

**Flange heater Ø 280 mm
Incoloy 825; 2.4858**

**AHFOR-BI-A-...
AHFOR-BI-E-...**

with combination of temperature control and
safety temperature limiter



Application

Auxiliary heating system of industrial water and heating water.

Features

FH The heating element ist made of six U-shaped heating tubes, each press-fitted into a press-fitting nipple. These are bolted with the immersion tube onto a steel flange.
A food-safe tesnit disk serves as insulation
The unheated zone is 70 mm for all types.

Type A **TC** Electromechanical temperature control acc. EN 14597, not fail safe.

STL Electromechanical safety temperature limiter acc. EN 14597, fail safe.

If nominal value is reached, the limiter switches and stays locked in this position. Reset is performed manually and is only possible after the sensing element is cooled off by approx. 10 K.

- Time factor of sensing element acc. EN 14597
- Operation type TC Type 2 B acc. EN 14597
- Operation type STL Type 2 BK acc. EN 14597

Type E **TC** Electromechanical temperature control acc. EN 14597, not fail safe.

STL Electromechanical safety temperature limiter acc. EN 14597, fail safe.

If nominal value is reached, the limiter switches and stays locked in this position. Reset is performed manually and is only possible after the sensing element is cooled off by approx. 20 K.

- Time factor of sensing element acc. EN 14597
- Operation type TC Type 1 B acc. EN 14597
- Operation type STL Type 2 BDEFHKL acc. EN 14597

Type summary

	Type	Order-no.	Power		Immersion length [EL]
Type A	AHFOR-BI-A-4.0	012-1841	4.0 / 3.3 / 3.0 / 2.7 / 2.3 / 2.0kW;	400V 3~	260mm
	AHFOR-BI-A-5.0	012-1842	5.0 / 4.1 / 3.8 / 4.4 / 2.9 / 2.5kW;	400V 3~	260mm
	AHFOR-BI-A-8.0	012-1843	8.0 / 6.7 / 6.0 / 5.3 / 4.7 / 4.0kW;	400V 3~	260mm
	AHFOR-BI-A-10.0	012-1844	10.0 / 7.5 / 5.0kW;	400V 3~	300mm
	AHFOR-BI-A-12.0	012-1845	12.0 / 9.0 / 6.0kW;	400V 3~	360mm
	AHFOR-BI-A-15.0	012-1846	15.0 / 7.5kW;	400V 3~	420mm
	AHFOR-BI-A-16.0	012-1847	16.0 / 8.0kW;	400V 3~	440mm
	AHFOR-BI-A-18.0	012-1848	18.0 / 9.0kW;	400V 3~	490mm
	AHFOR-BI-A-20.0	012-1849	20.0 / 10.0kW;	400V 3~	540mm
Type E	AHFOR-BI-A-25.0	012-1850	25.0 / 12.5kW;	400V 3~	660mm
	AHFOR-BI-A-30.0	012-1851	30.0 / 15.0kW;	400V 3~	780mm

Technical data

The following indications are valid for the above listed standard types. Due to the function, other types might show different data.

Application range

Adjustable cut-off temperature

0...*...28...85 °C / 15...95 °C

Safety cut-off temperature ϑ_{off}

110 °C (0-9 K)

Ambient temperature on switching head

max. 50 °C (T50)

Thermal switching differential

11.0 K \pm 5.5 K / 4.0 K \pm 2.0 K

Calibration

Ambient temperature for storage and transport

-30...+90 °C

Calibration tolerance

\pm 7 K / \pm 6 K

Time factor in water

<45 s

Specification

Flange material

St 37

Outside flange diameter

Ø 280 mm

Pitch circle diameter

Ø 245 mm / 12 X M14

Flange seal

EPDM, KTW and FDA certification

Tesnit disk

Tesnit BA-U light blue, KTW certification

Heating tube industrial water

Incoloy 825; 2.4858, Ø 8.2 mm

Immersion tube

Cronifer 1.4529

Surface load

7 W/cm²

Electrical connection

Screw type terminal

Operating pressure

10 bar max.

Housing cover

ABS UL94 V0, NCS 2005-R80B (light gray)

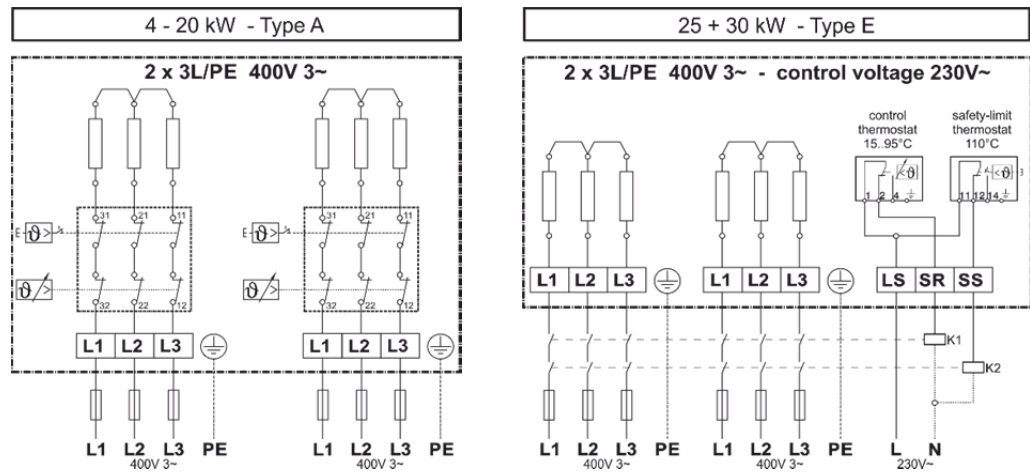
Protection mode

IP31 acc. EN 60529

Fitting notes

The device must be installed horizontally. The heating tubes must be covered entirely by the liquid. The circulation of the liquid shall not be inhibited.

Wiring diagram



Dimension drawing

