

STEM Initiative

Missouri's economy is becoming increasingly centered around science, technology, engineering, and mathematics occupations, yet there is a shortfall in qualified labor to meet these demands. This is especially true for agriculture, Missouri's number one industry.

- A report released by the U.S. Department of Agriculture (USDA)¹ reported that Missouri had produced over \$2.6 billion worth of soybeans, making us the fourth largest producer in the nation. States like ours will be put under increasing pressure to meet rising demand as the global population continues to increase. Many have turned to agriculture for creative, innovative solutions to present-day problems.
- U.S. News elaborated on the problem: "Nearly 58,000 high-skill agriculture-related jobs are expected to open up between 2015 and 2020," typically requiring a college degree. "But fewer than 36,000 grads in related fields of study are expected to enter the workforce during that period." Missouri can help fill the gap by investing in and promoting opportunities in STEM fields.²

Investing in STEM is a win-win. It promotes the Missouri economy, as well as indiviual-level fulfillment and satisfaction.

- The number of STEM occupations available in Missouri are expected to grow by 10% by 2022, compared with 8% for Missouri occupations overall³
- STEM jobs pay nearly 75 percent more than the average Missourian income³
- According to the 2014 St. Louis Workforce Report, there were over 23,000 job advertisements for STEM occupations, and only 2,044 jobseekers for those positions; a 27.8% supply deficit⁴

The STEM Initiative will move the needle forward from the bottom-up: The program encourages STEM-field employers to hire current students or recent graduates in relevant fields to have a small portion of its tax liabilities put into the STEM Fund which, in turn, is used to invest in providing STEM-related opportunities to students at the K-12 and college level. By increasing accessibility and opportunity, Missouri's economy can meet rising demand and become a leader in the nation.

¹ United States, Congress, "USDA/NASS 2016 State Agriculture Overview for Missouri," USDA/NASS 2016 State Agriculture Overview for Missouri, National Agricultural Statistics Service, 2016. www.nass.usda.gov/Quick_Stats/Ag_Overview/stateOverview.php?state=MISSOURI.

² Soergel, Andrew. ⁽²⁷⁾ News, 11 May 2015, <u>www.usnews.com/news/articles/2015/05/11/science-technology-engineering-and-math-skills-a-necessity-in-27-percent-of-new-agriculture-jobs</u>.

³ United States, Congress, Missouri's Economic Research and Information Center. "Missouri's STEM Occupation." Missouri's STEM Occupation, Missouri's Department of Economic Development. www.missourieconomy.org/pdfs/stem_occ_booklet.pdf.

⁴ http://www.stlcc.edu/Workforce-Solutions/St-Louis-Workforce/Reports/State-of-St-Louis-STEM-Workforce-Report-2014.pdf