KMD-5551E

KMD to BACnet Translator

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DESCRIPTION

The KMC Controls KMD-5551E translator is a gateway for BACnet and KMDigital networks. The translator polls designated KMDigital controllers and adds them as BACnet devices to a virtual BACnet network. The devices on the virtual network can then be discovered and manipulated within a Niagara framework as standard BACnet devices and objects.

Translation Each KMD-5551E translates from one KMDigital Tier 1 network and one KMDigital Tier 2 network. Multiple translators can be added as needed. The KMD-5551E translates between KMDigital input, output, and variable points and BACnet input, output, and value objects.

Diagnostic and Status Displays For network troubleshooting and diagnostics, the translator features BACnet route status, KMDigital status, and HPO output card status.

BACnet Routing The KMD-5551E supports BACnet IP and Ethernet routing. The IP routing is fully compliant with BACnet Standard 134-2012, Annex J.

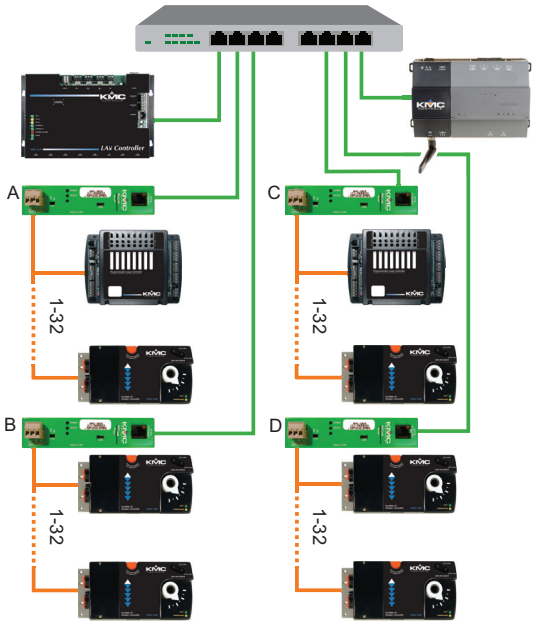
Browser Configuration Configure the KMD-5551E using only an Internet browser. No special software to learn or load.

Flexible Mounting Two mounting choices for permanent installations–DIN rails or surface mount.

Automatically Learns Networks Automatically detects and configures routing for the actual discovered BACnet networks.



KMDigital®
Automation Hardware



Typical translator network configuration

LICENSING

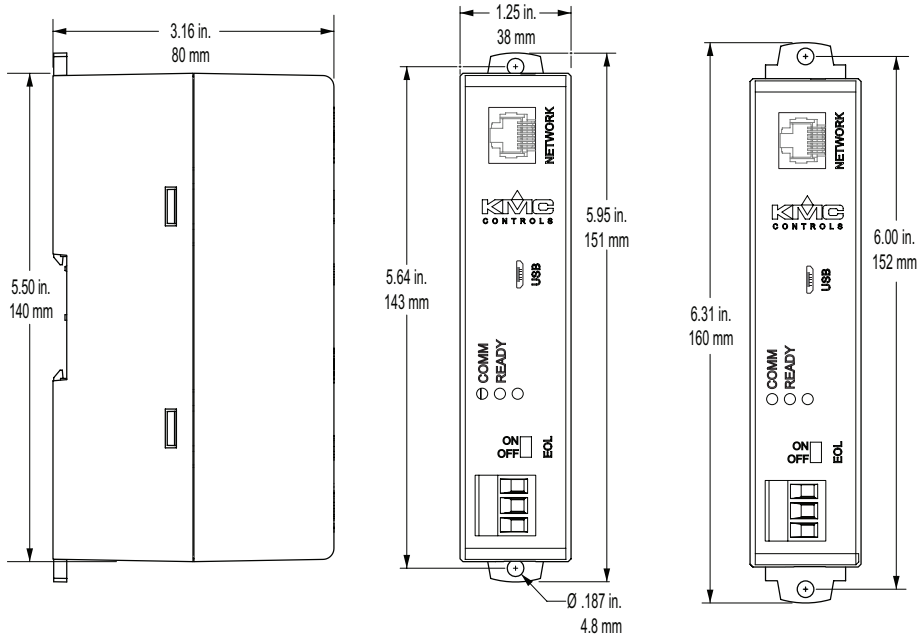
KMD-5551E translators are enabled from a licensed DR-KMD-TRANS module file. Typically, the module file is added to a station running on a JACE, but it can also be added to Niagara supervisor. All KMD-5551E translators discovered by the station are enabled from the same licensed module.

MODEL

DESCRIPTION	MODEL
KMDigital to BACnet Translator	KMD-5551E
License for a single station. A Host ID is required to activate the license.	DR-KMD-TRANS

SPECIFICATIONS

Dimensions



Configuration Tools

All configuration is performed using only internally served browser pages. Requires HTML5 compliant versions of Microsoft Internet Explorer, Chrome, or Firefox.

BACnet Routing Protocols

- One BACnet Ethernet port
- One IP port that can be set up for any of the following protocols:
  - Normal BACnet IP network routing
  - BACnet broadcast management device with network and port address translation
  - Foreign device registration with BACnet broadcast management devices (BBMD)
  - PAD (packet assembling/disassembling) routing

Compatibility

Compatible with Niagara 3.8 and later and the following KMDigital controllers:

Tier 1 controllers

- KMD-5205 series
- KMD-5210 series
- KMD-5270 series

Tier 2 controllers

- KMD-5800 series
- KMD-7000 series
- KMD-7300 series
- KMD-7400 series

Tier 2 controllers (obsolete)

- KMD-5500series
- KMD-6000series
- KMD-6100 series
- KMD-6300 series
- KMD-6400 series
- KMD-6900 series

Hardware Features

Processor and Memory

Processor	32-bit ARM® Cortex-M4
Memory	Configuration parameters and diagnostics are stored in nonvolatile memory; auto restart on power failure

Indicators

- Power
- KMD Tier 2 communication
- Ethernet status

Network connections

BACnet Ethernet and IP

10/100BaseT, RJ-45 connector

KMDigital Tier 2

- One Tier 2 port, supports speeds up to 38,400 baud
- Removable three-screw terminal block, 12–22 AWG wire
- Switched end-of-line termination

USB

USB micro B connection for power and communication to use as a service tool

Installation

AC supply voltage	24 volts AC (–15%, +20%), 50/60 Hz, Class 2 only; non-supervised All circuits, including supply voltage, are power limited circuits.
DC supply voltage	24 volts DC (–15%, +20%) 5 volts DC through USB connection for temporary service connection
Required power	8 VA

Enclosure and Mounting

Weight	5.3 ounces (149 grams)
Case material	Green and black flame retardant plastic
Mounting	Surface mount or 35 × 7.5 mm DIN rail

Environmental Limits

Operating	32 to 120° F (0 to 49° C)
Shipping	–40 to 160° F (–40 to 71° C)
Humidity	0 to 95% relative humidity, non-condensing

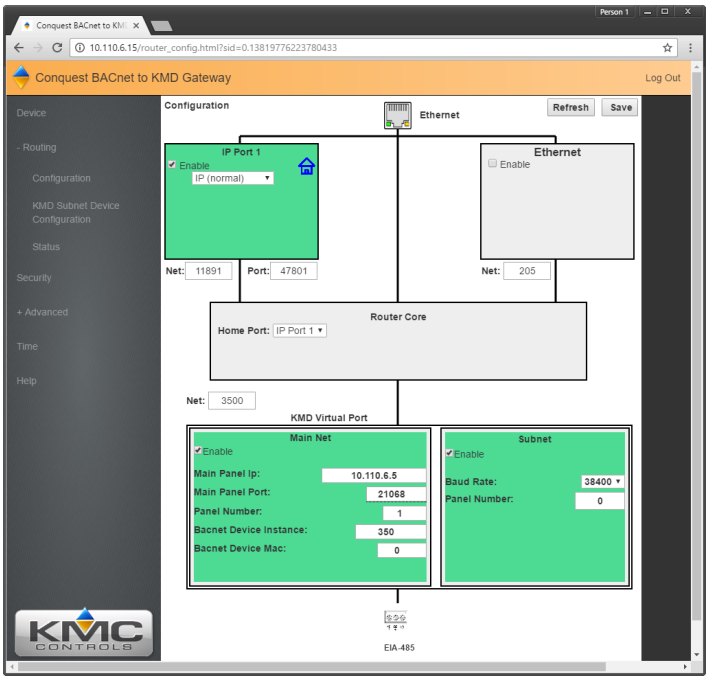
Timekeeping

The translator is a BACnet time master device that can maintain time with or without an SNTP server. Time messages can be broadcast daily, weekly, or monthly to all or selected networks. Time messages are formatted as UTC, local, or both.

Agency and Regulatory Approvals

UL	UL 916 Energy Management Equipment
RoHS	RoHS compliant (pending)
CE	CE compliant
FCC	FCC Class A, Part 15, Subpart B and complies with Canadian ICES-003 Class A*

*This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.



Network configuration page

ACCESSORIES

KMD-5567	MS/TP network surge suppressor
XEE-6111-050	50 VA, single-hub transformer
XEE-6112-050	50 VA, dual-hub transformer
HPO-5551	Conquest router tech cable kit Includes USB, Ethernet, and MS/TP to NetSensor cables
HSO-9001	Ethernet patch cable, 50 feet
HSO-9011	Ethernet patch cable, 50 feet, plenum rated

SUPPORT

Additional resources for installation, configuration, application, operation, programming, upgrading and much more are available on the web at **www.kmccontrols.com**. To see all available files, log-in to the KMC Partners site.

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