



1 Overview

Additional power supply 5 V for Systems H51q

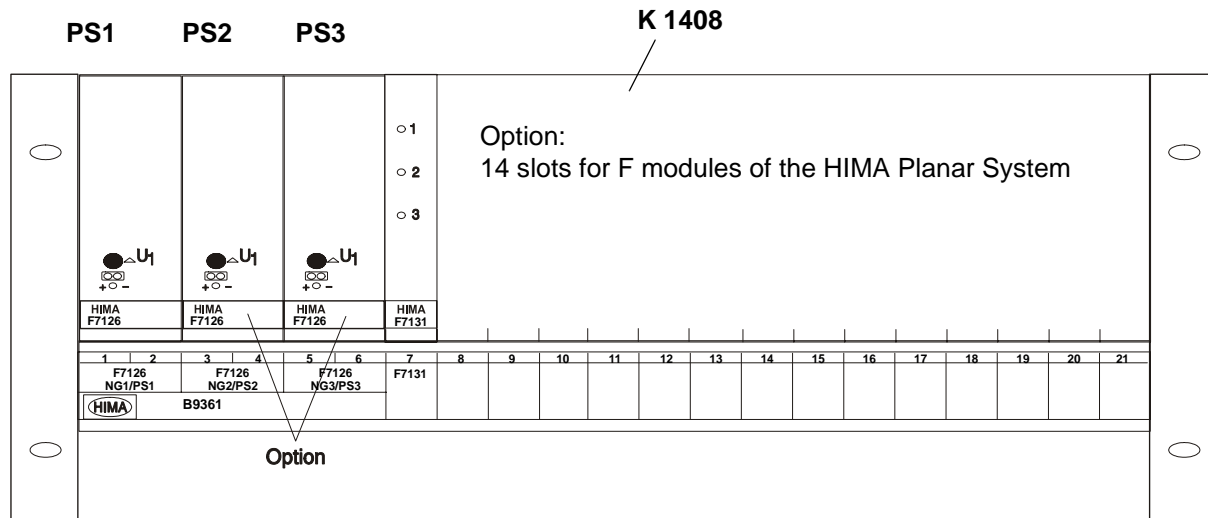


Figure 1: Front view

2 Parts of the assembly kit B 9361

- 1 x K 1408 central rack, 5 units high, 19 inches, with integrated cable tray
- additional modules on the rear
 - 3 x Z 6011 decoupling and fusing to feed the power supply modules
 - 1 x Z 6012 fan with fan run monitoring and fuse monitoring
 - 2 x Z 6013 decoupling and fusing of the supply voltage for Z 6012

include the modules:

- 1 x F 7126 power supply module 24 V / 5 V, 10 A (PS1)
- 1 x F 7131 power supply monitoring module
- 14 socket connectors to install standard (F type) modules of the HIMA Planar System

Modules for option (separate order):

- 2 x F 7126 power supply module 24 V/5 V (PS2, PS3). The 5 V outputs of the power supply modules are switched in parallel
- 1...14 x Standard (F type) modules of the HIMA Planar System

The additional power supply (loadable up to 18 A) will be used if the power supply modules built-in in the central rack are not sufficient to supply the 5 V circuits (i.e. $I > 18$ A for 3 power supply modules F 7126 in a redundant control). For the accurate current consumption for each module refer to the appertaining data sheets.

The 5 V circuits of the power supply modules in the central rack and in the additional power supply should not be switched in parallel but the GND of both power supplies has to be connected together. Availability is present because 2 of 3 power supply modules are able to guarantee the 5 V supply.

3 Wiring of the assembly kit

Wirings to be done by the user (refer to "Assembly kit, wiring diagram"):

3.1 Supply 24 VDC

| Connection | Wire and connection | Fusing | Use |
|--|---|--------------|----------------|
| XG.21/22/23:2 (L+) | RD 2.5 mm ² , Faston 6.3 x 0.8 | max. 16 A gL | PS1...PS3 |
| XG.21/22/23:1 (L-) | BK 2.5 mm ² , Faston 6.3 x 0.8 | | Reference pole |
| RD = Color code red BK = Color code black | | | |

Table 1: Supply 24 VDC

3.2 Output 5 VDC

| Connection | Wire and connection | Use |
|---|---|---|
| XG.2: +5 V | YE 2 x 2.5 mm ² , Faston 6.3 x 0.8** | Supply I/O subrack (B 9302) |
| XG.3: GND | GN 2 x 2.5 mm ² , Faston 6.3 x 0.8** | Supply I/O subrack (B 9302), to be connected with the GND of the central rack |
| GN = Color code green YE = Color code yellow | | |

Table 2: Output 5 VDC

** for distances > 2 m: wire cross section 6 mm²

3.3 Output 24 VDC

| Connection | Wire and connection | Use |
|---------------------|---|---|
| XG.24:2 (L+) | RD 1.5 mm ² , Faston 6.3 x 0.8 | Supply fuse monitoring and IO-CON in the I/O subrack |
| XG.25:2 (L+) | RD 1.5 mm ² , Faston 6.3 x 0.8 | Supply fuse monitoring and IO-CON in I/O subrack for 2nd I/O bus (B 5222-2, B 5223-2, B 5232-2 and B 5233-2 only) |
| RD = Color code red | | |

Table 3: Output 24 VDC

3.4 Connection of the monitoring loop (for fuses and fans)

| Connection | Wire and connection | Fusing | Use |
|----------------------|--|-----------------------|---|
| XG.26:4/5/6 | GY 0.5 mm ² , Faston 2.8 x 0.8 | max. 4 A slow blow | Floating NO/NC contact for sig- nalling |
| GY = Color code gray | | | |

Table 4: Connection of the monitoring loop

3.5 Internal fuses

| Position | Size | Dimension | HIMA part no. |
|----------|-----------------|-----------|---------------|
| Z 6011 | 4 A slow blow | 5 x 20 mm | 57 0174409 |
| Z 6013 | 1.6 A slow blow | 5 x 20 mm | 57 0174169 |

Table 5: Internal fuses

3.6 Earthing



With installation of the assembly kit a conductive connection to the frame or a separate earth connection has to be installed according to the EMC requirements.

Connection PE earth: Faston 6.3 x 0.8 mm.

Pay attention for the manufacturers information concerning detaching and replugging of the Faston connectors!

3.7 Connections on the rear

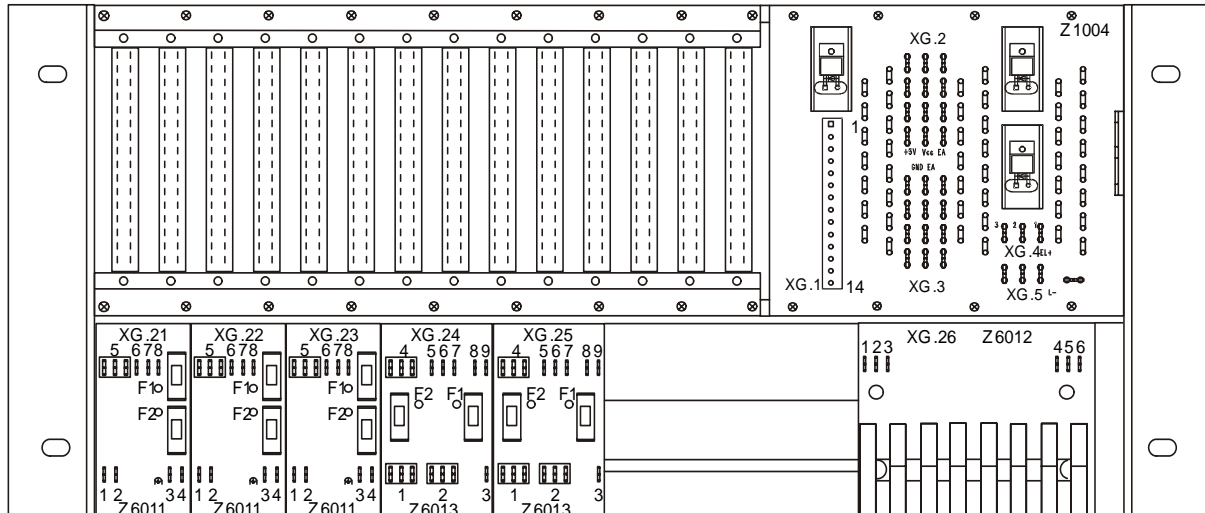


Figure 2: Connections on the rear of the additional power supply subrack K 1408

Connections on the rear of the additional power supply subrack K 1408 (see also assembly kit, wiring diagram):

3.7.1 Wiring ex works

| | |
|-----------------|---|
| XG .4 | Feeding L+ (24 V) for power supply module F 7126 |
| XG .5 | Feeding L- (24 V) for power supply module F 7126 |
| XG. 26 | Connections for Z 6012: fan with fan run monitoring and fuse monitoring |
| XG .26: 2, 3 | Power supply for fans |
| XG .26: 1 | Wire for fuse monitoring |
| XG .26: 4, 5 ,6 | Floating NO/NC contact for signalling of fuse and fan monitoring |

3.7.2 Wiring by customer

| | |
|---------------------|--|
| XG .1:9-11 | Connections for monitoring of the power supplies by power supply monitoring module F 7131 |
| XG .2 | Output + 5 V (supply of I/O subrack B 9302) |
| XG .3 | Output GND (supply of I/O subrack B 9302, connection to GND of central subrack) |
| XG .21 - XG .23 | Connections for Z 6011 (decoupling and fusing to feed the power supply modules) |
| XG .24, XG .25 | Connections for Z 6013: decoupling and fusing of the supply voltage for Z 6012 and feeding of the coupling module F 7553 in I/O subrack |
| XG .24: 1st I/O bus | |
| XG .25: 2nd I/O bus | |

3.8 Assembly kit, wiring diagram

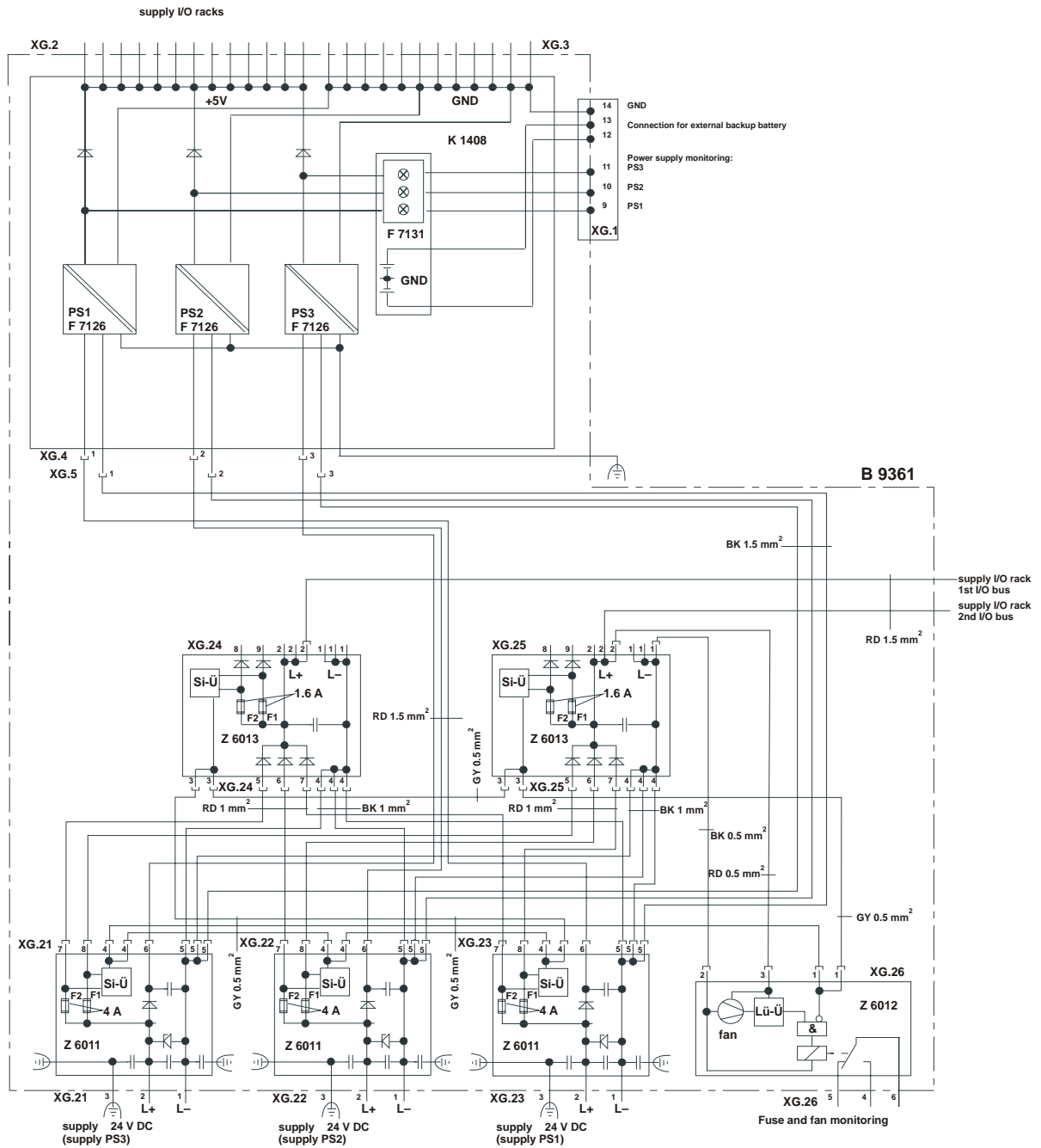


Figure 3: Assembly kit, wiring diagram

4 Side view assembly kit B 9361

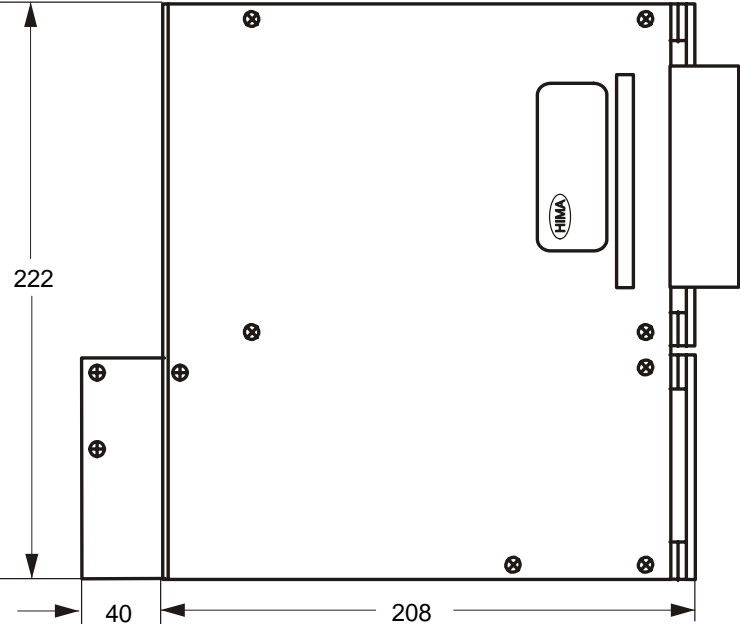


Figure 4: Side view