NovaTech now offers complete packaged solutions for pole top mounting to support distribution automation applications. Solutions are engineered and packaged per customer specification and can include user-specified enclosure, locking door with door switch, radio and associated distribution sensors.

At the heart of this solution is the new Bitronics Pole Top Power Monitor (M661P3) which calculates accurate voltages, currents, power and energy. The M661P3 also picks up on Definite Time Over Current (relay element 51) and records and reports Peak Fault Currents in DNP3 or Modbus registers. To reduce installation costs, the rugged M661P3 requires no environmental or noise conditioning and provides a 12V dc output to power the radio or other accessory. A compact transducer footprint provides mounting flexibility. In addition, the front end of the M661P3 is engineered to connect directly to low voltage outputs from Lindsey and other distribution sensors and includes compensation algorithms to improve overall accuracy. As with all Bitronics instruments, the M661P3 comes with a 10-year “no hassle” warranty with no repair fees.

**Applications**

- End-of-Line Monitor (EOL)
- Volt-VAR Optimization (VVO)
- Conservation Voltage Reduction (CVR)
- Fault Location Isolation and Service Restoration (FLISR)
- Fault Indication using a definite time overcurrent relay element (ANSI Code 51)
- Report Peak Fault Current
M661P3 Details

Physical Specifications

- Dimensions: 4” H x 5.25” W x 6.34” D (102mm H x 133mm W x 161mm D)
- Weight: 1.8 lbs. (.81 kg)
- Power Supply: 120V ac or 240V ac
- Voltage Inputs:
  - Four terminals (A, B, C, and Common).
  - Up to 20V ac
- Currents:
  - Three terminals
  - Inputs are 10Vrms (representing 600A rms)
  - Accommodates peaks of 200Vrms for measuring fault currents
- Inputs/Outputs:
  - RJ45 10BaseT/100BaseTX port for service port functions and protocols
  - Serial port RS-232/RS-485 four-wire and one binary input

Measurements

- Full measurement set including volts, amps, watts, kWh, demands, peaks and frequency
- Peak fault currents and time overcurrent pickup
- Voltage measurements: 0.2% of reading (3.5 to 20Vrms)
- Current Measurements: 0.25% of full scale (200Vrms input to transducer)
- Updated every cycle

Environmental

- Operating temperature range: -40 to +70°C, storage temperature -40 to +85°C
- Humidity: 0-95% non-condensing
- Surge withstand: ANSI/IEEE C37.90.1: 2002

Configuration

- No need for PC software; all settings configured through a web browser.

Communications

- DNP3 or Modbus protocol available via serial port or Ethernet port