isel®
From Components to Systems

IBC 10

User manual

Hardware description

Stand: 07/2014

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About this manual

The information, technical data and dimensions contained in this print are up-to-date when published. Any possible misprints and mistakes cannot be excluded however. We are thankful for any suggestion for improvement and indication of mistakes.

Please note that the used software- and hardware descriptions of each individual company are generally subject to protection of trademarks and patent law.

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1 Introduction

The brake chopper module IBC10 is an additional module for isel servo controllers. With the module the energy, which is generated in the generator operation, is degraded and prevents a back feed-in to the power supply. Therefore resulting defects and malfunctions of parts of the controller are avoided.

The module has an internal temperature monitoring. A special floating output is suitable to evaluate the status of the external monitoring for example by a PLC or an isel- residual interpret module. In case of over-temperature, the output is open.

Connect the output X2:C/E according to avoid over-temperature of the brake chopper module IBC10 for example by switching off the power supply in case of over-temperature.

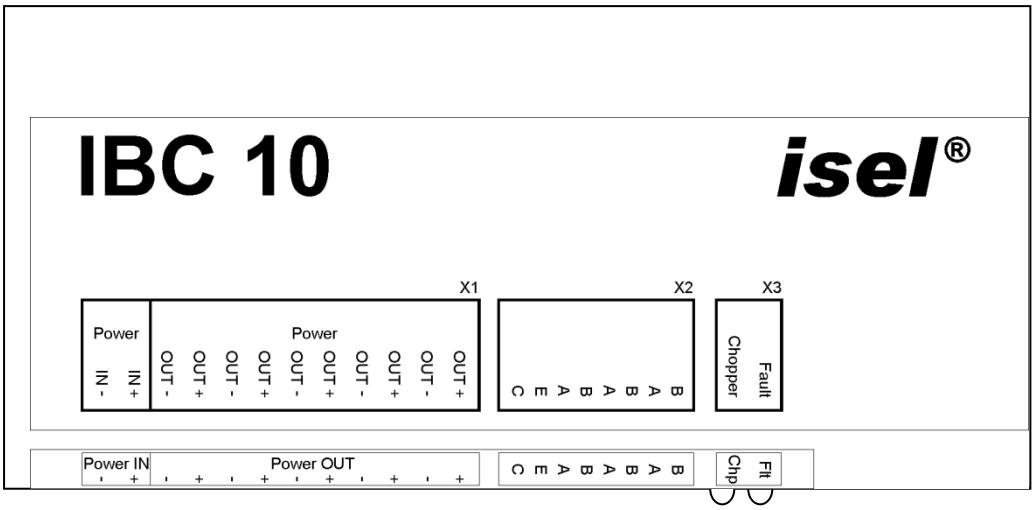
Safety symbols

- The brake chopper module IBC 10 is constructed according to the current state of the art and the recognized safety rules.
- The device may only be operated in perfect technical condition. Disturbances must be corrected immediately. Children and untrained persons should not operate the device.
- The appliance must be used only for the intended use.
- All work must be performed only by authorized personnel and in accordance with the requirements of the electrical industry as well as the accident prevention regulations.
- Assembly and use of resources must be performed according to the standards of the Declaration of Conformity. The rules and regulations as well as the limit values, which were kept from the manufacturer, do not protect in case of improper use of resources.
- The device must not be exposed to high humidity and vibrations (see technical data).
- Keep this manual in a safe place and pledge all users on their compliance!
- The non-observance of this manual may result in property damage, serious injury and even death.

2 Technical Data

Part-no.:	390194 4001
Dimensions:	180mm (W) x 110mm (H) x 35mm (D)
Weight:	538 g
Protection class:	IP20
Supply voltage:	24 - 100VDC
Maximum rated current:	15A
Ambient temperature:	5°C to +40°C
Storage temperature:	-25°C to +70°C
Relative Humidity:	max. 95%

3 Connections



3.1 Connection for power supply (X1/Power IN)

Here the output of the DC-power supply unit is connected. This is decoupled via a diode from the outputs of the final stages.

3.2 Connection for final stages (X1/Power OUT)

The final stages are affiliated to the above-mentioned diode decoupled voltage. Up to 5 final stages can be connected. However, the permissible total current of 15 A must not be exceeded. Short-term peak loads are permitted.

3.3 Distributor (X2/A,B)

These connectors are for internal use only. The pin "A" and "B" are each bridged. Here, for example, fans can be clamped in parallel.

3.4 Fault-Output (X2/C,E)

The terminals C and E are used for internal temperature monitoring. If the terminal C connected to +24 V, thus leading to the terminal E +24 V, as long as the temperature limit is not exceeded. Upon reaching the shutdown temperature of 75 ° C, the temperature monitoring interrupts applied +24 V -> 0V at terminal E. After cooling, the sensor switches itself back on -> +24 V at terminal E.
The connection should be wired to use the internal monitor the temperature.

The maximum curretn IF should not exceed 200mA !