

FM Approvals
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CERTIFICATE OF COMPLIANCE

HAZARDOUS (CLASSIFIED) LOCATION ELECTRICAL EQUIPMENT

This certificate is issued for the following equipment:

H11, H41, H51 Automation System Modules

NI / I / 2 / ABCD; ANI / I / 2 / ABCD — HAI96426-001 / A

<i>Model No.</i>	<i>Description</i>
F8620/11 (H51)	Central Module
F8640 (H41)	Central Module
F9430 (H11)	24 Binary or Digital Inputs 24 V dc; 24 Binary or Digital Outputs 24 V dc, 12 W

Nonincendive Field Wiring Parameters:

Input:

$V_{\max} = 15V$, $I_{\max} = 500mA$, $C_i = 0$, $L_i = 0$

Output:

$V_{oc} = 6V$, $I_{sc} = 500mA$

Groups A/B - $C_a = 1\mu F$, $L_a = .15mH$

Groups C/D - $C_a = 2\mu F$, $L_a = .5mH$

H41, H51, H41q, H51q, Automation Systems Modules

NI / I / 2 / ABCD; T4 Ta = 60°C

<i>Module Name</i>	<i>Description</i>
F3221	16 Fold Input Module
F3236	16 Fold Input Module, Safety related
F3237	8 Fold Input Module for Prox. Sw., Safety related
F3240	16 Fold Input Module, Testable, 120 V ac/dc
F3248	16 Fold Input Module, Safety related, 48 V ac/dc
F3322	16 Fold Output Module
F3330	8 Fold Output Module, Safety related

F3331	8 Fold Output Module, Safety related
F3333	4 Fold Output Module, Safety related
F3334	4 Fold Output Module, Safety related
F3422	8 Fold Relay Module
F3430	4 Fold Relay Module, Safety related
F5220	2 Fold Counter Module, Safety related
F6214	4 Fold Analog Input Module, Safety related
F6215	8 Fold Analog Input Module
F6216A	8 Fold Analog Input Module w/Transmitter Supply
F6220	8 Fold Thermocouple Input Module, Safety related
F6221	8 Fold Analog Input Module, Safety Related
F6705	2 Fold Analog Output Module, Safety related
F6706	2 Fold Analog Output Module
F7126 (H51)	Power Supply Module
F7130A (H41)	Power Supply Module
F7131 (H51)	Power Supply Monitoring w/Buffer Batteries
F7133	4 Fold Power Distribution
F7553 (H51)	Coupling Module
F9430 (H11)	24 Binary or Digital Inputs 24 V dc; 24 Binary or Digital Outputs 24 V dc, 12 W
F8621A	Coprocessor Module
F8627X	Communication Module for Ethernet 10/100MBit
F8628X	Communication Module for Ethernet 10/100MBit
H4135	Relay Module in Terminal Case, Safety related
H4135A	Relay Module in Terminal Case, Safety related
H7505	Multifunctional Interface Module
H7506	Bus Terminal
K7915	Decoupling, Feeding, and Fusing Subrack
K9202	Cabinet Fan Module
K9203	Fan Module/19-inch Subrack
Z6015	EMC Filter

H41, H51, H41q, H51q, H41q, H51q, Automation Systems Modules

NI / I / 2 / ABCD; T4 Ta = 60°C — 99001 / 1; nonincendive field wiring parameters

<i>Model No.</i>	<i>Description</i>
F8650X	Central Module [H51q]
F8652X	Central Module [H41q]
F6217	8 Fold Analog Input Module

Nonincendive Field Wiring Parameters:

Input:

$V_{max} = 15V$, $I_{max} = 500mA$, $C_i = 0$, $L_i = 0$

Output:

$V_{oc} = 6V$, $I_{sc} = 500mA$

Groups A/B - $C_a = 1\mu F$, $L_a = .15mH$

Groups C/D - $C_a = 2\mu F$, $L_a = .5mH$

Special Condition of Use:

1. The equipment shall be installed in compliance with the enclosure mounting, spacing and segregation requirements of the ultimate application, including having tool removable covers.

HIMatrix F60, Safety Related System

NI / I / 2 / ABCD; T* Ta = 60°C

<i>Module Names</i>	<i>T*</i>	<i>Description</i>
BUS 01	T6	System Bus Board
PSU 01	T6	Power Supply Module
CPU 01	T6	Central Module with Profibus-DP, Safety related
AI 8 01	T6	Analog In Module, Safety related
AO 8 01	T6	Analog Out Module, Safety related
CIO 2/4 01	T6	Counter Module, Safety related
DI 24 01	T6	Digital Input Module, Safety related
DIO 24/16 01	T6	Digital I/O Module, Safety related
DI 32 01	T6	Digital Input Module, Safety related
MI 24 01	T5	Module PES system rack
DO 8 01	T6	Relay Output Module, Safety related
GEH 01	T6	6 Slot HIMatrix F60 Chassis
CM-Profibus DP	T6	
CM-RS485	T6	
CM-RS232	T6	
CM-RS232A	T6	

Special Condition of Use:

1. Shall be installed in compliance with the enclosure, mounting, spacing and segregation requirements of the ultimate application including provisions for Division 2 wiring method and access only by the use of a tool.

F1 DI 16 01	T4A	Digital Input Module, Safety related 16 channels
F2 DO 16 01	T4A	Digital Output Module, Safety related 16 channels
F2 DO 08 01	T5	Digital Output Module, Safety related 8 channels
F2 DO 04 01	T5	Digital Output Module, Safety related 4 channels
F3 AIO 8/4/01	T4A	Analog I/O Module, 8 channel Safety related, 4 channel not
Safety related		
F3 DIO 20/8/02	T5	Digital I/O Module Safety related, 20 channel Input, 8
channel output		
F60 MI 24 01	T5	Module PES system rack

HIMatrix Compact PES, Safety Related System

NI / I / 2 / ABCD; T*, Ta = 60°C

<i>CompactPES</i>	<i>T*</i>	<i>Description</i>
F20	T4	8 Digital Inputs/Outputs, 4 Pulsed Outputs, 2 Ethernet, 2
Field Bus Interfaces		
F30	T4	20 Digital Inputs, 8 Outputs (cross-circuit monitoring) Field
bus Interfaces		
F31	T4	20 Digital Inputs, 8 Outputs (cross-circuit monitoring)
F35	T4	24 Digital Inputs, 8 Outputs, 8 Analog Inputs, 2 Counter
Inputs, Field bus Interfaces		

Remote I/O	T*	Description
F1 DI 16 01	T4A	16 Digital Inputs, 4 pulsed outputs (cross-circuit monitoring)
F2 DO 16 01	T4A	6 Digital Outputs
F2 DO 08 01	T5	8 Channel Relay Outputs
F2 DO 04 01	T5	4 Digital Outputs
F3 AIO 8/4 01	T4A	8 Analog Inputs and 4 Outputs
F3 DIO 20/8 01	T4	20 Digital Inputs, 8 Outputs (cross-circuit monitoring)
F3 DIO 20/8 02	T5	20 Digital Inputs, 8 Outputs (cross-circuit monitoring)
F2 DO 16 02	T5	16 Channel Relay Outputs
F3 16/8 01	T5	16 Digital Inputs
F3 8/8 01	T3C	8 Digital Inputs

Special Condition of Use:

1. Shall be installed in compliance with the enclosure, mounting, spacing and segregation requirements of the ultimate application including provisions for Division 2 wiring method and access only by the use of a tool.

GuardPLC 2000

NI / I / 2 / ABCD; T4A Ta = 60°C

Module Names

RA-GEH 01	6 Slot GuardPLC Chassis
RA-PS 0503	Power Supply Module
RA-CPU	Safe GuardPLC 2000 CPU Module
RA-CO2	Safe Counter Module
RA-DIO	2416 Safe Digital I/O Module
RA-AO 08	Safe Analog Out Module
RA-AI 08	Safe Analog In Module
RA-BUS 2106	System Bus Board

Special Condition of Use:

1. Shall be installed in compliance with the enclosure, mounting, spacing and segregation requirements of the ultimate application including provisions for Division 2 wiring method and access only by the use of a tool.

GuardPLC 1200

NI / I / 2 / ABCD; T4A Ta = 60°C

Module Names

RA-MAXI	Safe GuardPLC 1200 28 I/O
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Special Condition of Use:

1. Shall be installed in compliance with the enclosure, mounting, spacing and segregation requirements of the ultimate application including provisions for Division 2 wiring method and access only by the use of a tool.

K7916, Feeding Decoupling Diode.

NI / I / 2 / ABCD; T6 Ta = 60°C

H6200, Analog Isolator / Power Supply

NI /1 / 2 / ABCD; T5 Ta = 60°C

H6210, HART Multiplexer

NI /1 / 2 / ABCD; T6 Ta = 60°C

Equipment Ratings:

Nonincendive for use in Class I, Division 2, Groups A, B, C, and D Hazardous (Classified) Locations

FM Approved for:

HIMA Paul Hildebrandt GmbH
Albert-Bassermann-Strabe 28
Bruehl Bei Mannheim, Germany 68782

This certifies that the equipment described has been found to comply with the following Approval Standards and other documents:

Class 3600	2011
Class 3611	2004
Class 3810	1989
Including Supplement #1	1995

Original Project ID: 3015309

Approval Granted: May 2, 2003

Subsequent Revision Reports / Date Approval Amended

Report Number	Date	Report Number	Date
3018714	September 2, 2004		
070302	March 6, 2007		
3027060	October 11, 2007		
071101	December 20, 2007		
080312	April 18, 2008		
RR202299	September 28, 2015		

FM Approvals LLC



J.E. Marquedant
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28 September 2015

Date