

Contact

www.linkedin.com/in/aarondsolson
(LinkedIn)

Top Skills

Finite Element Analysis
ANSYS
Labview

Languages

French

Aaron Olson

NASA Physicist and Co-Founder at NovoMoto
Greater Palm Bay-Melbourne-Titusville Area

Experience

NASA - National Aeronautics and Space Administration
Research Physicist
November 2020 - Present (1 year 6 months)
Kennedy Space Center

NovoMoto
Co-Founder
November 2015 - Present (6 years 6 months)
Madison, WI, and Democratic Republic of Congo

NASA Academy
Alumni
2009 - Present (13 years)

University of Wisconsin-Madison Fusion Technology Institute
Graduate Fellow and Research Assistant
June 2012 - October 2018 (6 years 5 months)
Madison, WI

I am researching the acquisition of energy, life support, and propellant volatile resources from lunar soil

NASA Zero-Gravity Systems Engineering Educational Discovery
(SEED) Program
Engineer: UW-Madison FIRCE Team
January 2012 - April 2012 (4 months)
Houston, TX

- Developed an automated dust cleaning mechanism to clean regolith off of orthofabric and polycarbonate for the Field-Integrated Regolith Cleaning Experiment (FIRCE)
- Flew with and operated the experiment in microgravity

Mars Desert Research Station
Specialist: Crew 110
January 2012 - January 2012 (1 month)
San Rafael Swell, UT

-Developed a 3-D model of the area surrounding the research station for more efficient robotic traverses and participated in habitability studies as a member of the station's 110th crew

NASA Langley Research Center

LARSS Researcher: Expandable Space Structures Group

September 2010 - December 2011 (1 year 4 months)

Langley Research Center, Hampton, VA

-Fall 2011: Developed a vacuum bagging procedure for composite terminations in restraint material for inflatable structures

-Summer 2011: Developed test plans and matrices for damage tolerance of inflatable structure restraint materials

Performed and documented tests and analyzed test data for damage tolerance

-Spring 2011: Researched composite and metallic interfaces for inflatable structures

-Fall 2010: Designed a conceptual flight shell for a modular inflatable space habitat as part of the NASA Exploration Habitat Academic Innovation Challenge

Collaborated with NASA Johnson Space Center and the University of Wisconsin

NASA Desert Research and Technology Studies Field Testing

Engineer: Badger Exploration Loft Team

August 2011 - September 2011 (2 months)

Black Lava Point, AZ

-Designed modifications and repairs for the inflatable loft's pressurized systems

-Aided in hardware assembly and set up for field testing

UW Library Technology Group

Student Technology Associate

December 2008 - January 2011 (2 years 2 months)

Madison, WI

Assisted in hardware and software maintenance of UW-Madison Library computers

NASA Academy Internship Program

Researcher: JWST ISIM Team

June 2009 - August 2009 (3 months)

Goddard Space Flight Center, Greenbelt, MD

- Researched past NASA missions to mitigate the shock environment risk for the detectors on the James Webb Space Telescope's instruments
- Developed a Case study on future Launch Pads for the Academy team project

Madison PEOPLE Program

High School and Middle School Tutor

September 2007 - December 2008 (1 year 4 months)

Madison, WI

Tutored PEOPLE students in math and science

Automation Components, Inc.

Duct Assembler

June 2008 - September 2008 (4 months)

Middleton, WI

Assembled temperature duct sensors

Woodman's Food Markets

Utility Clerk and Bagger

July 2005 - October 2005 (4 months)

Madison, WI

Bagged groceries for customers in a large, fast-paced store

Education

University of Wisconsin-Madison

Doctor of Philosophy - PhD, Engineering Mechanics · (2012 - 2018)

University of Wisconsin-Madison

Master of Science (M.S.), Engineering Mechanics · (2012 - 2014)

University of Wisconsin-Madison

Bachelor of Science (B.S.), Mechanical Engineering · (2007 - 2012)

University of Wisconsin-Madison

Certificate (Minor), International Engineering · (2010 - 2011)

ISAE-ENSICA

· (2010 - 2010)