

# Koshiro Yamaguchi

William E. Boeing Department of Aeronautics and Astronautics  
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## EDUCATION

**Ph.D. in Aeronautics & Astronautics**, (9/2018 - Present)  
University of Washington, Seattle, WA

**B.S. in Aerospace Engineering**, (3/2018)  
Nihon University, College of Science and Technology, Chiba, Japan  
*Magna cum laude*  
GPA: 3.74/4.00 (2nd ranked among 108)

## AWARDS AND HONORS

- **Funai Overseas Scholarship**, Funai Foundation for Information Technology, 2018 – 2020
  - This scholarship funds me the first two years of my graduate study.
- **Dean's Award**, College of Science and Technology, Nihon University, 2018
- **Governor's Award**, Chiba, Japan, 2018
- **Merit-based Scholarship**, Nihon University, 2016 - 2017
- **F-tech Scholarship**, 2017
- **Kawamoto-Mori Educational Foundation Scholarship**, 2017
- **Undergraduate Scholar Award**, Nihon University, 2017
- **2nd-place awardee**, International Gemini Mars Design Competition, 2016
  - Held at the 19<sup>th</sup> Annual International Mars Society Convention, Washington DC, USA
- **Nakamura Educational Foundation Scholarship**, 2016
- **Yamaguchi Educational Foundation Scholarship**, 2016
- **Full-tuition scholarship**, Nihon University, 2015

## RESEARCH EXPERIENCE

**Laboratory for Engineered Materials and Structures, the University of Washington**

**Research Assistant** (Advisor: Prof. Jinkyu Yang) 7/2018 – Present

- Developing a data-driven prediction system for chaotic behavior of origami structure with machine learning
- Developing a simulation system for origami structures with 3D physics engine
- Developing origami structures for robotics

## **Space Structure Systems Laboratory, Nihon University**

**Research Assistant** (Advisor: Prof. Yasuyuki Miyazaki)

4/2017 – 3/2018

- Developed prototypes of universal docking systems for multiple space structures
- Studied flexible multibody dynamics for space structures

## **Laboratory for Engineered Materials and Structures, the University of Washington**

**Visiting Scholar** (Advisor: Prof. Jinkyu Yang)

2/2017 – 3/2017

- Developed prototypes of Origami-based morphing wings for UAVs

## **Mars Society's International Gemini Mars Design Competition**

**Subsystems Design Manager** (Advisor: Prof. Hiroyuki Miyajima)

2/2016 – 9/2016

- Designed subsystems for a two-person Mars flyby vehicle
- Won 2<sup>nd</sup> place by making a presentation on the design and plan to go to Mars

## **INDUSTRIAL EXPERIENCE**

**Educational Design Co., Ltd**, Shizuoka, Japan

4/2018 – 6/2018

**Developer Intern**

- Developed an autonomous chatbot system for a company website
- Developed educational materials for programming for elementary school students

## **JOURNAL REVIEW**

Proceedings of the Royal Society A

Proceedings of the National Academy of Sciences of the United States of America

## **SKILLS**

**Programming Languages**

- Python, C/C++, MATLAB,

**Software Libraries & Engineering Tools**

- Tensorflow, OpenAI Gym, Creo, Autodesk Fusion 360, Visual Studio, Raspberry Pi, Arduino

**Languages**

- Japanese, native speaker
- English, fluent