

# Logan Halstrom

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## EDUCATION

### University of California, Davis, California USA

- Ph.D Student in Aerospace Engineering Sep 2013 – Mar 2018
  - Thesis: Dynamic Mesh Applications and Validation for Computational Fluid Dynamics Simulations of Parachutes
  - Adviser: Prof. Stephen Robinson
  - Focus: Computational Fluid Dynamics, dynamics.
- Bachelor of Science (B.S.) in Aerospace Engineering and Mechanical Engineering Jun 2013
  - Graduated with College Honors.

## EXPERIENCE

### Johnson Space Center, National Aeronautics and Space Administration

- Pathways Intern, Applied Aeroscience and CFD Branch (EG3) Jun 2014 – Present  
Projects:
  - Dynamic simulations of Orion parachute oscillations
  - Optimization of Orion Flush Air Data System sensor array
  - Transonic stability analysis of RED-Data2 re-entry heating probeSupervisors: Steve Labbe and Ben Kirk
- USRA Intern, Aircraft Operations Division (CC3) Jul 2013 – Sep 2013  
Projects:
  - Designed and conducted pitot-static calibration for WB-57 aircraft
  - Assisted in Reduced Gravity Operations safety inspectionsSupervisors: Gregory Johnson and Jack Woods

### University of California, Davis

- Teaching Assistant, Department of Mechanical and Aerospace Engineering Sep 2013 – Present  
Courses:
  - *Applied Aerodynamics*: Compressible/transonic, viscous flow, finite wings, aircraft equilibrium, panel methods
  - *Computational Aerodynamics*: 2D finite difference Euler methods, transonic small-disturbance theory
  - *Stability and Control of Aerospace Vehicles*: State-space representation, longitudinal and lateral stability
  - *Rocket Propulsion*: Fluid and thermodynamics of liquid and solid rocket enginesSupervisors: Dr. Stephen Robinson, Dr. Jean-Pierre Delplanque, Dr. Ron Hess, and Dr. Mohamed Hafez

## AWARDS & SCHOLARSHIPS

- Outstanding Achievement, NASA Johnson Space Center Office of Education Aug 2015  
For outstanding contributions as an intern for the Johnson Space Center
- Service Award, UC Davis Department of Mechanical Engineering May 2013  
For service as the captain of the Advanced Modeling Aeronautics Team
- Regents' Scholar, University of California 2011 – 2013  
The most prestigious award on the UC Davis campus given to students entering with a GPA higher than 3.80
- Forrest Mitchell Award, Northern California Scholarship Federation 2012  
For maintaining the highest GPA of any Junior scholarship recipient
- Engineering Dean's List, University of California, Davis 2011  
For achieving a GPA in the top 16 percent of the College of Engineering
- Outstanding Achievement in Physics, Butte Community College 2011  
For exceptional performance in the field of physics
- Presidential Scholar, Humboldt State University 2010  
For achieving a GPA in the top 15th percentile
- Bill Kent Award, Northern California Scholarship Federation 2009  
For maintaining the highest GPA of any Freshmen scholarship recipient

## PROFESSIONAL AFFILIATIONS & ACTIVITIES

### American Institute of Aeronautics and Astronautics, UC Davis Chapter, Davis, California

- Member 2011 – 2014

**CAMPUS  
ACTIVITIES**

**Advanced Modeling Aeronautics Team, UC Davis**

Sep 2011 – Jun 2013

- Captain
  - Competed in the Society of Automotive Engineers (SAE) 2013 Aero Design West Competition
  - Placed 2nd internationally in overall competition
  - Designed and manufactured a model aircraft optimized for specific mission requirements
  - Managed team members throughout all stages of the design process

**SKILLS**

Documentation/Presentation

- L<sup>A</sup>T<sub>E</sub>X, Beamer, Microsoft Word, Power Point.

Computing

- Linux, Python, MATLAB, FORTRAN, C++, High Performance Computing, MPI/OpenMP.

Computational Fluid Dynamics

- OVERFLOW, OpenFOAM, Chimera Grid Tools, Pointwise, Tecplot 360/ParaView.

**LANGUAGES**

- English: Native language.
- Spanish: Basic (speaking, reading, writing).
- Russian: Basic (speaking, reading, writing).

**INTERESTS**

Backpacking, digital photography, running.

[CV created on 05-11-2016]