ANSYS AIM Thermal Analysis of an Electrical Wire -Geometry

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- **Problem Specification**
- 1. Pre-Analysis & Start-Up
- 2. Geometry
- 3. Physics Setup
- 4. Numerical Solution/Results
- 5. Verification & Validation

Geometry

AlM will prompt to either **Define new geometry**, **Import geometry file**, or **Connect to active CAD session**. Select **Import new geometry** and downloaded the file <u>here</u>. Since we are interested in the centerline temperature of the wire, a one quarter symmetric model will be used to allow us to easily post-process the centerline temperature. AlM will prompt again asking you to select your **Additional Physics** and **Options**. Since we are looking at temperature of the centerline and heat dissipation, thermal results will also need to be calculated. Under **Additional Physics**, select **Thermal** and then click **Finish**.

Electric Conduction: Physics
Additional physics: Structural Image: Structural
Options:
Typical settings and results will be defined automatically. Back Finish

Go to Step 3: Physics Setup

Go to all ANSYS AIM Learning Modules