



## MEGHAN ZECH, B.S.B.M.E. PROFESSIONAL BIOGRAPHICAL OUTLINE

### BACKGROUND

Ms. Zech received a Bachelor of Science in Biomedical Engineering from Marquette University. At Marquette, her scientific research included utilizing human motion capture for sports injury prevention and rehabilitation, clinical gait analysis, and occupational biomechanics. Throughout her undergraduate career, she used mechanical testing equipment, along with bone models, to study the effects of force and surgical intervention on the human body, in particular with regard to the spine. In addition, Ms. Zech completed a design project involving a fully automatic environmental control system that is patent pending.

### EDUCATION

- Bachelor of Science in Biomedical Engineering, Marquette University, Milwaukee, WI, May 2019

### PROFESSIONAL EXPERIENCE

#### October 2019 – Present | ARCCA, Incorporated | Biomechanist

- Applies biomechanical and kinematic principles for injury analysis and human tolerance in forensic investigation
- Conducts research to evaluate the relationships between human injuries and associated forces, kinematics, and human tolerance
- Utilizes medical records, testing, and computer modeling to determine whether a claimed injury is consistent with a specific set of actions or exposure to a specific incident environment

#### June 2018 – August 2018 | Merz North America: Franksville, WI | Manufacturing, Science, & Technology Intern

- Assembled, serviced, and wrote user protocol for company's first 3D bioprinter and software
- Utilized two customized machines for filling and stoppering aesthetic syringes adhering to Good Manufacturing Practice
- Trained production team in FDA clean room conditions following a new engineering study

#### June 2017 – August 2017 | Uptake Medical: Seattle, WA | Engineering Intern

- Developed two engineering studies and edited over ten official company documents following GDP
- Communicated with sales reps, purchased parts, developed tests for parts, presented test results
- Learned Vida lung software for patient diagnosis, machine shop and 3D printing skills for prototypes

### ADDITIONAL EXPERIENCE

Women's Ambassador, National Collegiate Club Golf Association (NCCGA), 2017 – 2018

- Promoted and mentored women teams and individual players as one of four national student leaders
- Published monthly blog posts, composed weekly email updates, directed 2 national tournaments