AS-Interface data coupler

VAA-4EA-KF-DK

Dimensions

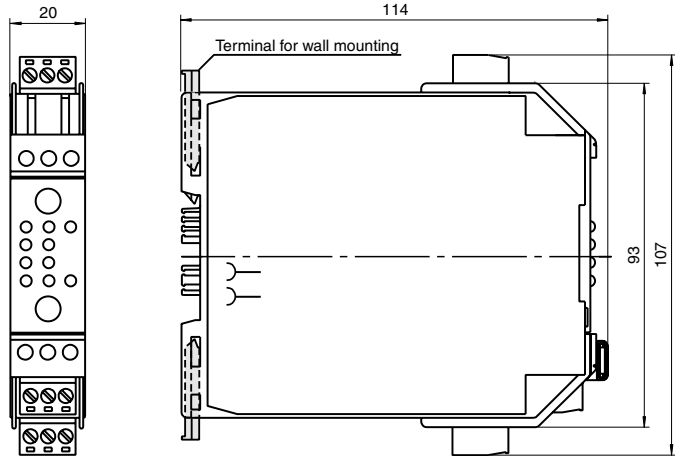

Electrical connection

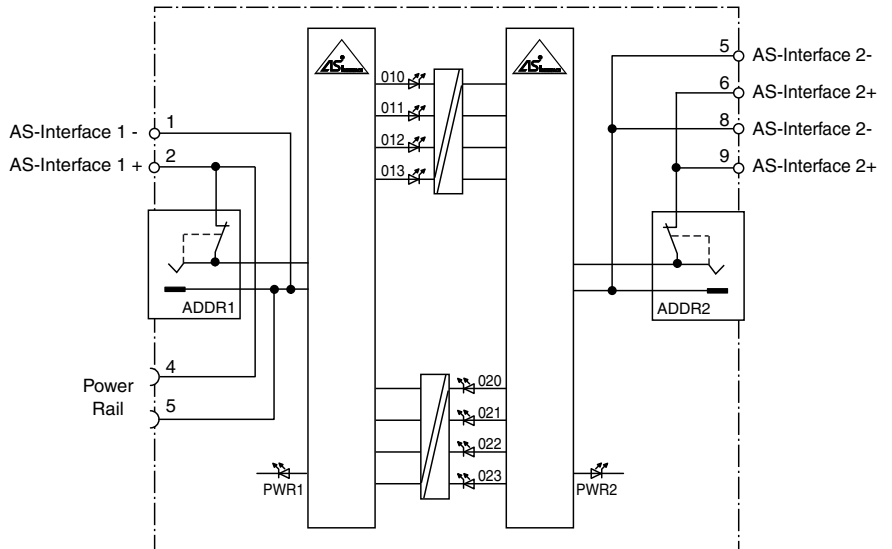## Model Number

VAA-4EA-KF-DK

Cabinet module

Features

- Module for bi-directional data exchange between two AS-Interface circuits
- 2 AS-Interface connections
- 4 inputs/4 outputs per slave (internally connected)
- AS-Interface-connection 1 via Power Rail
- Housing with removable, coded terminals
- Function display for all outputs
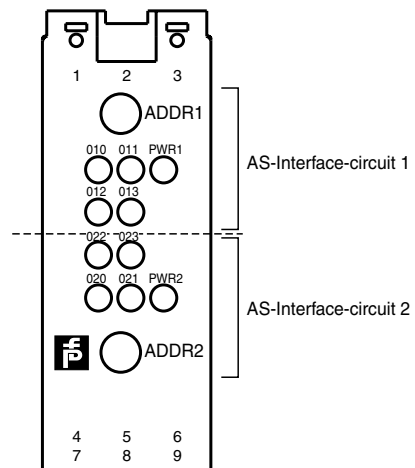- Addressing via 2 sockets in the front plate

Indicating / Operating means

AS-Interface data coupler

VAA-4EA-KF-DK

Technical data

General specifications

Slave type	Standard slave
AS-Interface specification	V2.0
Required master specification	≥ V2.0

Indicators/operating means

LED PWR	AS-Interface voltage; 2 LED green
LED OUT	switching state (output); 8 LED yellow O10-O13: AS-Interface 1; O20-O23: AS-Interface 2

Electrical specifications

Protection class		III
Rated operational voltage	U_e	26.5 ... 31.6 V from AS-Interface
Rated operational current	I_e	≤ 30 mA

Input

Number/Type	4 internal inputs per AS-Interface circuit 1+2

Output

Number/Type	4 internal outputs per AS-Interface circuit 1+2

Programming instructions

Profile	S-7.F
IO code	7
ID code	F

Data bits (function via AS-Interface)	input	output
D0	IN1	OUT1
D1	IN2	OUT2
D2	IN3	OUT3
D3	IN4	OUT4
Parameter bits (programmable via AS-i)	function	
P0	not used	
P1	not used	
P2	not used	
P3	not used	

Ambient conditions

Ambient temperature	-25 ... 70 °C (248 ... 343 K)
Storage temperature	-25 ... 85 °C (248 ... 358 K)

Mechanical specifications

Protection degree	IP20
Connection	removable coded terminals, Power Rail
Mass	130 g
Mounting	DIN rail

Compliance with standards and directives

Standard conformity	
Protection degree	EN 60529

Function

The data coupler interface module VAA-4EA-KF-DK is used when the output bits of an AS-Interface circuit are to be used as the input bits of another AS-Interface circuit. The data coupler is equipped with two AS-Interface connections for this purpose, each representing a 4EA module. The output bits of the AS-Interface circuit 1 are represented on the AS-Interface circuit 2 as input bits and vice versa. This enables data exchange to be carried out in both directions without having to transfer the data via the higher-level control system. This is a particular advantage in time-critical applications. The addressing procedures for the two integrated AS-Interface slaves are carried out independently of each other. Two addressing jacks are provided for this purpose.

Because two independent AS-Interface modules are used, the related inputs and outputs are galvanically isolated from each other. This avoids problems with potential shifts (earth potential). The status of all the outputs is indicated via 8 LEDs located on the module's front panel. Two additional LEDs indicate the AS-Interface voltage on the two circuits.

Its design, only 20 mm wide, occupies little space in a cabinet installation. The VAA-4EA-KF-DK is installed by snapping it onto the 35 mm DIN rail per EN 50022, with the inserted Power Rail. This ensures that AS-Interface circuit 1 of the module is automatically connected to the AS-Interface transmission line, if other cabinet modules or a master/gateway are operating on this circuit. If this is not the case, the AS-Interface transmission line is connected to the pluggable, coded terminals. This is absolutely essential for AS-Interface circuit 2.

Accessories

VBP-HH1
AS-Interface handheld

VAZ-PK-1,5M-V1-G
Connection cable module/hand-held programming device

UPR-05
Universal Power Rail

UPR-E
End cap

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