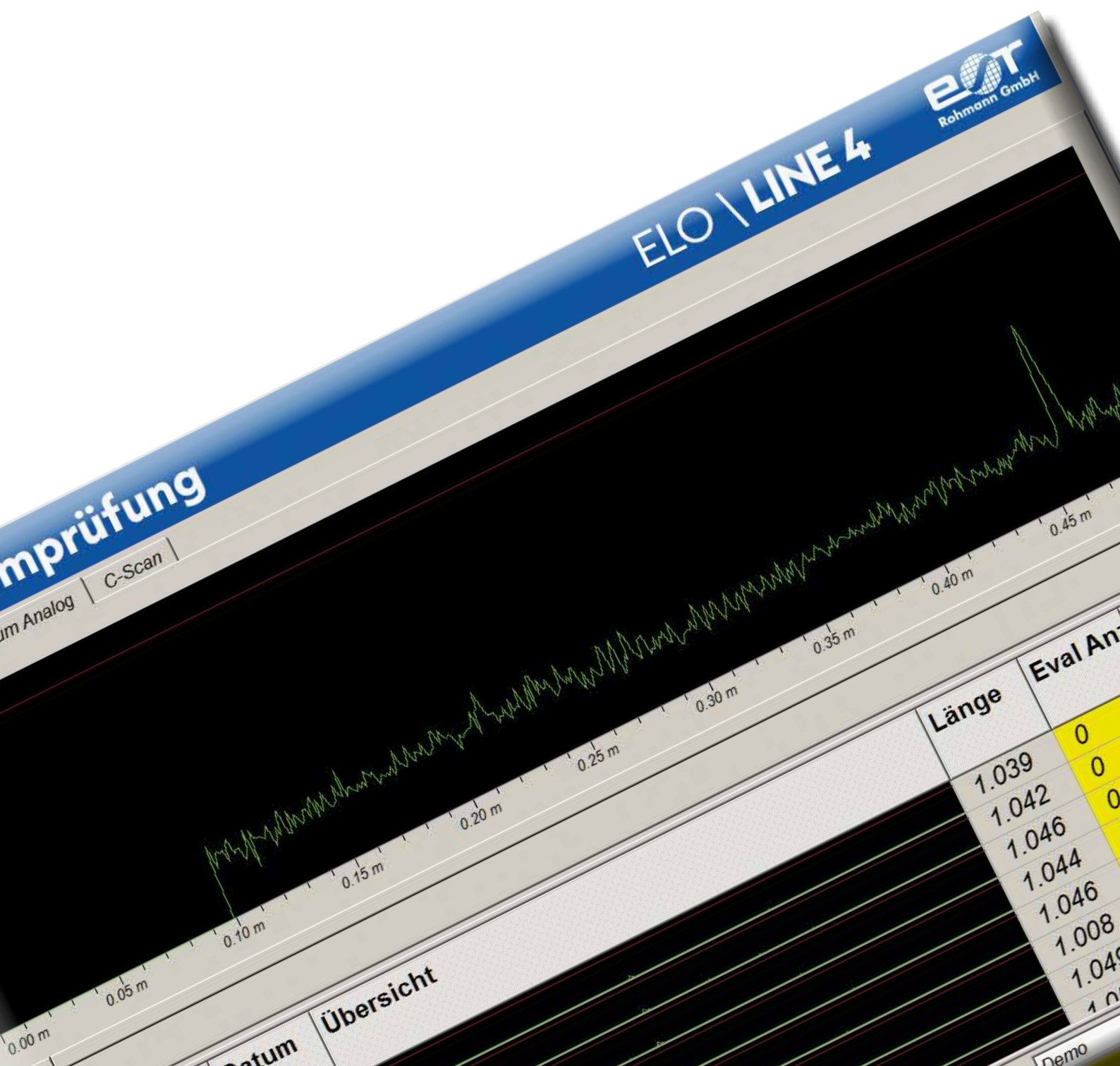


ELO \ LINE

Software for recording inspection results of long products



ELO\LINE

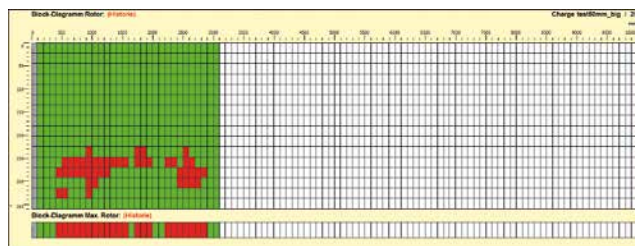
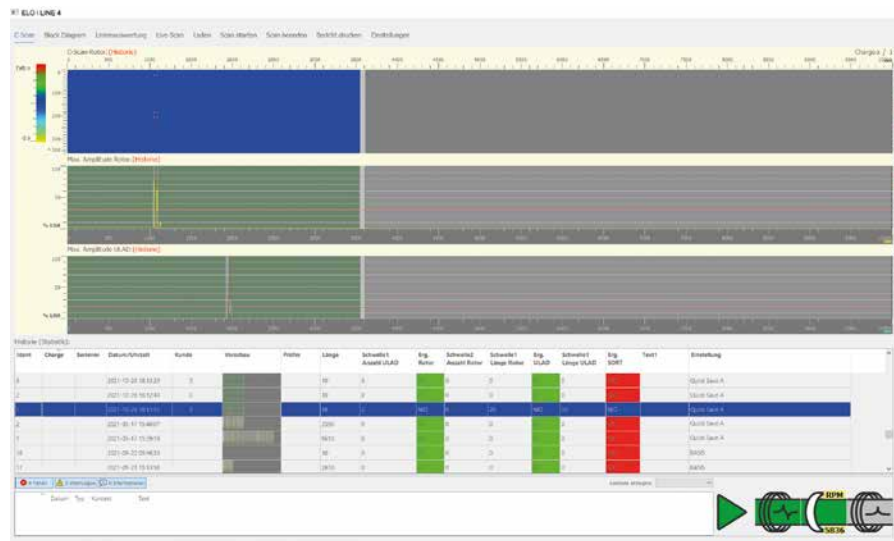
ELO\LINE 4 – Eddy Current inspection of long products

The software serves for visualizing and recording the results of the Eddy Current inspection of long products.

It supports inspection with simple encircling coils up to complex multichannel rotor or multiplex sensor array applications.

The application range of the ELO\LINE software covers the inspection of various long products such as bars, tubes, profiles and rails. The inspected areas are plotted and any detected anomaly is recorded at its actual location. It is possible to switch over at any moment from the current inspection to prior inspection results contained in the data base. A flexible zoom function makes it possible to view even small details.

Several inspection channels can be processed at the same time and aggregated in an overall result. A report on the inspection can be printed afterwards for every inspection or for entire batches.



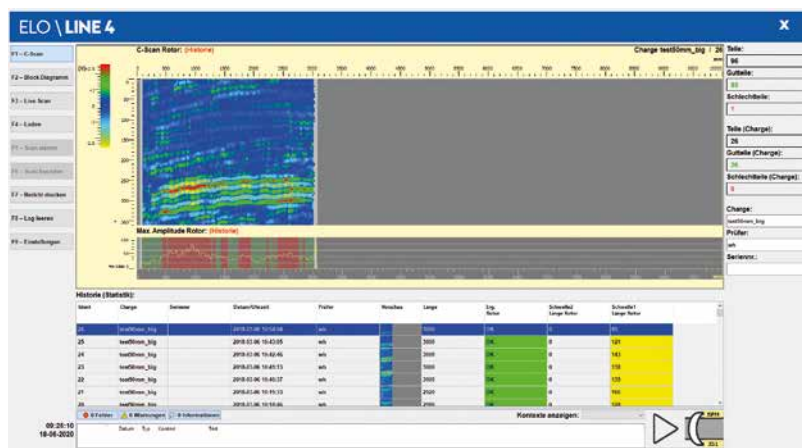
ELO\LINE block diagram

Evaluation and presentation on the computer

ELO\LINE evaluates the inspection data recorded by the ELOTEST Eddy Current inspection instrument and displays the results on the screen of the evaluation computer. The inspection can be displayed as a block diagram or as an amplitude display including C-Scans.

The information on the batch and serial numbers, the name of the customer and the inspection and the four free text fields can be directly transmitted to ELO\LINE by a PLC via Profibus or Profinet. In this case, the operator does not have to make any entries.

The inspection result is stored in a database, while the inspection data are compressed and stored in a file in TIFF format. This makes it possible to display them as an image on any computer.

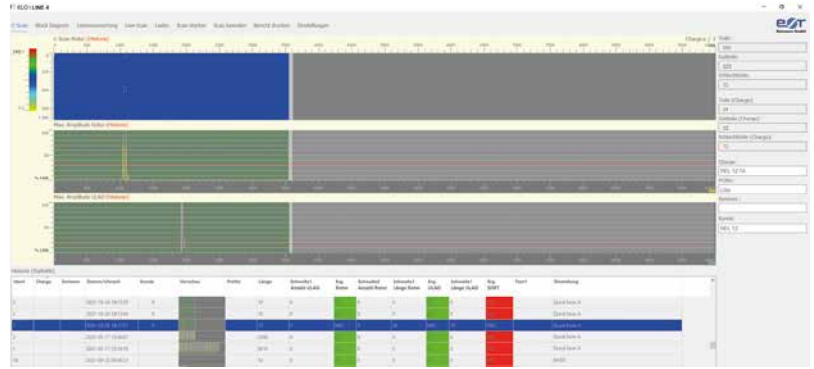


C-Scan and y/s Eddy Current signal display

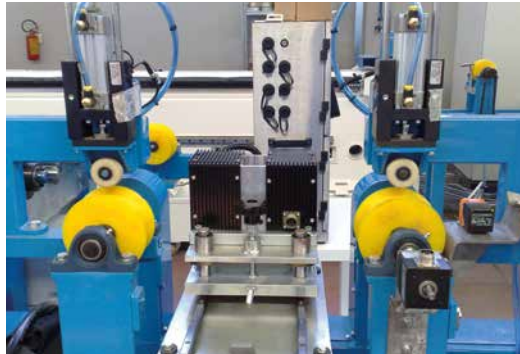
User interface of the ELO\LINE-Software

The software starts with a main screen in full screen mode. The control buttons are at the top. The display of the signals as C-Scans or a y/s Eddy Current signal display is in the center. Any information on the batch, the serial number, the inspector etc. is shown on the right. The lower section displays the history of the inspections conducted so far.

The application messages and the status indications of the process stations are displayed in the status area below.



ELO\LINE 4, Main screen



ELO\LINE Application examples

Important functions of the ELO\LINE-Software

DB BACKUP

The inspection results contained in the database can be deleted automatically after an adjustable time or number. The files can be archived by the client according to the requirements of data storage and software routines of the client, before they are deleted.

DB EXPORT

When a complete batch has been inspected, it can be exported by ELO\LINE to a database structure, which is ideally suited for archiving.

DB INFORMATION

- ▷ Consecutive inspection part number (ID)
- ▷ Batch or order designation
- ▷ Serial number
- ▷ Name of the customer
- ▷ Name of the inspector
- ▷ Inspection date and time
- ▷ Length of the inspected part
- ▷ Information on the number and total lengths of the possibly defective points for every inspection function
- ▷ Previews of the block diagram, the C-Scan and the maximum amplitude graph. In addition, the last two displays of any inspection are stored as an individual file.
- ▷ 4 free text fields (only via PLC)

The ELO\LINE Office version, available on request, makes it possible to open any ELO\LINE database containing prior inspection results. This software can be installed on a computer with Windows 10 (64 Bit) without being connected to the inspection system.

PC OFFICE

ELO\LINE-Software – documentation of the inspection results

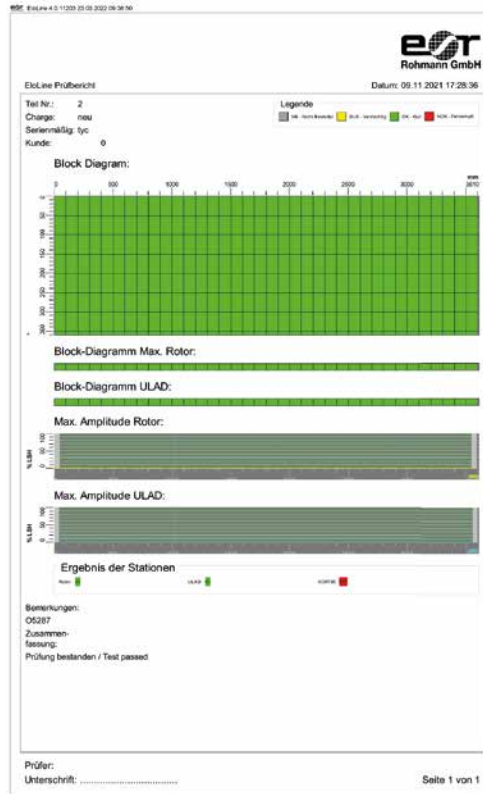
The ELO\LINE software provides different possibilities for recording the inspection results. Both a detailed inspection report for every single inspected part and a report for a specific batch can be printed out.

The operator can enter comments or a summary before printing (as a PDF file or as a direct printout).

The detailed inspection report contains the information on one specific inspected part, including the printout of the amplitude displays or block diagrams.

The contents of the batch report can be very easily changed in many different ways: the choice ranges from printing out a single statistic (number of inspected parts with and without possibly defective points) up to the complete list of all inspected parts with all database details such as the number and total lengths of the possibly defective points for every inspection station.

ELO\LINE can be configured to document and print any modification of specific inspection parameters. This means that the supervised parameters of the ELOTEST Eddy Current inspection instrument are traceable for any inspected part at any time.



Technical Data

SYSTEM REQUIREMENTS

- ▷ Windows 10, 64 Bit
- ▷ CPU: i5, better i7 or similar CPU
- ▷ 8 GByte RAM
- ▷ Screen 1920 x 1080 Pixel (Full-HD)
- ▷ Two 1 GBit Ethernet cards for ELOTEST PL600 and network connection
- ▷ A third 1 Gbit card for the Profinet communication or special hardware for the Profibus connection
- ▷ At least 500 GByte SSD medium for storing data (no archiving)
- ▷ Local administrator rights are required for installation, normal user rights are sufficient for normal operation.
- ▷ We generally recommend connecting the evaluation computer to the internet, which makes it possible to have TCP/IP based remote access as an option or for servicing purposes.