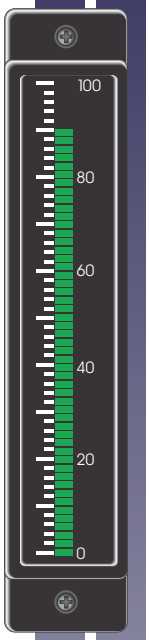
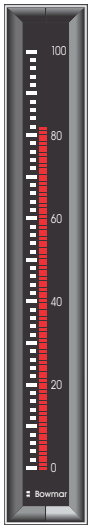
Bowmar Series
Single Edgewise BarGraphs™



APM-500

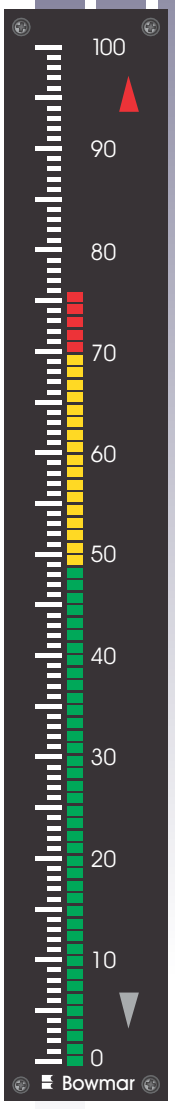


APM-100

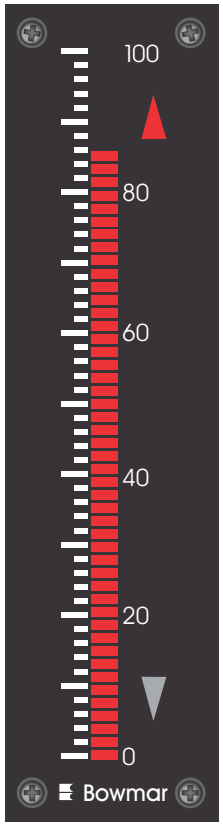
The Weschler Bowmar Series Single Edgewise BarGraphs feature bright, easy-reading 3" to 10" LED bars for OEM and process applications. The Bowmar Series offer 51 or 101 segment bar displays with 2% or 1% resolution. Choose from red, green or amber LEDs on most larger models. Colors can also be mixed within the bar to provide permanent indication zones. A rear panel low/high brightness selection terminal changes the LED intensity for operator and control room conditions. Standard white on black or custom black on white scales can be provided. Expanded scales can also be ordered to view the most important part of a measurement in greater detail.

Screw terminal connectors are standard on the APM series. Connections to the BG series are made to a rear panel card edge connector. Front panel, mounting and performance are identical in both series.

The Bowmar BarGraph instruments accept DC process inputs, either voltage or current. Other BarGraph models can be configured for a wide variety of input signals. Retrofit sizes are available for most panel and switchboard meters in use today. These instruments satisfy the high quality standards set forth by the utility, OEM and process control industries.



APM-800
with MX option



APM-600

FEATURES

51 or 101 segment LED bar array

Red, green, yellow, blue, white or mixed color bar

Selectable LED brightness

DC inputs to 10A and 100V

Differential input

Harsh environment enclosures

WESCHLER INSTRUMENTS
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SPECIFICATIONS

Bar Display
APM500, APM600, BG500, BG600
- 51 segment LED plus underrange and overrange
- 5" display

APM100, BG100
- 101 segment LED plus underrange and overrange
- 3" display

APM800, BG800
- 100 segment LED plus underrange and overrange
- 10" display

Input Type

DC Volts	50mV to 100V
DC Amps	10mV to 10A

Response Time
25msec full scale, damping to 1sec available

Temperature

Operation	0 to 50°C
Storage	-60 to 71°C

Shock
to 8.5 G's

Humidity
0 to 95% RH, non-condensing

Weight
6 to 27 oz.

Calibration
NIST traceable factory calibration. Some models may be field adjusted ± 20% at Zero and Full Scale

Power Requirement
5VDC ± 0.25V, 400mA typical

Input Impedance
≥100kohms typical, 50mV current shunt for most ammeters

Linearity
0.5% (from 0 to 50°C)

Gain Temperature Coefficient
± 0.015%/°C maximum

Zero Temperature Coefficient
± 0.01%/°C maximum

Under-range
150% of input

Over-range
250% of input

Display Modes
Bar and Point

Power Supply Sensitivity
± 0.1%/volt maximum

Input Bias Current
100 nA typical

Common Mode Rejection
60dB typical

Standard Scales
- 0-10
- 0-50
- 0-100
- -10/0/+10
- -50/0/+50
- -100/0/+100
- Available with % signs

Over 2300 scales available

Connections
APM: Terminal studs
BG: Card edge (mating connector included)

OPTIONS MATRIX GUIDE

Option Code	100	150		500	600	800	DESCRIPTION
A	●					●	Differential Input, DC volts
F	●	●		●	●	●	Increased Damping
G	●	●		●	●	●	Custom Input Range
Z	●	●					Black Metal Bezel
X				●	●		Drip Proof Bezel
P					●	●	Red Filter
Gr	●	●		●	●	●	Green Display
YL	●	●		●	●	●	Yellow Display
MX	●	●		●	●	●	Mixed Display (Red, Green, Yellow)
BL	●	●					Blue Display
WH	●	●					White Display
UN	●	●					Sunlight Readable
S	●	●		●	●	●	Library Scales (Scale #)

● = *Available*

ORDERING GUIDE

SAMPLE PART NUMBER (SEE BOTTOM OF PAGE FOR EXAMPLE)

A	P	M	1	0	0	V	V	0	1	0		S	1				

PART NUMBER

TYPE:
APM1 = 3" LED BarGraph
APM5 = 5" LED BarGraph, with bezel
APM6 = 5" LED BarGraph
APM8 = 10" LED BarGraph
BG1 = 3" LED BarGraph
BG6 = 5" LED BarGraph

INPUT TYPE:
00 = DC
50 = Center Zero (APM only)

INPUT SENSITIVITY:
VV = Volts
MV = Millivolts
AA = Amps
MA = Milliamps
UA = Microamps

INPUT LEVEL:
Example 4/20, 10, 150
Indicate Full Scale Value

SCALE NUMBER:
(Consult factory for exact need)

VERTICAL	HORIZONTAL	RANGE
S12	S13	0-10
S8	S11	0-50
S3	S1	0-100
S3P	S1P	0-100%
S136	S137	-10, 0, +10
S113	S112	-50, 0, +50
S4	S2	-100, 0, +100
S242	S10	Tick Marks Only
Sbnk	Sbnk	Blank
SH	SH	Custom Artwork

OPTIONS:
If more than one option is required, continue placing each respective option letter after each other.
See Options Matrix Guide on previous page or consult factory.

ACCESSORIES:
ACC-001 Card Edge Connectors (BG/BGD)
ACC-002 Screw Type Barrier Strip (BG/BGD)

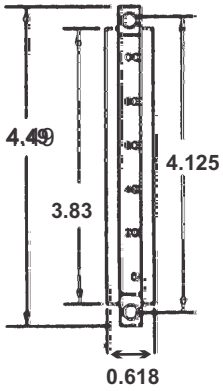
EXAMPLE:

A	P	M	1	0	0	V	V	0	1	0		S	1				

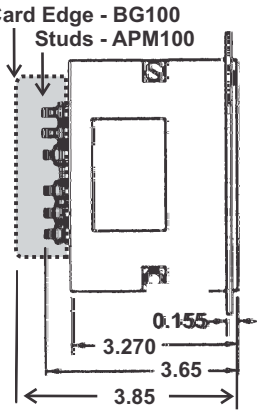
(APM1) 3" LED BarGraph, (00) DC input, (VV) Volts input sensitivity, (010) 0-10 input level, (S1) 0-100 horizontal scale.

DIMENSIONS

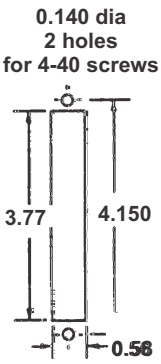
APM 100



FRONT VIEW

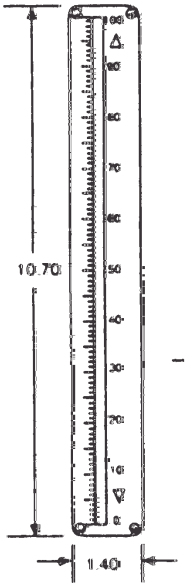


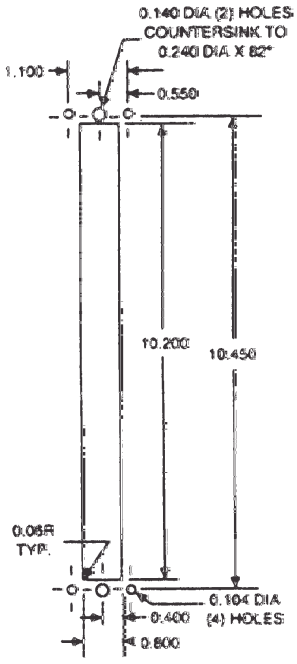
SIDE VIEW



PANEL CUTOUT

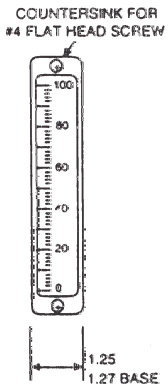
APM 800



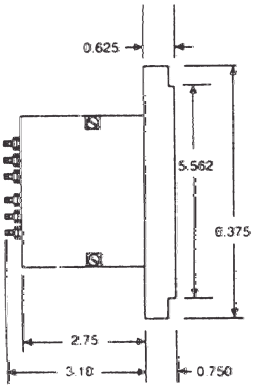


FRONT VIEW PANEL CUTOUT

APM 500



FRONT VIEW



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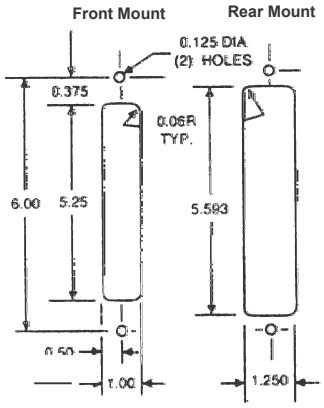

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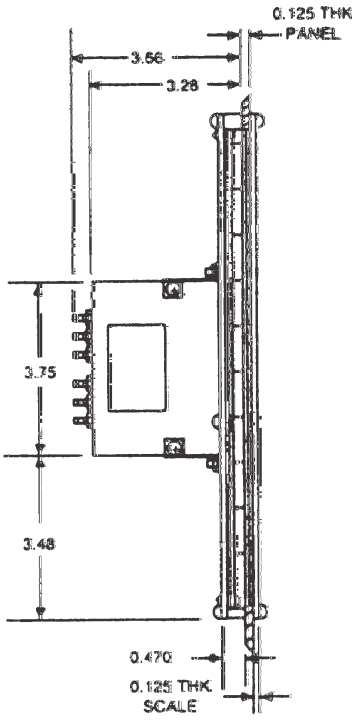
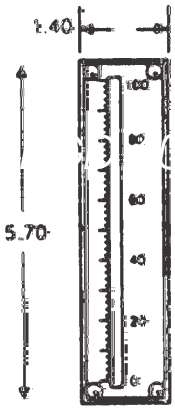
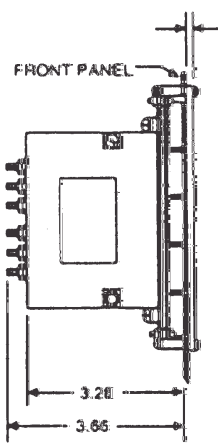


SIDE VIEW

APM 600



FRONT VIEW



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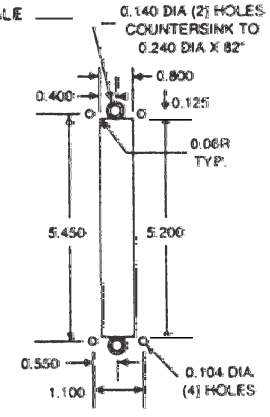

PANEL CUTOUT

2/22/18

Options and features vary by model. Contact factory for details and latest specifications.

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