MICHIGAN STATE UNIVERSITY
Biosystems & Agricultural Engineering (BAE)

Postdoc Position: Specialty Crop Automation

A postdoc research associate position is available in Dr. Yuzhen Lu's group (**AgFood Sensing & Intelligence**) in the Department of Biosystems & Agricultural Engineering at Michigan State University (Top 100 Globally, Public Ivy, the first Land-Grant University and AAU member in the U.S., Top 15 in Agriculture & Forestry globally). The selected candidate will work primarily on **in-orchard/postharvest automation** for specialty crops. This position will be an initial 12-month opportunity with the possibility of an extension depending on performance and funding. It may start in September of 2025 or on a later agreed-upon starting date of 2025.

The successful candidate is expected to assist with leading efforts in leveraging *advanced machine vision and artificial intelligence (AI)/robotics technologies well as fast prototyping techniques to automate otherwise labor-intensive in-orchard tasks* (e.g., automated fruit sorting, robotic harvesting, vision-based crop management), and to generate high-quality peer-reviewed publications. The postdoc will meet regularly with Dr. Lu to discuss best practices in design, experiments, prototyping, algorithm development and testing, manuscript preparation, and mentoring. The selected candidate may also engage in activities such as grant proposal development and class teaching assistance as needed for their professional development. Successful candidates need to be *creative*, *self-motivated/disciplined*, *adaptive*, and *dedicated*, collaborate in multidisciplinary environments, and communicate research outcomes actively through journal publications and deliver presentations at conferences.

Minimum Requirements

- The successful candidate must have a PhD degree in Biosystems/Agricultural Engineering, Computer Science, Electrical Engineering, Mechanical Engineering, or closely related fields.
- Successful candidates are expected to have demonstrated experience evidenced in publication records in machine/computer vision, mechatronics, and or AI/robotics.
- Strong computer programming skills are necessary in C++, Python, and or Matlab.
- The candidate is expected to have excellent scientific writing and communication skills.

Desired Qualifications

- Skills in machine vision, engineering design, hardware prototyping, and system integration are highly desirable.
- Experience in the *development of real-time machine/computer vision systems with AI for special crop automation* is an advantage.

Application

Correspondences about the position may be sent to Dr. Yuzhen Lu at luyuzhen@msu.edu. Review of applications will commence immediately and proceed until the position is filled. Video pre-interview meetings may be scheduled for potential candidates if necessary.