## **Architecture and Construction**

## High School Program of Study

#### Coursework

Introduction to Construction
Building Construction 1-4

Tools

Blueprints

Framing & Roofing

Exterior/Interior Finishing

Footings and Foundations

Electrical switches/circuits

Plumbing tubing and systems

Drainage systems

A&C - WBC

#### **Industry Certifications**

National Center for Construction Education and Research (NCCER)

Carpentry, Core, Electricity, Masonry, Plumbing

Residential Construction Academy (RCA) – Electrical Principals, Wiring

#### Work-Based Learning

Internships / Apprenticeships Student Organizations Employability Skills

### Certificate

#### **Trident Technical College**

Architectural Drafting
Construction Management

Electrician: Construction

Surveying

#### Midlands Technical College

Architectural Systems and Codes
Construction Engineer

Technology

Carpentry - Qualified Framer

## Associate's Degree

#### **Trident Technical College**

A.S. Civil Engineering Technology

Technology
A.S. Electrician: Industrial and
Construction

A.S. Engineering Design Graphics

MIDLANDS

#### Midlands Technical College

A.S. Civil Engineering Technology

A.S. Building Construction Technology

## Bachelor's Degree

#### Clemson University

B.S. Architecture

B.S. Civil Engineering

B.S. Construction Science and Management

#### South Carolina State University

B.S. Civil Engineering Technology



B.S. Electrical Engineering Technology

B.S. Professional Land Surveying

#### University of South Carolina

**B.S. Civil Engineering** 

**B.S. Physics** 

## High School Diploma

- •Construction Laborers and Helpers (\$33,450); 1130L
- •Carpenter (\$45,170); 1130L
- •Construction Equipment Operators (\$46,080); 1130L

#### Certificate

- Plumbers, Pipefitters, and Steamfitters (\$52,590); 1280L
- •Electrician (\$54,110); 1270L
- •Construction and Building Inspectors (\$59,090); 1130L

#### Associate's

- •Surveyor (\$61,140); 1395L
- •First-Line Supervisors of Construction Trades and Extraction Workers (\$64,070); 1130L

- •Architect (\$78,470); 1420L
- •Civil Engineer (\$84,770); 1430L
- •Construction Managers (\$91,370); 1350L

## **Advanced Manufacturing**

## High School Program of Study

#### Coursework

Electrical Components/Industrial Safety

Mechanical Components Electric Drives/Hand & Power Tool Operation

Electro Pneumatics and Hydraulics

Digital Fundamentals and Programmable Controllers

Welding 1-4

Manufacturing WBC

#### **Industry Certifications**

NCCER Core -- The National Center for Construction Education and Research

NCCER - Manufacturing Skills Standards Council (MSSC) CPT -Certified Production Technician

OSHA -- Occupational Safety and Health Administration

#### Work-Based Learning

Internships/ Apprenticeships Student Organizations

**Employability Skills** 

#### Certificate

#### **Trident Technical College**

Advanced Automation:
Mechatronics
Industrial Mechanic

Welding Technology

#### Midlands Technical College

Machining

Mechatronics Technology I

## Associate's Degree

#### Trident Technical College

A.S. Industrial TECHNICAL Maintenance Mechanics

A.S. Mechanical Engineering Technology

A.S. Welding

#### Midlands Technical College

A.S. Electronics
Engineering Technology MILITARIANDS
MEDICAL COLLEGE

A.S. Machine Tool Technology
A.S. Mechanical Engineering

Technology

## Bachelor's Degree

#### Clemson University

B.S. Electrical Engineering

B.S. Mechanical Engineering

#### South Carolina State University

B.S. Electrical Engineering Technology

B.S. Mechanical Engineering Technology

#### University of South Carolina

B.S. Electrical Engineering

B.S. Mechanical Engineering

#### High School Diploma

- Assemblers and Fabricators (\$31,850); 1130L
- Welders, Cutters, Solderers, and Brazers (\$40,240); 1130L

#### Certificate

 Mechanical Engineering Technician I (\$55,360); 1270L

#### Associate'

- Industrial Engineer Technician (\$54,280); 1320L
- Electronics Engineering Technician (\$63,660); 1250L

- Mechanical Engineer (\$85,880); 1405L
- Electronics Engineer (\$97,970); 1380L

# Information Technology

## High School Program of Study

#### Coursework

(Advanced) Computer Repair and Service

(Advanced) Networking **Fundamentals** 

Computer Programming

Fundamentals (Advanced) Web Page Design and Development

Game Design and Development

IT Fundamentals

Fundamentals of (Advanced) Cyber Security

Computer Science Principles IT WBC

#### Industry Certifications

Cisco Certified Entry Networking Technician

CompTIA A+ / Security Plus

Oracle - Database Design

Microsoft Technology Associate (MTA) Certification

Systems Security Certified Practitioner - SSCP from (ISC)

#### Work-Based Learning

Internships / Apprenticeships **Employability Skills** 

### Certificate

#### **Trident Technical College**

**Business Information Systems** Cisco Certified Network Associate CompTIA Systems Specialist Computer Aided Design Computer Animation Database Administrator Internet Programming Linux Systems Administration

Microcomputer Programming

Microsoft Network Solutions

Midlands Technical College

LAN Networking Systems

Office Support Specialist

Routing and Networking

Web Design and Maintenance

Multimedia Design

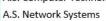
Network Security

Help Desk

Configuration

## A.S. Administrative

Office Technology



## Associate's Degree

#### **Trident Technical College**

A.S. Computer Programming A.S. Information Systems Specialist

## Midlands Technical College

MIDLANDS

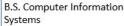
A.S. Computer Technology

Management

## Bachelor's Degree

#### Clemson University

**B.S.** Computer Engineering



B.S. Computer Science

#### South Carolina State University

**B.S. Computer Science** 

B.S. Technology Education

#### University of South Carolina

B.S. Computer Science / Computer Engineering

B.S. Educational Technology

**B.S. Information Science** 

B.S. Integrated Information Technology

- Information Clerk (\$33,680); 1130L
- · Health Information Technician (\$39.180): 1130L
- Web Developer (\$67,990); 1390L

- Computer Operator (\$44,270); 13551
- Computer Support Specialist (\$52,810); 1390L

• Computer Network Support Specialist (\$62,670); 1410L

#### Bachelor's

- Database Administrator (\$87,020); 1410L
- Information Security Analyst (\$95,510); 1415L
- Computer Hardware Engineer (\$115,120); 1410L

## Charleston > excellence is our standard County SCHOOL DISTRICT

# Science, Technology, Engineering, and Math

## **High School Program of Study**

#### Coursework

Introduction to Engineering Design (IED)

Principles of Engineering (POE)

Aerospace Engineering (AE)

Civil Engineering and Architecture (CEA)

Computer Integrated Manufacturing (CIM)

Digital Electronics (DE)

Engineering Design and Development (EDD)

Introduction to Computer Science (ICS)

STEM WBC

#### **Industry Certifications**

Autodesk Inventor

CSWA- SolidWorks Associate Certification

#### Work-Based Learning

Internships / Apprenticeships

Student Organizations

**Employability Skills** 

### Certificate

#### Trident Technical College

Advanced Automation: Mechatronics

Aircraft Assembly Technology

Certificates in Transfer Engineering: USC/Citadel

Industrial Mechanic

#### Midlands Technical College

Architectural Design
Construction Engineering

Technology

Engineering Science

Mechanical Systems Dynamics

Structural Technology

## Associate's Degree

TRIDENT

#### Trident Technical College

A.S. Civil Engineer Technology

A.S. Electronics Engineering Technology

A.S. Mechanical Engineering Technology

## Midlands Technical College

### A.S. Architectural Engineering Technology

A.S. Civil Engineering Technology

A.S. Electronics Engineering Technology

A.S. Mechanical Engineering Technology

## Bachelor's Degree

#### Clemson University

B.S. Civil Engineering

**B.S. Electrical Engineering** 

B.S. Mechanical Engineering

#### South Carolina State University

B.S. Civil Engineering Technology



B.S. Industrial Engineering Technology

B.S. Mechanical Engineering Technology

B.S. Nuclear Engineering

#### University of South Carolina

B.S. Aerospace Engineering

**B.S. Electrical Engineering** 

B.S. Mechanical Engineering

B.S. Nuclear Engineering

## High School Diploma

Assemblers and Fabricators (\$31,850);
 1175L

#### Certificate

- Surveying and Mapping Technicians (\$43,340); 1285L
- Stationary Engineers and Boiler Operators (\$59,890); 1375L

#### Associate's

- Civil Engineering Technicians (\$51,620);
   1260L
- Aerospace Engineering and Operations Technicians (\$67,240); 1260L

- •Landscape Architects (\$65,760); 1420L
- Mechanical Engineer (\$85,880); 1405L
- Electronics Engineer (\$97,970); 1380L
- Nuclear Engineers (\$105,810); 1450L

# **Health Science Technology**

## **High School Program of Study**

#### Coursework

HST WBC

Sports Medicine Human Body Systems Principals of Biomedical Sciences Biomedical Innovations Medical Interventions

Health Science Technology

#### **Industry Certifications**

Certified Nurse Aide (CNA)
Certified Patient Care Technician
(CPCT)

Emergency Medical Technician (EMT)

Medical Billing and Coding Specialist (MBCS)

Healthcare Providers Basic Life Support (BLS)

OSHA -- Occupational Safety and Health Administration

#### Work-Based Learning

Internships / Apprenticeships Student Organizations Employability Skills

### Certificate

Pre-Nursing

#### **Trident Technical College**

Emergency Medical Technician Medical Office Specialist Paramedic Pharmacy Technician

Sports and Health Nutrition

## Associate's Degree

#### **Trident Technical College**

A.A.S. Dental Hygiene

A.A.S. Emergency Medical
Technology

A.A.S. Health Information Management

A.A.S. Medical Laboratory Technology

A.A.S. Nursing

A.A.S. Pharmacy Technician

A.A.S. Physical Therapy Assistant

A.A.S. Radiologic Technology

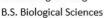
A.A.S. Respiratory Care

A.A.S. Sports and Health Nutrition

## Bachelor's Degree

#### Clemson University

B.S. Bioengineering



B.S. Health Science

B.S. Microbiology

#### South Carolina State University

B.S. Biology Education



B.S. Nutrition/Food Management

B.S. Professional Biology

### University of South Carolina

B.S. Biochemistry and Molecular Biology

B.S. Cardiovascular Technology

B.S. Exercise Science

B.S. Pharmacy



#### High School Diploma

- Emergency Medical Technician (\$32,670); 1250L
- Medical Lab Assistant (\$32,480); 1280L

#### Certificate

- Pharmacy Technician (\$31,750);
   1380L
- Medical Laboratory Technician (\$38,950); 1280L

#### Associate's

- Dental Assistant (\$37,630); 1420L
- Surgical Technologist (\$46,310); 1410L

- Registered Nurse (\$73,550); 1315L
- Occupational Therapist (\$83,200); 1340L
- Biomedical Engineer (\$88,040);
   1455L
- Chemical Engineer (\$102,160);
   1375L