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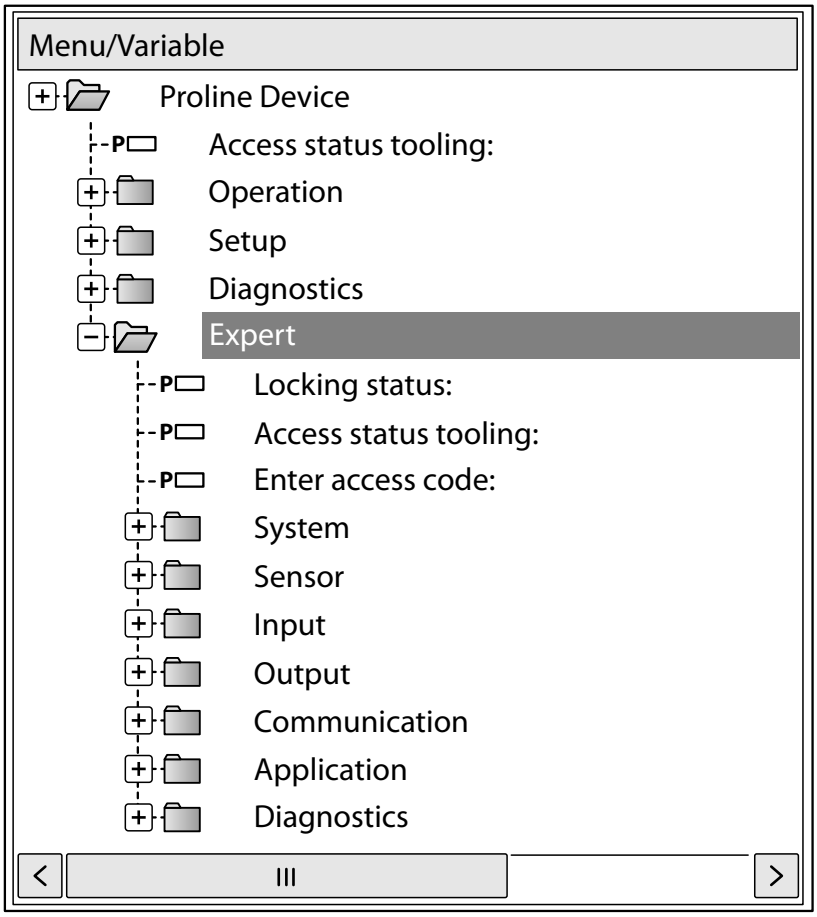
71289149

Valid as of version
03.00.zz (Device firmware)

Description of Device Parameters
Dosimag
Modbus RS485

Electromagnetic flowmeter



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1 Document information

1.1 Document function

The document is part of the Operating Instructions and serves as a reference for parameters, providing a detailed explanation of each individual parameter of the Expert operating menu.

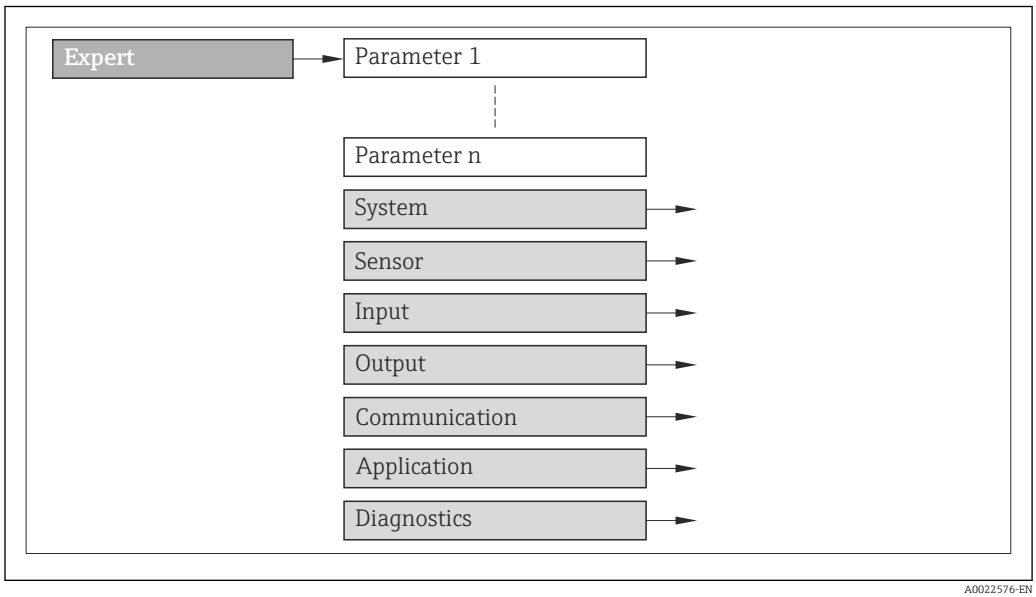
1.2 Target group

The document is aimed at specialists who work with the device over the entire life cycle and perform specific configurations.

1.3 Using this document

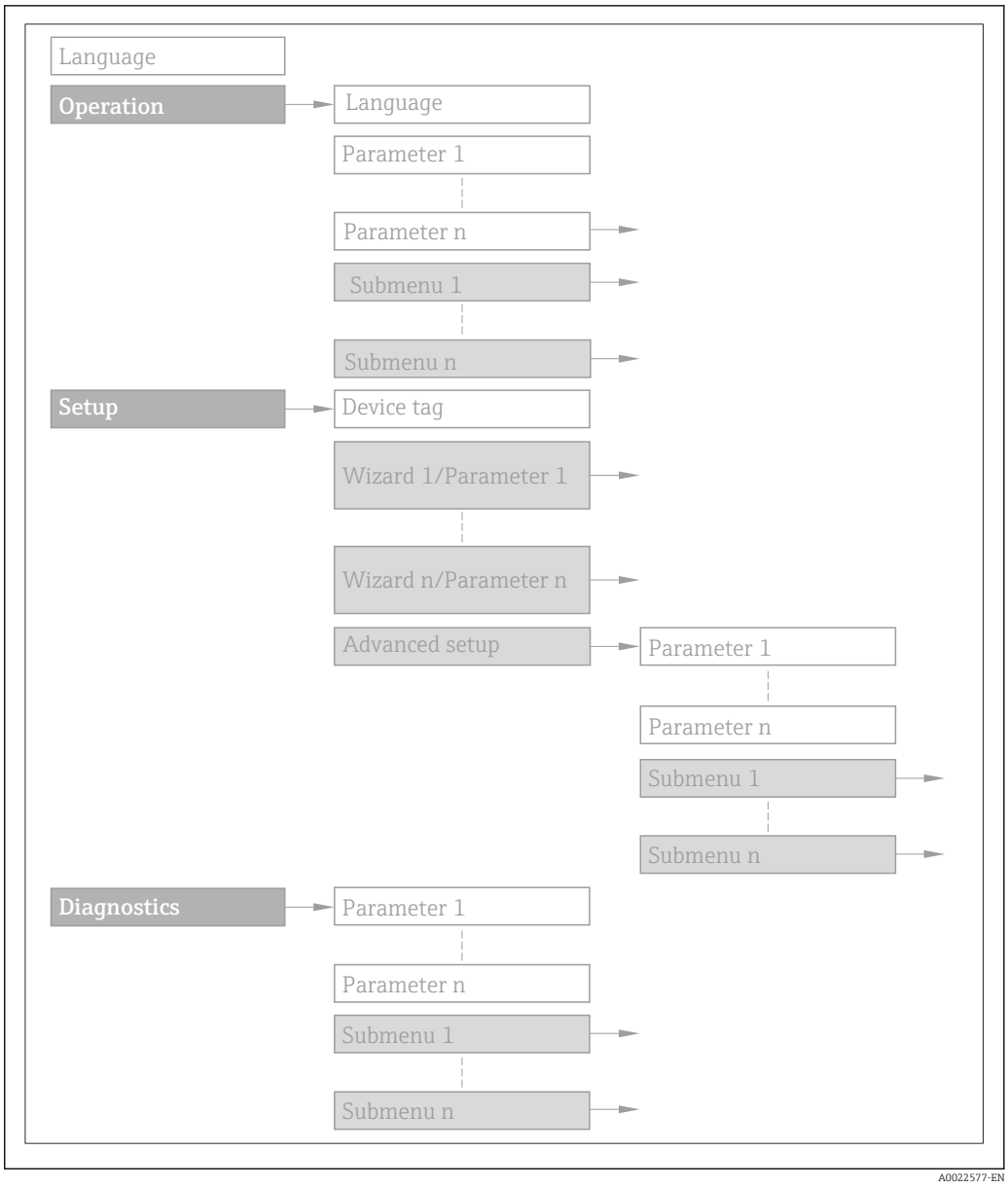
1.3.1 Information on the document structure

The document lists the submenus and their parameters according to the structure from the **Expert** menu (→ 🖹 7).



1 Sample graphic

For information on the arrangement of the parameters according to the structure of the **Operation** menu (→ 🖹 42), **Setup** menu, **Diagnostics** menu (→ 🖹 58), along with a brief description, see the Operating Instructions for the device.



2 *Sample graphic*

For information about the operating philosophy, see the "Operating philosophy" chapter in the device's Operating Instructions

1.3.2 Structure of a parameter description

The individual parts of a parameter description are described in the following section:

Complete parameter name	Write-protected parameter =

Navigation	Navigation path to the parameter via the operating tool The names of the menus, submenus and parameters are displayed in abbreviated format.
Prerequisite	The parameter is only available under these specific conditions
Description	Description of the parameter function
Options	List of the individual options for the parameter ▪ Option 1 ▪ Option 2
User entry	Input range for the parameter
User interface	Display value/data for the parameter
Factory setting	Default setting ex works
Additional information	Additional explanations (e.g. in examples): ▪ On individual options ▪ On display values/data ▪ On the input range ▪ On the factory setting ▪ On the parameter function

1.4 Symbols used

1.4.1 Symbols for certain types of information

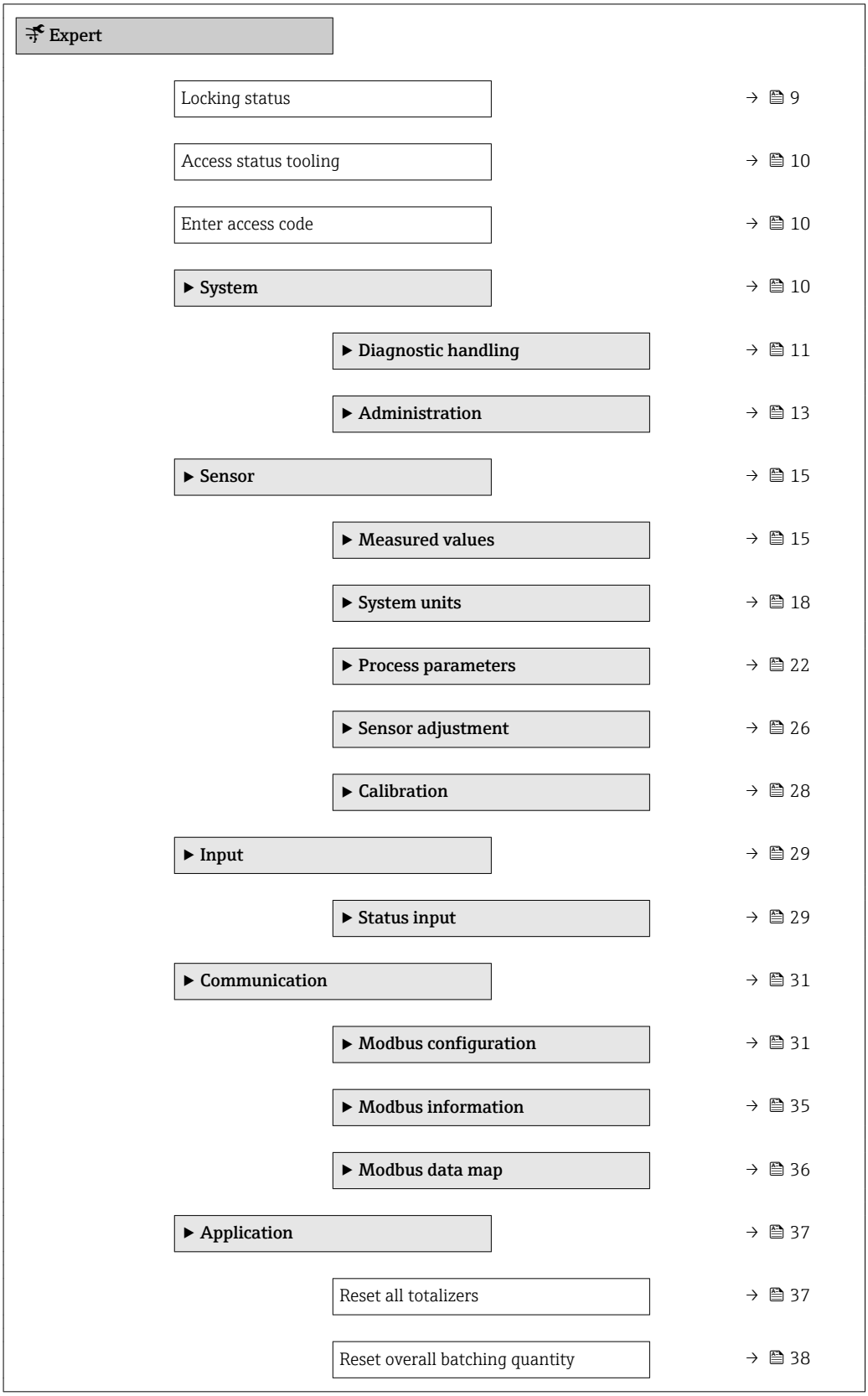
Symbol	Meaning
	Tip Indicates additional information.
	Reference to documentation
	Reference to page
	Reference to graphic
	Operation via operating tool
	Write-protected parameter

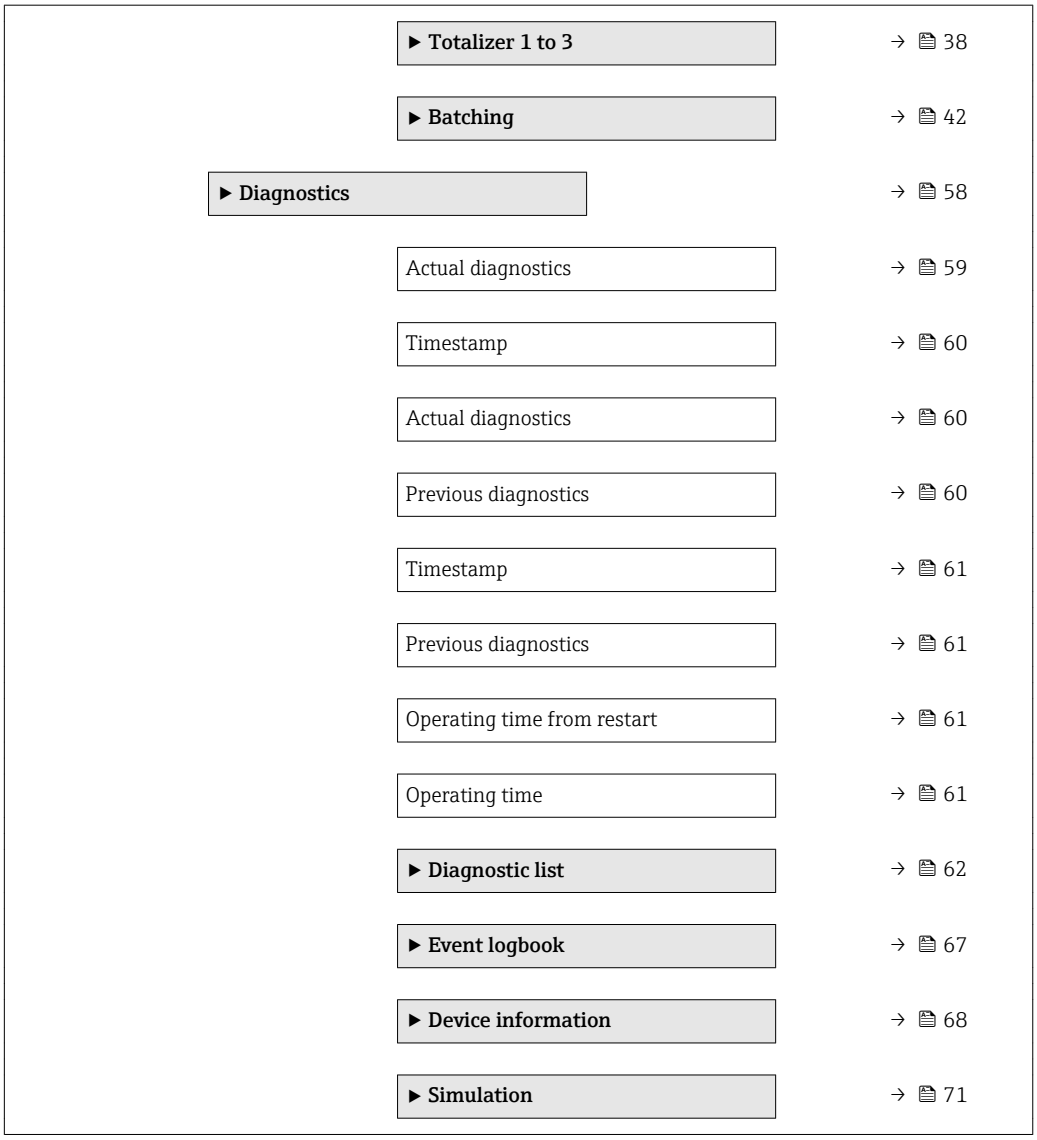
1.4.2 Symbols in graphics

Symbol	Meaning	Symbol	Meaning
1, 2, 3 ...	Item numbers	**A, B, C, ...**	Views
A-A, B-B, C-C, ...	Sections		

2 Overview of the Expert operating menu

The following table provides an overview of the menu structure of the expert operating menu and its parameters. The page reference indicates where the associated description of the submenu or parameter can be found.




▶ Totalizer 1 to 3
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▶ Batching
→ 42
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Actual diagnostics
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Timestamp
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Actual diagnostics
→ 60
Previous diagnostics
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Timestamp
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Operating time from restart
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Operating time
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▶ Diagnostic list
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▶ Device information
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▶ Simulation
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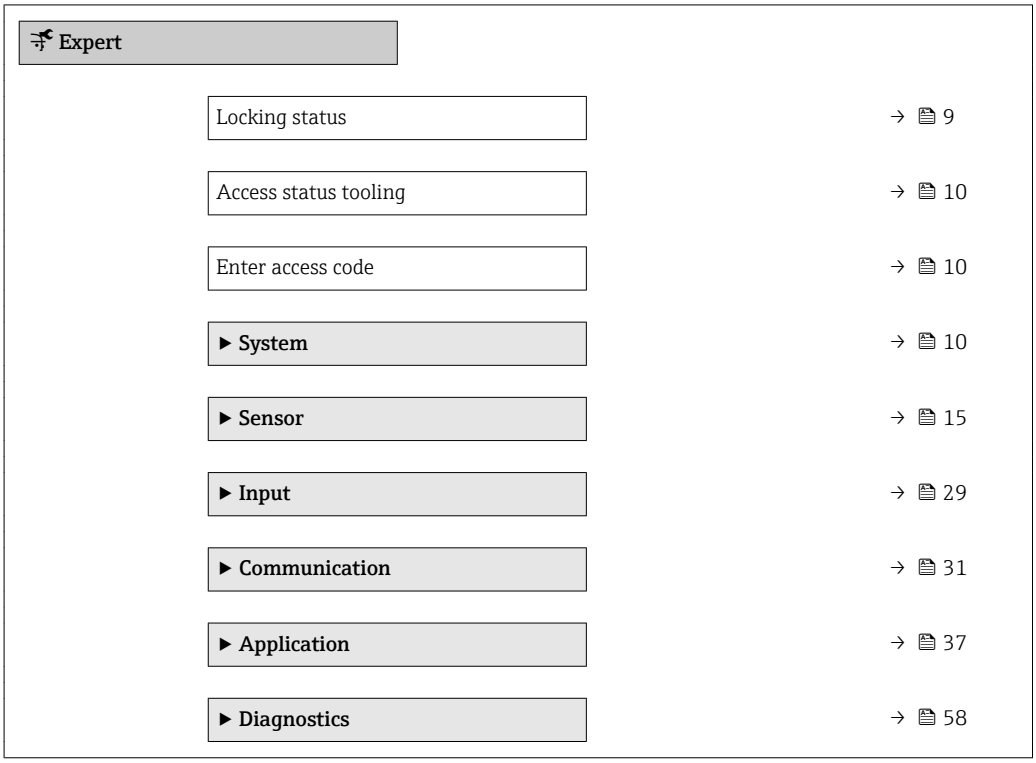
3 Description of device parameters

In the following section, the parameters are listed according to the menu structure of the operating tool.



Locking status

Navigation Expert → Locking status

Description Use this function to view the active write protection.

User interface Temporarily locked

Additional information *Display*

In the operating tool all active types of write protection are selected.

If additional write protection is active, this restricts the current access authorization even further. The write protection status can be viewed via the **Locking status** parameter (→ 9).

"Temporarily locked" option (priority 3)

Write access to the parameters is temporarily lock due to device-internal processing (e.g. data upload/download, reset). Once the internal processing has been completed, the parameters can be changed once again.

Access status tooling

Navigation Expert → Access stat.tool

Description Use this function to view the access authorization to the parameters via the operating tool.

User interface
- Operator
- Maintenance

Factory setting Maintenance

Additional information *Description*

The access authorization can be modified via the **Enter access code** parameter.

If additional write protection is active, this restricts the current access authorization even further. The write protection status can be viewed via the **Locking status** parameter (→ 9).

Display

Information on access authorization is provided in the "User roles and associated access authorization" and "Operating concept" sections of the Operations Instructions for the device.

Enter access code

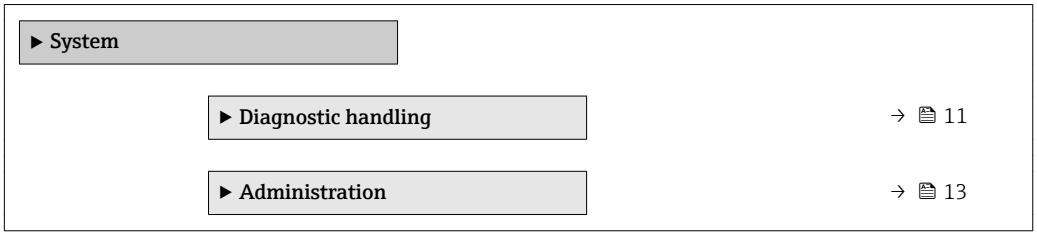
Navigation Expert → Ent. access code

Description Use this function to enter the user-specific release code to remove parameter write protection.

User entry 0 to 9 999

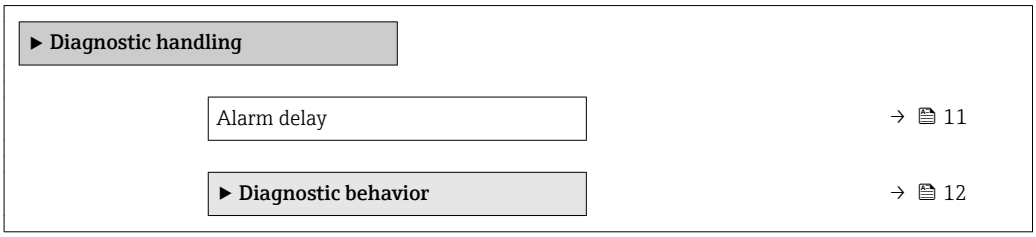
3.1 "System" submenu

Navigation Expert → System



3.1.1 "Diagnostic handling" submenu

Navigation Expert → System → Diagn. handling



Alarm delay

Navigation Expert → System → Diagn. handling → Alarm delay

Description Use this function to enter the time interval until the device generates a diagnostic message.

The diagnostic message is reset without a time delay.

User entry 0 to 60 s

Factory setting 0 s

Additional information *Description*

This setting affects the following diagnostic messages:
- 004 Sensor
- 062 Sensor connection
- 082 Data storage
- 083 Memory content
- 242 Software incompatible
- 270 Main electronic failure
- 272 Main electronic failure
- 273 Main electronic failure
- 281 Electronic initialization
- 311 Electronic failure
- 322 Electronic drift
- 453 Flow override
- 500 Electrode difference voltage too high
- 832 Electronic temperature too high
- 833 Electronic temperature too low
- 834 Process temperature too high
- 835 Process temperature too low
- 937 EMC interference
- 938 EMC interference
- 991 Batch time exceeded

"Diagnostic behavior" submenu

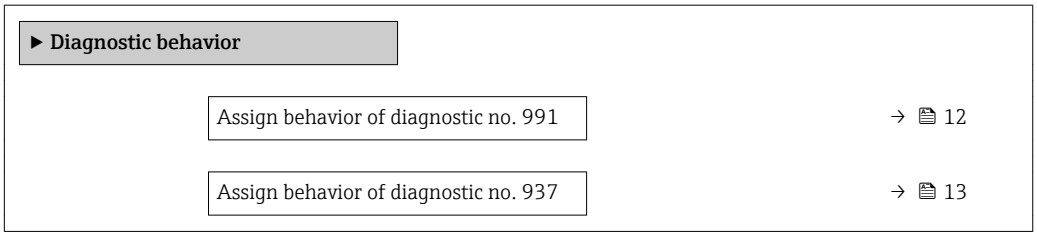
For a list of all the diagnostic events, see the Operating Instructions for the device.

Modifying the diagnostic behavior of a diagnostic event. Each diagnostic event is assigned a certain diagnostic behavior at the factory. The user can change this assignment for certain diagnostics events.

The following options are available in the **Assign behavior of diagnostic no. xxx** parameters:

- **Off** option
  The device continues to measure. The diagnostic event is ignored; it is neither entered into the Event logbook, nor is a diagnostic message generated.
- **Alarm** option
  The device continues to measure. The signal outputs assume the specified alarm condition. A diagnostic message is generated.
- **Warning** option
  The device continues to measure. A diagnostic message is generated.
- **Logbook entry only** option
  The device continues to measure. The diagnostic message is only entered in the **Event logbook** submenu (→ 67).

Navigation Expert → System → Diagn. handling → Diagn. behavior



Assign behavior of diagnostic no. 991 (Batch time exceeded)

Navigation Expert → System → Diagn. handling → Diagn. behavior → Diagnostic no. 991

Description Use this function to change the diagnostic behavior of the diagnostic message **991 Batch time exceeded**.

Selection

- Off
- Alarm
- Warning
- Logbook entry only

Factory setting Warning

Additional information For a detailed description of the options available, see → 12

Assign behavior of diagnostic no. 937 (EMC interference)

Navigation Expert → System → Diagn. handling → Diagn. behavior → Diagnostic no. 937

Description Use this function to change the diagnostic behavior of the diagnostic message **937 EMC interference**.

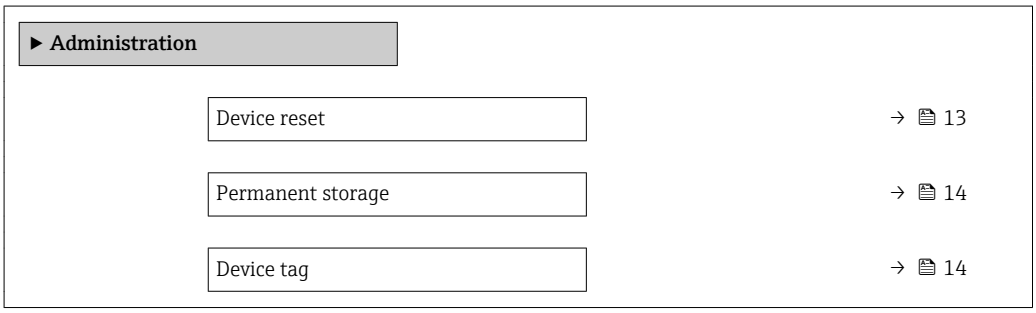
Selection
- Off
- Alarm
- Warning
- Logbook entry only

Factory setting Warning

Additional information For a detailed description of the options available for selection: → 12

3.1.2 "Administration" submenu

Navigation Expert → System → Administration



Device reset

Navigation Expert → System → Administration → Device reset

Description Use this function to choose whether to reset the device configuration - either entirely or in part - to a defined state.

Selection
- Cancel
- To delivery settings
- Restart device

Factory setting Cancel

Additional information *"Cancel" option*

No action is executed and the user exits the parameter.

"To delivery settings" option

All the parameters are reset to their factory settings.

"Restart device" option

The restart resets every parameter whose data are in the volatile memory (RAM) to the factory setting (e.g. measured value data). The device configuration remains unchanged.

Permanent storage

Navigation Expert → System → Administration → Perm. storage

Description Use this function to switch permanent storage on and off.

Selection
- Off
- On

Factory setting On

Additional information *Description*

NOTE!

If non-volatile device parameters are modified via the MODBUS RS485 function codes 06, 16 or 23, the change is saved in the EEPROM of the measuring device.

The number of writes to the EEPROM is technically restricted to a maximum of 1 million.

▸ Make sure to comply with this limit since, if it is exceeded, data loss and measuring device failure will result.

▸ Avoid constantly writing non-volatile device parameters via the MODBUS RS485.

Device tag

Navigation Expert → System → Administration → Device tag

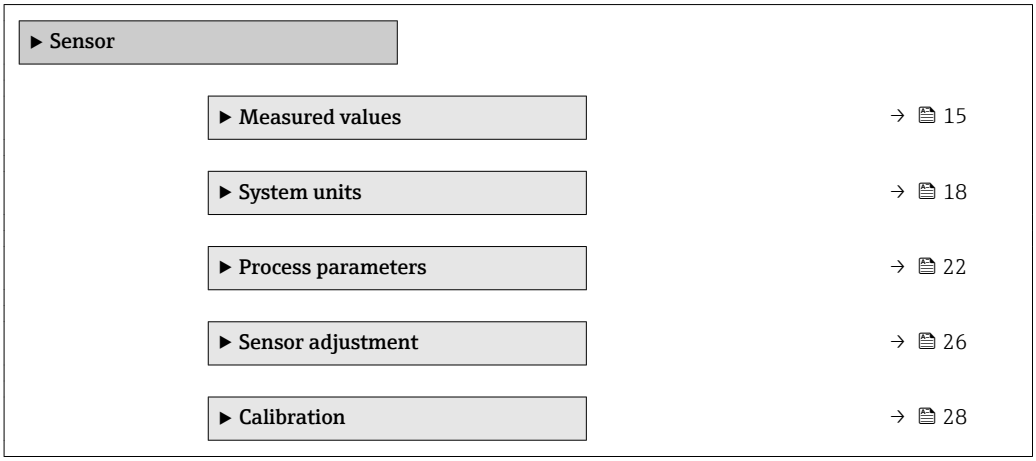
Description Use this function to enter the name for the measuring point.

User entry Max. 16 characters such as letters, numbers or special characters (e.g. @, %, /).

Factory setting Dosimag

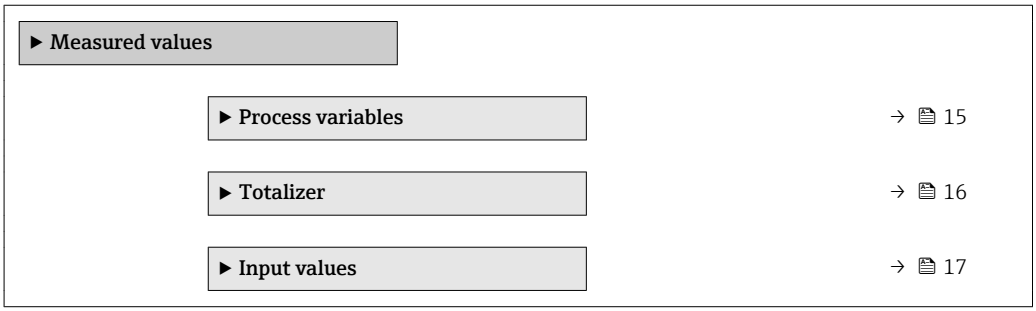
3.2 "Sensor" submenu

Navigation Expert → Sensor



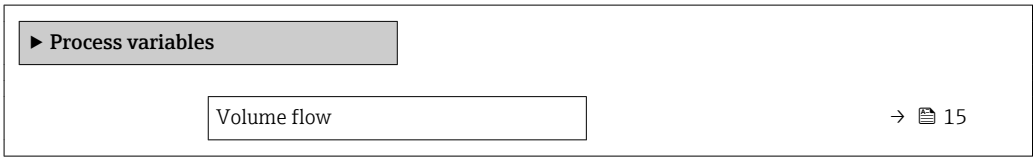
3.2.1 "Measured values" submenu

Navigation Expert → Sensor → Measured val.



"Process variables" submenu

Navigation Expert → Sensor → Measured val. → Process variab.



Volume flow

Navigation Expert → Sensor → Measured val. → Process variab. → Volume flow

Description Use this function to view the volume flow currently measured.

User interface Signed floating-point number