DISP-BOYDP
CRANE-BOYDP

LOAD LIMITATION ELECTRONICS FOR 2 HOISTING DEVICES

Electronics ensuring the individual limitation of loads lifted by 2 hoisting systems and also the limitation of a function of these loads (sum, difference, multiplication, ratio)

DISP-BOYDP

Features

o Easy and intuitive calibration
o Display of hoisted loads and input signals
o Internal monitoring system of the integrity of the load cells and the load limitation electronic (positive safety)
o TEST button on front cover
o Options
- 4(0)...20mA or 0...10V analog output
- RS232, RS485, USB or fieldbus capabilities
- NEMA 4X/IP65
- Rail DIN adaptor
- Power supply : 48VAC (only for 85...230 VAC version)
- Also available with industrial metallic housing --> see CRANE-BOYDP products

Applications

Load limitation on
- overhead cranes
- container cranes
- gantry cranes

Functions

- Internal survey system of the load cell and the electronic (positive safety)
- TEST button in order to check the good working of the detection system.
- Secret code prohibiting programming by unauthorized persons.
- Intelligent filter with quick reaction to quick overload while not reacting on transitory non significant overload.
- Maximum and minimum memories, Smart filter,
- A math function (+, -, * or %) can be performed on the two signals.

Specifications	DISP-BOYDP	DISP-BOYDP-24	CRANE-BOYDP	CRANE-BOYDP-2	
Type	Load limiter for dual 4..20mA load cell	Load limiter for dual 4..20mA load cell	Load limiter for dual 4..20mA load cell	Load limiter for dual 4..20mA load cell	-
Input range	2 x 4...20mA	2 x 4...20mA	2 x 4...20mA	2 x 4...20mA	-
Sensor excitation	18VDC ± 20% @70mA max. per input channel	18VDC ± 20% @70mA max. per input channel	18VDC ± 20% @70mA max. per input channel	18VDC ± 20% @70mA max. per input channel	-
Display	5 digits (14.2 mm)	5 digits (14.2 mm)	5 digits (14.2 mm)	5 digits (14.2 mm)	-
Accuracy	0.1	0.1	0.1	0.1	% F.S.
A/D converter	16 bit	16 bit	16 bit	16 bit	-
Converter rate	Up to 20 readings /s	Up to 20 readings /s	Up to 20 readings /s	Up to 20 readings /s	-
Service temperature range	0...+50	0...+50	0...+50	0...+50	C
Storage temperature range	-40...+60	-40...+60	-40...+60	-40...+60	C
Power supply	85...250 VAC (21VA)	18...36 VDC (13W), 24VAC (16VA)	85...250 VAC (15VA)	18...36 VDC (13W), 24VAC (16VA)	-
IP Rating	IP54*	IP54*	IP54	IP54	-
Qty of relay	3	3	3	3	-
Relay type	Form A - potential free	Form A - potential free	Form A - potential free	Form A - potential free	-
Breaking capacity relays	3A @250VAC or 30VDC	3A @250VAC or 30VDC	3A @250VAC or 30VDC	3A @250VAC or 30VDC	-

* : IP rating for front panel only
F.S.: full scale - Specifications subject to change without notice

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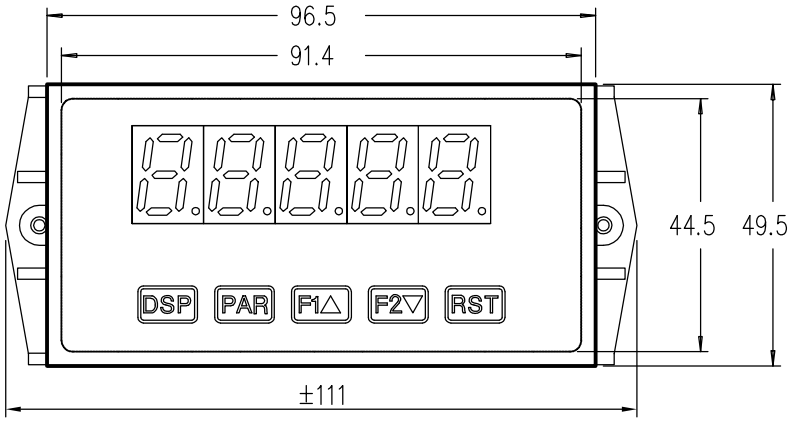
LOAD LIMITER

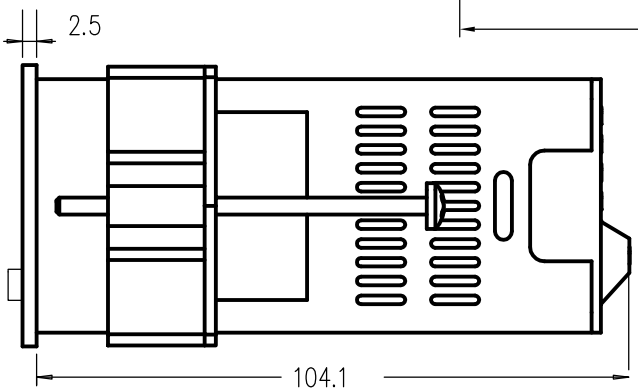
model DISP-BOYDP

CE

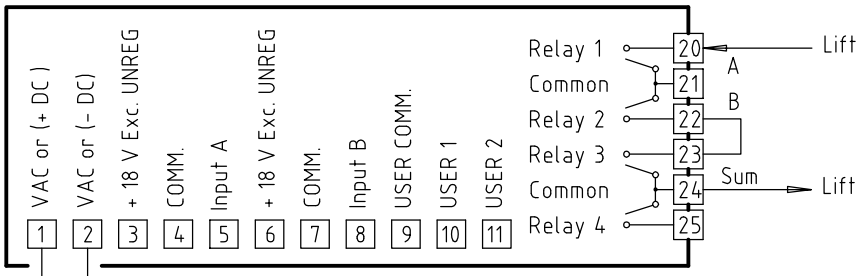
Power supply : 85 to 250 VAC / 10-30 VDC IP54
DISP PAXDP :85 to 250 VAC- Input 4-20 mA - 0/10 V - Ohms
" " PAXDP-DC: 10-30 VDC - "

Options :
CARD CDL10 = 4-20 mA / 0-10 V output
CARD CDC20 = RS232 output
CARD CDC10 = RS485 output
CARD CDS20 = 4 Relays output
CARD CDS10 = 2 Relays output
F= Splashproof Cover IP 65



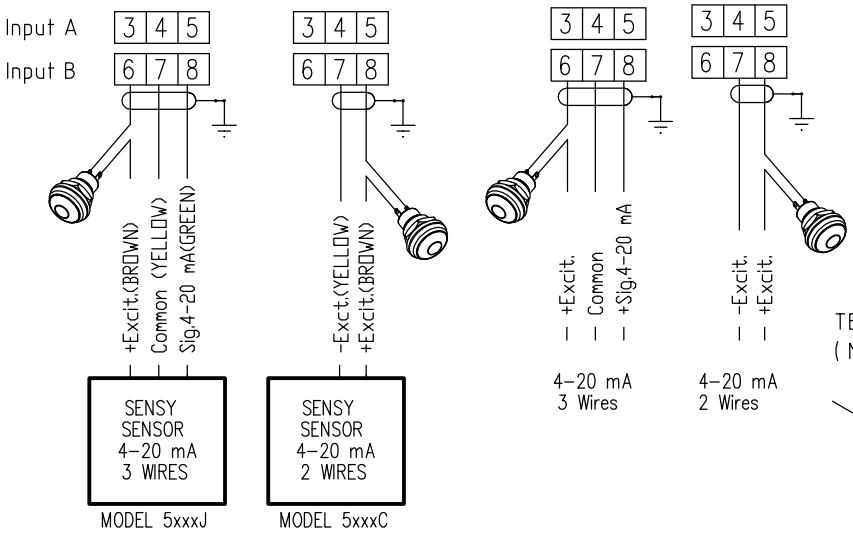


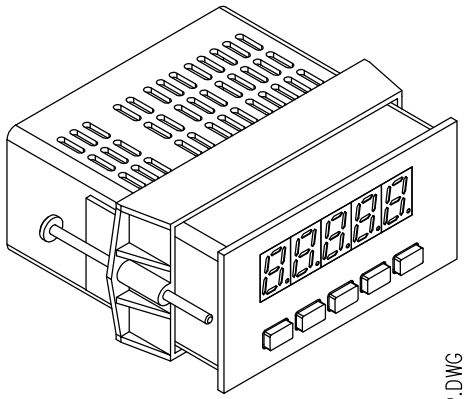
Note:
recommended min. clearance (behind the panel) for mounting is depth 140 mm and heigth 53.4mm.
Panel cut-out
92mm (-0+0.8)
45mm (-0+0.5)



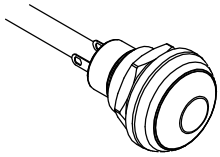
ReLay 1= Overload set point A
ReLay 2= Overload set point B
ReLay 3= Overload set point A+B (Sum)
ReLay 4= Not Applied

POWER SUPPLY





TEST BUTTON (delivered)
(NC Contact)



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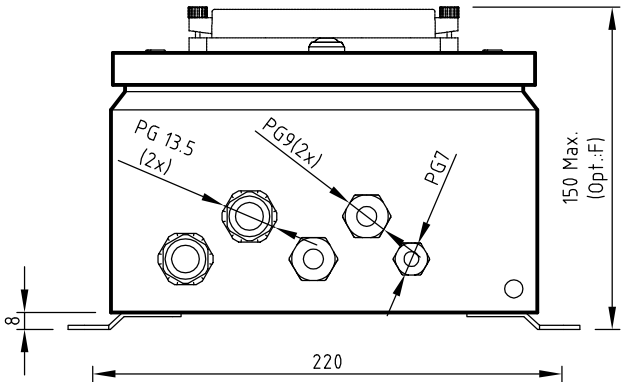
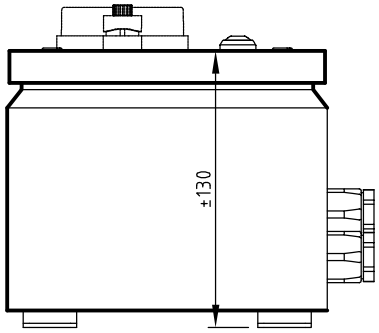
LOAD LIMITER

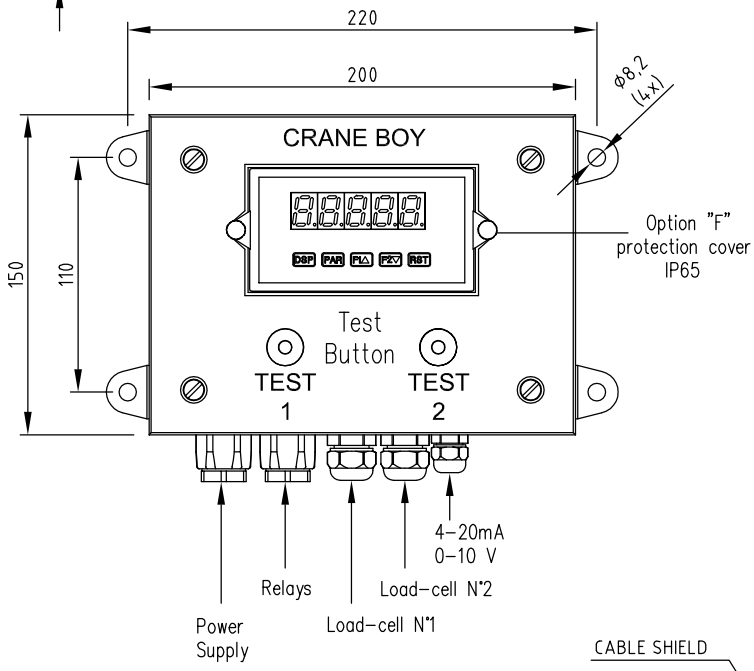
model CRANE–BOYDP

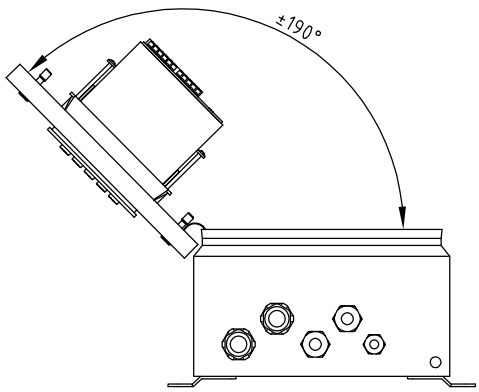
Power supply : 48 to 250 VAC / 24 VAC / 10–30 VDC IP54
CRANE BOY :48 to 250 VAC– Strain gages input
" " BOY–24: 24 VAC – " "
" " BOY–DC: 10–30 VDC – " "
" " BOYP :48 a 250 VAC – 4–20 mA input
" " BOYP24: 24 VAC – " "
" " BOYPDC: 10–30 VDC – " "

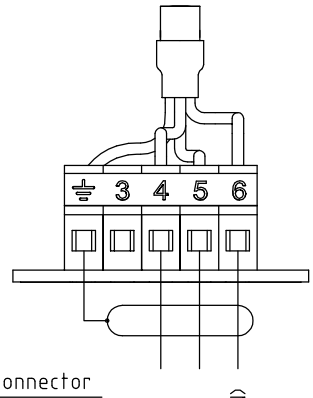
Options :
CARD CDL10 = 4–20 mA / 0–10 V output
CARD CDC20 = RS232 output
CARD CDC10 = RS485 output
F= Splashproof Cover IP 65

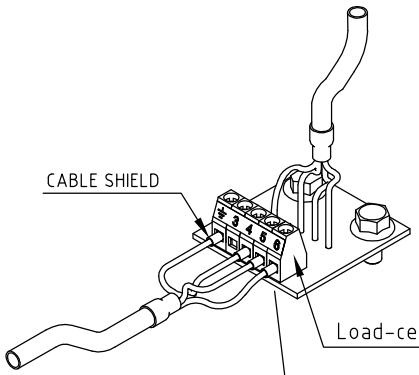


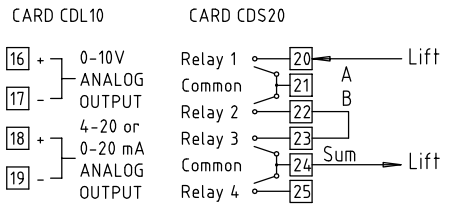


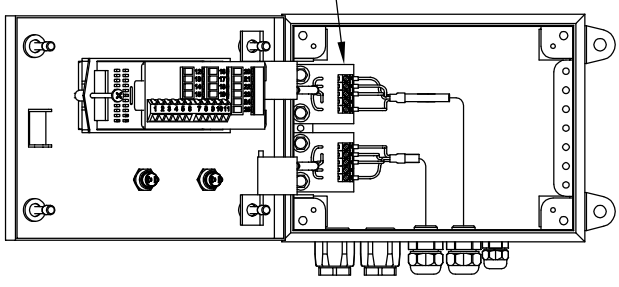


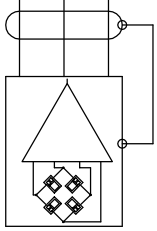


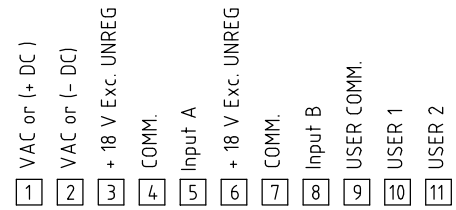












ReLay 1= Overload set point A
ReLay 2= Overload set point B
ReLay 3= Overload set point A+B (Sum)
ReLay 4= Not Applied

Input 4 – 20 mA

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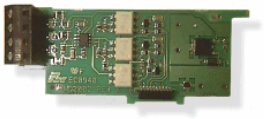
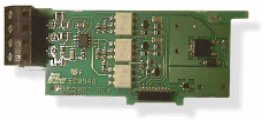
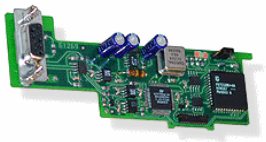


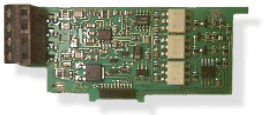
CARD-CDC10
- RS485 field bus communication interface
- Available with crew terminals or DB9 connector



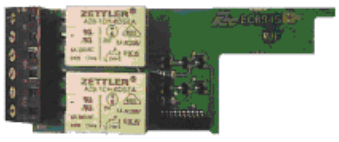
CARD-CDC20
- RS-232C half duplex communication interface
- Available with crew terminals or DB9 connector



CARD-CDC50
- Profibus-DP (EN 50170) communication interface



CARD-CDL10
- Analog output signal: 0-20 mA, 4-20 mA, or 0-10 VDC (*)



CARD-CDS10
& CARD-CDS20 (already included in load limitation electronics)
- 2 or 4 set-points activating each an independent relay

It is possible to install up to 3 different option cards in the same panel meter. These options have to be of different type.
Ex. : CARD-CDS-20 + CARD-CDL10 + CARD-CDC20 is available
CARD-CDS20 + CARD-CDS10 or CARD-CDC10 + CARD-CDC20 is not available

Full technical documentation available on request