Ariana Strandburg-Peshkin
Mentors: John Miller, SFI Professor, and Willemien Kets, SFI Postdoctoral Fellow

Ari is working on an agent-based model that explores the effect that a small amount of information about another player's strategy has on an agent's strategy. Agents, modeled as finite automata, will compete with other agents in an iterated prisoner's dilemma and evolve strategies based on a genetic algorithm. Some of these agents will be "smart" in that they know the length of their opponent's strategy, whereas others will have no knowledge about their opponents. She will explore the differences in strategies between these two types of agents, as well as the resulting dynamics of a system composed of both types of agents.