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MEGAN HOFMANN

OBJECTIVE For decades, software engineering has taken inspiration from mechanical and electrical engineering. My aim is to return the favor, by bring software engineering principles to 3D design, and fabrication. With these advances I aim to support the development of highly customized assistive technologies.

EDUCATION **COLORADO STATE UNIVERSITY—FORT COLLINS, CO**
Undergraduate in Computer Science

PUBLICATIONS **CLINICAL AND MAKER PERSPECTIVES ON THE DESIGN OF ASSISTIVE TECHNOLOGY WITH RAPID PROTOTYPING TECHNOLOGIES—ASSETS 2016 EXPERIENCE REPORT**

In this report, we compare the perspectives of prosthetists, HCI and fabrication researchers, and volunteers on the design, development, and deployment of 3D printed assistive technology.

HELPING HANDS: REQUIREMENTS FOR A PROTOTYPING METHODOLOGY FOR UPPER-LIMB PROSTHETICS USERS—CHI 2016
Presents a case study where researchers and participants with upper limb amputations iteratively designed task specific 3D printed prosthetic devices.

INVESTIGATING THE IMPLICATIONS OF 3D PRINTING IN SPECIAL EDUCATION—TACCESS 2016
Consumer-grade digital fabrication such as 3D printing is on the rise. This research explores how this technology can be leveraged to support special education.

USING AUDIO CUES TO SUPPORT MOTION GESTURE INTERACTION ON MOBILE DEVICES—TAP 2016
In this article, we describe and evaluate a training and feedback technique, Glissando, which uses audio characteristics to provide feedback on the system's interpretation of user input.

MAKENG CONNECTIONS: MODULAR 3D PRINTING FOR DESIGNING ASSISTIVE ATTACHMENTS FOR PROSTHETIC DEVICES—ASSETS 2015 2ND PLACE STUDENT RESEARCH COMPETITION
Presents a modular technique for developing highly customized assistive devices that can support specified tasks.

SHARING IS CARING: ASSISTIVE DESIGNS ON THIGIVERSE—CHI 2015 BEST PAPER
An investigation of the assistive devices available on online 3D modeling repositories. Significant findings include classification of the models

COMING TO GRIPS: 3D PRINTING FOR ACCESSIBILITY—ASSETS 2014 WORK IN PROGRESS
GripFab is a tool for producing customized grips for various tools using clay, a 3D scanner and 3D printing technology.

AWARDS **RUNNER- UP CRA OUTSTANDING UNDERGRADUATE FEMALE RESEARCHER AWARD FOR PHD-GRANTING INSTITUTIONS 2016**

With respect to research conducted at Carnegie Mellon University and Colorado State University

UNDERGRADUATE RESEARCH HONORS: CSU COLLEGE OF ENGINEERING

Presented research into the development of a pin based tactile display for users with visual impairments.

EMPLOYMENTT **UNDERGRADUATE RESEARCH ASSISTANT AT CARNEGIE MELLON UNIVERSITY**

May 2015—May 2017, Advised by Jenifer Mankoff and Scott Hudson

UNDERGRADUATE RESEARCH ASSISTANT AT COLORADO STATE UNIVERSITY

August 2013—December 2015, Advised by Jaime Ruize

UNDERGRADUATE RESEARCH ASSISTANT AT UNIVERSITY OF MARYLAND, BALTIMORE COUNTY

May 2014—June 2014, Advised by Amy Hurst

HIGH SCHOOL SOFTWARE ENGINEERING INTERN AT LOCKHEED MARTIN

August 2012—March 2013, Advised by Gary Shubert

ELECTRICAL ENGINEERING HIGH SCHOOL RESEARCHER WITH NASA

December 2011—May 2013,
Sponsored by HUNCH (High school students United with Nasa to Create Hardware)

SERVICE **ACM-W, COLORADO STATE UNVIERSITY CHAPTER**

Vice Chair: May 2015—Present

Founding Member: August 2015—Present

This chapter of the ACM-W is working to promote women from the department and the local community who have an impact on computing and technology. The ACM-W hosts many panels that spotlight exceptional female computer scientists and provide career and academic support to students. This group also works on outreach to the local community to promote young women interested in entering technology fields.

UNDERGRADUATE TEACHING ASSISTANT: FOUNDATIONS IN PROGRAMMING

August 2013—December 2013

Student Teacher who provided tutoring and programming support to students in low level programming course. Provided instruction for programming assignments, lab exercises, quizzes, and programming exams.