

Siyuan Liu

(206) 465-5761 | lius27@stanford.edu | www.linkedin.com/in/siyuan-liu-33401568

Education & Related Coursework

Stanford University	Stanford, CA
MS in Mechanical Engineering	2018-2020
University of Washington	Seattle, WA
BS in Mechanical Engineering, Math Minor, Labor Studies Minor	Jun. 2018
MAGNA CUM LAUDE Honors Graduation	
Thomas L. & Patricia M. Curkendall Endowed Scholarship	2016-2017
Blake D. and Dorothy C. Mills Endowed Scholarship	2016-2017

Internship Experience

Intern, AECC, Commercial Engine Company	Nov.2017 -Jan. 2018
Performed squirrel cage structural optimization using MATLAB and Ansys APDL Batch operation	
Studied gear mesh mating behavior and influence of misalignment on gear life using MASTA	
Explored development of bearing and gear materials including high alloy steel and ceramics	
Intern, Lecgi Inc.	Jun.-Sept. 2017
Conducted FEA structural analysis steel baseplate under varying loading conditions	
Organize results into company design references	
Assisted company's internal literature composition	
Analyzed structural integrity of architectural designs	
Intern, NAVECO,	Jul.-Aug. 2015
Conducted structural analysis and optimization using HyperMesh for metallic and composite materials	
Assisted Composite spring research and paper publishing	

Engineering Leadership and Research

EcoCar3 Mechanical Team, Transmission Team Lead	2015-2018
Remodeled a Chevrolet Camaro into a hybrid vehicle and lasted 1000+ miles in a 3-year competition	
Designed, analyzed and manufactured transmission system using Siemens NX	
Operated HAAS CNC machines using SolidWorks HSM and led shop machining classes	
Collaborated with outsourcing company like Gearworks and consulting firm sponsors like GKN	

Concrete 3D Printer

Worked closely with UW WOOF 3D printing to create a concrete 3D printer
Managed the product design, analysis and manufacture of extruder head
Participated in documentation of experiment result and maintained guide

Boechler Research Group	Jun.-Aug. 2016
Studying Surface Instability between soft and hard materials	
Prepared experiment setup, including many rapid prototyping like 3D printing	

Skills and Volunteering Experiences

Application Software: SolidWorks, Ansys (Workbench and APDL), HyperMesh, Siemens NX, HSMWorks, MASTA, MATLAB	
Language: Mandarin Chinese, native speaker and technical writer	
Broad interest in Math, Sociology, Economics, Ethnic Studies and Comparative Politics	
OCA Golden Circle Award Student Chair	Feb. 2017
Peer Facilitator at University of Washington	2014-2017
CLUE Tutor at University of Washington	Jan.-Jun. 2017

Job Finding Technology Coach at CISC
Student Translator and Coordinator for UW Study Abroad AES 498
Management experience: 3-unit apartment manager

Sept.-Dec. 2016
Jul.-Aug. 2014
2014-2017