

# Sensus Turbo Corrector



The Turbo Corrector performs all Auto-Adjust Turbo-Meter algorithms as well as computes the self-checking and self-adjusting equations. You can base the corrector volume data on uncorrected volume, unadjusted volume or adjusted volume.

Since MasterLink software calibrates, configures and downloads data, technicians may already be familiar with these instrument functions. The Turbo Corrector enables you to take full advantage of your AAT meter capabilities.

## Additional features

- Pulsating gas alarm
- Form-A volume pulse output for adjusted volume pulses
- 4-20 mA output signal for either Delta-A or adjusted volume rate flow
- Simultaneous live graphing of main rotor frequency, sensing rotor frequency, Delta-A and adjusted volume flow rate using MasterLink 32 software
- 4-year warranty
- CSA-approved for Class 1, Div-1 and Div-2
- Full curve linerarization for up to 28 flow rates at 4 different pressures

# Sensus Turbo Corrector

## Providing local access to turbine meter data

### General description

The primary component is the Turbine Interface Board (TIB). It provides excitation voltage to the sensors, inputs the pulses from the AAT sensors, computes the algorithms and provides output adjusted volume pulses along with a 4-20 mA signal.

The TIB includes several RS-232 ports to allow serial communications. The TIB also outputs adjusted volume pulses to a RTU (or pulse accumulator) as well as to a 4-20 mA signal

(representing either adjusted volume flow rate or Delta-A).

You can mount a Turbo Connector directly to an AAT meter or remotely via wall-mount or pipe-mount brackets. The Corrector also provides standard functions to produce fully corrected volume data by applying pressure, temperature and super factors to uncorrected volume, unadjusted volume or adjusted volume (user selectable).

### Power supplies

- 120 VAC PS with alkaline battery (Div-2)
- 120 VAC PS and I.S. barriers with alkaline battery (Div-1)
- Solar panel and rechargeable battery
- 0-30 VDC via regulator board (Div-2)

### Unique parameters

configured into separate item codes

- AAT serial number
- Mechanical output factor (Kmo)
- Main rotor factor (Km)
- Sensing rotor factor (Ks)
- Average relative adjustment (Abar)

### Computed parameters

available as separate item codes

- Adjusted volume
- High resolution adjusted volume
- Unadjusted volume
- Adjusted volume flow rate
- Unadjusted volume dial rate
- Instantaneous Delta-A
- Average Delta-A
- Main rotor frequency
- Sensing rotor frequency



### Alarms

in addition to standard Mini-AT alarms

- Level 1 Delta-A alarm
- Level 2 Delta-A alarm
- Pulsing gas alarm
- Internal fault

### Outputs

- Adjusted volume (low-level pulses to Mini-AT Bd)
- Unadjusted volume (low-level pulses to Mini-AT Bd)
- Adjusted volume pulses (Form-A volume pulses)
- 4-20 mA analog output signal (user selectable Delta-A or adjusted volume flow rate)
- Corrected volume pulses (Form-A pulses)
- Adjusted flow rate via optional Turbo Frequency Board

### Mini-AT volume inputs

user selectable via item code

- Uncorrected volume (from reed switches if meter-mounted)
- Unadjusted volume (from TIB)
- Adjusted volume (from TIB)

**SENSUS**

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