

# Biology

A Biology major focuses on the study of living organisms, their structure, function, and interaction with their environment. Students explore various subfields such as genetics, ecology, microbiology, and physiology to develop a broad understanding of biological systems. Graduates are well-prepared for careers in healthcare, research, environmental science, and education. Typical industry sectors include healthcare, pharmaceuticals, biotechnology, environmental conservation, and academic or government research.

## Job Title Examples:

- Laboratory Technician
- Research Assistant
- Environmental Consultant
- Biological Technician
- Medical Laboratory Technician
- Wildlife Biologist
- Quality Control Analyst
- Clinical Research Coordinator
- Biotech Production Assistant
- Environmental Health Specialist

## Hard and Soft Skills Needed:

### Hard Skills:

1. Laboratory Techniques
2. Data Analysis
3. Molecular Biology
4. Environmental Monitoring
5. Genetic Sequencing

### Soft Skills:

1. Critical Thinking
2. Problem-Solving
3. Communication
4. Attention to Detail
5. Teamwork

### **Further Education/Training Required and/or Suggested:**

A BS in Biology qualifies students for entry-level roles, but additional certifications or training can enhance career prospects:

To Enter the Field:

1. Certified Biological Scientist (CBS):
  - Recognizes proficiency in biological sciences.
2. First Aid/CPR Certification:
  - Often required for laboratory or fieldwork positions.

To Advance:

1. Laboratory Certifications (e.g., ASCP or CLT):
  - For students pursuing careers in medical or clinical laboratory work.
2. Graduate Degree (e.g., MS or PhD):
  - For roles in research, academia, or advanced positions in healthcare.

Summary:

Certifications like CBS and specialized laboratory certifications, along with graduate study, can enhance career advancement in biology.

### **Professional or Student Associations:**

- American Institute of Biological Sciences (AIBS)
- American Society of Plant Biologists (ASPB)
- Phi Sigma Biological Honor Society