

## Online-Training - SINAMICS S120 - Diagnostics and Service with STARTER (DR-S12-DG)

### Short Description

In this online course you learn to determine the cause of faults and resolve them. You can also perform changes of the parameterization.

[Also available as face-to-face training](#)

### Objectives

You are responsible for reliable operation of the SINAMICS S120 drive system. If faults occur, then these should be resolved in the shortest possible time and operation resumed.

In this course, you will learn how to correctly and safely handle SINAMICS S120 drives when a fault occurs. Based on various scenarios, you will practice suitable measures such as data backup, replacing components and recommissioning.

After the course, you can determine the cause of faults and resolve them faster. When changes are made to the plant or system, you are also in a position to adapt the parameterization.

### Target Group

Service personnel  
Maintenance personnel

### Content

Design and principle of operation of the SINAMICS S120 converter system:

- Control module, infeed and power units
- Motor, encoder and DRIVE-CLiQ interfaces

Data backup and diagnostics using:

- STARTER software
- BOP operator panel and web server

Determining the signal flow in the setpoint channel

Internal interconnections to PROFIBUS and PROFINET

Procedure when troubleshooting and recommissioning

- Checking the operating state and enable signals
- Analysis of alarms and fault messages
- Read-out of the diagnostics memory
- Tracing signals using the trace function
- Test operation using the control panel and measurement functions

Typical power unit, motor, encoder and cable faults

Procedure when replacing:

- Control module, power unit, motor and encoder
- Components with safety functions Safety Integrated

Practical exercises on remote training equipment with SINAMICS S120 in the booksize format

### Note

Additional information and diagnostics is provided in courses DR-S12-CHA and DR-S12-NET.

### Type

Online-Training

### Duration

5 days

### Language

en