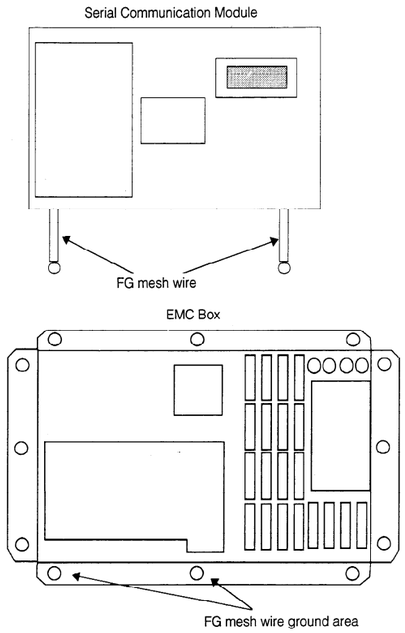
② Correctly install the module by tightening the module fixing screws (3 screws) within the tightening torque range (36 to 48 N · cm (3.7 to 4.9 kg · cm)).

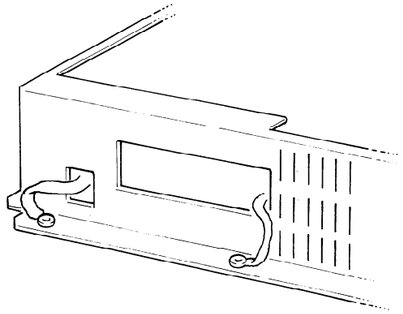


When removing the Serial Communication Module do so in reverse of the procedure shown above.

5. Grounding the GOT + Serial Communication Module

To prevent radiated noise when configuring the GOT with the Serial Communication Module, be sure to ground the serial communication's FG mesh wire to the EMC Box (A8GT-EL-BOX-EU/A8GT-STN-BOX-EU).
The FG mesh wire ground position is the screw holes shown below on the EMC Box.





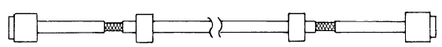
Install the FG mesh wire solderless terminal in the EMC Box's FG mesh wire ground area facing the normal direction.

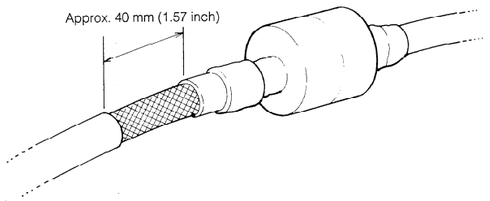
6. Connection cable ground

To prevent radiated noise from the connection cable (Model A8GT-RS4-EU RS-422 cable) between the Serial Communication Module and the PC CPU, the grounds must be connected to the GOT and PC CPU control panels.

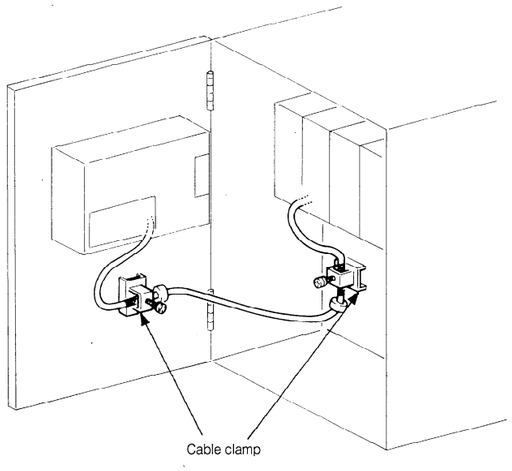
The connection cable grounding procedure is shown below.
When grounding the connection cable to the control panel a cable clamp is required so obtain it separately.

① Peel off the white areas (2 areas) of the connection cable (Model A8GT-RS4-EU RS-422 cable) covering to expose approximately 40 mm(1.57 inch) of the shield mesh.

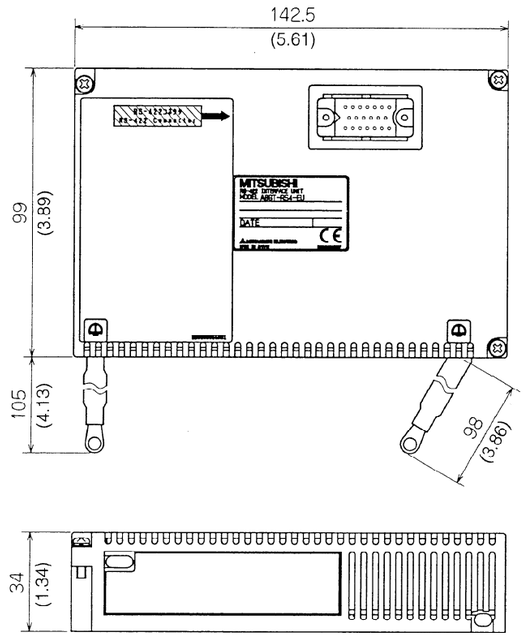




② Choose the respective cable clamps for the control panel in which the GOT is installed and the control panel in which the PC CPU is installed and ground the connection cable.



* The cable clamp used by Mitsubishi Electric for the EMC specification compatibility test is shown below.
· Mitsubishi Electric Model AD75CK cable clamp



Unit : mm (inch)

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