

How Can Artists Use AI Responsibly?

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Abstract

Machine learning tools provide the potential for unprecedented creative expression, but also the potential to cause unintended harms. *Making AI Art Responsibly: A Field Guide* is an illustrated zine composed of questions and case studies to help AI artists use AI techniques responsibly and with care. We argue that artists using AI should consider themselves part of the broader responsible AI community, considering factors such as consent of people represented in their datasets, labor involved in codebase and model development, and AI infrastructure and environmental costs of training machine learning models. Further, we believe that by reflecting on what is “responsible” in making their own creative works, artists can push forward best practices employed by all AI practitioners.

Background

When artists use AI technologies—whether they know it or not—they are participating in the research and development of AI. While responsible AI guidelines for academic researchers and technology companies abound (Geburu et al. 2018, Mitchell et al. 2019), this literature rarely speaks directly to the distinct needs and workflows of independent artists using AI. Despite this, artists are likely to face many of the same pitfalls as other practitioners, such as lack of dataset transparency, failure to obtain informed consent from people represented in datasets, and lack of understanding of the environmental costs and supply chain of labor involved in creating

underlying AI systems. As a result, we set out to explore and address the specific needs of the AI art community in order to reduce unintended harms of their work.



Fig. 1. *Making AI Art Responsibly: A Field Guide*, 2020, Claire Leibowicz, Emily Saltz, Lia Coleman, digital and print zine, ©The Partnership on AI. All rights reserved.

Development of the Guide

Making AI Art Responsibly (fig. 1) was created by the Partnership on AI with AI artist Lia Coleman following a July 2020 talk with Gray Area (Gray Area 2020), a cultural hub for art and technology in San Francisco. The initial talk presented insights from the Partnership on AI’s own work on AI and Media Integrity (The Partnership on AI 2020). Coleman helped translate responsible AI issues into the workflows of independent artists using AI, drawing on personal experience with the common challenges faced by those in the “Artificial Images” AI arts community (Schultz 2021). During this talk, we further engaged attendees—many of them practicing artists using AI themselves—to share their own experiences, which went on to inform the guide’s contents.

Field Guide Takeaways

The resultant field guide is structured around a path of questioning across four phases of creating AI works: 1) dataset, 2) model code, 3) training resources, and 4) publishing. In many cases, we pose questions rather than answers; this is because when it comes to the evolving AI field, many topics are subject to debate and should be built upon through trial and error. In the guide, we empower artists to lead in responsible AI practices. By taking care in how they create work, artists can serve as a model for others in the AI research space, or create provocations that push forward current best practices for using AI.

We conclude with several best practices. For example, we suggest that the least risky path to take for AI artists to take is to create their own datasets, curate images from the public domain, or ask for consent of those in a dataset, calculate the environmental costs of training, and document their work with explainable AI fields. While the field guide currently offers a starting point for AI artists, we intend for it to become a living document for creators to further discuss and shape as an ongoing part of their artistic practices.

References

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Biographies

Claire Leibowicz leads AI and Media Integrity efforts at the Partnership on AI. Claire holds a BA in Psychology and Computer Science, Phi Beta Kappa and Magna Cum Laude, from Harvard, and a Master's in the Social Science of the Internet from University of Oxford as a Clarendon Scholar.

Emily Saltz is a Researcher at the Partnership on AI studying misinformation. Before that, Emily led UX for The News Provenance Project at The New York Times. She has a Master's in Human-Computer Interaction from Carnegie Mellon University.

Lia Coleman is an artist, AI researcher, and educator who teaches machine learning artwork at Rhode Island School of Design. Her work has appeared in the NeurIPS 2019 conference, School for Poetic Computation, and Neocha Magazine. She holds a BSc in Computer Science from MIT