Health Science Career Cluster

The Health Science career cluster focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. This career cluster includes occupations ranging from medical assistant, registered nurse, and physical therapist to forensic science technician and athletic trainer.

Statewide Program of Study: Biomedical Science

The Biomedical Science program of study focuses on occupational and educational opportunities associated with the study of biology and medicine. This program of study includes researching and diagnosing diseases, pre-existing conditions, and other determinants of health. Students will also practice patient care and communication.

Secondary Courses for High School Credit

Level 1

- **Principles of Biomedical Science (PLTW) (1 credit)**
  - 1400CT; 9-12 grade
  - 1 semester at Ben Barber
  - Weighted

Level 2

- **Medical Terminology (1 credit)**
  - 1443CT; 9-12 grade
  - 1 semester at Ben Barber
- **Human Body Systems (PLTW) (1 credit)**
  - 1405CT; 9-12 grade
  - 1 semester at Ben Barber
  - Weighted
  - *Prerequisite: Principles of Biomedical Science*

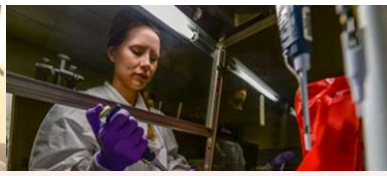
Level 3

- **Medical Microbiology (1 credit)**
  - 8120CT; 10-12 grade
  - 1 semester at Ben Barber
  - Science Credit
  - *Prerequisite: Biology, Chemistry, AND Medical Terminology*
- **Anatomy and Physiology (1 credit)**
  - 0810CT or 8100A/B; 11-12 grade
  - 1 semester at Ben Barber or 2 semesters at Home Campus
  - Science Credit
  - *Prerequisite: Biology AND Level 2 or 3 Health Science Course*

Level 4

- **Pathophysiology (1 credit)**
  - 8125CT; 11-12 grade
  - 1 semester at Ben Barber
  - Science Credit
  - *Prerequisite: Biology AND Chemistry AND Level 2 or 3 Health Science Course*
- **Practicum in Health Science (2 credits)**
  - 1431CA/CB; 12 only
  - 2 semesters at Ben Barber
  - *Prerequisite: Health Science Theory AND any Level 3 Health Science Course AND Selection Process*





Example Postsecondary Opportunities

Apprenticeships
- Medical Laboratory Technician

Associate Degrees
- Biotechnology
- Biological Sciences

Bachelor's Degrees
- Biology
- Cellular and Molecular Biology

Master's, Doctoral, and Professional Degrees
- Forensic Science and Technology
- Biomedical Sciences

Additional Stackable IBCs/License
- Cytotechnologist

Example Aligned Occupations

Medical Equipment Preparers
Median Wage: $38,827
Annual Openings: 519
10-Year Growth: 18%

Forensic Science Technicians
Median Wage: $56,971
Annual Openings: 249
10-Year Growth: 22%

Biological Technicians
Median Wage: $45,787
Annual Openings: 879
10-Year Growth: 14%

- Biotechnician Assistant Credentialing Exam (BACE)
- Medical Laboratory Assistant
- Medical Laboratory Technician

Data Source: TexasWages, Texas Workforce Commission. Retrieved 3/8/2024.

For more information visit: https://tea.texas.gov/academics/college-career-and-military-prep/career-and-technical-education/programs-of-study-additional-resources

Successful completion of the Biomedical program of study will fulfill requirements of the Public Services endorsement or the STEM endorsement if the math and science requirements are met.

Biomedical Science