

LINK – Fiber Optic Based Drive and Process Control System

LINK is an ultra high speed distributed drive control system. It enables all machine control elements including variable speed drives, operator controls and plant I/O to be networked together to provide integrated machine control of unrivalled flexibility.

Communication speeds of 2.7Mbaud allows LINK to operate a real time, event driven, deterministic network. Each control element of the machine or process is interconnected on a single, noise immune, fiber optic cable, which replaces the myriad of control wires traditionally associated with multi-drive systems. Typically savings of 50% in site cabling time and cost are possible with LINK compared to a standard wired system.

Each LINK system may comprise any combination of Eurotherm Drives sensorless and closed loop AC drives (690+, 605 and 620 series) or DC drives (590+ series). Digital and analog plant equipment can be interfaced onto the network via local or distributed I/O modules and a variety of gateway devices allow seamless integration with PC based control and monitoring packages.

The major component parts of a LINK control system are described below. There are however many other interface and peripheral components available that make LINK the world's most flexible control system, so please contact your nearest Eurotherm Drives sales outlet to discuss your application in detail.

TOTAL CONFIGURABILITY FOR THE MOST ADVANCED MULTI-DRIVE SYSTEMS

NOISE IMMUNE FIBER OPTIC BASED HIGHWAY

REAL TIME PEER TO PEER COMMUNICATIONS

FIELDBUS COMPATIBILITY

MODEM REMOTE ACCESS CAPABILITY

AC AND DC NETWORKED DRIVES

L5300 LinkRack

This high speed intelligent controller forms the heart of a LINK system. There are 4 slots that accommodate any of the plug-in modules below in addition to the main processor and power supply (single phase 85-265Vac). The L5300 has been designed for DIN Rail or direct panel mounting.

L5392 LinkStation

The L5392 is a touch-sensitive, color LCD operator station with provision (in the rear of the unit) for 4 option module slots. The multi-page operator screens are software configurable into 6 bands each grouping any combination of the following.

- Operator pushbuttons, each independently configurable
- Potentiometers, displaying and setting setpoint and feedback variables
- Indicators, displaying variables only
- Machine status and alarm indicators

L5331 Digital I/O LinkCard

16 x 24V channel digital input/output module. Each channel can be independently configured as an input or output. All terminals are plug-in and easily accessed on the front of the module and have LED indication of the "ON" state. A high speed counter for encoder or other pulse inputs is available.

L5341 Analog I/O LinkCard

8 x Input and 2 x Output analog module. Each channel is bipolar with 14 bit (13 bit + sign) resolution. +10V and -10V power supply outputs are provided for use with external devices including potentiometers and transducers. All terminals are disconnectable plug-in types.

L5311 RTN Fiber Optic LinkCard

Provides input and output connections for the acrylic fiber optic link.

L5202 Remote Digital I/O Module



L5201 Remote Analog I/O Module





LINK High Speed Drive Control System

L5351 Devicenet LinkCard

Enables LINK to be interfaced into a Devicenet based system.

L5353 Profibus LinkCard

Enables LINK to be interfaced into a Profibus based system.

L5321 Serial Link/Modbus LinkCard

Enables LINK to be interfaced to Modbus or other serial protocol systems.

L5201 Remote Analog I/O Unit

Remote module providing 5 x analog inputs and 1 x analog output plus fiber optic interface. Particularly useful for distributed control around the machine or process.

L5202 Remote Digital I/O Unit

Remote module providing 12 x independently configurable 24V digital inputs or outputs plus fiber optic interface. Particularly useful for distributed control around the machine or process.

L5204 DDE Interface

DDE Interface module that opens the LINK network to any Windows based application including SCADA packages.

L5510 Universal Gateway

Universal gateway to additional Bus standards including Data Highway, Ethernet and VME.

DRIVE SYSTEM DESIGNER - Revolutionary System Design Software

Drive System Designer ("DSD") is like no other drive software. With the Auto Configure option, it actually designs the drive control system for you! You simply enter basic data on your process (line speed, web tension etc) and identify the function of each drive (unwind, nip roll etc) and DSD does the rest by selecting and configuring all the LINK hardware and software. Full details on this unique software package are on page 34.