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| Jared Rifkin | Email: rifkin@virginia.edu | Phone: (631) 626-3153 | https://itsja.red |
| University of Virginia, Center for Applied Biomechanics |
| 4040 Lewis and Clark Drive, Charlottesville, VA, 22911 |

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| **EDUCATION** | **2020 - present** | *Ph.D., Department of Mechanical and Aerospace Engineering* |
| University of Virginia, Center for Applied Biomechanics |
| Expected Graduation Date: 2024 |
| **2016 - 2019** | *B.S.E, M.S.E, Department of Bioengineering (GPA: 3.89, 3.91)* |
| University of Pennsylvania |

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| **HONORS & AWARDS** | **2022** | NNS Trainee Travel Award |
|  | **2022** | University of Virginia: Engineering-in-Medicine Seed Grant |
|  | **2021** | University of Virginia: UVA Engineering is Beautiful Dean’s Research Art Contest, 1st Place, Graduate Student Category |
|  | **2021** | National Science Foundation: Graduate Research Fellowship Program Honorable Mention |
|  | **2019** | University of Pennsylvania: Graduated *summa cum laude* |
|  | **2016 - 2019** | University of Pennsylvania: Dean's List |

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| **RESEARCH ACTIVITIES** | **2022 - present** | *Differential brain network response to simulated lesion* |
|  | Lesioning brain networks according to strain distributions from finite element simulated impacts. |
| **2021 - present** | *Endovascular surgery simulator* |
|  | Developing computational finite element model for rapid simulation of catheters in neuro-endovascular surgery. |
| **2021 - present** | *Pediatric skull surgical screw characterization* |
|  |  | Determining the strength of surgical screw integration in pediatric skull samples. |
|  | **2019 - present** | *Brain network architecture typing* |
|  |  | Identifying distinct patterns of structural connectivity networks and simulated neural dynamics within a population of brains. |
|  | **2020 - 2021** | *Risk function development of skin response to blunt impact* |
|  |  | Characterizing skins response to blunt impact over a parametric sweep of impactor shape, size, and speed. |

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| **WORK EXPERIENCE** | **2020 - present** | *University of Virginia, Center for Applied Biomechanics* |
| Position: Graduate Research Assistant |
| Mentor: Matthew B. Panzer, Ph.D. |
| **2019 - 2020** | *University of Pennsylvania, Meaney Lab* |
|  | Position: Research Specialist |
| **2017 - 2019** | *University of Pennsylvania, Department of Bioengineering* |
| Position: Undergraduate Research Specialist |
| Mentor: David F. Meaney, Ph.D. |

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| **TEACHING & MENTORSHIP** | **2021 - present** | *University of Virginia, Mechanical and Aerospace Engineering Department* |
|  | Position: Graduate Teaching Assistant |
|  | Class: Finite Element Analysis, Professor: Matthew Panzer, Ph.D. |
| **2021** | *University of Virginia, School of Engineering* |
|  | Position: Engineering Graduate School Mentor |

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| **PUBLICATIONS & PRESENTATIONS** |  |
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| **Journal Publications** | **Jared A. Rifkin**, Taotao Wu, Adam Rayfield, Erin D. Anderson, Matthew B. Panzer, David F. Meaney**. Brain architecture-based vulnerability to traumatic injury**. (under review). Frontiers in Bioengineering |
|  | Taotao Wu, **Jared A. Rifkin**, Adam Rayfield, Matthew B. Panzer, David F. Meaney**. An Interdisciplinary Computational Model for Predicting Traumatic Brain Injury: Linking Biomechanics and Functional Neural Networks**. (2022). NeuroImage |
|  | Daniel F. Shedd,Parker R. Berthelson, **Jared A. Rifkin**, Justin McMahon, J. Sebastian Giudice, Jason L. Forman, Matthew B. Panzer. **The Risk of Skin Injury Caused by High‑Rate Blunt Impacts to the Human Thorax.** (2022, pre-published). Hum Factors Mech Eng Def Saf |
|  | Parker R. Berthelson, Daniel F. Shedd, **Jared A. Rifkin**, Justin McMahon, J. Sebastian Giudice, Jason L. Forman, Matthew B. Panzer. **Evaluation of an In Situ Ovine Model as a Surrogate for Human Skin Injury Caused by High-Rate Blunt Impact.** (2022). Hum Factors Mech Eng Def Saf |
|  | David Gabrieli, Nick Vigilante, Rich Scheinfield, **Jared A. Rifkin**, Samantha Schumm, Taotao Wu, Lee F. Gabler, Matthew B. Panzer, David F. Meaney. **A multibody model for predicting spatial distribution of human brain deformation following impact loading**. (2020). JBME |