Experiences in the flour milling industry

Christy (Pepple) Ball knows the flour milling industry. Since graduating from Penn State with a bachelor’s degree in Agricultural and Biological Engineering, she has held several positions with Cargill, Horizon Milling and Ardent Mills. Her various roles include: Production Management Engineer in Chattanooga, Tenn., Production Supervisor and Project Manager in Stockton, Calif., Assistant Plant Manager in Culpeper, Va., and Assistant Plant Manager in Ogden, Utah.

In her multiple milling positions and locations, she has learned each one offers different opportunities.

“Working in a flour mill is a job where you can be as hands-on as you want to be in making changes and improvements in the process and with your team. I’ve worked at five different mills so far, and each one has its own unique character and personality,” Ball said.

“Whether older equipment or brand new, there are things to learn and be challenged by, so no day in flour milling is ever boring! The people I’ve worked with through my career are genuine and are the reason I stay in flour milling—they truly have been my family, no matter which mill I’ve worked at. If you are looking for a career where you can have fun and make a difference and help feed people, flour milling is definitely one to consider!”

Currently, she is a Skills and Talent Development Analyst for Ardent Mills. Ardent Mills is a joint venture launched by ConAgra Mills and Horizon Milling in 2014. The company provides a range of flour mixes, blends and specialty products. It is the largest wheat flour milling company in the U.S., with 40 milling locations, bakery-mix facilities and specialty bakeries in the U.S., Canada and Puerto Rico.

Her current role gives her the opportunity to help train new leadership for Ardent Mills. Ball creates training documents and programs to improve workers’ understanding of job tasks, so they can work safely and efficiently.

“I’m responsible for training and development programs for our operations team members. I manage our new hire management program and facilitate their training schedules to ensure consistency across our sites for the new hire leaders,” she said. “I also have an apprenticeship program that I manage where we target hiring high school students and pay for them to go to additional schooling and work for us as they develop their flour milling capabilities.”

Going forward, one of the biggest challenges facing the flour milling industry today is the gluten-free movement. Estimates show one in five Americans try to include gluten-free products in their diet. Ardent Mills is actively developing products for this growing market.

“Flour milling always has it’s issues with folks going for gluten-free products. The biggest growth in the industry is how do we incorporate other grain-based things into plain flour. We are always challenging ourselves to provide our customers with nutritious grain-based solutions,” Ball said.

“Gluten-free is sure to continue to be both an opportunity and challenge for flour millers in the future.”

While she was still working for Cargill, she started thinking about earning a graduate degree. There were several factors that influenced her decision.

“I chose the K-State Master of Agribusiness program for a few different reasons. First, I had coworkers who recommended the experience – had that not happened I wouldn’t have ever heard of the MAB program.

“Second, I liked that it had classroom time, as well as remote time, and it didn’t matter where I lived, I would be able to complete the program. I was moving every 2 years or so with my
job when I started, and I wasn't able to commit to a physical school for getting my master's degree.

“Third, I worked for Cargill at the time of completing my MAB, and I felt like the coursework would directly apply to my day-to-day life,” Ball said.

Her thesis topic is an example of the direct application of the MAB program to her work at Cargill. Ball worked with major professor Dr. Vincent Amanor-Boadu on her thesis, *Foreign Direct Investment Decision Making Using an Investment Index*.

“I did my thesis on international opportunities for flour milling. I had approached my company for some possible topics, and that was something that they’d expressed interest in me pursuing,” she said. “To complete the thesis, I created a calculator that looked at different economic factors, political factors and flour consumption rates to rate countries on their market potential.”

Her investment index was designed to evaluate three components to assist in selecting a location for a greenfield investment: market conditions, economic environment and supporting infrastructure.

Amanor-Boadu, Professor of Agricultural Economics and Ball's thesis advisor, said, “Through her thesis and developing an investment calculator, Christy helped organizations make more objective decisions about their international investments. In so doing, it will enhance their competitive position and reduce risk of adverse events.”

When thinking about her thesis, Ball said, “It was a really interesting look into something I had no knowledge of and really challenged me to think outside the box. While I don’t know if we’ll ever build a flour mill in Malaysia or Thailand, I definitely learned a lot about them!”

Reflecting on her experience in the MAB program, Ball had these thoughts to share.

“The MAB program has helped me understand more outside of the operations world than I knew before entering the program. I was an engineering major in my undergraduate life and knew the technical side of the business. The courses I took in the MAB program helped broaden my horizons as far as business management and logistics.

“The MAB was definitely a good experience for me. The faculty truly care that you are supported and can complete the program, and the other folks I met through the classes are awesome and are part of what makes the experience so valuable.”

Christy (Pepple) Ball

For a copy of Ball’s thesis, go to http://hdl.handle.net/2097/14917.