# Dual Channel Process Indicator

Easy Keypad Scaling for Voltage, Current and Millivolt Signals plus Built-in Math Functions





## FEATURES

- Accepts Voltage, current and millivolt signals from all type of transducers
- Easily scalable from front keys
- Three programmable alphabets for showing engineering units e.g. PSI, Lbs, etc.
- Programmable time base for rate
- Selectable decimal point to 1000th place
- Auto/manual scanning with HOLD feature
- Two relays and one audio/visual output per channel (optional)
- Output status indication on front panel
- Keeps track of process run time
- Built-in buzzer (with alarm option)
- Captures Min/Max readings
- Shows channel differentials
- Security password for preventing unauthorized program changes

# DESCRIPTION

The DPM series offers two completely independ-

ent channels for indicating Process readings. Linear voltage, current or millivolt signals are converted to desired engineering units, and then displayed. In addition, it also monitors a number of useful functions such as high and low process readings, process run time, rate of process change, channel differentials, etc.

If desired, the display can be held indefinitely on either channel or automatically scan between the readings on two Channels. Channel display time is programmable and can be set any where from 1 to 999 seconds. While holding on any one channel, internally the unit keeps scanning both the channels to keep track of necessary parameters such as alarm conditions, channel differentials, etc.

Input signals are displayed in engineering units that correspond to the process being monitored e.g. if measuring pressure, the input signal can be scaled to give the reading directly in PSI. Scaling is accomplished from the front keys and does not require any tedious formulas. Also offered is a tare function for weighing and any similar applications.



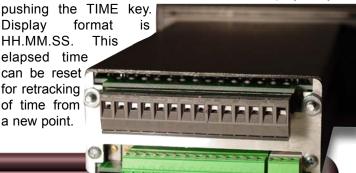


For further information, contact: Tel. No: (480) 607-3100 (Ext. 201) Fax No: (480) 607-3101 www.kaifdigital.com automatically stored and may be displayed with the grammable and can be set in seconds. touch of a key. These stored peaks can be reset to current process reading at any time, thus allowing retrack- Process run time is monitored and can be displayed by ing of process from a new point.

Four process based alarms, two for each Channel, are HH.MM.SS. also featured by this series. Additionally, each Channel elapsed time has one audio/Visual alarm. This alarm turns on an LED can be reset / on the front panel as well as activates the Buzzer. The for retracking buzzer also comes on whenever relay/solidstate outputs of time from are activated. The outputs can be programmed as nor- a new point. mally open/noramally closed and latching/non-latching.

Each Channel on DPM units constantly tracks high and Another useful function on these units is the display of low process readings. This feature is useful if the Channel differentials. This can be displayed as C1-C2 or process is not being continuously watched, or must be C2-C1. Also calculated by the unit is rate of Process left unattended e.g. overnight. Process extremes are change on each Channel. Time base for this rate is pro-





### **IPUT TYPE:**

- Loop Current: 4-20ma, 0-50ma
- Voltage: 0-5vdc, 0-10vdc
- Millivolt: 0-100millivolt

#### Other Inputs available: Consult Factory **CCURACY:**

Voltage = 0.05% FS Current = 0.05% FS

## NALOG TO DIGITAL CONVERSION:

20,000 count A/D converter

Dual slope integrating converter.

Conversion rate: Seven conversions/sec (typical)

#### DISPLAY:

Red 7-segment LED display, 0.39 inch (10mm) height Negative polarity indication. Over-range indication.

Display test: 8.8.8.8.8.8. on power up

#### **CHANNEL DISPLAY TIME:**

Programmable from 1-999 seconds.

#### **ELAPSED TIME:**

Displayed in hours, minutes & seconds. Display for-

mat: HHH.MM.SS

#### **POWER OPTION:**

120VAC -- 60 Hz (Standard) 220VAC -- 50 HZ (Optional)

8VDC -- 12VDC @ 900ma (optional)

#### **SCALE/OFFSET:**

Scale programmable from 1 - 30000

Offset: 0 - 20.00 (current), 0 - 10.000 (voltage),

0 - 100.0 (millivolt)

Decimal Point: 9999, 999.9, 99.99, 9.999

#### **RELAY/OPEN COLLECTOR OUTPUT:**

Relays: Single pole single throw, 1 amp @ 28vdc or 0.5 amp @120vac

Open Collector output: 100ma maximum (internal 5vdc

Outputs programmable as normally open, normally

closed, latching or non latching.

Displayed as rate of process change/minute.

#### **RATE TIME BASE:**

Programmable from 1-9999 minutes.

#### **DIMENSIONS:**

Case: 3.60" x 1.75" x 8.5" Bezel size: 4/40" x 2.25" x 0.45"

120vac Power and relay output option.



To find a model number, fill in blanks 1, 2, and 3 with appropriate selection. Refer to ordering example below:

