# **BIOCHEMISTRY**

# What can I do with this degree?

## **AREAS**

## **EMPLOYERS**

## **STRATEGIES**

#### **RESEARCH**

Basic

Applied

Medical

Administration

University laboratories

Federal government laboratories/agencies:

National Science Foundation

National Institutes of Health

Food and Drug Administration

**Environmental Protection Agency** 

Department of Agriculture

Army/Navy

State and local government laboratories/agencies

Public health departments

Hospital laboratories

Commercial medical laboratories

Independent research foundations

Industry laboratories:

Pharmaceutical companies

Biotechnology firms

Food processors

Cosmetic manufacturers

Chemical and petroleum industries

Bachelor's degree in biochemistry, biology, or chemistry to qualify for laboratory technician/research assistant positions.

Choose courses with laboratory work.

Get on the job experience in a laboratory and/or do a senior research project.

Complete a certificate training program, usually one year, to learn specialized laboratory techniques.

Earn master's degree in biochemistry for better positions, advancement opportunities, more responsibility and higher pay.

Obtain Ph.D. to direct research projects and lead research teams.

#### **TEACHING**

Elementary Secondary

Post-secondary

Public and private elementary, middle, and high schools

Two-year community colleges/technical institutes Four-year institutions

Medical schools

Complete an accredited teacher preparation program for certification/licensure in biology and/or chemistry.

Earn a higher degree in biochemistry and gain research experience. Ph.D. required for four-year research institutions.

### **AREAS**

## **EMPLOYERS**

### **STRATEGIES**

#### **BUSINESS**

Sales/Marketing Technical Writing Scientific Journalism Regulatory Affairs Administration/Management Biotechnology industry Pharmaceutical and chemical companies Publishers:

textbook, magazine, newspaper, book Software firms Regulatory agencies Take business and/or computer classes.

Become familiar with desktop publishing and other software packages.

Develop written and oral communication skills. Obtain an MBA or Ph.D. to reach high levels of administration.

#### **PROFESSIONAL**

Intellectual Property/Patent Law

Medicine

Law firms
Legal departments of corporations
Hospitals
Private practice

Obtain a J.D.

Earn an M.D.

#### **GENERAL INFORMATION**

 Seek laboratory experiences as an undergraduate:

research projects, volunteer to help professors, summer jobs, internships, co-op experiences.

- Participate in research programs some sponsored by the National Science Foundation and the National Institutes of Health.
- Consider a certificate program or specialized master's program to qualify for research technician positions.
- Earn master's degree for greater variety and autonomy on the job.
- Gain a Ph.D. to work on high-level research projects, to direct research programs, to enter high levels of administration, and to teach at a four-year post-secondary institution.

- Postdoctoral fellowships may also be required.
- Learn to work independently and as a part of a team.
- Need the ability to communicate clearly.
- Gain competencies in computers and mathematics.
- Read scientific journals and join related professional organizations.