

# Intesis IN485MIT001A000 Prescription Document

Document version: 1.0.0

**Product type:** The IN485MIT001A000 is a BACnet MS/TP and Modbus RTU gateway compatible with Mitsubishi Electric Ecodan air-to-water heat pump systems.

**Manufacturer:** HMS Industrial Networks SLU.

**Product description:** Connect this gateway directly to the Ecodan unit to monitor and control its main functions, such as error monitoring, leak detection, running hours counter, temperature limits for DHW and climate, monitoring of compressor and circulation pump operation, and many more. The gateway configuration is very easy: just set the DIP switches according to your needs. No configuration software or power supply is required.

**Installation:** DIN rail or wall

**Equipment and accessories:** Intesis gateway, installation guide, and Ecodan unit connection cable.

**Standards, guidelines, and certificates:**

- BTL and UL certificate.
- CE conformity to EMC directive (2014/30/EC) and low-voltage directive (2014/35/EC).
- EN 61000-6-3, EN 61000-6-2, EN 62368-1.
- Compliant with RoHS 2 directive (2011/65/EU).

**Main features:**

- BTL mark ensures full interoperability with BACnet devices.
- Supports BACnet MS/TP and Modbus RTU.
- Configuration with onboard DIP switches.
- Quick and easy installation: Set the DIP switches, plug, and play.
- Built-in 120 Ω termination resistor. Bus termination and polarization configurable via DIP switches.
- External power supply not required.
- Simultaneous control of the Ecodan unit via both the remote controller and the BMS (BACnet MS/TP or Modbus RTU).
- Reduced dimensions (HxWxD): 93 x 53 x 58 mm / 3.7 x 2.1 x 2.3".
- Mountable on DIN rail or wall.
- Compatibility with the principal Ecodan system features, including simultaneous control of domestic hot water (DHW) and two climate zones.
- More than 100 communication signals implemented by default that ensure monitoring and control over the main functions of the Ecodan unit.
- Significant reduction of the HVAC system energy consumption.
- Three-year warranty.



**Technical specifications:**

<b>Housing</b>	Plastic, type PC (UL 94 V-0); Color: Light grey. RAL 7035 Net dimensions (DxWxH): 93 x 53 x 58 mm / 3.7 x 2.1 x 2.3"
<b>Weight</b>	85 g / 3 oz
<b>Terminal wiring</b>	Use solid wires or stranded wires (twisted or with ferrule). Wire cross-section/gauge per terminal: One core: 0.2 .. 2.5 mm <sup>2</sup> (24 .. 11 AWG) Two cores: 0.2 .. 1.5mm <sup>2</sup> (24 ,, 15 AWG) Three cores: Not permitted
<b>Mounting</b>	DIN rail or wall
<b>BACnet MS/TP - Modbus RTU port</b>	1 x EIA-485 pluggable terminal block (3 poles: B, A, and SG)
<b>AC unit port</b>	1 x Specific socket
<b>LED indicators</b>	2 x Communication status
<b>DIP switches</b>	SW1: Gateway and baudrate configuration SW2: BACnet/Modbus address and temperature unit SW3: Bus polarization and termination
<b>Operational and storage temperature</b>	OP: 0 .. 70°C / 32 .. 158°F; ST: -20 .. 85°C / -4 .. 185°F
<b>Operational and storage humidity</b>	5 .. 95% RH, non-condensing
<b>Isolation between comm. ports</b>	1000 VDC