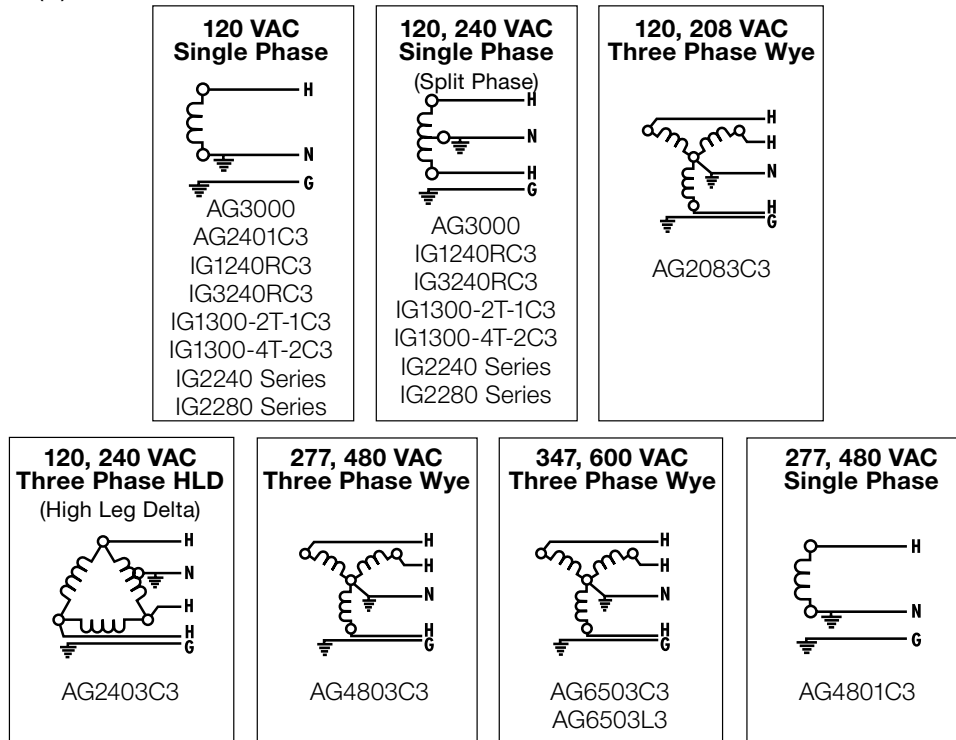


## Common Voltage Configurations

The wiring diagrams below illustrate the common voltage configurations for Intermatic surge products. Locate the desired voltage configuration and surge protector part number, and then go to the applicable product page to order the desired item(s).



*Note: All SPDs protect against surges that travel along the electrical pathway and are not applicable to direct lightning strikes that travel down non-electrical paths. Be sure to have at least a 20 A dual pole breaker(s) to help prevent the circuits from shorting. Type 1 SPDs are normally mounted before panels, which would not include a breaker.*

## Surge Glossary

**Maximum Continuous Operating Voltage (MCOV):** The maximum RMS voltage that may be applied to each mode of a surge protection device. (Listed on the product)

**Modes Of Protection:** Electrical paths within a system which an SPD offers defense against surge events. Examples of protection include, Line to Neutral (L-N), Line to Ground (L-G), Line to Line (L-L) and Neutral to Ground (N-G). (Listed on the product)

**Nominal Discharge Current (In):** Peak value of the current through the SPD having a current wave shape of 8/20 where the SPD remains functional after 15 surges. (Listed on the product)

**Nominal System Voltage:** The voltage level at which a system normally operates. Nominal system voltages include, but are not limited to, 120, 208, 240, 277, 347, 480, 600 VAC. (Listed on the product)

**Short Circuit Current Rating (SCCR):** The measurement of how much current the electrical system can supply during a fault condition. This value determines where an SPD may be installed. (Listed on the product)

**Surge:** A sudden and sharp increase of current or voltage within electric circuits.

**Surge Protective Device (SPD):** A device used to limit a surge on equipment by diverting or limiting it. SPDs were previously known as Transient Voltage Surge Suppressors or secondary surge arresters.

**Voltage Protection Rating (VPR):** The value assigned by UL which specifies the measured limited voltage value of the SPD. VPR rating is formally known as the "suppressed voltage rating". (Listed on the product)

# HVAC Surge & Power Protection

Type 1 or 2 Surge Protective Device



AG3000

## AG3000

### HVAC Surge Protective Device

Power surges are the silent killer for home appliances and HVAC equipment. Most homeowners protect their electronics, but leave more valued equipment unprotected. Surges can wipe out equipment and leave you searching for answers. Search no more. The easy-to-install AG3000 Surge Protective Device (SPD) is the perfect add-on for HVAC equipment. A green LED indicator provides the status of protection. Trusted, state-of-the-art TPMOV® (Thermally Protected Metal Oxide Varistor) technology eliminates the potentially hazardous failure modes that are commonly associated with standard MOV technology. UL Listed to ANSI/UL 1449, 4th Edition.

#### Applications

- Boilers • Hydronic Heating • Heat Pumps • Furnaces
- Central Air Conditioning • Air Handlers • Mini-splits
- Instantaneous Water Heaters

#### Features

- Three modes of protection: L-G, L-L, L-N
- TPMOV surge protection technology
- Green LED indicator provides status of protection
- Type 4X watertight and UV resistant plastic enclosure
- 3-year product warranty
- \$7,500 connected equipment warranty for 3 years



Ratings	
Service Voltage	120/240 VAC, 50/60 Hz
Phase	Single
SPD Type	Type 1, Type 2
MCOV (Max Continuous Overvoltage)	L-N/G 150, L-L 300
In (Nominal Discharge Rating)	20 kA
SCCR (Short Circuit Current Rating)	100 kA
Voltage Protection Rating (VPR)	L-L 1200, L-N/G 700
Modes of Protection	3 (L1-N, L2-N, L1-L2)
Surge Protection Technology	TPMOV
Operating Temperature	-40° F to 158° F (-40° C to 70° C)
Lead Gauge	#10 AWG, Tinned Copper
Dimensions H x W x D	3 7/8" x 1 5/8" X 4 3/16" (98 mm x 41 mm x 106.4 mm)
Warranty	3-year
Connected Equipment Warranty	3-year / \$7,500

Model #	Enclosure
AG3000	Indoor/Outdoor Type 4X