TYPE: ADP15-SP16

ADP15-SP16 Process Input Indicator/Controller with up to 16 Setpoints

Features

- Up to 16 Set Points, programmable from ADP15 keypad
- 4 and 8 relay DIN rail module
- Individual set points & hysteresis values
- Selectable set point quality
- Relay contact rating 230V @ 5A AC
- PID Control
- Programmable output actions
- Peak hold

Typical Applications

- Crane safety remote display and control
- Batch control
- Multiple motor/pump control

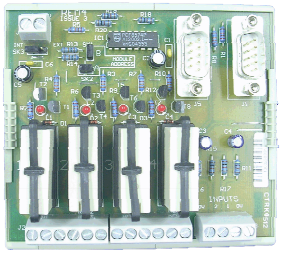
Description

The DIN rail mounted remote relay units offer an increased number of set points over that provided by a standard ADP15 indicator/controller. This allows for multi action operations.

The software of the ADP-SP16 gives the user freedom to program the number of set points for their requirements. A single ADP-SP16 will control up to 16 set points, programmed from its front panel. Set points can be individually set up with In Flight compensation and hysteresis values. Separate 'Output Latch' and 'Output Action' for up to 14 of the 16 set points is available, settable from the front panel of the ADP-SP16. A special mnemonic allows the user to specify the number of set points to be used.

A DIN rail mounted power supply unit is required where more than 4 set points are to be used. The units are driven from the ADP-SP16 via an internal special remote driver board. All relays are pluggable and connections are made via field screw terminals.

Outputs include:-
Analogue voltage and current, Industry standard digital communications, Relays, Printer Drive



Options and Accessories include:-
Panel mounting, DIN rail mounting, Power supplies for 110/230 V AC or 9-32V DC, Communications for Printer, PLC or PC.

Software Options include:-
Power Factor Printers DP data only and TDP for real time/date. Printers DP data only and TDP for real time/date.

Specifications

General Specifications

Accuracy	Typical ±0.08% of output, ± 0.08%FSD
Resolution	As display resolution, max 15 bits
Calibration	By 15-turn pre sets for gain and offset
Inversion	By keypad value
Isolation	±130V RMS or DC max to analogue input or to any other port
Ranging	Fully keypad scalable over desired display range
PID	Power level, when selected = 12 bit resolution output

Display

7 segment 4.5 digit display (max display ±19999), 10mm high digits
3 x 3mm LED's 2 for relay status, 1 for program and hold indication

Front Panel Keys/Buttons

4 membrane panel keys, offering the following functionality, when configuring:-
Scroll key to view/update parameter.
Digit select key
Digit increment key
Reset key
The keys can be configured in normal operation, to offer the following functionality
Keypad can be disabled when in normal operation, required.
Peak/Trough hold reset
Resetting of relay latches
Auto-Zero display

Physical

Case Dimensions	DIN 72 x 72 x 163mm (excluding mounting terminal)
Case Material	Grey Noryl, flame retardant
Weight	750 grams
Terminals	2.5mm, saddle field terminals
Accessibility	Electronics removable through front panel leaving field wiring and case in situ.

Data Retention/Protection

Retention:	10 years for set up values, minimum of 100,000 write cycle
Protection of data and function(s)	Watchdog timer giving repeat auto resets. Impending power detection and hold off. Keypad security and time out.

CE & Environmental

Storage temperature	-20 to +70ºC
Operating temperature	-10 to 50°C
Relative humidity	95% maximum non-condensing
Low Voltage Directive	2006/95/EC
EMC Directive	2004/108/EC

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Input Options

Input Type	Input Range	Order Code	Input Range	Order Code
Temperature	Platinum Pt100	PT	Type K Thermocouple	T1
DC Voltage	+/-200mV	DCV2	+/-20V	DCV4
DC Voltage	+/-200V	DCV5		
DC Current	3.5mA to 20.5mA	DCA2E		
Potentiometer	Any value in the range 100R to 10K	RL		

DC Analogue Outputs

Output Range	Order Code	Output Range	Order Code
0 to 10V	V4	4-20mA	A3
Maximum Current out 50mA		Maximum Voltage out 20V	

Communications Port

Port Type	Order Code
RS485/232	COM 1

RS485 -For up to 32 instruments on 1 bus, 4 wire.
RS232 -For printer or direct connection to 1 device.

Port Specifications

Baud rates	300, 600, 1200, 2400, 4800, 9600 (19200 MANTRABUS only)
Electrical isolation	±130V RMS or DC max to analogue input or any other port
Formats	MODBUS RTU, MANTRABUS and printer output formats
Cable Length	1km (depending on baud rate)

The printer option utilises the communications board RS232 output. The output drive for a printer offers a Time/Date stamp and log number together with the label of units of measure, or the output drive for a log number only, together with label of units of measure. A wide range of printers may be connected.

In all bi-directional communications option, all display data can be accessed via the communications port along with relay and EEPROM status. All user configurable data can be changed including EEPROM enable/disable and relay reset (address code cannot be changed).

Alarm/Control Outputs

Relay Output Type	Order Code
4 relay module (SPCO)	REM4
8 relay module (PSU required)(SPCO)	REM8
Power supply for REM8 module	REMPSU
REM to REM cable (req. for additional REM units)	REMC2

Relay Output Specifications

Relays	230V at 5A AC resistive
Isolation	±130V RMS
Keypad	Can be used to reset latch, when relays configured for latching

Power Supplies

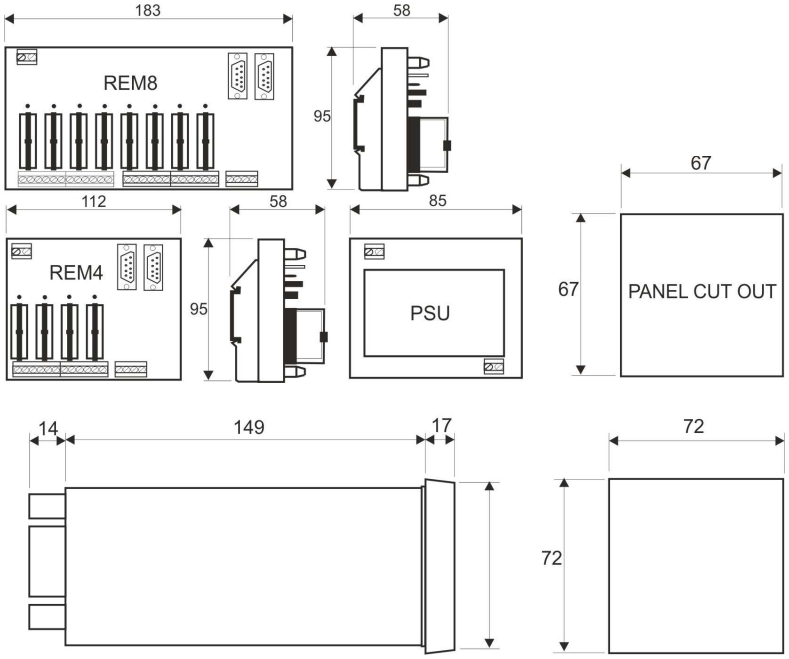
Power Supply Range	Order Code
220V-230V AC 50-60Hz 10W	240
110V-120V AC 50-60Hz 10W	110
9-32V DC 10W isolated	12/24

Mounting Options

Mounting Type	Order Code	Mounting Type	Order Code
Panel Mounting	P	DIN Rail Mounting	D

Mechanical Dimensions

All dimensions in millImeters



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Due to continual product development, LCM Systems Ltd. reserves the right to alter product specifications without prior notice.

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