

Cable Innovations 4737 Hwy 332 Suite 21

Hoschton,GA 30548 800-952-5146

Application Note

DWG# 11090206 REV B

Subject: DLPS SURGE PROTECTORS VERSUS A GROUND BLOCK

The ground block that is installed on the drop line is only intended to be a safety device.

The National Electrical Code states:

"The metallic sheath of communications cables entering buildings shall be grounded as close as practicable to the point of entrance."

In the event an electrical wire were to drop across the coaxial cable, and the insulation (dielectric) failed, the ground block would provide a path to ground if the shield came in contact with the center conductor.

- A ground block only grounds the shield.
- The only protection the ground block provides to the center conductor is a way to ground the center conductor if the cable's dielectric fails.
- The only way to protect subscriber electronics is to eliminate overvoltages on the center conductor. Only a surge suppression device can do this.

Lightning generates a very strong electromagnetic wave that passes though the sheath and produces a voltage on the center conductor, which may damage traps and subscribers equipment. The ground block does not provide any protection from voltage that is induced on the center conductor through the sheath of the cable.

For questions or comments please contact: Cable Innovations Engineering Dept. 800-952-5146