CIFEIIOWS 2020-2021

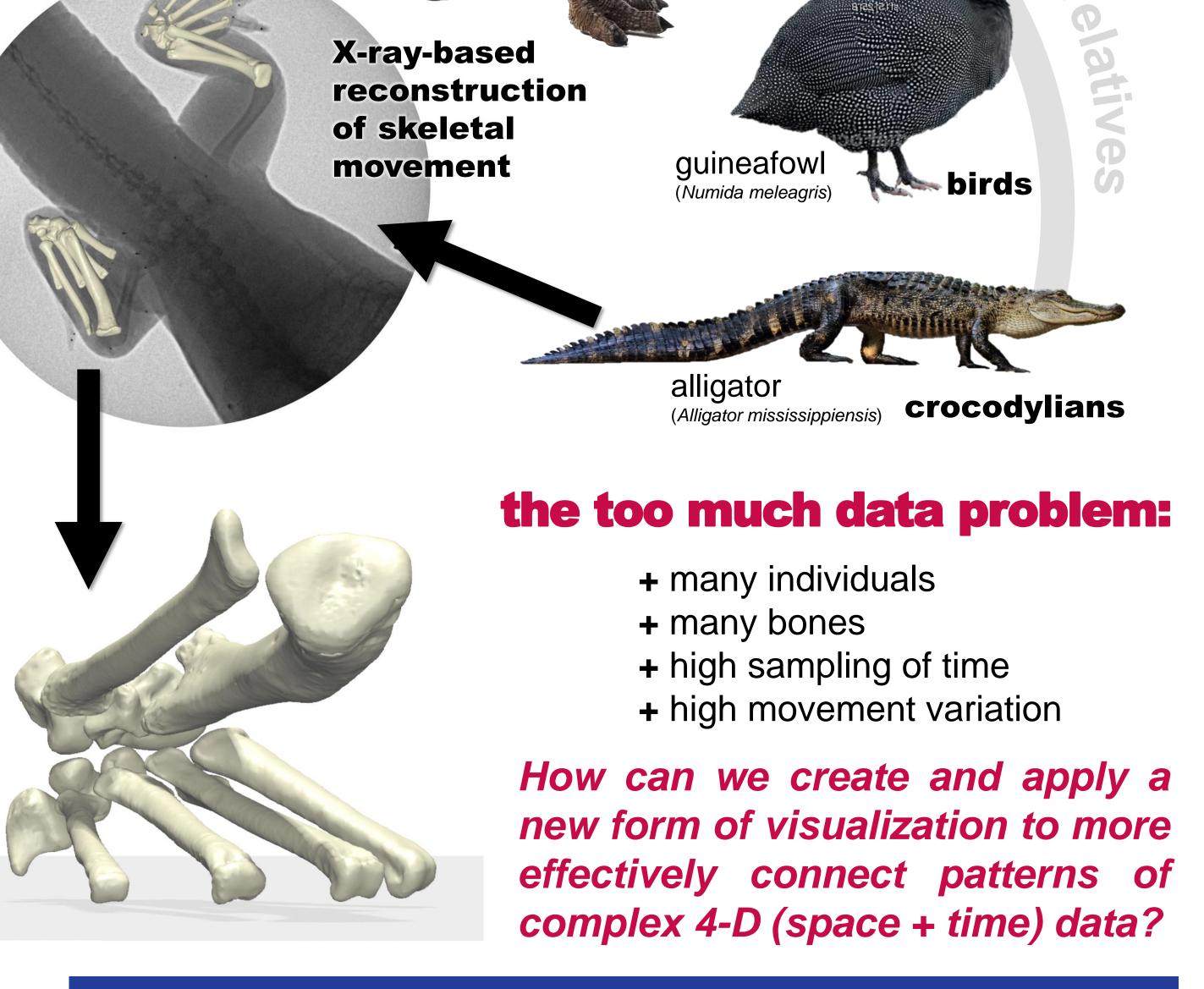
Morgan L. Turner, PhD

University of Minnesota

Computing Innovation Fellows

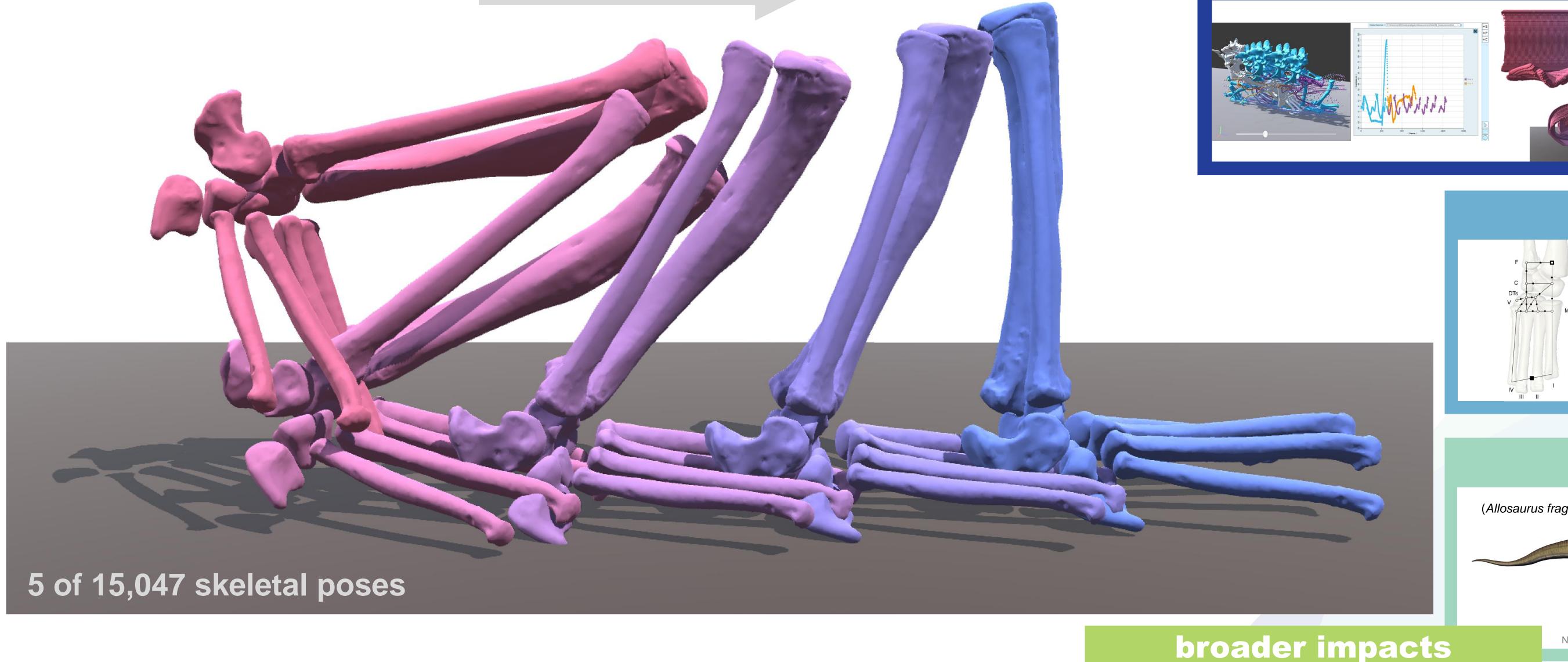
How did dinosaurs walk?

Trans-disciplinary research in visual design, data-intensive visualization, and paleontology is creating new tools for analyzing high-resolution time-varying experimentally collected motion data and re-defining bio-informed design.

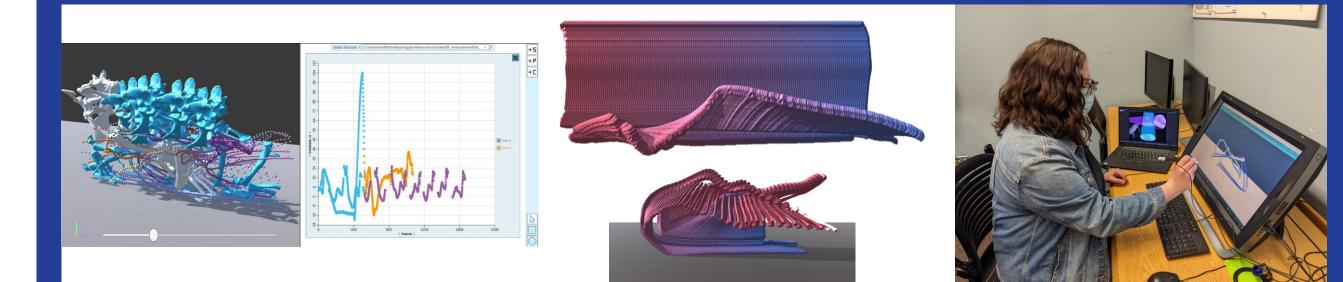


direction of travel

computer science



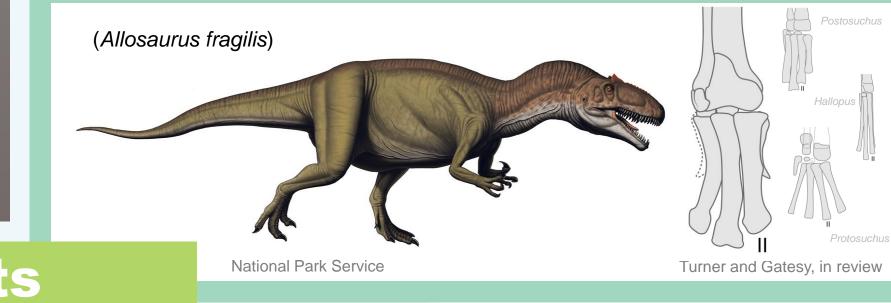
Acknowledgements:



biomechanics



paleontology



People | Data visualization collaborators (Daniel Keefe, Bridger Herman, Matthias Broske, Cheyenne Diebert) Alligator research co-author (Stephen Gatesy); providing and shipping alligators (Tomasz Owerkowicz, Adrien Arias); assistance in alligator surgery and data collection (Armita Manafzadeh, Elska Kaczmarek, Hannah Weller, Andrea Rummel, John Capano, David Boerma); data analysis support (Kia Huffman, Ben Knörlein); logistics (Erika Tavares, Beth Brainerd); operating room (Thomas Roberts); foot function discussions (Peter Falkingham, Kevin Hatala, Michael Rainbow, Lauren Welte); data visualization discussions (Daniel Keefe and the Interactive Visualization Lab, David Laidlaw, Johannes Novotny, Joshua Tveite, students of Brown/RISD CS137, and students of UMN CSCI5609)

Facilities | Brown University Center for Animal Resources and Education; W.M. Keck Foundation XROMM Facility at Brown University; Harvard Center for Nanoscale Systems

Funding | CRA/CCC/NSF Computing Innovation Fellows Program; National Science Foundation; National Geographic; EEB Doctoral Dissertation Enhancement Grant; Bushnell Research and Education Fund; UMN Postdoctoral Leadership Grant





For more research and contact information:

