

Mark II Molded Plastic Manometers

3% Accuracy For Stationary and Portable Applications at Minimum Cost

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Fig. 13-1, Mark II Model No. 25 Inclined-vertical manometer. (shown with optional A-612 portable stand)



Fig. 13-2, Mark II Model No. 40-1 Inclined manometer

Dwyer Mark II series molded manometers are of the inclined and inclined-vertical types. The curved inclined-vertical tube of the Model 25 gage provides higher ranges with more easily read increments at low readings. The Model 25 is excellent for general purpose work. The Model 40 inclined gage provides linear calibration and excellent resolution throughout its range. The Model 40 is ideally suited for air velocity and air filter gage applications. Both gage types are capable of pressure measurements above and below atmospheric as well as differential pressure measurements.

Construction - Mark II manometers are economically priced, compact and available in both stationary and portable configurations. Portable stand is standard on Model 40, available as optional A-612 stand for Model 25. Construction is simple with virtually indestructible molded white styrene-acrylonitrile housing, indicating tube and fluid wells, molded ABS knobs and zero adjust plunger, shock mounted glass level vial and leak proof "O" ring seals. Moderate overpressures are accommodated by an overflow tank incorporated in the Model 25. Greater protection is provided by float operated overflow traps in the Model 40. Scales are lithograph printed on aluminum and epoxy coated.

Installation - Mark II manometers can be mounted on any vertical surface with the two mounting screws provided. A built-in spirit level simplifies leveling before mounting screws are tightened. Simply fill the reservoir, adjust fluid level to zero, connect the tubing, and the gage is ready for operation.

Accessories - Included with each Mark II manometer are two tubing connectors for 1/8" pipe or sheet metal ducts, two mounting screws, ¾ oz. Bottle of indicating fluid, red and green pointer flags and complete instructions. The Model 25 also includes 8' of flexible double column plastic tubing.

Portable operation of the Model 25 is made possible by the use of the optional A-612 portable stand. A short piece of tubing can be slipped over the Model 25 pressure connections to contain the gage oil in transit. The Model 40 contains two 4 ½ lengths of clear plastic tubing, a plastic swing-out stand and leveling screw for portable operation. It also features convenient rapid shutoff pressure connections and integral overpressure safety traps.

OEM Specials - All Dwyer Mark II molded plastic manometers can be supplied on OEM quantities with your name or special graphics and scales.



INSTRUCTIONS FOR USE OF THE MARK II MODEL #25 MANOMETER

INSTALLATION

- 1. Manometer may be mounted inside or outside of the booth in a convenient location at approximately (5) feet.
- 2. After mounting the manometer, run the tubing supplied with the manometer to the filter bank. Place the tube from the high side part of the manometer to the air entering side of the filter. Place the tube from the low side of the manometer to the air leaving side of the filter bank.

NOTE: On a down draft booth with an exhaust pit in the floor, tubing from the low side of the manometer should be run into the pit and as close as possible to the filter back for the greatest accuracy.

SET-UP

- 1. Fill the manometer with fluid as per manufacturer's instructions.
- 2. With the booth off, adjust the manometer to read zero.
- 3. Start up the booth with clean filters and observe the rise in the manometer reading. This reading should now be marked with the magnetic <u>green arrow</u> (indicating clean) supplied with the manometer.
- 4. From the <u>green</u> arrow reading, add 0.30" and mark that point with the magnetic <u>red</u> arrow. This will be the dirty filter mark for changing the exhaust filters. For other style filters, the differential setting should be adjusted to the manufacturer's recommendations.

NOTE: Filtration used that is other than the *booth original design* may require additional static capability in the exhaust fan; consult Global Finishing Solutions to determine fan compatibility.

NOTE: If a manometer is used on an *intake filter bank* Global Finishing Solutions recommends following the above set-up steps and adding 0.15" to the green arrow setting for step four (4).

NOTE: The instructions above are for single stage filtration, for set points and procedures for *multiple stages of filtration* reference the booth specific manual or consult Global Finishing Solutions.

GLOBAL PART #242-001



MODEL CHART

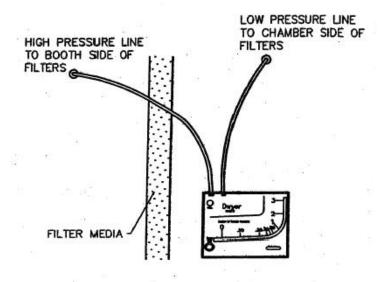
Model	Range	Fluid Used
25	0-3 in w.c.	Red oil, .826 s.g.
26	0-7 in w.c.	Blue oil, 1.91 s.g.
27*	0-7000 fpm	Red oil, .826 s.g.
28*	0-10,500 fpm	Blue oil, 1.91 s.g.
MM-80	0-80 mm w.c.	Red oil, .826 s.g.
MM-180	0-180 mm w.c.	Blue oil, 1.91 s.g.
M-700Pa	10-0-700 Pa	Red oil, .826 s.g.

^{*}Require Pitot Tube at additional cost. See Flow and Velocity section.

SPECIFICATIONS

Accuracy: ± 3% full scale

Maximum internal working pressure: 10 psi (70 kPa) Maximum Working temperature: 140°F (60°C)



MOUNTING

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