

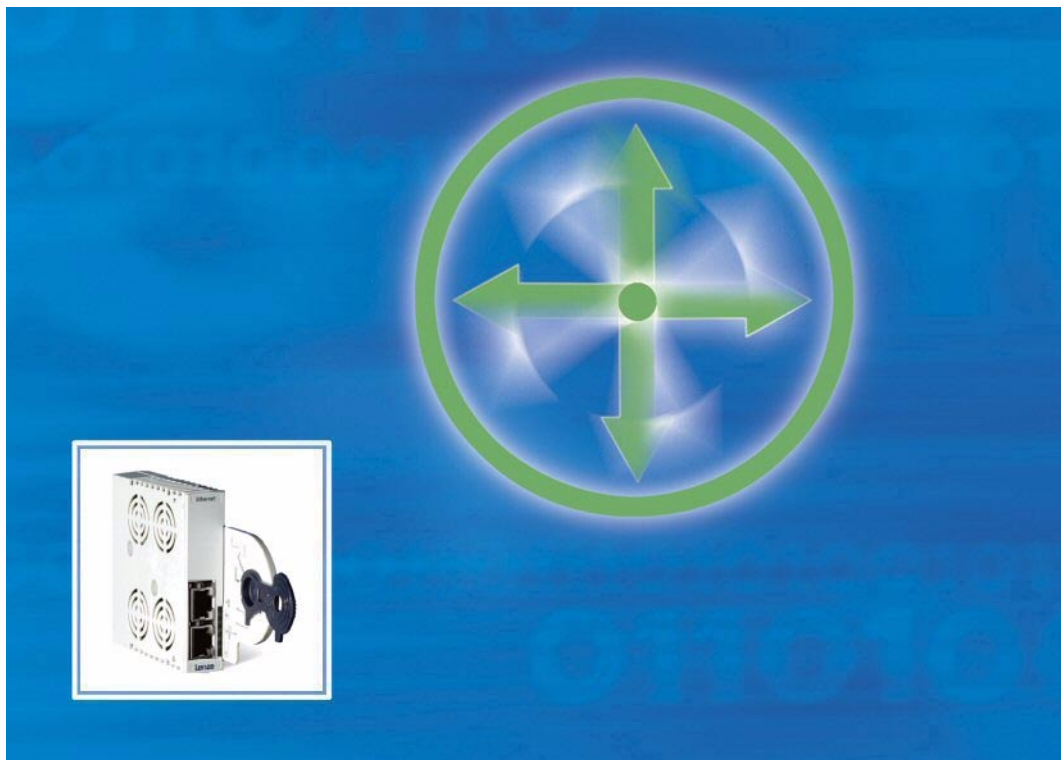
EDS94AYCEN
13416838

L-force *Communication*



Communication Manual

9400



E94AYCEN

Ethernet communication module

Lenze

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1 About this documentation

Contents

The descriptions in this documentation only refer to the E94AYCEN communication module (Ethernet).



Note!

This documentation supplements the **mounting instructions** supplied with the communication module and the **Servo Drives 9400 hardware manual**.

The mounting instructions contain safety instructions that must be observed!

The features and functions of the Ethernet communication module are described in detail. Examples illustrate typical applications.

This documentation furthermore contains:

- ▶ Safety instructions that must be observed
- ▶ The basic technical data of the communication module
- ▶ Information on versions of the Lenze standard devices to be used
- ▶ Notes on troubleshooting and fault elimination

The theoretical context is only explained as far as it is required for understanding the function of the communication module.

This documentation does not describe the software of another manufacturer. No guarantee can be given for corresponding information in this documentation. Information on the use of the software can be found in the documents for the host system (PLC, scanner).

All brand names mentioned in this documentation are trademarks of their corresponding owners.

Screenshots/application examples

All screenshots in this documentation are application examples. Depending on the firmware version of the field devices and the software version of the installed engineering tools (»Engineer«, »Network Analyzer«), the screenshots in this documentation may differ from the screen representation.

Target group

This documentation addresses to persons who configure, install, commission, and maintain the networking and remote maintenance of a machine.



Tip!

Current documentation and software updates for Lenze products can be found in the download area at:

www.Lenze.com

Validity information

The information in this documentation applies to the following devices:



| Extension module | Type designation | From hardware version | From software version |
|-------------------------------|------------------|-----------------------|-----------------------|
| Ethernet communication module | E94AYCEN | VC | - |

1.1 Document history

| Version | | | Description |
|---------|---------|------|--|
| 1.0 | 11/2004 | TD06 | First edition |
| 2.0 | 03/2005 | TD06 | Description of the GCI protocol added |
| 3.0 | 03/2005 | TD06 | Description of displays added |
| 4.0 | 10/2006 | TD06 | General revision |
| 5.0 | 11/2007 | TD17 | General revision and provision of the documentation in the form of the »Engineer« online help |
| 6.0 | 11/2008 | TD17 | Revision for hardware version VC (2-port Ethernet) |
| 7.0 | 06/2009 | TD17 | Update of the description for the configuration of the communication module with the »Engineer«. |
| 8.0 | 07/2010 | TD17 | General revision |
| 9.0 | 09/2012 | TD17 | <ul style="list-style-type: none">• Revision of the telegram description in chapter Parameter data transfer (38).• Parameter reference (54) supplemented. |

1.2 Conventions used

This documentation uses the following conventions to distinguish different types of information:

| Type of information | Identification | Examples/notes |
|---------------------------|---|--|
| Numbers | | |
| Decimal | Standard notation | Example: 1234 |
| Hexadecimal | 0x[0 ... 9, A ... F] | Example: 0x60F4 |
| Binary • Nibble | In inverted commas Point | Example: '100' Example: '0110.0100' |
| Decimal separator | Point | In general, the decimal point is used. Example: 1234.56 |
| Text | | |
| Program name | » « | PC software Example: Lenze »Engineer« |
| Control element | Bold | The OK button... / The Copy command... / The Properties tab... / The Name input field... |
| Hyperlink | <u>Underlined</u> | Optically highlighted reference to another topic. In this documentation activated via mouse-click. |
| Icons | | |
| Page reference |  8 | Optically highlighted reference to another page. In this documentation activated via mouse-click. |
| Step-by-step instructions |  | Step-by-step instructions are marked by a pictograph. |

1.3 Terminology used

| Term | Meaning |
|-----------------|--|
| Drive | Lenze controllers of the "Servo Drives 9400" series |
| Standard device | |
| »Engineer« | Lenze PC software supporting you for the "Engineering" (parameterisation, diagnostics, and configuration) during the whole life cycle, i. e. from the design to the maintenance of the machine commissioned. |
| Code | Parameter which serves to parameterise and monitor the drive. In normal usage, the term is usually referred to as "Index". |
| Lenze setting | This setting is the default factory setting of the device. |
| Basic setting | |
| HW | Hardware |
| SW | Software |
| PLC | Programmable Logic Controller (PLC) |
| Use DHCP | Dynamic Host Configuration Protocol |

1.4 Notes used

The following signal words and symbols are used in this documentation to indicate dangers and important information:

Safety instructions

Layout of the safety instructions:



Pictograph and signal word!

(characterise the type and severity of danger)

Note

(describes the danger and suggests how to prevent dangerous situations)

| Pictograph | Signal word | Meaning |
|------------|-------------|---|
| | Danger! | Danger of personal injury through dangerous electrical voltage Reference to an imminent danger that may result in death or serious personal injury if the corresponding measures are not taken. |
| | Danger! | Danger of personal injury through a general source of danger Reference to an imminent danger that may result in death or serious personal injury if the corresponding measures are not taken. |
| | Stop! | Danger of damage to material assets Reference to a possible danger that may result in damage to material assets if the corresponding measures are not taken. |

Application notes

| Pictograph | Signal word | Meaning |
|------------|-------------|---|
| | Note! | Important note to ensure trouble-free operation |
| | Tip! | Useful tip for easy handling |
| | | Reference to other documentation |