



*Digital Barometer MSB780X is designed for use in professional meteorological and aviation applications that require reliable and highly accurate measurement, fast dynamic response, and advanced long-term stability.*

## KEY FEATURES & BENEFITS

- Excellent total accuracy 0.15 hPa
- Typical long-term stability better than 0.05 hPa / year
- Fast dynamic response
- Fully temperature compensated
- Digital output
- 1 to 3 transducers

**The Digital Barometer MSB780X is built to withstand even the most challenging environmental conditions, which are often encountered in environmental monitoring applications.**

Barometer MSB780X is a low power consumption microprocessor controlled sensor suitable for solar and battery powered applications. The barometer is operable in temperature range from -50°C to +80°C. The operating voltage range is from 5 to 32 V dc.

The robust product is made of durable materials and uses a heavy duty metal IP66 enclosure. This barometer comes fully factory calibrated with a manufacturer calibration certificate.

The MSB780X uses premium quality transducers. One, two or three transducers are available for high reliability, fault tolerant systems. An optional touch screen display is available.

# MSB780X

## Digital Barometer Specifications



### Performance

Barometric pressure range	500 hPa to 1100 hPa (or as specified)
Linearity	< 0.02 hPa
Hysteresis	< 0.02 hPa
Accuracy @ 23°C	0.10 hPa
Total accuracy	0.15 hPa (-50°C to +80°C)
Typical long-term stability	Better than 0.05 hPa / year

### Operating Environmental

Pressure range	500 hPa to 1100 hPa
Temperature range	-50°C to +80°C
Relative humidity	(0) To 100) % (RH)
Overpressure limit	4000 hPa (not affecting sensor calibration)
Burst pressure limit	7000 hPa
Enclosure	IP66

### Inputs and Outputs

Supply voltage	5 to 35 V dc
Power supply current	32 mA @ 12 V dc (1 sensor, without display)
Resolution	0.001 hPa
Communication	RS-232
Number of transducers	1 to 3

### Models

Ref No.	Description	Power Supply Current
MSB780X1	1 pressure sensor, no display	32 mA @ 12 V dc
MSB780X2	2 pressure sensors, no display	64 mA @ 12 V dc
MSB780X3	3 pressure sensors, no display	96 mA @ 12 V dc
MSB780X1D	1 pressure sensor, touchscreen display	35 mA @ 12 V dc
MSB780X2D	2 pressure sensors, touchscreen display	67 mA @ 12 V dc
MSB780X3D	3 pressure sensors, touchscreen display	99 mA @ 12 V dc