



Health, Safety and Environmental Management

Career Goal (O*NET Code): Health and Safety Engineer (17-2111), Industrial Health and Safety Engineer (17-2111), Environmental Compliance Inspector (13-1041), Environmental Engineer (17-2081).

Cluster Overview : The Transportation, Distribution, and Logistics Cluster focuses on careers in the planning, management, and movement of people, materials, and goods by road, pipeline, air, rail, and water and related professional and technical support services such as transportation infrastructure planning and management, logistics services, mobile equipment and facility maintenance.

SUGGESTED COURSEWORK EXTENDED LEARNING EXPERIENCES

High School	9th	Core Courses:	English I Algebra I Biology	World Geography Languages other than English I Health/PE or Equivalent	Curricular Experiences: Business Professionals of America Health Occupations Students of America SkillsUSA TSA	Extra-Curricular Experiences: UIL Engineering Summer Camps
		Career-Related Electives:	Introduction to Health Science Technology			
	10th	Core Courses:	English II Geometry Chemistry	World History Languages other than English II Technology Applications	Career Learning Experiences: Career Preparation (Paid/Unpaid): Job Shadowing Internships	
		Career-Related Electives:	Technology Systems (Modular Based Lab)** or Introduction to Transportation Service Careers or Health Science Technology I			
	11th	Core Courses:	English III Algebra II Physics	United States History Communication Applications PE or Equivalent	Service Learning Experiences: Volunteer Peer Tutoring Peer Mentoring	
		Career-Related Electives:	Automotive Technician I* or Automotive Collision Repair/Refinishing Technology I* or Health Science Technology II or Small Engine Repair I*			
	12th	Core Courses:	English IV Precalculus Environmental Systems	Government/Economics Fine Arts		
		Career-Related Electives:	Automotive Technician II* or Health Science Technology III or Small Engine Repair II*			

On-the-Job Training	Automotive Youth Service Excellence				Professional Associations: American Society for Testing & Materials American National Standards Institute American Society of Civil Engineers National Association of Air Traffic Specialists Society of Automotive Engineers Texas Motor Transportation Association
	NOTE: Some of these experiences may be started and/or completed as part of the high school experience.				
Certificates	Automotive Service Excellence	Boating Safety			Career Options: Dealership Technician Safety Technician
	Automobile/Light Truck Certification	OSHA CareerSafe			
NOTE: Students may earn some of these certificates as part of the high school experience.					

Postsecondary	Associate's Degrees	15 hours General Education Core		Career Options:	Specialty Technician	
		Cluster Foundation		Industrial Electric Safety	Supervisor	
		Business Computer Applications (BCIS 1X05) OR Micro-Computer Applications (COSC 1X01) OR Introduction to Computers (ITSC 1X01)		Automotive, Boat, Truck, Rail or Plane Safety		
		OSHA Regulations General Industry (OSHT 2X01) OR Introduction to Safety and Health (OSHT 1X01)		Certificates, Licenses & Credentials		
		Principles of Management (BMGT 1X03) OR Supervision (BMGT 1X01) OR Problem Solving and Decision-Making (BMGT 1X03)		Certified Safety and Health Safety Officer (CSHO)		
		Human Relations (HRPO 1X11) OR Communication Skills for Managers (BMGT 1X45) OR Customer Relations (MRKG 1X01)		HAZWOPER		
		Introduction to Business Logistics (LMGT 1X19) OR Logistics (INMT 1X36)		DOT		
		Introduction to Materials Handling (LMGT 1X21)	Business Ethics (BMGT 1X41)			
		Warehouse and Distribution Management (LMGT 1X25)				
		Practicum OR Internship (BMGT OR LMGT)				
		Information and Project Management (BMGT 1X09)				
		Quality Assurance and Quality Control (EPCT 1X51)				
		POS Specific Courses				
		DOT Regulations- HAZMAT (EPCT 2X00)				
		Federal Motor Carrier Safety Regulations (CVOP 2X01)				
		International Standards Organization (ISO) 14000 Standards (EPCT 2C32)				
		Safety, Health, and Environment I (PTAC 1X08)				
		Environmental Regulation Interpretation and Application (EPCT 1X49)				
	Bachelor's Degrees	Business	Industrial Health & Safety	Career Options:	Occupational Safety and Health Administration (OSHA)	
		Engineering	Industrial Management	Industrial Safety Inspector	U.S. Department of Transportation	
		Engineering Safety & Compliance	Safety Engineering	Manager		
		Environmental Science	Science			
	Graduate Degrees	Business Management	Ergonomics	Career Options:	National Highway Traffic Safety Administration (NHTSA)	
		Engineering	Public Policy	Airport & Ports Safety Federal Aviation Admin. (FAA) Instructor/Professor	Research and Development	

*May substitute for the required credit for Physical Education
**Satisfies the required credit for Technology Applications
***May substitute for the required credit for Health Education

Students should take Advanced Placement (AP), International Baccalaureate (IB), dual credit, Advanced Technical Credit (ATC), or locally articulated courses, if possible.

This plan of study serves as a guide, along with other career planning materials, for pursuing a career path and is based on the most recent information as of 2007. All plans should meet high school graduation requirements as well as college entrance requirements. Students may select other elective courses for personal enrichment purposes.