

HPS Utility Automation Line Post Sensors

INTRODUCTION

HPS is pleased to announce our new Line Post Sensor product offering. The product line includes both Current and Voltage Monitoring Insulators (CVMI) and Current Monitoring Insulators (CMI). The sensors are rated at 15kV (110kV BIL) and 25kV (150kV BIL). Hubbell Line Post Sensors can be bundled with current HPS products such as automated AR switches, capacitor switches and loadbreak switches. The sensors can also be used for OEMs and direct customers as well as a drop in replacement for other existing competitors' products.

APPLICATION

- Outdoor pole or structure mounting
- Capacitor Banks
- Distribution Automation Ready Switches
- Distribution Line Monitoring (3 phase)
- Load break switches
- Distribution Switchgears
- Power Quality Metering
- Voltage and current sensing for Reclosers

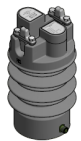
FEATURES & BENEFITS

Engineering & Standards:

- Hydrophobic Cycloaliphatic Epoxy Material (HCEP) - Better Insulator
- Best in Class **highest leakage distance** for high contamination environments. **Improved dielectric performance.**
- **Superior Strike Distance** for better impulse withstand capability
- **Compatibility** with most legacy & newer controllers
- Low Energy Analog Outputs (LEA) - **Safety** (compared to CT design).
- **Safe Dual-Core Current Sensing** Technology - inductor based, high accuracy, and complete phase shift compensation
- Improved Grounding Method (**Ground Plate** - Reliable and Easy Grounding)

Operations & Linecrew:

- **Light Weight** (Less than ½ the weight of competition) with rated mechanical strength
- Low Energy Analog Outputs (LEA) - **Safety** (compared to CT design)
- **Lay-in groove and clamps** for easy installation and optimal positioning



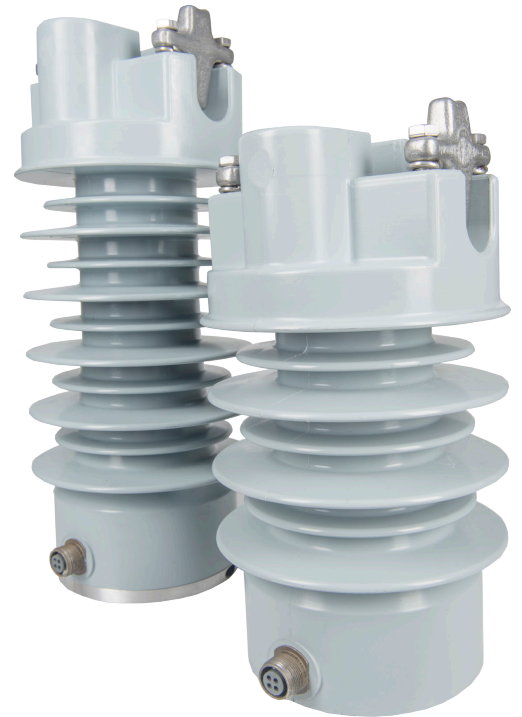
- No cutting of line required



- Both center pin mounting and 3 inch bolt circle mounting for simple installation process



- Improved Grounding Method (**Ground Plate** - Reliable and Easy Grounding)



RATINGS & SPECIFICATIONS

| Product | Current Sensor | | Voltage Sensor | | Voltage and Current Sensor | |
|-----------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------|------|------------------|------|-----------------------------|------|
| Measurement Output | 600A:10V | | 10000:1 | | C - 600A:10V / V - 10000:1 | |
| | 1000A:10V | | 1400:1 | | C - 600A:10V / V - 1400:1 | |
| | | | | | C - 1000A:10V / V - 10000:1 | |
| | | | | | C - 1000A:10V / V - 1400:1 | |
| Nominal Rating (kV) | 15 | 27 | 15 | 27 | 15 | 27 |
| Rated Line to Ground Voltage (kV) | 8.7 | 15.6 | 8.7 | 15.6 | 8.7 | 15.6 |
| Positive Impulse Rating or BIL (kV) | 110 | 150 | 110 | 150 | 110 | 150 |
| Withstand Rating (kV) | | | | | | |
| 60Hz Dry Withstand | 34 | 50 | 34 | 50 | 34 | 50 |
| 60Hz Wet Withstand | 34 | 50 | 34 | 50 | 34 | 50 |
| Leakage Distance (Inches) | 23.2 | 35.4 | 23.2 | 35.4 | 23.2 | 35.4 |
| Dry Arcing Distance (Inches) | 9.7 | 13.2 | 9.7 | 13.2 | 9.7 | 13.2 |
| Overall Height (Inches) | 12.3 | 15.7 | 12.3 | 15.7 | 12.3 | 15.7 |
| Partial Discharge Test Voltages (kV) | 11 | 19 | 11 | 19 | 11 | 19 |
| Maximum Pico Coulomb | Less than 10pC at 125% of nominal voltage; less than 3pC at operating voltage | | | | | |
| Weight (lbs) | 17 | 21 | 17 | 21 | 17 | 21 |
| Ultimate Cantilever Strength* (lbs) | 2800 | 2800 | 2800 | 2800 | 2800 | 2800 |
| Temperature Range | 65°C to -45°C | | | | | |
| Current Signal Output (CMI and CVMI) | | | | | | |
| Ratio | 600A:10V (or) 1000A:10V | | | | | |
| Output Burden/Load | 1 Meg Ohm or Greater | | | | | |
| Accuracy | ± 1% | | | | | |
| Phase Shift | 0° nominal, ± 1° | | | | | |
| Sensors can be calibrated at any current value to ensure improved accuracy results within the range | | | | | | |
| Voltage Signal Output (VMI and CVMI) | | | | | | |
| Ratio | 10000:1 | | 1400:1 | | | |
| Output Burden/Load | 1 Meg Ohm or Greater | | 1 Meg Ohm | | | |
| Accuracy | ± 1% | | ± 1% | | | |
| Phase Shift | 0° nominal, ± 1° | | 0° nominal, ± 1° | | | |
| Conductor Diameter Range (Inches) | 0.25 to 1.165 | | | | | |
| Material | Cycloaliphatic Epoxy | | | | | |
| * Recommended maximum working load is 40% of the cantilever rating - Per ANSI C29.7 | | | | | | |

CATALOG NUMBERS

| Catalog Number | Sensor Rating | Description |
|----------------|------------------------------------|-------------------|
| PSC82011100 | 15kV, 600A:10V | Current Only |
| PSC82011110 | 15kV, 600A:10V, 10000:1 | Current & Voltage |
| PSC82011120 | 15kV, 600A:10V, 1400:1 (1 Meg Ohm) | Current & Voltage |
| PSC82012100 | 25kV, 600A:10V | Current Only |
| PSC82012110 | 25kV, 600A:10V, 10000:1 | Current & Voltage |
| PSC82012120 | 25kV, 600A:10V, 1400:1 (1 Meg Ohm) | Current & Voltage |