DISSERTATION ABSTRACT

Sarah's dissertation, "Science Fairs before Sputnik: Adolescent Hobbyists and the Formation of Youth Scientific Communities in Contemporary America, 1915-1960," traces the formation and evolution of science fairs in America, focusing on the ways in which adolescents established communities of practice by engaging in these competitions. Over the course of the twentieth century, millions of American children engaged in their first experiments by crafting science fair projects. Sarah's dissertation evaluates this understudied phenomenon against the backdrop of American fascinations and fears of science and evolving notions of adolescence. Sarah argues that science fairs were central to shaping an adolescent scientific culture in the United States during the early to mid twentieth century. Sarah's research is grounded in a source base that includes thousands of photographs of science fair projects, project descriptions written by students, museum collections of equipment, toys, and apparatus, scientific trade literature, popular magazines, and archival collections of sponsoring organizations. In reviewing this range of materials, Sarah has found that the meanings of science fairs were tied to widespread apprehensions regarding the pace of modern scientific advancements, negotiations between adolescents and adults over who held scientific authority, the development of a children's consumer culture, and broader debates regarding the role scientifically inclined youth would play in shaping the nation's future.

While acknowledging the ways in which adults orchestrated the science fair movement, Sarah evaluates these competitions from a child's eye view, tracing how these competitions fostered the development of youth communities of practice. For adolescents, science fairs were a place to demonstrate their scientific acumen, develop relationships with likeminded peers, and perhaps most importantly, have fun. Science fairs also raise important philosophical questions regarding the epistemology of children's experimentation. From vibrant three-dimensional dioramas of the Progressive era to postwar argument-driven text panels, science fair displays reveal students' changing beliefs about what counted as faithful scientific evidence. Science fairs, in short, provide an entry point into understanding how adolescents conceived of science on material, social, and epistemological terms over the course of the twentieth century. Sarah is currently completing her dissertation in preparation for a May 2014 defense date.