DATASHEET

Generic ASCII Ethernet Communication Module
MVI56-GEC

The MVI56 Generic ASCII Ethernet Interface module is designed to allow ControlLogix processors to interface easily with ASCII devices using the TCP/IP protocol. Compatible devices may be either ASCII instruments with built-in Ethernet or Ethernet connection via a thin server to the existing ASCII device.

Five servers and Clients are present on the module permitting both the reception and transmission of data between the processor and attached devices.

General Specifications

- Single Slot - 1756 backplane compatible

- The module is recognized as an Input/Output module and has access to processor memory for data transfer between processor and module.

- Ladder Logic is used for data transfer between module and processor. Sample ladder file included.

- Configuration data obtained from configuration text file downloaded to module. Sample configuration file included

- Local or remote rack

Functional Specifications

- Five Servers and five Clients to receive and/or transmit data
- 10/100 Base-T Ethernet-compatible interface
- Configurable parameters
    - Service port number
    - Connection timeout
    - Close type

- Simple ladder logic operation
- Setup and monitoring through RS-Logix 5000 software and user-constructed configuration file (GEC.CFG)
- ControlLogix backplane interface via I/O access
- Each Server monitors
    - State
    - IP and port number of connected Client
    - Error codes

- Each Client monitors
    - State
    - IP and port number of connected Server
    - Message related parameters

- ASCII character strings up to 2048 characters in length supported
- Full hardware handshaking control, providing radio, modem, and multi-drop support
- User-definable module memory usage, supporting the storage and transfer of up to 4000 bytes to/from the control processor
- Module error and status conditions returned to processor for diagnostic purposes
    - Module status
    - Port error status word (bit mapped)
    - Port receive state
    - Port receive character count
    - Port receive block count
    - Port transmit state
    - Port transmit character count
    - Port transmit block count

- All data related to the module is contained in a single controller tag with defined objects to simplify the configuration, monitoring, and interfacing with the module
- Module configuration and communication configuration data is transferred to the MVI56-GEC via a pre-defined user data type in the processor

Hardware Specifications

Specification	Description
Backplane Current Load	800 mA @ 5 Vdc 3 mA @ 24 Vdc
Operating Temperature	32°F to 140°F (0° C to 60°C)
Storage Temperature	-40°F to 185°F (-40° C to 85°C)
Shock	30 g operational 50 g non-operational Vibration: 5 g from 10 Hz to 150 Hz
Relative Humidity	5% to 95% (with no condensation)
LED Indicators	Module Status Backplane Transfer Status Application Status Serial Activity
Application port (Ethernet)	
Ethernet Port (Ethernet modules)	10/100 Base-T RJ45 Connector Link and activity LED indicators Electrical Isolation 1500 V rms at 50 Hz to 60 Hz for 60 s, applied as specified in section 5.3.2 of IEC 60950: 1991 Ethernet Broadcast Storm Resiliency = less than or equal to 5000 [ARP] frames-per-second and less than or equal to 5 minutes duration
Shipped with Unit	RJ45 to DB-9M cables for each port 6-foot RS-232 configuration cable
Debug/Configuration port (CFG)	
CFG Port (CFG)	RJ45 (DB-9M with supplied cable) No hardware handshaking

Agency Approvals & Certifications

Please visit our website: www.prosoft-technology.com