



CROP SCIENTIST

Design better crops to help feed the world more sustainably and efficiently. No farm background required!

WHAT IT IS

Imagine using cutting-edge science and technology to grow the food, feed and fiber crops that we all depend on. You'll work with plants and everything affecting their development—light, water, temperature, nutrients, diseases, weeds, insects. Think plant genetics meets environmental science meets biotechnology. You'll identify, develop, and manage crops for agriculture, urban spaces, and rangelands. Your work spans activities from breeding more nutritious crops to discovering disease and pest-resistant varieties to improving soil health. Every breakthrough helps farmers grow more food on less land with fewer resources.

A DAY IN THE LIFE

Most crop scientists work in a laboratory or research setting. Your day may include:

- Designing plants that withstand drought, heat, disease
- Developing sustainable pest management
- Researching plant nutrition and soil fertility
- Exploring crop biodiversity
- Testing new seed varieties
- Using molecular biology and genetics to make crops more nutritious and stress tolerant
- Analyzing environmental impacts
- Modeling crop yields using AI and data science
- Working internationally to solve global food hunger and security challenges

READY FOR SUCCESS

Your success begins with a passion for plant science and a strong foundation in related science like biology. Practice a problem-solving mindset and develop your analytical thinking. Think about what most excites you: plant breeding, genetics, molecular biology, biotechnology, plant physiology, pest and weed management, turfgrass science, seed science, plant diseases, ecology. Seek out mentors and practice your lab skills.

EDUCATION REQUIRED

This career is highly technical and science based. **Most crop scientists major in:**

- **Biology**
- **Crop Science**
- **Plant Science**
- **Related field**

Entry-level roles require a bachelor's degree, while advanced research positions often call for a master's or Ph.D. Leadership roles may require a master's degree or MBA plus experience.

JOB OPPORTUNITIES

Crop scientists work in incredibly diverse spaces, depending on their specialty and area of focus. Most work for the private sector, academia or government laboratories.

GETTING STARTED

Excel in biology, chemistry or math. Join agriculture organizations or clubs. Seek summer internships at agricultural research stations or seed companies.



GROW BY
6%
UNTIL 2034

JOB OUTLOOK

Growing 6 percent from 2024 to 2034, faster than average. Climate change, population growth, and sustainable agriculture drive demand.



\$83K
AS OF 2024

AVERAGE SALARY

Crop scientists will have earnings comparable to soil and plant scientists and earn a median annual wage of \$83,040, according to the Bureau of Labor Statistics May 2024.