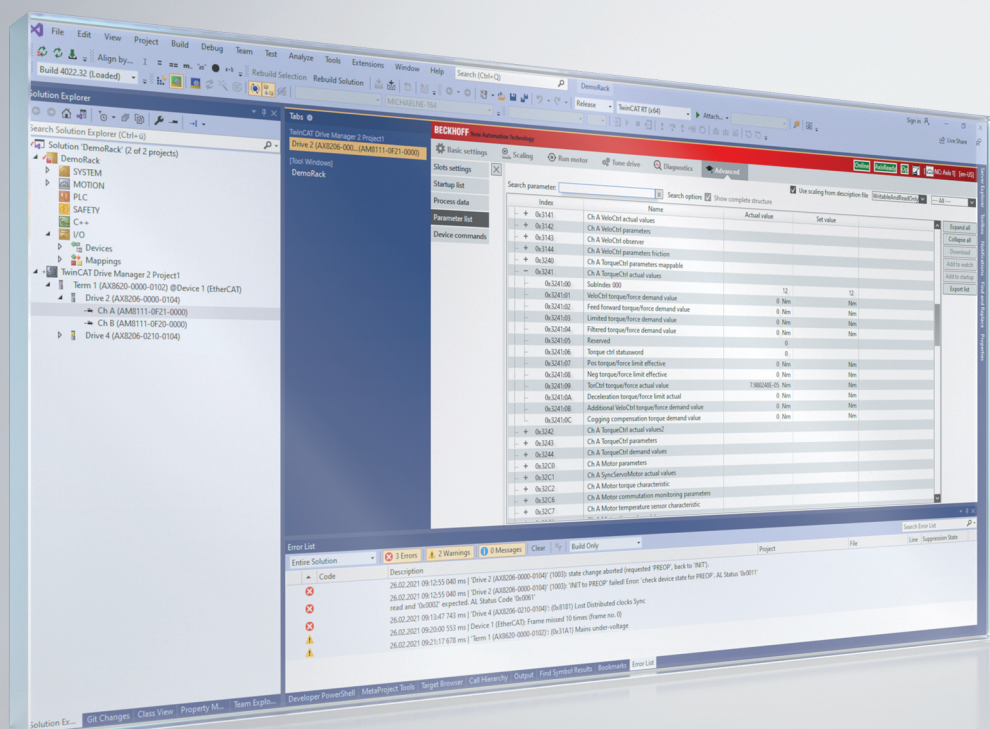# BECKHOFF New Automation Technology

Diagnostic Messages | EN

AX86x0, AX85xx

Power supply module

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1 Standard-Messages

1.1 0000, No errors

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
0000	0

Class	Type
Info	Information

Standard Reaction	Reset
No	Information: No reset required.

Internal: *0x0000, No errors*

1.2 2310, Continuous over current (device output side), Operating time counter: UU s., Entry counter: UU

The demanded current from axis system exceeds permanently the nominal current by more than the nominal current.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
2310	8976

Class	Type
Error	Error

Standard Reaction	Reset
NC-Handling order	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your applikation is so designed, that this exceeds permanently the allowed value.	Analize your application and make that this overcurrent does not happen. E.g. make that not so many motors run with so much current at once. Or use a bigger power supply module.

Internal: *0x2310, Continuous over current (device output side), Operating time counter: %u s., Entry counter: %u*

1.3 2380, Peak over current (device output side), Operating time counter: UU s., Entry counter: UU

The demanded current from axis system overloads the power supply module. This happens when a current of two times the nominal current is requested for longer than 5s.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
2380	9088

Class	Type
Error	Error

Standard Reaction	Reset
Generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your applikation is so designed, that this exceeds the maximal allowed current.	Analize your application and make that this overcurrent does not happen. E.g. make that not so many motors accelerate with so much current at once. Or use a bigger power supply module.

Internal: *0x2380, Peak over current (device output side), Operating time counter: %u s., Entry counter: %u*

1.4 23A0, Continuous over current (device output side)

The demanded current from axis system exceeds parametrized warning threshold.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
23A0	9120

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x23A0, Continuous over current (device output side)*

1.5   3110, Mains over-voltage, Operating time counter: UU s., Entry counter: UU

The actual mains voltage exceeds the parametrized mains voltage (0x8000:06) by more than 20% or by more than the parametrized positive tolerance (0x8000:07), if this higher than 20%.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
3110	12560

Class	Type
Error	Error

Standard Reaction	Reset
NC-Handling order	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
The actual mains voltage is too high.	Look for a allowed mains voltage.
The positive mains voltage tolerance (0x8000:07) is parametrized too low.	Correct this parametrized value.

Internal: *0x3110, Mains over-voltage, Operating time counter: %u s., Entry counter: %u*

1.6   3130, Phase failure, Operating time counter: UU s., Entry counter: UU

One phase is failed by 3-phase-supply.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
3130	12592

Class	Type
Error	Error

Standard Reaction	Reset
NC-Handling order	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
The mains voltage supply is faulty.	Analyze the mains voltage supply and resolve the problem.
You use the power supply module in a one-phase-mains but it is parametrized for three phases. And the module has not recognized the mains type properly.	Check the parameter Mains type (0x8000:04) and correct its value. Switch on again the mains voltage.
The mains voltage supply is disturbed over and over.	Activate a filter, which effects, that the phase monitoring waits longer, until this error is set.

Internal: *0x3130, Phase failure, Operating time counter: %u s., Entry counter: %u*

1.7   3180, Mains voltage over brake resistor operating voltage. Operating time counter: UU s., Entry counter: UU

The mains voltage has voltage peaks, which makes that the brake chopper gets switched on.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
3180	12672

Class	Type
Error	Error

Standard Reaction	Reset
Relays are disabled	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Voltage peaks occur by the mains voltage.	Analize the mains supply and make, that the voltage peaks do not happen.
The parametrization of DC link max voltage (0x8000:01) is too low.	Check your application and parametrize the DC link max voltage higher, if necessary. In this case the switchOn threshold voltage (0x9006:0C) of the brake chopper should has been changed.

Internal: *0x3180, Mains voltage over brake resistor operating voltage. Operating time counter: %u s., Entry counter: %u*

1.8   3181, Wrong mains type. Operating time counter: UU s., Entry counter: UU

The connected mains type (3Ph/AC, 1Ph/AC or DC) does not match with parametrized value of Mains type (0x8000:04).

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
3181	12673

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Mains type (0x8000:04) is parametrized with wrong value.	Check the parameter Mains type (0x8000:04) and correct its value.
The mains supply is not connected right.	Check the mains suppy and connected it right, Switch on the mains voltage again.

Internal: *0x3181, Wrong mains type. Operating time counter: %u s., Entry counter: %u*

1.9   31A0, Mains over-voltage

The connected mains voltage exceeds the parametrized warning threshold.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
31A0	12704

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x31A0, Mains over-voltage*

1.10   31A1, Mains under-voltage

The connected mains voltage fell below the parametrized warning threshold.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
31A1	12705

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x31A1, Mains under-voltage*

1.11 3210, DC link over-voltage, Operating time counter: UU s., Entry counter: UU

The DC link voltage rises over the permitted DC link voltage because of power feedback (brake) from the motors.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
3210	12816

Class	Type
Error	Error

Standard Reaction	Reset
Non-generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your application is so designed, that the permitted DC link voltage is exceeded.	Analize your application and make, that this overvoltage can not happen.
The parametrization of DC link max voltage (0x8000:01) is too low.	Check your application and parametrize the DC link max voltage (0x8000:01) higher, if necessary.

Internal: *0x3210, DC link over-voltage, Operating time counter: %u s., Entry counter: %u*

1.12 3280, Device DC link over-voltage, Operating time counter: UU s., Entry counter: UU

The DC link voltage rises over the permitted maximal DC link voltage because of power feedback (brake) from the motors.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
3280	12928

Class	Type
Error	Error

Standard Reaction	Reset
Torque off order to the axis	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your application is so designed, that the permitted maximal DC link voltage is exceeded.	Analize your application and make, that this overvoltage can not happen.

Internal: *0x3280, Device DC link over-voltage, Operating time counter: %u s., Entry counter: %u*

1.13   4210, Excess temperature device, Operating time counter: UU s., Entry counter: UU

The device temperature exceeds the permitted maximal value of 80,0°C.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
4210	16912

Class	Type
Error	Error

Standard Reaction	Reset
NC-Handling order	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your application has produced a thermic overload of the power supply module.	Analize your application and make, that this thermic overload does not happen.

Internal: *0x4210, Excess temperature device, Operating time counter: %u s., Entry counter: %u*

1.14   42A0, Excess temperature device

The actual device temperature exceeds the parametrized warning threshold.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
42A0	17056

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x42A0, Excess temperature device*

Standard-Messages

1.15   5560, Read data failed: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5560	21856

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x5560, Read data failed: %s*

1.16   5561, Missing data EEPROM: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5561	21857

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x5561, Missing data EEPROM: %s*

1.17 556C, Write data failed: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
556C	21868

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x556C, Write data failed: %s*

1.18 5580, Read failure EEPROM Pcb ID UU

A error by reading data from the eeprom happened by the initialization.
- ID 0: PowerPcb
- ID 1: LinkPcb
- ID 2: OptionPcb
- ID 3: DisplayPcb

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5580	21888

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
An internal hard- or software failure happened, while reading data from eeprom.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x5580, Read failure EEPROM Pcb ID %u*

1.19   5582, Missing ids in EEPROM Pcb ID UU

An error by reading data from the eeprom happened by the initialization.
- ID 0: PowerPcb
- ID 1: LinkPcb
- ID 2: OptionPcb
- ID 3: DisplayPcb

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5582	21890

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
A internal hard- or software failure happened, while reading data from eeprom.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x5582, Missing ids in EEPROM Pcb ID %u*

1.20   5583, Missing device ids in eeprom. Operating time counter: UU s., Entry counter: UU

By the initialization the device ids could not be found in eeprom.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5583	21891

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
A internal hard- or software failure happened, while reading data from eeprom.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.
Device ids are missing in eeprom	Please contact your competent Beckhoff office.

Internal: *0x5583, Missing device ids in eeprom. Operating time counter: %u s., Entry counter: %u*

1.21   5587, Missing factory settings

By the initialization the factory settings could not be found in eep-rom.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5587	21895

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
A internal hard- or software failure happened, while reading data from eeprom.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.
Factory settings are missing in eeprom.	Please contact your competent Beckhoff office.

Internal: *0x5587, Missing factory settings*

1.22   5592, EEPROM Pcb ID UU FirmwareIndex is incompatible to this Firmware

Detected incompatible Pcb for this Firmware.
- ID 0: PowerPcb
- ID 1: LinkPcb
- ID 2: OptionPcb
- ID 3: DisplayPcb

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5592	21906

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
This Hardware needs a newer Firmware.	Ask the Beckhoff branch office that is responsible for you for the right Firmwareversion.

Internal: *0x5592, EEPROM Pcb ID %u FirmwareIndex is incompatible to this Firmware*

1.23   5593, ESC EEPROM Pcb ID UU Structure Version is incompatible to this Firmware.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5593	21907

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x5593, ESC EEPROM Pcb ID %u Structure Version is incompatible to this Firmware.*

1.24   5598, Update BIC to SII Eeprom failed: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
5598	21912

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x5598, Update BIC to SII Eeprom failed: %s*

1.25   55A0, Read failure EEPROM. SS

A error by reading data from the eeprom of power board happened by the initialization.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
55A0	21920

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x55A0, Read failure EEPROM. %s*

1.26   55A1, Missing data EEPROM. SS

Data could not be found when reading from the eeprom.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
55A1	21921

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x55A1, Missing data EEPROM. %s*

1.27   55D0, Restored Errormessages from persistent memory

The persistent Memory contains an errorlog. The messages are restored during power on phase.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
55D0	21968

Class	Type
Info	Information

Standard Reaction	Reset
No	Information: No reset required.

Internal: *0x55D0, Restored Errormessages from persistent memory*

1.28   55D1, Missing data EEPROM: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
55D1	21969

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x55D1, Missing data EEPROM: %s*

1.29 6010, Software reset (watchdog), Operating time counter: UU s., Entry counter: UU

A time out happened.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6010	24592

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A fatal error occured. A device reboot is required.

Possible Causes	Solutions
An unknown software failure happened.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x6010, Software reset (watchdog), Operating time counter: %u s., Entry counter: %u*

1.30 6080, Failure config bits. Operating time counter: UU s., Entry counter: UU

A failure in the internal configuration happened.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6080	24704

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
The firmware update was not succesfully.	Switch off the mains voltage and the 24V-supply. Switch on them again and start a new firmware update. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x6080, Failure config bits. Operating time counter: %u s., Entry counter: %u*

1.31   6310, Loss of parameters, Operating time counter: UU s., Entry counter: UU

Default values of parameters could not be loaded.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6310	25360

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
Device ids or power board ids are missing in eeprom.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x6310, Loss of parameters, Operating time counter: %u s., Entry counter: %u*

1.32   6320, Parameter error. Operating time counter: UU s., Entry counter: UU

A parametrization error happened.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6320	25376

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Parameter values are not plausible to each other.	Check the parameter values and correct them.

Internal: *0x6320, Parameter error. Operating time counter: %u s., Entry counter: %u*

1.33   6380, Parameter 0xXX/XX with parametrized 0xXX/XX is too low

Value of first parameter is too low in relation to the value of second parameter.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6380	25472

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Parametrized DC link max voltage (0x8000:01) is too low for parametrized mains voltage (0x8000:06).	Look at the internal calculated values 0x9006:0A and 0x9006:0B. The first one must be higher than second one multiplied by sqrt(2). Parametrize 0x8000:01 or 0x8000:06 again, so that this is achieved.

Internal: *0x6380, Parameter 0x%x/%x with parametrized 0x%x/%x is too low*

1.34   6381, Parameter 0xXX/XX with parametrized 0xXX/XX is too high

Value of first parameter is too high in relation to the value of second parameter.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6381	25473

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Parametrized mains voltage min tolerance (0x8000:08) is too high for parametrized mains voltage (0x8000:06).	Parametrize 0x8000:08 or 0x8000:06 so that the value of object 0x9006:0C is not exceeded.
Parametrized mains voltage (0x8000:06) is too high for parametrized mains mains type (0x8000:04).	Parametrize 0x8000:07 or 0x8000:06 so that the value of object 0x9006:0B is not exceeded.
Parametrized mains voltage max tolerance (0x8000:07) is too high for parametrized mains voltage (0x8000:06).	Parametrize 0x8000:07 or 0x8000:06 so that the value of object 0x9006:0B is not exceeded.

Internal: *0x6381, Parameter 0x%x/%x with parametrized 0x%x/%x is too high*

1.35   6382, Value of parameter 0xXX/XX not supported

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6382	25474

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	Execute Reset-Command (Fault reset).

Internal: *0x6382, Value of parameter 0x%x/%x not supported*

1.36   6383, Parameter error: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
6383	25475

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x6383, Parameter error: %s*

1.37 7111, Failure brake chopper, Operating time counter: UU s., Entry counter: UU

Brake chopper failed.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7111	28945

Class	Type
Error	Error

Standard Reaction	Reset
Torque off order to the axis	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
Brake chopper is damaged.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x7111, Failure brake chopper, Operating time counter: %u s., Entry counter: %u*

1.38 7112, Over current brake chopper, Operating time counter: UU s., Entry counter: UU

Your connected brake resistor (internal or external) was overloaded.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7112	28946

Class	Type
Error	Error

Standard Reaction	Reset
Brake chopper is disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
Current at connected brake resistor is too high. The brake resistor may be damaged.	Switch off the mains voltage and the 24V-supply. Check whether your brake resistor is damaged, if external one connected. Try to operate power supply module again. If this error happens repeatedly, please contact your competent Beckhoff office.
Your applikation is so designed, that this exceeds the maximal allowed current at the brake resistor.	Analize your application and make that this overcurrent does not happen.

Internal: *0x7112, Over current brake chopper, Operating time counter: %u s., Entry counter: %u*

Standard-Messages

1.39 7180, Brake resistor not found. Operating time counter: UU s., Entry counter: UU

No connected brake resistor could be detected.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7180	29056

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Internal brake resistor is faulty and any external brake resistor has not been connected.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.
The connection bridge for the internal brake resistor is not pugged in, an external brake resistor has been connected but this may be damaged.	Check your external brake resistor. If this is not damaged, try to operate the power supply module again. If this error happens repeatedly, please contact your competent Beckhoff office.
The connection bridge for the internal brake resistor is missing and any external brake resistor has not been connected.	Plug in the connection bridge or connect an external brake resistor.

Internal: *0x7180, Brake resistor not found. Operating time counter: %u s., Entry counter: %u*

1.40 7181, Brake resistor power overload by DC link over-voltage. Operating time counter: UU s., Entry counter: UU

Brake resistor was disabled because of power overload. As result over-voltage at dc link.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7181	29057

Class	Type
Error	Error

Standard Reaction	Reset
Non-generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your application is so designed, that the brake energy overloads the brake resistor.	Analize your application and make, that this overload does not happen or connect a more powerful brake resistor if possible.

Internal: *0x7181, Brake resistor power overload by DC link over-voltage. Operating time counter: %u s., Entry counter: %u*

1.41 7182, Wrong xml file. Operating time counter: UU s., Entry counter: UU

Device description file does not match to device or to firmware.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7182	29058

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate and transition PREOP to SAFEOP disabled	A reset is not possible. The PSM detected a fatal hard- or software error.

Possible Causes	Solutions
Wrong file by firmware update choosen.	Start again a firmware update with the right file.
The firmware or device description files do not match to device.	Check the files. Change them or change the device, if necesary.
Wrong file by device description update choosen.	Start again a firmware update with the right file. A separate device description update is not necessary because this is made automatically by a firmware update.

Internal: *0x7182, Wrong xml file. Operating time counter: %u s., Entry counter: %u*

1.42 7183, Brake resistor overloaded. Operating time counter: UU s., Entry counter: UU

Brake resistor was disabled because of power overload. As result over-voltage at dc link.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7183	29059

Class	Type
Error	Error

Standard Reaction	Reset
Non-generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
Your application is so designed, that the brake energy overloads the brake resistor.	Analize your application and make, that this overload does not happen or connect a more powerful brake resistor if possible.

Internal: *0x7183, Brake resistor overloaded. Operating time counter: %u s., Entry counter: %u*

1.43 7184, Chopper diode overloaded. Operating time counter: UU s., Entry counter: UU

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7184	29060

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0x7184, Chopper diode overloaded. Operating time counter: %u s., Entry counter: %u*

1.44 71A0, Brake resistor overloaded

The brake resistor is overloaded over the parametrized warning threshold.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
71A0	29088

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0x71A0, Brake resistor overloaded*

1.45   7580, I2C communication failure. Operating time counter: UU s., Entry counter: UU

Failure at I2C bus.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
7580	30080

Class	Type
Error	Error

Standard Reaction	Reset
PSM is not ready to operate	Execute Reset-Command (Fault reset).

Possible Causes	Solutions
A I2C-member is hanging and a reset of the I2C-bus failed.	Switch off the mains voltage and the 24V-supply. Switch on them again. If this error happens repeatedly, please contact your competent Beckhoff office.

Internal: *0x7580, I2C communication failure. Operating time counter: %u s., Entry counter: %u*

1.46   FF01, Error reaction forced: Generative brake order

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF01	65281

Class	Type
Error	Error

Standard Reaction	Reset
Generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Internal: *0xFF01, Error reaction forced: Generative brake order*

1.47   FF02, Error reaction forced: Non-generative brake order

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF02	65282

Class	Type
Error	Error

Standard Reaction	Reset
Non-generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Internal: *0xFF02, Error reaction forced: Non-generative brake order*

1.48   FF03, Error reaction forced: Brake chopper off

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF03	65283

Class	Type
Error	Error

Standard Reaction	Reset
Brake chopper is disabled	Execute Reset-Command (Fault reset).

Internal: *0xFF03, Error reaction forced: Brake chopper off*

1.49   FF07, Error reaction forced: Torque Off order

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF07	65287

Class	Type
Error	Error

Standard Reaction	Reset
Torque off order to the axis	Execute Reset-Command (Fault reset).

Internal: *0xFF07, Error reaction forced: Torque Off order*

1.50   FF0B, Error reaction forced: NC handling order

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF0B	65291

Class	Type
Error	Error

Standard Reaction	Reset
NC-Handling order	Execute Reset-Command (Fault reset).

Internal: *0xFF0B, Error reaction forced: NC handling order*

Standard-Messages

1.51 FF1C, Load resistor overloaded with error reaction brake, Operating time counter: UU s., Entry counter: UU

Dc link load resistor overloaded over 65%.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF1C	65308

Class	Type
Error	Error

Standard Reaction	Reset
Generative brake ramp order to the axis	Execute Reset-Command (Fault reset).

Internal: *0xFF1C, Load resistor overloaded with error reaction brake, Operating time counter: %u s., Entry counter: %u*

1.52 FF1D, Load resistor overloaded with error reaction torque off, Operating time counter: UU s., Entry counter: UU

Dc link load resistor overloaded over 90%.

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FF1D	65309

Class	Type
Error	Error

Standard Reaction	Reset
Torque off order to the axis	Execute Reset-Command (Fault reset).

Internal: *0xFF1D, Load resistor overloaded with error reaction torque off, Operating time counter: %u s., Entry counter: %u*

1.53   FFA0, Fan malfunction

Fan does not work

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FFA0	65440

Class	Type
Warning	Warning

Standard Reaction	Reset
No	Warning: No reset required.

Internal: *0xFFA0, Fan malfunction*

1.54   FFC0, SS successfully done

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FFC0	65472

Class	Type
undefined	undefined Type

Standard Reaction	Reset
undefined Reaction	undefined Reset

Internal: *0xFFC0, %s successfully done*

1.55   FFD0, Debug firmware, replace "As soon as possible"!

Debug fimware: Replace ASAP!

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FFD0	65488

Class	Type
Info	Information

Standard Reaction	Reset
No	Information: No reset required.

Internal: *0xFFD0, Debug firmware, replace "As soon as possible"!*

1.56 FFD1, Dbg: SS

Diagnostic Code (Hex.)	Diagnostic Code (Dez.)
FFD1	65489

Class	Type
Info	Information

Standard Reaction	Reset
No	Information: No reset required.

Internal: *0xFFD1, Dbg: %s*

Trademark statements

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