# Katelyn C. Morrison

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#### EDUCATION

'25). Madrid, Spain.

	Education		
08/2021 -	Carnegie Mellon University	Pittsburgh, PA	
04/2026	Ph.D. in Human-Computer Interaction '26 M.S. in Human-Computer Interaction '24		
08/2018 -	University of Pittsburgh	Pittsburgh, PA	
05/2021	B.S. in Computer Science Certificate in Sustainability		
08/2017 -	Moravian College	Bethlehem, PA	
05/2018	General Studies		
	Experience		
05/2025 -	IBM Research	Cambrige, MA	
08/2025	Human-Centered Generative AI Research Intern (with Djallel Michael Muller, and Justin Weisz)	Bouneffouf, Maria Chang,	
05/2024 -	IBM Research	Yorktown Heights, NY	
08/2024	Human-Centered Generative AI Research Intern (with Zahra Ashk W.7]	ctorab and Justin Weisz) [S.4,	
05/2022 -	Microsoft Research	Remote	
08/2022	Research Intern (with Shamsi Iqbal and Eric Horvitz) [C.4]		
05/2021 -	Microsoft Research	Remote	
08/2021	Undergraduate Research Intern (with David Rothschild)		
05/2020 -	In-Q-Tel (IQT) Labs	Remote	
08/2020	Data Science Intern (with Nina Lopatina)		
	Papers in Submission		
[S.6]	<b>Katelyn Morrison</b> , Zexuan Li, Malia Hong, Jidapa Kraisangka, Charles Fauvel, Priscilla Correa-Jaque, Rebecca Vanderpool, Shili Lin, Sandeep Sahey, Allen Everett, Manreet Kanwar, Ray Benza, and Adam Perer. "It's Not Just for Trust: Designing for Alternative Uses of Explainable AI in Clinical Decision-Making". Under review at <i>ACM Transactions on Computing for Healthcare</i> ( <b>HEATLH '26</b> ).		
[S.5]	Katelyn Morrison, Arpit Mathur, Aidan Bradshaw, Tom Wartmann, Steven Lundi, Afrooz Zan-		

- [S.5] **Katelyn Morrison**, Arpit Mathur, Aidan Bradshaw, Tom Wartmann, Steven Lundi, Afrooz Zandifar, Weicheng Dai, Kayhan Batmanghelich, Motahhare Eslami, and Adam Perer. "A Human-Centered Approach to Identifying Promises, Risks, & Challenges of Text-to-Image Generative AI in Radiology". Under review at AAAI/ACM Conference on AI, Ethics, and Society (AIES
- [S.4] **Katelyn Morrison**, Gabriel Enrique Gonzalez, Zahra Ashktorab, Matt Reimer, Djallel Bouneffouf, Andrew Anderson, Justin D. Weisz. "On the Same Wavelength: The Impact of Mutual Theory of Mind on Human-AI Teams". Under review at *AAAI/ACM Conference on AI, Ethics, and Society* (AIES '25). Madrid, Spain.
- [S.3] Seyun Kim, **Katelyn Morrison**, Motahhare Eslami and Haiyi Zhu. How Breast Cancer AI Risk Tools Are Used, Interpreted, and Repurposed in the Clinical Ecosystem. Under review at *AAAI/ACM Conference on AI, Ethics, and Society* (**AIES '25**). Madrid, Spain.
- [S.2] Philipp Spitzer, Joshua Holstein, **Katelyn Morrison**, Kenneth Holstein, Gerhard Satzger, and Niklas Kühl. "Don't be Fooled: The Misinformation Effect of Explanations in Human-AI Collaboration". Under review at *International Journal of Human–Computer Interaction* (IJHCI).
- [S.1] Philipp Spitzer, **Katelyn Morrison**, Violet Turri, Michelle Feng, Adam Perer, and Niklas Kühl. "Imperfections of XAI: Phenomena Influencing AI-Assisted Decision-Making". Under review at *ACM Transactions on Interactive Intelligent Systems* (**TIIS**).

### JOURNAL PAPERS

[J.1] Yanwu Xu, Li Sun, Wei Peng, Shuyue Jia, **Katelyn Morrison**, Adam Perer, Shyam Visweswaran, Motahhare Eslami, and Kayhan Batmanghelich. "MedSyn: Text-guided Anatomy-aware Synthesis of High-Fidelity 3D CT Images". *IEEE Transactions on Medical Imaging* (T-MI '24).

#### CONFERENCE PAPERS

- [C.6] Aidan Bradshaw, **Katelyn Morrison**, Arpit Mathur, Weicheng Dai, Kayhan Batmanghelich, Motahhare Eslami, and Adam Perer. Toward Interpretable 3D Diffusion in Radiology: Token-Wise Attribution for Text-to-CT Synthesis. In *Medical Imaging with Deep Learning* (MIDL '25); Short Papers Track. Salt Lake City, Utah.
- [C.5] Violet Turri\*, **Katelyn Morrison**\*, Katherine-Marie Robinson, Collin Abidi, Adam Perer, Jodi Forlizzi, Rachel Dzombak. "Transparency in the Wild: Navigating Transparency in a Deployed AI System to Broaden Need-Finding Approaches". In *ACM Conference on Fairness, Accountability, and Transparency* (**FAccT '24**). Rio de Janeiro, Brazil.
- [C.4] **Katelyn Morrison**, Shamsi Iqbal, and Eric Horvitz. "AI-Powered Reminders for Collaborative Tasks: Experiences and Futures". In ACM SIGCHI Conference on Computer-Supported Cooperative Work & Social Computing (CSCW '24). San Jose, Costa Rica.
- [C.3] **Katelyn Morrison\***, Philipp Spitzer\*, Violet Turri, Michelle Feng, Niklas Kühl, and Adam Perer. "The Impact of Imperfect XAI on Human-AI Decision-Making". In *ACM SIGCHI Conference on Computer-Supported Cooperative Work & Social Computing* (CSCW '24). San Jose, Costa Rica.
- [C.2] **Katelyn Morrison**, Mayank Jain, Jessica Hammer, and Adam Perer. "Eye into AI: Evaluating the Interpretability of Explainable AI Techniques through a Game With a Purpose". In *ACM SIGCHI Conference on Computer-Supported Cooperative Work & Social Computing* (CSCW '23). Minneapolis, Minnesota.
- [C.1] **Katelyn Morrison**, Donghoon Shin, Kenneth Holstein, and Adam Perer. "Evaluating the Impact of Human Explanation Strategies on Human-AI Visual Decision-Making". In *ACM SIGCHI Conference on Computer-Supported Cooperative Work & Social Computing* (CSCW '23). Minneapolis, Minnesota.

#### CLINICAL ABSTRACTS

[CA.1] Zexuan Li, **Katelyn Morrison**, Shuyi Han, Jidapa Kraisangka, Charles Fauvel, Priscilla Correa-Jaque, Rebecca Vanderpool, Yongqi Liu, Shili Lin, Adam Perer, Allen Everett, Manreet Kanwar, and Raymond Benza "Designing and Understanding What-if Explanations in an Interactive Clinical Decision-Support Tool for Pulmonary Hypertension Outcome Risk Assessment and Treatment Guidance". In *Pulmonary Vascular Research Institute Annual Congress*. (**PVRI '24**).

#### WORKSHOP PAPERS

- [W.9] Philipp Spitzer, Matthias Baldauf, Philippe Palanque, Virpi Roto, **Katelyn Morrison**, Domenique Zipperling, Joshua Holstein. "Hybrid Automation Experiences—Communication, Coordination, and Collaboration within Human-AI Teams". In *Extended Abstracts of the ACM Conference on Human Factors in Computing Systems* (CHI '25). Yokohama, Japan.
- [W.8] Venkatesh Sivaraman\*, **Katelyn Morrison**\*, Will Epperson\*, and Adam Perer. "Over-Relying on Reliance: Towards Realistic Evaluations of AI-Based Clinical Decision Support". In Workshop on Envisioning the Future of Interactive Health at (CHI '25). Yokohama, Japan.
- [W.7] Katelyn Morrison, Zahra Ashktorab, Djallel Bouneffouf, Gabriel Enrique Gonzalez, Justin D. Weisz. "Establishing the Cooperative Game Wavelength as a Testbed to Explore Mutual Theory of Mind". In Advancing Artificial Intelligence through Theory of Mind (ToM4AI) Workshop at (AAAI '25). Philadelphia, PA.
- [W.6] **Katelyn Morrison**, Philipp Spitzer, Michelle Feng, Violet Turri, Niklas Kühl, and Adam Perer. "Imperfect Natural Language Explanations in Human-AI Decision-Making". In *Trust and Reliance in Evolving Human-AI Workflows (TREW) Workshop* at **(CHI '24)**. Honolulu, Hawaii.

[W.5]	<b>Katelyn Morrison</b> , Ankita Mehra, and Adam Perer. "Shared InterestSometimes: Understanding the Alignment between Human Perception, Vision Architectures, and Saliency Map Techniques". In <i>XAI4CV at the Conference on Computer Vision and Pattern Recognition</i> ( <b>CVPR</b> ). Vancouver, Canada. <b>Spotlight Talk</b> .	
[W.4]	Vivek Aswal*, Gore Kao*, Seo Young Kim*, and <b>Katelyn Morrison</b> *. "Towards Generating Human-Centered Saliency Maps without Significantly Sacrificing Accuracy". In <i>NeuroVision Workshop</i> at (CVPR '22). New Orleans, Louisiana.	
[W.3]	<b>Katelyn Morrison</b> , Benjamin Gilby, Colton Lipchak, Adam Mattioli, and Adriana Kovashka. "Exploring Corruption Robustness: Inductive Biases in Vision Transformers and MLP-Mixers". In <i>Workshop on Uncertainty &amp; Robustness in Deep Learning</i> (ICML '21). Remote.	
[W.2]	<b>Katelyn Morrison</b> . "Reducing Discrimination in Learning Algorithms for Social Good in Sociotechnical Systems". In <i>AI for Social Good Workshop</i> at ( <b>IJCAI-PRICAI '20</b> ). Remote.	
[W.1]	<b>Katelyn Morrison</b> , Daniel Yates, Maya Roman, and William W. Clark. "Using Object Tracking Techniques to Non-Invasively Measure Thoracic Rotation Range of Motion". In <i>Adjunct Proceedings of the ACM International Conference on Multimodal Interaction</i> (ICMI '20). Utrecht, The Netherlands (Remote).	
	Invited Talks	
03/2025	Opportunities and Challenges in Designing Text-to-Image Generative AI for Medical Education, Training, and Practice Carnegie Mellon University Human-Robot Interaction Reading Group (in-person) Host: Michelle Zhao	
07/2024	Guest Lecture on Explainable AI in Human-AI Collaboration for Introduction to HCI University of Illinois Urbana-Champaign - School of Information Sciences Instructor: Kyrie Zhixuan Zhou	
02/2024	The Paradox of Transparency Mechanisms in AI-Assisted Decision-Making Department of Homeland Security Advanced Computing Branch (remote) Host: Krishnamurthy Vemuru	
02/2024	The Impact of Imperfect XAI on Human-AI Decision-Making Explainable AI Slack Group Talk Series (remote; co-presented with Philipp Spitzer) Host: Nick Kroeger	
11/2023	Guest Lecture on "Interpreting Image Classification Models" 05-839 Interactive Data Science Carnegie Mellon University - Human-Computer Interaction Institute Instructor: Adam Perer	
10/2023	Evaluating the Impact of Human Explanation Strategies on Human-AI Visual Decision-Making Explainable AI Slack Group Talk Series (remote) Host: Nick Kroeger	
05/2021	School of Computing & Information Commencement Speaker University of Pittsburgh, Peterson Events Center	
	Teaching	
01/2024 – 04/2024	<b>05-610 User-Centered Research and Evaluation (TA)</b> Carnegie Mellon University - Human-Computer Interaction Institute Instructor: Raelin Musuraca and Hong Shen	
08/2023 – 12/2023	05-839 Interactive Data Science (TA) Carnegie Mellon University - Human-Computer Interaction Institute Instructor: Adam Perer	

Since 2021	Reviewer  IJHCI; AIES; ACM CSCW, CHI*, FAccT, ISS*, IUI, UIST*, DIS, etc.  * 6 total Special Recognitions for Outstanding Reviews	
2020 – 2025	Organizing Committee Member CHI 2025 Workshop on Hybrid Automation Experiences, CVPR 2024 XAI4CV Workshop, NeurIPS 2023 Computational Sustainability Workshop, 2020 & 2022 Computational Sustainability Doctoral Consortium	
2021 – 2023	Acacemic Representative  Dean of the School of Computer Science Undergraduate Research Engagement Working Group  Graudate Student Assembly Representative	
	Mentoring	
02/2025 –	Maggie Chen – Summer Undergraduate Research Fellow Recipient	
08/2025	Undergraduate in Computer Science at Carnegie Mellon University	
01/2025 -	Ray Xia – Independent Study	
04/2025	Master's student at the Human-Computer Interaction Institute at Carnegie Mellon University	
01/2025 -	Clemence Ingabire – Visiting Research Assistant	
04/2025	Master's student in Engineering Artificial Intelligence at Carnegie Mellon University Africa	
09/2024 –	Aidan Bradshaw – Research Assistant	
04/2025	M.S. in Applied Data Science at Carnegie Mellon University; Now Ph.D. student at Northwestern	
02/2024 -	<b>Tom Wartmann</b> – Master's Thesis	
09/2024	Master's student in Computer Science at ETH Zurich	
01/2024 -	Natalie Sarabosing – Indepedent Study	
12/2024	Undergraduate in Computer Science at Carnegie Mellon University	
01/2024 -	Chengqi (Malia) Hong – Indepedent Study	
08/2024	Master's student in Design for Interactions at Carnegie Mellon University	
01/2024 -	Minsuk Kim – Indepedent Study	
05/2024	B.S. in Chemistry and Computer Science at Carnegie Mellon University	
01/2024 -	Isabelle Rhee – Research Assistant	
05/2024	B.S. Computer Science at Carnegie Mellon University	
09/2023 - 05/2024	<b>Ervin Song</b> – Highway to Undergraduate Research in the Academic Year Recipient Undergraduate student in Computer Science at Carnegie Mellon University	
04/2023 -	Crystal Li – Research Capstone	
05/2024	B.S. in Computer Science at the University of Pittsburgh	
04/2023 -	<b>Zexuan Li</b> – Research Assistant	
05/2024	B.S. CS at Carnegie Mellon University '24; Now Ph.D student at University of Michigan	
07/2023 –	<b>Kristin Shuyi Han</b> – Research Assistant	
12/2023	B.S. in Computer Science at University of California San Diego	
01/2023 –	Michelle Feng – Research Assistant	
06/2023	B.S. in Computer Science at Carnegie Mellon University	
	Honors & Awards	
08/2024 – 08/2025	Digital Health Innovations Fellowship Carnegie Mellon University Center for Machine Learning & Health	
05/2021	Most Outstanding Undergraduate Student Award University of Pittsburgh Computer Science Department	

SERVICE

01/2021 -	Chancellor's Undergraduate Research Fellowship
05/2021	University of Pittsburgh
10/2019 – 05/2020	University Innovation Fellowship University of Pittsburgh
08/2019 -	United Nations Academic Impact Group Millennium Fellowship
12/2019	University of Pittsburgh

## **SKILLS**

**Technical:** Python (LangChain, Pydantic, PyTorch, Pandas), HTML, JavaScript (Svelte), CSS,

Full-Stack Development

Research: Interviews, Surveys, Design probes, Iterative prototyping, Experimental design,

Hypothesis testing