

Overview of AFL Motion Control Products

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AFL has many different motion control products that all serve a unique purpose and can differ in application. Below is an overview of the different series within the motion control product line.

1700

The [1700 Series](#) dampers to be used for overhead lines. This design uses two (2) of the same weights to activate at two resonant frequencies. The 1701/1702 weight codes are to be used for overhead shield wire (OHSW) and the 1703-1709 weights are specifically sized for conductor. AFL clamps are designed to be installed directly on to the bare conductor for all conductor types (ACSR, ACSS, ACCC, etc.) without the need for rods as protection.

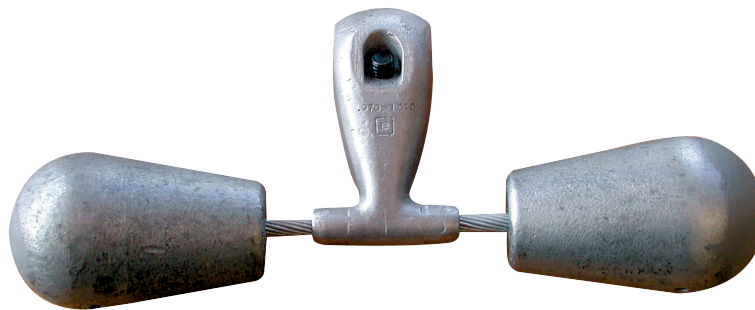


Figure 1—1700 Damper

1700AA

Asymmetrical line of Stockbridge dampers to be used for overhead lines. This design uses a large and a small weight to activate at four (4) resonant frequencies. The [1700AA series](#) can be used interchangeably with 1700 series and uses the same clamp system.

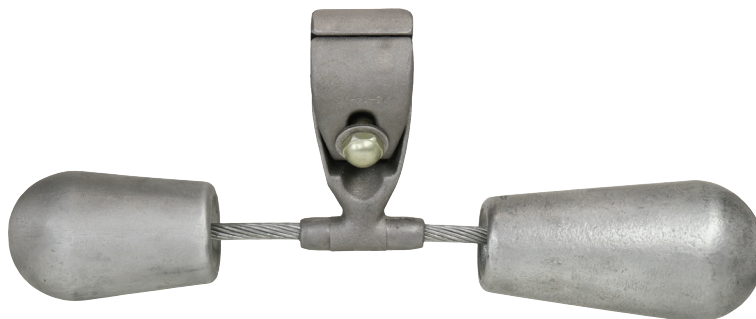


Figure 2—1700AA Asymmetrical Damper

2200

The [2200 Series](#) dampers designed for other applications not associated with electrical overhead lines such as antenna tower guy wires, cell phone towers, steel bridge cables, etc.

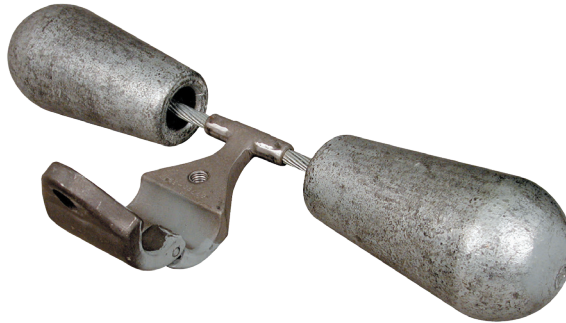


Figure 3—2200 Series Open Guy Wire Damper

OVD

[OPGW Vibration Dampers \(OVD\)](#) are Stockbridge dampers designed specifically for OPGW applications. These dampers come standard with a breakaway bolt and are selected based on the diameter of the OPGW. For example, an OPGW with a diameter of 0.699" would use OVD676/770 (0.676"-0.770" diameter range).

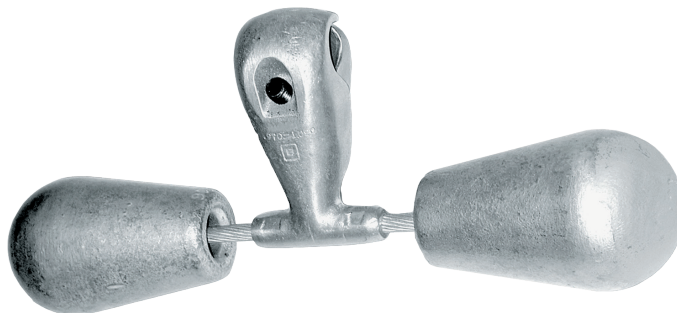


Figure 4—OVD Damper

SVD AND AVD

[Spiral Vibration Dampers \(SVD\)](#) are a non-Stockbridge style damper. These dampers can be used on OHSW, OPGW, and conductor with a diameter less than 0.770" dia. SVDs can be used interchangeably with Stockbridge but have a different placement/quantity recommendation scheme. Please consult the SVD catalog page for the full list of recommendations. [ADSS Vibration Dampers \(AVD\)](#) are a style of spiral vibration dampers that are specifically designed to be used with All-Dielectric Self-Supporting (ADSS) Cable. These cannot be used interchangeably with SVDs for transmission and distribution applications.

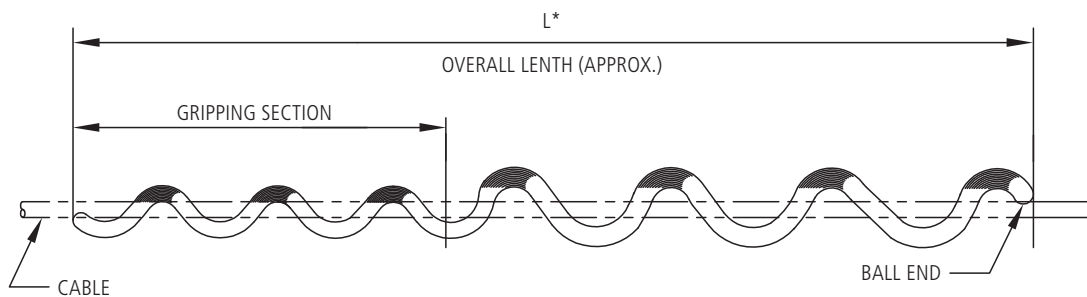


Figure 5—SVD Spiral Vibration Damper

3300 – SPEEDGRIPS®

The [3300 Series SpeedGrip® spacers](#) are rigid spacers intended for double-bundle applications. SpeedGrips® utilize elastomer bushings to not damage the conductor but also provide a firm grip to prevent movement. All SpeedGrips® come standard with a breakaway bolt and require no special tools to install. A high temperature (HT) variant is also available for applications of up to 250°C.

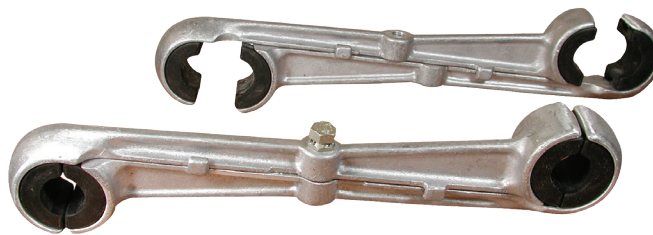


Figure 6—SpeedGrip® Spacer

28000 – HUB STYLE SPACER DAMPERS

For three and four bundle applications, AFL recommends the use of spacer dampers to both effectively space the conductors apart as well as dampen vibrations. The [28000 Series](#) have an excellent service history since being introduced in 1977. These spacer dampers come standard with breakaway bolts and do not require special tools to install. Elastomer bushings firmly grip the conductors but do not damage the conductor strands during installation or service life. A high-temperature variant is also available for applications of up to 250°C.



Figure 7—28000 Hub Style Spacer Damper



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