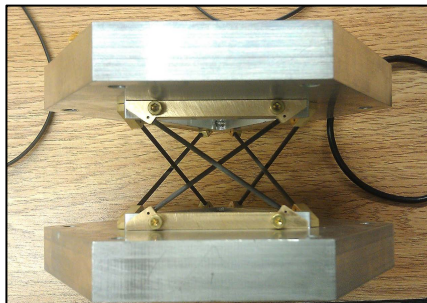
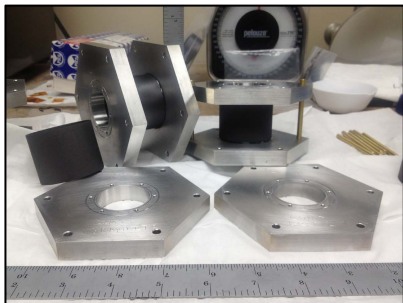


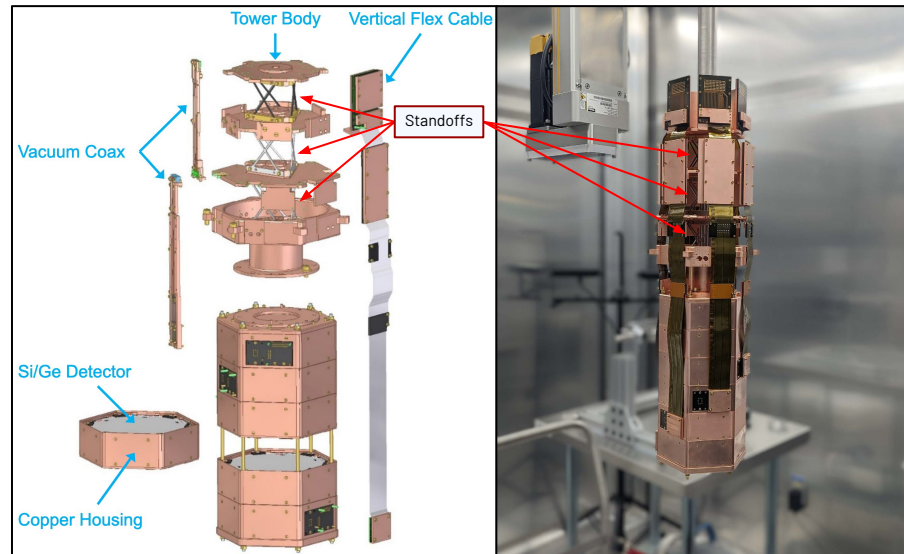
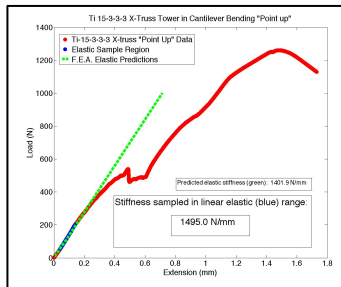
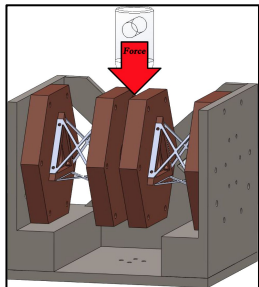
# Erik Kramer | SuperCDMS SNOLAB Support Tower Standoffs

**Project** → A multi-temperature stage support structure for cryogenic dark matter detectors

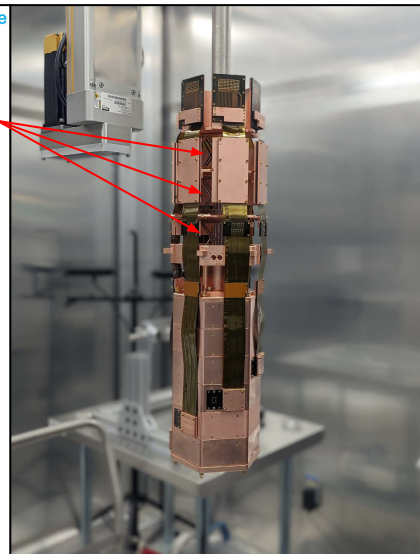
**Tasks** → **Design**, **delivery** and **qualification** of structural thermal standoffs for multiple temperature stages



## Design Trades, Analysis, and Testing



## Final Design Integration



# Erik Kramer | SuperCDMS SNOLAB Support Tower Standoffs

## Objectives

- Design standoffs to structurally support multiple temperature stages for the SuperCDMS SNOLAB experiment tower
- Fabricate hardware and qualify based on structural and thermal requirements

## Process

- Used **SolidWorks** and **MATLAB** to design and model both **structural** and **thermal** properties
- Produced ASME Y14.5 **GD&T** standard drawings and oversaw fabrication of hardware and test equipment
- Performed **qualification testing**

## Results

- Timely delivery of 2 final hardware designs that meet requirements
- Standoffs are now in active use as part of the SuperCDMS SNOLAB experiment

