

Design, Build and Launch of a Re-entry CubeSat

THE PROJECT

STRUCTURAL ENGINEER

Aether is a team of motivated engineering students that have the ambitious goal of bringing the capabilities of sample return to the CubeSat platform. To succeed in this, we are first focussing on the creation of an inflatable heatshield. This is no easy feat, as the hypersonic re-entry creates a challenging environment for our satellite.

"A Cube-what?" you may ask. A CubeSat is a type of nanosatellite that comprised of small 10x10x10 cm cubes. This type of satellites is interesting as it is a 'cheap' platform to conduct research and testing in space.

We are currently looking for new people to join the team. You can join the team for one or two years in function of a Postgraduate program. The requirement: Having a bachelor's degree or higher.

FUNCTION

As Structural Engineer you will be responsible for designing and structural testing of the heatshield and other CubeSat components.

You will be testing and designing the components based on structural and vibration parameters. Some components will already be in the real-world validation stage, while others still need to be computationally tested and designed.

PROFILE

- Motivated team player
- Good communication skills
- Finite-elements based analysis experience
- Computer Aided Design experience

RETURNS

- Extensive experience with Structural design and testing
- Ability to connect with our partners in the space industry
- First-hand experience in working on a space mission

