*Danfoss*

Fact Sheet

# VLT® PROFINET MCA 120

**Ordering number**

Standard        130B1135
Coated          130B1235

# MRP

**support for high availability**

## PROFINET®

## PI CERTIFIED ✓
**PROFIBUS · PROFINET**

**PROFIsafe**

The VLT® PROFINET MCA 120 offers connectivity to PROFINET based networks via the PROFINET Protocol.

PROFINET was introduced in 2003 and is today a proven and complete industrial Ethernet network solution available for manufacturing automation. PROFINET is a member of a family of networks that implement the PROFINET protocol at its upper layers.

PROFINET encompasses a suite of messages and services for a variety of manufacturing automation applications, including control, configuration and information.

The option is able to handle a single connection with an Actual Packet Interval down to 2 ms in both directions, positioning it among the fastest performing PROFINET devices in the market.

## Other features

Built-in web server for remote diagnosis and reading out of basic drive parameters. An e-mail notificator can be configured for sending an e-mail message to one or several receivers, if certain warnings or alarms occur, or have cleared again.

The plug and play option can be installed in VLT® AutomationDrive, VLT® HVAC Drive, VLT® Refrigeration Drive and VLT® AQUA Drive.
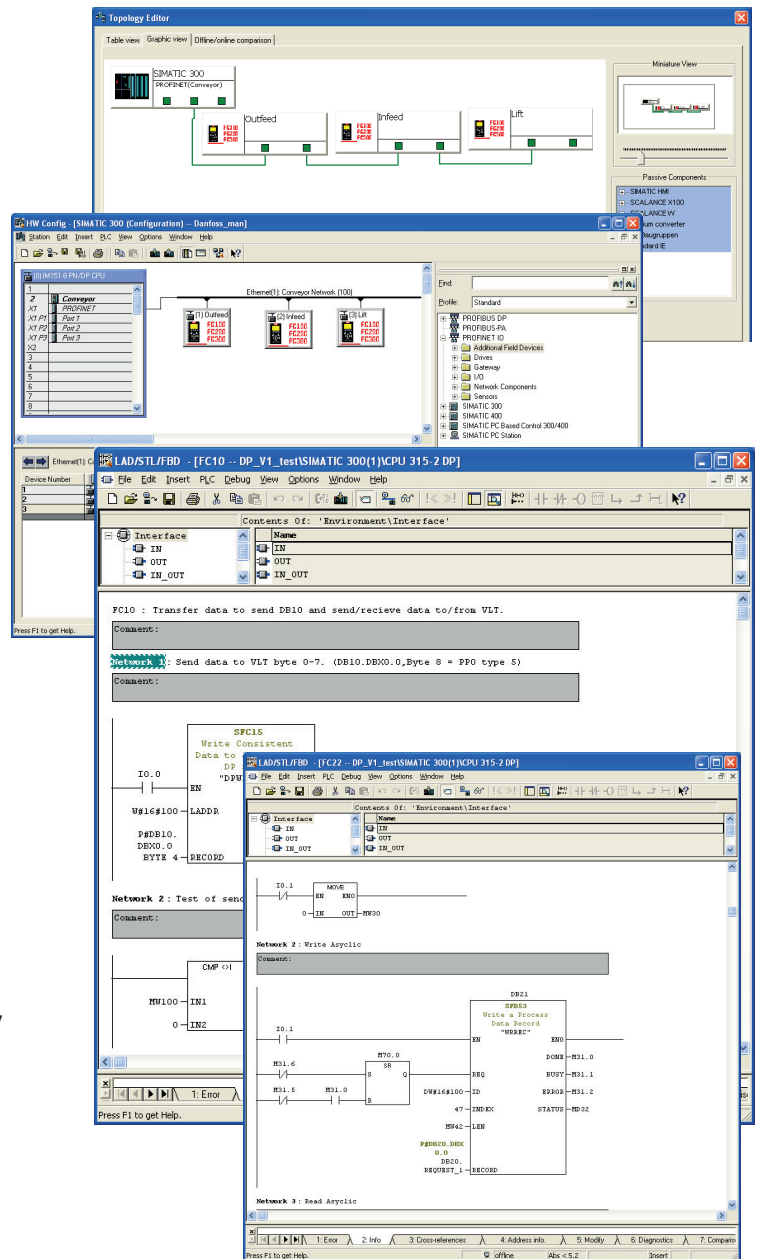
## Application protocols

- PROFINET for controlling and parameter setting
- DCP (Discovery and Configuration Protocol) for configuring network related settings
- LLDP (Link Layer Discovery Protocol) for topology recognition and initial settings of communication parameters
- HTTP (Hypertext Transfer Protocol)for diagnosis via built-in web server
- SMTP (Simple Mail Transfer Protocol) for e-mail notification
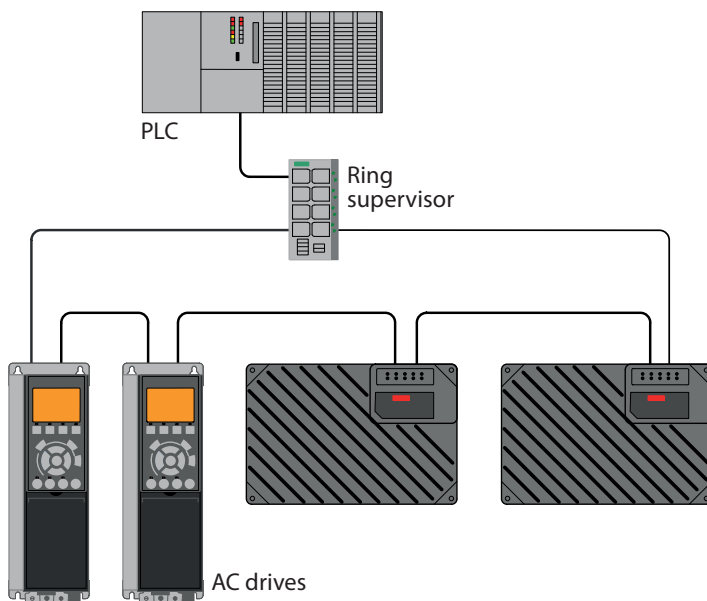- TCP/IP for easy access to Drive configuration data from VLT® Motion Control Tool MCT 10

| Feature | Benefit |
|---|---|
| Connectivity to PROFINET based networks | Connects to Siemens S7, PC7 PLC systems and to various SCADA system |
| Actual Packet Interval (API) down to 2 ms | High performance |
| Built-in web server | Remote diagnosis and reading out of basic drive parameters |
| E-mail notificator | Notifies if warnings or alarms occur |
| Two Ethernet ports with built-in switch | • Simple cabling<br>• No need for expensive switches or hubs |
| Certification | Option tested at third party laboratory guarantees interoperability and observance of standards |
| Same option for all power sizes | Low learning curve and reuse of PLC program |
| MRP (Media Redundancy Protocol) ring topology | High availability |
| PROFIsafe | Reduced wiring, flexible configurations, easy and cost-effective system design |

The VLT® PROFINET MCA 120 uses standard function calls and system features. This allows the user to build the PLC program on well-tried PLC functionality.

The VLT® PROFINET MCA120 supports the network topology view in the PLC programming tool.

## Media Redundancy Protocol (MRP) topology

PLC

Ring supervisor

AC drives