

# Kendall Reid

## Objective

During the first three years of my career, I gained experience in AI engineering, data science, team leadership and project management. In the past two years, I have gained experience in the health care setting, leading projects in clinical research, health informatics, genetics, and patient centered research, while being directly mentored by one of the world's leading rare disease doctors. I aim to combine these experiences and apply my technical skills to solve the toughest problems facing health care and health science, both at the clinical and basic science level.

## Education

- Fall 2024 – **Johns Hopkins University**  
**MS in Bioinformatics**
- 2021-2024 **University of Maryland**  
**Post baccalaureate, Biological Sciences**
- 2018-2019 **Rutgers University**  
**Post baccalaureate, Computer Science**
- 2013-2017 **Rutgers University**  
**BA Mathematics and Economics with Highest Honors**  
Summa Cum Laude  
Thesis: "A High-Frequency Methodology for Studying Sector Volatility Transmission", Advised by Xiye Yang  
Awards: Henry Rutgers Scholar Award for outstanding research paper, John C. Daniels award for outstanding achievement in economics, Milton Friedman Distinguished Scholar

## Research experience

- 2016-2017 **Honors Thesis**, Rutgers University  
Advisor: Xiye Yang
  - Developed novel methodology to study how volatility spreads across economic sectors using high-frequency trading data.
  - Utilized R to clean, format, analyze, and visualize hundreds of thousands of trade data points.
  - Authored academic paper outlining approach and results, earning multiple departmental and university awards.

## Skills

- Languages Python, R, SQL, HTML, CSS, Javascript
- Data Science Deep learning, computer vision, cloud training and inference, GPU acceleration, data processing and pipelining, data visualization
- Software Pytorch, Tensorflow, OpenCV, git, scikit-learn, numpy, pandas, matplotlib, Linux, Docker, AWS, Django, node.js
- Leadership Technical team management, product management, project management, agile, scrum, Kanban
- Research Grant Writing, Technical Writing

## Work experience

- June 2024 - **Johns Hopkins University**, Baltimore, MD  
**Lab Software Engineer**, Epidemiology
- May 2022 – June 2024 **Children's National Medical Center**, Washington, DC  
**Clinical Research Assistant**, Orthopedic Surgery
- Coordinated a cross disciplinary health informatics investigation exploring trends in hospital throughput across age, resulting in presentation to the executive leadership team.
  - Coordinated the Osteogenesis Imperfecta Longitudinal study, ensuring accurate and precise data collection from 50 patients.
  - Initiated an industry-sponsored drug trial for Setrusumab, aiming to reduce fracture risk in patients with Osteogenesis Imperfecta.
  - Inherited and oversaw the completion of drug trials for Burosumab, a drug treatment for cutaneous skeletal hypophosphatemia syndrome. Coauthored journal research paper currently in review, and poster presented at Children's Research and Innovation Week.
  - Initiated and oversaw research projects for current medical students performing Single Nucleotide Polymorphisms on muscle phenotype data, resulting in presentation at Orthopedic Research Society.
- January 2019 - January 2021 **Productivity Industries**, San Francisco, CA  
**Data Scientist**, Computer Vision, and Artificial Intelligence
- Combined state-of-the-art research in the creation of a document parsing algorithm surpassing previous industry and academic benchmarks.
  - Collaborated with backend and front-end engineers to ensure that the results of the deep learning algorithm were processed quickly, efficiently, and displayed properly to the customer.
  - Created a continuous integration cloud framework for training, testing, and deploying deep learning models.
  - Managed the technology roadmap, stakeholder expectation, and delivery of data science products.
- June 2017 - July 2018 **Iunu**, Seattle, WA  
**Data Scientist**, Computer Vision, and Artificial Intelligence
- Grew the data science team from myself to 6 engineers and data scientists, resulting in promotion to team lead.
  - Created personal improvement plans for each member of the team to ensure personal growth.
  - Collaborated with the other technical team leads, robotics and application engineering.
  - Developed a deep learning pipeline to measure the amount of plant material in a multispectral image and predict total plant yield from a time series of images.

---

## Publications

- 2024 (Pending) **Textbook Chapters**  
ASBMR Primer Section IX, Metabolic Bone Issues in Orthopedics, Chapter 103: Corrective Orthopedic Surgery for those with Rare Bone Disease and Skeletal Deformities

### Journal Publications

2024 Tosi, Laura L., "Influences of sex and gender on musculoskeletal conditions and how these are reported", Invited Article, Journal of Bone and Joint Surgery

2024 (Pending) Tosi, Laura L, "Burosumab was safe and effective in a young adult with FGF23-mediated hypophosphatemia due to cutaneous skeletal hypophosphatemia syndrome (CSHS)" (working title), Journal of Bone and Mineral Research

**Poster Presentations**

2025 "The Projected Impact of Post-ART BMI Maintenance on Diabetes Risk: A Modeling Study", Conference on Retroviruses and Opportunistic Infections

2024 "Can random forests and deep neural networks add something new to our understanding of correlates of virologic failure in adults with HIV? A multidisciplinary team and a comparison of approaches", Johns Hopkins University Bloomberg Public Health and AI Strategic Endeavors AI Research Day

2024 "Preparing Adults with Osteogenesis Imperfecta to Engage in Research on Access and Quality of Care for Their Rare Disease", Journal of Bone and Joint Surgery

2024 "Somewhere to Go for Adults with Childhood-Onset Rare Diseases: A Conversation About How We Can Fill Gaps in Care", Children's Research, Education, and Innovation Week

2024 "Influence of Genetic Variation within the TGF- $\alpha$  and GDF5 gene on Muscle Mass and Strength in Young Adults", Children's Research, Education, and Innovation Week

2023 "Influence of Genetic Variation Within the *WNT16* Gene on Musculoskeletal Phenotypes in Young Adults", Orthopedic Research Society

2023 "Genetic Variation in VDBP rs4588 Influences Musculoskeletal Phenotypes", Orthopedic Research Society

2023 "Three Years' Safety and Efficacy Outcomes of Burosumab in Cutaneous Skeletal Hypophosphatemia Syndrome (CSHS)", Children's Research, Education, and Innovation Week

2023 "Using Virtual Communication for Rapid Dissemination of COVID-19 Information to Patients with Osteogenesis Imperfecta", Children's Research, Education, and Innovation Week

2023 "Engaging the Osteogenesis Imperfecta (OI) Community in Patient Centered Outcomes Research", Children's Research, Education, and Innovation Week

---

## References

Dr. Laura Tosi MD, Orthopedics, Children's National Medical Center  
 Phone: (202) 997-1881, Email: [ltosi@childrensnational.org](mailto:ltosi@childrensnational.org)

---