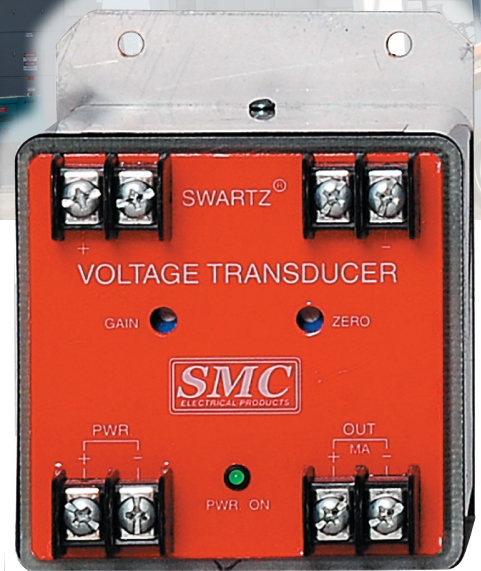




**Rugged construction
for high performance in
transit substation
environments**

The SWARTZ® Transducers



- **Watt Transducer**
- **Voltage Transducer**
- **Current Transducer**



Solid construction. High performance.

WATT TRANSDUCER

The SWARTZ® Watt Transducer is a high performance, solid-state unit specifically developed to meet requirements for supervisory control and data acquisition (SCADA) systems. The transducer is ruggedly constructed for the transit substation environment and operates from DC “housekeeping” battery supplies without use of separate AC inverters

The **Watt Transducer** is constructed on a flanged base and may be mounted in any orientation. Electrical connection via screw terminal barrier strips. “Gain” and “Zero” adjustment trimpots are located on the top cover for calibration or for setting intentional offsets. Voltage and current are multiplied in the high voltage section for highest accuracy and the watts output is fed to a full wave FET chopper that provides high voltage isolation between feeder circuits and current loop output. The output is a bi-polar current source and tracks the input signal with current feedback located in the positive output for the best performance.

VOLTAGE TRANSDUCER

The SWARTZ® Voltage Transducer is a high performance, solid-state unit specifically developed to meet requirements for supervisory control and data acquisition (SCADA) systems. The transducer is ruggedly constructed for the transit substation environment and operates from DC “housekeeping” battery supplies without use of separate AC inverters.

The **Voltage Transducer** is constructed on a flanged base and may be mounted in any orientation. Electrical connection via screw terminal barrier strips. “Gain” and “Zero” adjustment trimpots are located on the top cover for calibration or for setting intentional offsets. The input is + 1 KV; full range. The output is a bi-polar current source that tracks the input signal with current feedback located in the positive output for the best performance. The Voltage Transducer contains a resistor that will sustain a 4000 VDC input for one minute.

CURRENT TRANSDUCER

The SWARTZ® Current Transducer is a high performance, solid-state unit specifically developed to meet requirements for supervisory control and data acquisition (SCADA) systems. The transducer is ruggedly constructed for the transit substation environment and operates from DC “housekeeping” battery supplies without use of separate AC inverters.

The **Current Transducer** is constructed on a flanged base and may be mounted in any orientation. Electrical connection via screw terminal barrier strips. “Gain” and “Zero” adjustment trimpots are located on the top cover for calibration or for setting intentional offsets. The input is + 100mV; full range. The output is a bi-polar current source that tracks the input signal with current feedback located in the positive output for the best performance.

SWARTZ TRANSDUCER FEATURES

- “Power on” LED
- Four quadrant multiplier (WATT)
- Overrange capability
- Smooth saturation characteristics at range limits
- High bandwidth to 1khz
- Bi-Directional
- Internal Power Supply on and auto-compensates for a wide range of DC inputs
- Magnetic link design; no aging deficiencies or temperature drift
- Three-way isolation: power supply, input circuit, and output circuit