EM-M40H 8-CHANNEL ALARM INDICATION UNIT

FEATURES:

- **8-channels**
- **Selectable input mode n.o- or n.c- alarm contacts**
- **Four alternative alarm delays**
- **Relay output for alarm**
- **Blinker and memory for alarm**
- **Realtime indication**
- **Invertable outputs**
- **Test function**
- **Each output protected against short circuit**
- **Protected against inverse polarity**

EM-M40H is an 8-channel alarm logic suitable for alarm control in various automation processes. With EM-M40H the alarm panels and systems can be build easily. Each of the 8 channels can be set to be active either on opening or closing contact. Similarly the inputs can be controlled with voltage signal. The indication output displays the state of the input in realtime which means that the unit is transparent. The indication outputs can be inverted as well, in that case the output is reversed compared to input. The indication outputs can control signal lamps, leds or relays.

The alarm logic operates in following manner: Once the fault signal is detected, the indication light of the particular channel starts to blink and the group alarm relay and the alarm output give an alarm. If the fault causing the alarm is removed the alarm stays. The alarm can be removed only with the reset button. When the alarm is acknowledged the group alarm is removed and the indication light stays lit until the input situation has been normalized. (The new alarm blinks and the acknowledged alarm stays lit.) The alarm input can be delayed for 1 - 8 seconds and respectively the alarm relay output for 0 - 15 seconds. These delays are the same for all channels.

The operation of the unit can be verified with the test input. Relay output can be excluded from the test. There are 3 types of alarm outputs: NPN-open-collector, inverted NPN-open-collector and relay outputs. The group alarm relay is de-energized when alarm occurs so that an operating voltage failure causes an alarm as well. All NPN- transistor outputs are protected against short circuits and overloading. Protection recovers automatically when the short circuit is removed. The operating voltage input is protected against voltage surges and inversed voltage.

TECHNICAL DATA:

Supply	12...32 Vdc
Current consumption	100 mA
Input levels	"0" < 1 V "1" > 4 V
Input voltages	max. ±35 V
Input impedances	4.7 kohm (in 1-8)
Relay output	1 A 125 Vac / 30 Vdc
Transistor output	NPN-open collector
Load capacity of output	100 mA (Uout < 1 V)
Overcurrent protection	typ. 120 mA
Input delay	1 - 8s
Relay output delay	0 - 15s
Oper. ambient temp.	0...50 °C
Dimensions of housing	97*133*35,5mm

EMC-tested and CE-marked
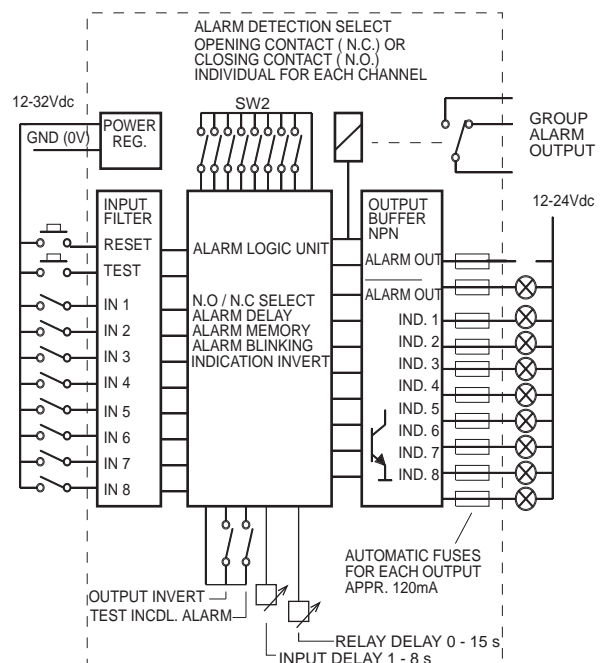
EM-M40H 8-CHANNEL ALARM CONTROL UNIT

CONNECTION EXAMPLE OF ALARM LOGIC UNIT EM-M40H
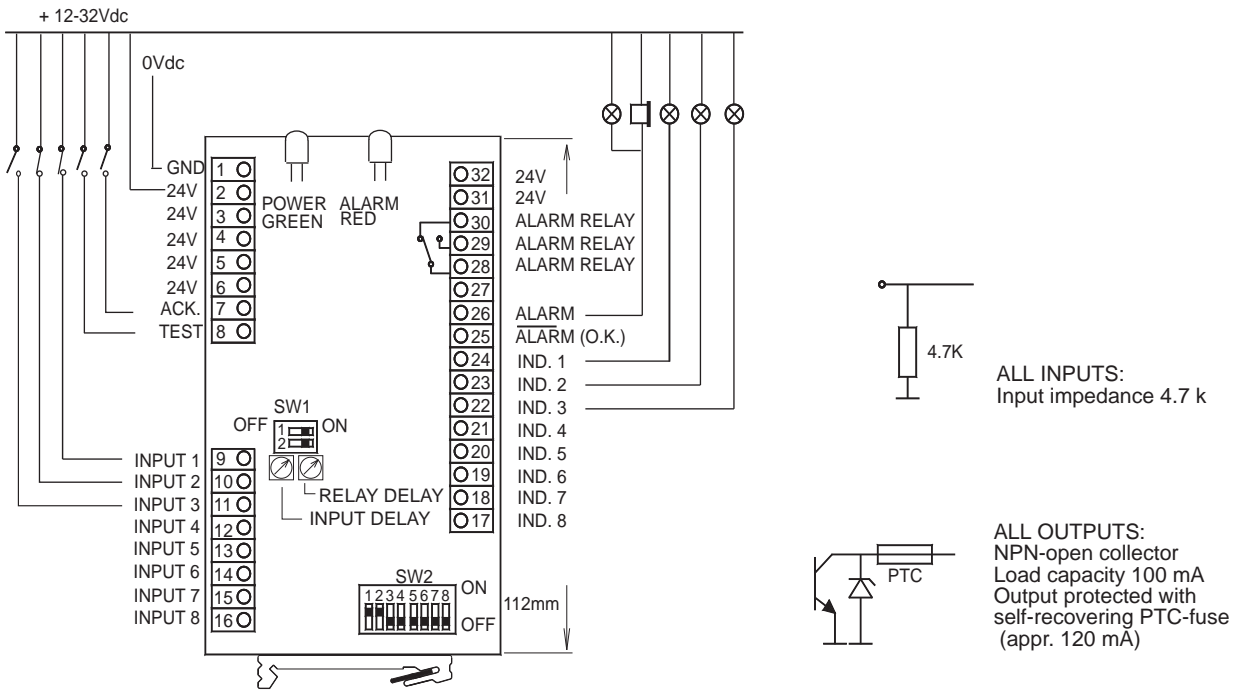
SELECTION OF THE INPUT MODE SW2

Opening contact causes an alarm (Uin < 1.0V), switch "ON"
Closing contact causes an alarm (Uin > 4 V), switch "OFF"

NOTICE !

1) IF INPUT IS NOT USED, SET THE RESPECTIVE
   SWITCH (SW2) ON "OFF"-POSITION

2) TEST AND ACKNOWLEDGEMENT ARE ACTIVATED
   WITH CLOSING CONTACT.

OPERATING MODE SELECTOR SW1

OPERATING DIRECTION OF THE OUTPUT (SW1/1)
- Direct operation: Alarm activates output, switch "ON"
- Inverting operation: Normal condition activates output,
  switch "OFF"

OPERATING MODE OF THE TEST (SW1/2)
- Test activates indications and the alarm relay, switch "OFF"
- Test activates only indications, switch "ON"

MOUNTING

Only with
additive lockings