

GRADUATE AG RESEARCH SPOTLIGHT



Elizabeth Dobis

"SHaPE has been about building a community. Here is a group of other people interested in the same things I am interested in—all the things I find fascinating."

Elizabeth Dobis, Ph.D. candidate, Agricultural Economics

THE RESEARCHER: In the honors program at the University of Minnesota, Liz Dobis was intrigued by the combined study of economics and geography. "My dad is an economics professor [in her hometown of Fargo, North Dakota], so I was exposed to it my entire life," she says. "But the idea of how economics plays out within a city, state or other geographic space—the way they interact with each other—was very interesting to me," she says. When she began to explore graduate programs, however, Dobis was unsure how to categorize this interest. Her father's former colleague, Purdue Professor of Agricultural Economics Frank Dooley, suggested that her background fit well with the university's Space, Health and Population Economics (SHaPE) program. Dobis agreed, coming to Purdue for master's study in 2009. She began her doctoral work in August 2011 under the guidance of Raymond Florax, professor of spatial and environmental economics, and Michael Delgado, assistant professor of agricultural economics. "I continued on here because I really enjoyed the program," she says. "The department is open and welcoming. People genuinely care about what you're researching and how you're developing as an individual."

THE RESEARCH: Dobis studies how the U.S. urban system has evolved. She focuses on when cities and towns were incorporated and how their size, physical location, and natural and manmade characteristics have affected population growth over the last 220 years, as well as their more current dynamics. "There are quite a few well-known theories on how this

should be happening," she says. "Contacting the cities directly and finding out little things tend to really spark my interest."

SHaPE: Dobis describes SHaPE as a specialty within agricultural economics. The diverse group develops and applies cutting-edge spatial data analysis and modeling techniques to real-world problems to inform public policy. Dobis was part of a subgroup that evolved to discuss research and share ideas. "If I ever have a question or need a different perspective, I can just ask one of our colleagues, and they're happy to help me," she says.

TOOLS: Much of the data Dobis uses comes from the U.S. Census Bureau, which she combines with historical research, geographic information systems analysis and other data sets. She appreciates Purdue's powerful computers and access to the statistical programs essential to her analysis.

FUTURE PLANS, CURRENT INTERESTS: Dobis plans to complete her work by May 2016 and is open to the whole spectrum of academic, private and governmental opportunities that might await her. In her spare time, she enjoys playing viola, reading, cooking the cuisine of other cultures, and traveling. She recently spent three months in Amsterdam, where she worked with one of her committee members to further her research.