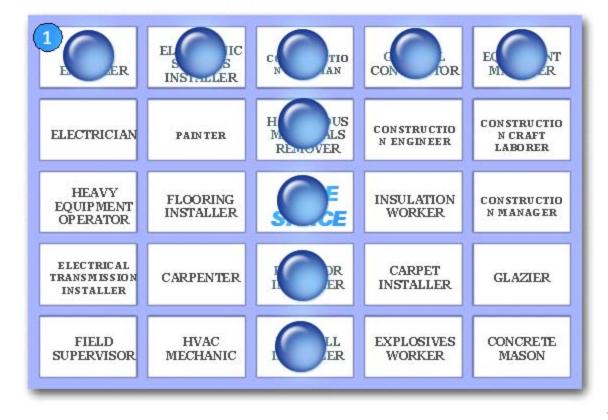
BINGO Careers in Engineering CTAE Resource Network, Curriculum Office September, 2009

Directions for the Instructor

- 1. Print the bingo cards. Twenty six different cards are included. Print additional cards at random if needed. Cut each sheet to separate the cards. Cards may be laminated for durability.
- 2. Give each student a bingo card and chips, markers, or scrap paper. If paper is to be used, ask students to tear or cut 25 pieces of paper about one-half inch square. If the cards have been laminated, students can mark their cards with erasable markers.
- 3. Explain to the students that you will read the definitions to the class and that they should mark the correct answer on their card. Note that all cards do not have all the answers.
- 4. At random, read ONLY the definitions from the list. Mark the checkbox beside the definitions as they are used. The student should place a chip on the cell with the correct response.
- 5. When a student has placed chips on 5 spaces in a row (diagonally, vertically, or horizontally) the student should call "Bingo". Ask the winning student to call out their answers. Check their answers to make sure those definitions have been used.

Variations:

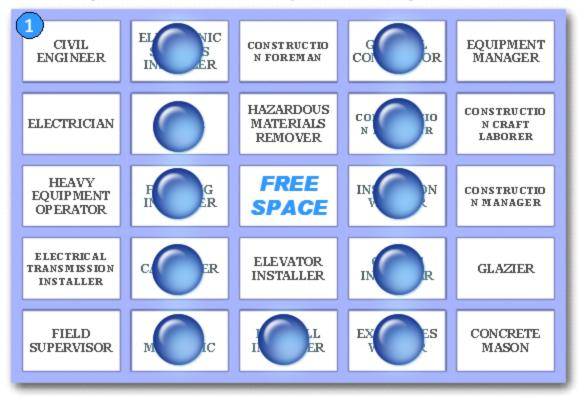
• T-Bingo: The card must be marked in the shape of a "T" to call Bingo.



	ELECTRONIC SYSTEMS INSTALLER	CONSTRUCTIO N FOREMAN	GENERAL CONTRACTOR	EQUIT
ELECTRICIAN	PAINTER	HAZARDOUS MATERIALS REMOVER	CONSTRUCTIO N ENGINEER	CONSTRUCTIO N CRAFT LABORER
HEAVY EQUIPMENT OPERATOR	FLOORING INSTALLER	FREE SPACE	INSULATION WORKER	CONSTRUCTIO N MANAGER
ELECTRICAL TRAN SM ISS ION IN STALLER	CARPENTER	ELEVATOR INSTALLER	CARPET INSTALLER	GLAZIER
STOOR	HVAC MECHANIC	DRYWALL INSTALLER	EXPLOSIVES WORKER	CCOTE

•Corners Bingo: The four outer corners of the card must be marked to get Bingo.

•U-Bingo: The card must be marked in the shape of a "U" to call Bingo.

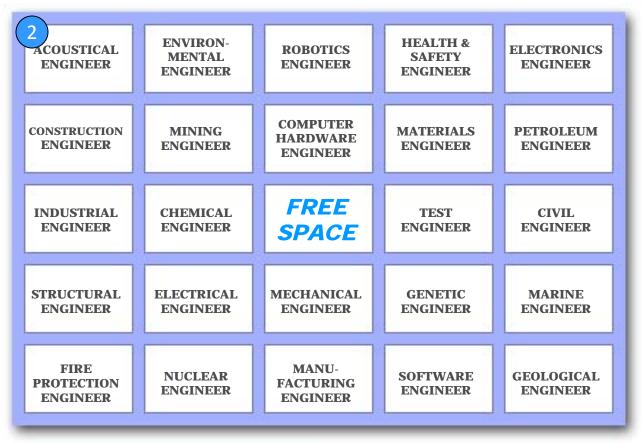


Correct Response	Definition	Used
Acoustical Engineer	Plans, improves, or perfects the sound of an architectural place. Works with sounds such as sonar and radar.	
Aerospace Engineer	Designs, develops, tests, and supervises manufacture of aircraft, spacecraft, and missiles.	
Agricultural Engineer	Applies knowledge of engineering technology and science to agriculture and the efficient use of biological resources.	
Automotive Engineer	Is responsible for designing the mechanical aspects to complete the system or product envisioned by the automotive designer.	
Biomedical Engineer	Develops devices and procedures that solve medical problems by combining knowledge of biology and medicine with engineering principles.	
Chemical Engineer	Applies the principles of chemistry to solve problems involving the production or use of chemicals and biochemicals.	
Civil Engineer	Designs and supervises the construction of roads, buildings, airports, tunnels, dams, bridges, and water supply and sewage systems.	
Computer Hardware Engineer	Researches, designs, develops, tests, and oversees the manufacture of computer hardware.	
Construction Engineer	Is concerned with the management and operations of construction projects, as well as the improvement of construction methods and materials.	
Electrical Engineer	Designs, develops, tests, or supervises the manufacture of electrical equipment, components, or systems for public, commercial, industrial, military, or scientific use.	
Electronics Engineer	Is responsible for a wide range of electronic technologies, from portable music players to global positioning systems (GPS).	
Environmental Engineer	Is responsible for the treatment of chemical, biological, and thermal waste, the purification of water and air, and the remediation of contaminated sites.	

Correct Response	Definition	Used
Fire Protection Engineer	Works to prevent loss of life and property by fires through product and system design, building inspection, and education.	
Genetic Engineer	Manipulates the genetic material in the cells of plants, animals, and other living organisms to develop better products, medicines, and services.	
Geological Engineer	Finds and coordinates the extraction, transportation, and preparation of coal, metals, and minerals for use by manufacturing industries and utilities.	
Health & Safety Engineer	Prevents harm to people and property by applying knowledge of systems engineering and mechanical, chemical, and human performance principles.	
Industrial Engineer	Determines the most effective ways to use the basic factors of production—people, machines, materials, information, and energy—to make a product or provide a service.	
Manufacturing Engineer	Plans, directs, and coordinates elements of design, materials, and manufacturing processes in industrial plants, working to produce a product while maintaining safety, standards, and product quality.	
Marine Engineer	Is involved in the design, construction, and maintenance of ships, boats, and related marine equipment.	
Materials Engineer	Is involved in the development, processing, and testing of the materials used to create a range of products, from computer chips to snow skis.	
Mechanical Engineer	Researches, designs, develops, tests, supervises the manufacture of tools, engines, machines, and other mechanical devices.	
Mining Engineer	Locates and supervises the extraction of coal, metals, and minerals for use by manufacturing industries and utilities.	
Nuclear Engineer	Researches, designs, and develops the processes, instruments, and systems used to derive benefits from nuclear energy and radiation.	
Petroleum Engineer	Searches for geological reservoirs of oil and natural gas, determines drilling methods to be used, and monitors drilling and production operations.	

Correct Response	Definition	Used
Robotics Engineer	Designs, tests, and builds robots and automated systems that are productive, safe, efficient, and economical to maintain.	
Software Engineer	Analyzes user needs, designs, constructs, tests, troubleshoots, and maintains software or systems.	
Structural Engineer	Performs engineering duties in the planning, designing, construction, and continued structural integrity of bridges, parking decks, office buildings, etc.	
Test Engineer	Responsible for the design, development, and implementation of testing methods and equipment, particularly for the military and aerospace industry.	

1 AUTOMOTIVE ENGINEER	FIRE PROTECTION ENGINEER	COMPUTER HARDWARE ENGINEER	MARINE ENGINEER	GEOLOGICAL ENGINEER
ENVIRON- MENTAL ENGINEER	ACOUSTICAL ENGINEER	MECHANICAL ENGINEER	CIVIL ENGINEER	CHEMICAL ENGINEER
MINING ENGINEER	MANU- FACTURING ENGINEER	FREE SPACE	PETROLEUM ENGINEER	CONSTRUCTION ENGINEER
ELECTRONICS ENGINEER	AEROSPACE ENGINEER	GENETIC ENGINEER	AGRI- CULTURAL ENGINEER	MATERIALS ENGINEER
INDUSTRIAL ENGINEER	NUCLEAR ENGINEER	ELECTRICAL ENGINEER	HEALTH & SAFETY ENGINEER	BIOMEDICAL ENGINEER



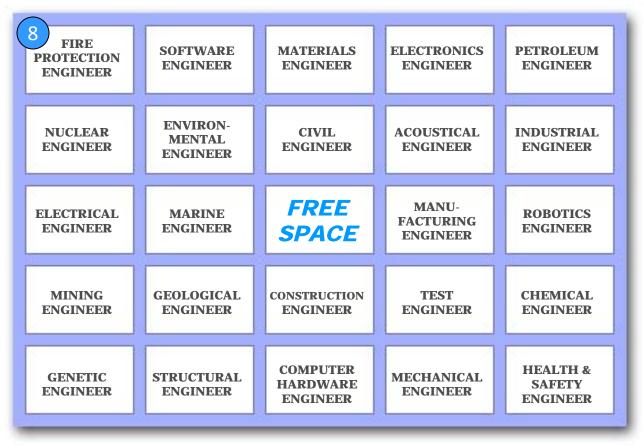
3 AUTOMOTIVE ENGINEER	COMPUTER HARDWARE ENGINEER	MANU- FACTURING ENGINEER	ELECTRONICS ENGINEER	AGRI- CULTURAL ENGINEER
INDUSTRIAL ENGINEER	ENVIRON- MENTAL ENGINEER	HEALTH & SAFETY ENGINEER	AEROSPACE ENGINEER	GENETIC ENGINEER
MARINE ENGINEER	CIVIL ENGINEER	FREE SPACE	FIRE PROTECTION ENGINEER	PETROLEUM ENGINEER
CONSTRUCTION ENGINEER	NUCLEAR ENGINEER	ACOUSTICAL ENGINEER	MECHANICAL ENGINEER	BIOMEDICAL ENGINEER
MATERIALS ENGINEER	CHEMICAL ENGINEER	MINING ENGINEER	ELECTRICAL ENGINEER	GEOLOGICAL ENGINEER

4 MATERIALS ENGINEER	GEOLOGICAL ENGINEER	CONSTRUCTION ENGINEER	SOFTWARE ENGINEER	HEALTH & SAFETY ENGINEER
ROBOTICS ENGINEER	MECHANICAL ENGINEER	ELECTRICAL ENGINEER	STRUCTURAL ENGINEER	MINING ENGINEER
MARINE ENGINEER	COMPUTER HARDWARE ENGINEER	FREE SPACE	TEST ENGINEER	ELECTRONICS ENGINEER
CIVIL ENGINEER	GENETIC ENGINEER	NUCLEAR ENGINEER	ENVIRON- MENTAL ENGINEER	MANU- FACTURING ENGINEER
PETROLEUM ENGINEER	CHEMICAL ENGINEER	FIRE PROTECTION ENGINEER	INDUSTRIAL ENGINEER	ACOUSTICAL ENGINEER

5 COMPUTER HARDWARE ENGINEER	AEROSPACE ENGINEER	MARINE ENGINEER	GENETIC ENGINEER	AGRI- CULTURAL ENGINEER
ACOUSTICAL ENGINEER	MANU- FACTURING ENGINEER	CONSTRUCTION ENGINEER	MATERIALS ENGINEER	FIRE PROTECTION ENGINEER
PETROLEUM ENGINEER	INDUSTRIAL ENGINEER	FREE SPACE	AUTOMOTIVE ENGINEER	ENVIRON- MENTAL ENGINEER
CIVIL ENGINEER	MINING ENGINEER	BIOMEDICAL ENGINEER	GEOLOGICAL ENGINEER	MECHANICAL ENGINEER
CHEMICAL ENGINEER	NUCLEAR ENGINEER	HEALTH & SAFETY ENGINEER	ELECTRICAL ENGINEER	ELECTRONICS ENGINEER

6 SOFTWARE ENGINEER	COMPUTER HARDWARE ENGINEER	MINING ENGINEER	ELECTRICAL ENGINEER	MARINE ENGINEER
MECHANICAL	GEOLOGICAL	GENETIC	ACOUSTICAL	FIRE PROTECTION
ENGINEER	ENGINEER	ENGINEER	ENGINEER	ENGINEER
MATERIALS ENGINEER	TEST ENGINEER	FREE SPACE	CONSTRUCTION ENGINEER	MANU- FACTURING ENGINEER
HEALTH & SAFETY ENGINEER	CIVIL ENGINEER	NUCLEAR ENGINEER	ELECTRONICS ENGINEER	ROBOTICS ENGINEER
CHEMICAL ENGINEER	STRUCTURAL ENGINEER	INDUSTRIAL ENGINEER	PETROLEUM ENGINEER	ENVIRON- MENTAL ENGINEER

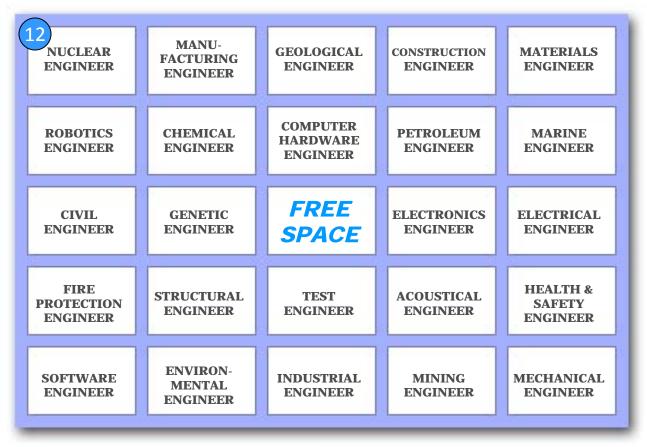
7 INDUSTRIAL ENGINEER	NUCLEAR ENGINEER	AUTOMOTIVE ENGINEER	MARINE ENGINEER	ELECTRICAL ENGINEER
BIOMEDICAL ENGINEER	CONSTRUCTION ENGINEER	PETROLEUM ENGINEER	GENETIC ENGINEER	GEOLOGICAL ENGINEER
ENVIRON- MENTAL ENGINEER	MINING ENGINEER	FREE SPACE	AEROSPACE ENGINEER	ACOUSTICAL ENGINEER
CHEMICAL ENGINEER	MECHANICAL ENGINEER	FIRE PROTECTION ENGINEER	MANU- FACTURING ENGINEER	CIVIL ENGINEER
MATERIALS ENGINEER	HEALTH & SAFETY ENGINEER	AGRI- CULTURAL ENGINEER	ELECTRONICS ENGINEER	COMPUTER HARDWARE ENGINEER



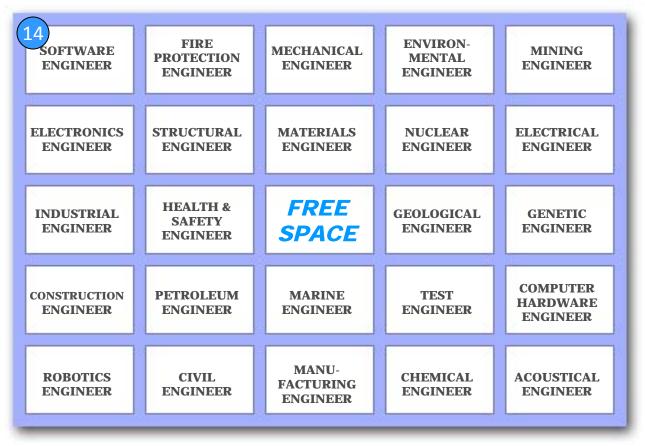
9 AUTOMOTIVE ENGINEER	FIRE PROTECTION ENGINEER	GEOLOGICAL ENGINEER	PETROLEUM ENGINEER	ELECTRONICS ENGINEER
MANU- FACTURING ENGINEER	CIVIL ENGINEER	MECHANICAL ENGINEER	ELECTRICAL ENGINEER	ACOUSTICAL ENGINEER
BIOMEDICAL ENGINEER	MINING ENGINEER	FREE SPACE	MARINE ENGINEER	AEROSPACE ENGINEER
GENETIC ENGINEER	COMPUTER HARDWARE ENGINEER	NUCLEAR ENGINEER	CONSTRUCTION ENGINEER	AGRI- CULTURAL ENGINEER
CHEMICAL ENGINEER	MATERIALS ENGINEER	ENVI- RONMENTAL ENGINEER	INDUSTRIAL ENGINEER	HEALTH & SAFETY ENGINEER

10 GEOLOGICAL ENGINEER	NUCLEAR ENGINEER	PETROLEUM ENGINEER	MINING ENGINEER	ENVI- RONMENTAL ENGINEER
CONSTRUCTION ENGINEER	STRUCTURAL ENGINEER	INDUSTRIAL ENGINEER	TEST ENGINEER	COMPUTER HARDWARE ENGINEER
ELECTRICAL ENGINEER	MARINE ENGINEER	FREE SPACE	MANU- FACTURING ENGINEER	ELECTRONICS ENGINEER
CHEMICAL ENGINEER	ACOUSTICAL ENGINEER	HEALTH & SAFETY ENGINEER	SOFTWARE ENGINEER	CIVIL ENGINEER
GENETIC ENGINEER	MATERIALS ENGINEER	ROBOTICS ENGINEER	MECHANICAL ENGINEER	FIRE PROTECTION ENGINEER

11 AGRI- CULTURAL ENGINEER	BIOMEDICAL ENGINEER	INDUSTRIAL ENGINEER	AEROSPACE ENGINEER	FIRE PROTECTION ENGINEER
MATERIALS ENGINEER	ENVI- RONMENTAL ENGINEER	HEALTH & SAFETY ENGINEER	CHEMICAL ENGINEER	CONSTRUCTION ENGINEER
ELECTRONICS ENGINEER	ELECTRICAL ENGINEER	FREE SPACE	NUCLEAR ENGINEER	GENETIC ENGINEER
PETROLEUM ENGINEER	MANU- FACTURING ENGINEER	MECHANICAL ENGINEER	CIVIL ENGINEER	ACOUSTICAL ENGINEER
MARINE ENGINEER	AUTOMOTIVE ENGINEER	GEOLOGICAL ENGINEER	COMPUTER HARDWARE ENGINEER	MINING ENGINEER



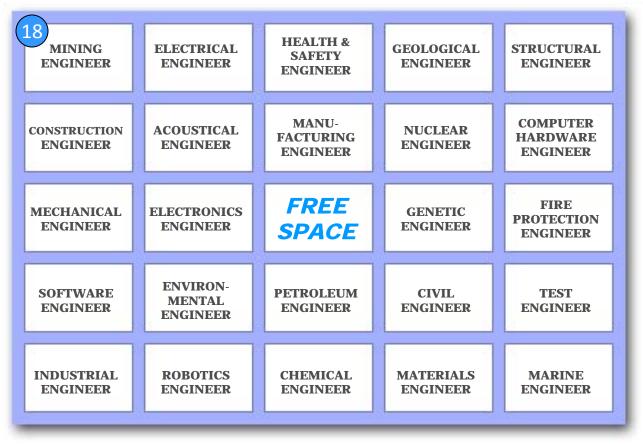
13 GEOLOGICAL ENGINEER	MANU- FACTURING ENGINEER	COMPUTER HARDWARE ENGINEER	CONSTRUCTION ENGINEER	ELECTRICAL ENGINEER
HEALTH & SAFETY ENGINEER	INDUSTRIAL ENGINEER	CIVIL ENGINEER	CHEMICAL ENGINEER	ELECTRONICS ENGINEER
PETROLEUM ENGINEER	MARINE ENGINEER	FREE SPACE	BIOMEDICAL ENGINEER	ENVIRON- MENTAL ENGINEER
NUCLEAR ENGINEER	MATERIALS ENGINEER	ACOUSTICAL ENGINEER	AUTOMOTIVE ENGINEER	FIRE PROTECTION ENGINEER
MINING ENGINEER	MECHANICAL ENGINEER	AEROSPACE ENGINEER	AGRI- CULTURAL ENGINEER	GENETIC ENGINEER



15 ENVIRON- MENTAL ENGINEER	CHEMICAL ENGINEER	MANU- FACTURING ENGINEER	BIOMEDICAL ENGINEER	MARINE ENGINEER
CIVIL ENGINEER	INDUSTRIAL ENGINEER	PETROLEUM ENGINEER	FIRE PROTECTION ENGINEER	AUTOMOTIVE ENGINEER
GENETIC ENGINEER	ELECTRONICS ENGINEER	FREE SPACE	MECHANICAL ENGINEER	MATERIALS ENGINEER
COMPUTER HARDWARE ENGINEER	NUCLEAR ENGINEER	AEROSPACE ENGINEER	CONSTRUCTION ENGINEER	AGRI- CULTURAL ENGINEER
ACOUSTICAL ENGINEER	MINING ENGINEER	HEALTH & SAFETY ENGINEER	ELECTRICAL ENGINEER	GEOLOGICAL ENGINEER

16 INDUSTRIAL ENGINEER	COMPUTER HARDWARE ENGINEER	MINING ENGINEER	MANU- FACTURING ENGINEER	FIRE PROTECTION ENGINEER
ELECTRICAL	SOFTWARE	MECHANICAL	ACOUSTICAL	CIVIL
ENGINEER	ENGINEER	ENGINEER	ENGINEER	ENGINEER
ROBOTICS	CONSTRUCTION	FREE	CHEMICAL	MATERIALS
ENGINEER	ENGINEER	SPACE	ENGINEER	ENGINEER
TEST	GEOLOGICAL	PETROLEUM	GENETIC	ELECTRONICS
ENGINEER	ENGINEER	ENGINEER	ENGINEER	ENGINEER
HEALTH & SAFETY ENGINEER	NUCLEAR ENGINEER	ENVIRON- MENTAL ENGINEER	MARINE ENGINEER	STRUCTURAL ENGINEER

17 CONSTRUCTION ENGINEER	MATERIALS ENGINEER	FIRE PROTECTION ENGINEER	COMPUTER HARDWARE ENGINEER	AGRI- CULTURAL ENGINEER
MECHANICAL ENGINEER	BIOMEDICAL ENGINEER	ACOUSTICAL ENGINEER	MINING ENGINEER	MANU- FACTURING ENGINEER
ELECTRICAL ENGINEER	GENETIC ENGINEER	FREE SPACE	PETROLEUM ENGINEER	INDUSTRIAL ENGINEER
AUTOMOTIVE ENGINEER	CHEMICAL ENGINEER	MARINE ENGINEER	CIVIL ENGINEER	NUCLEAR ENGINEER
ELECTRONICS ENGINEER	GEOLOGICAL ENGINEER	ENVIRON- MENTAL ENGINEER	AEROSPACE ENGINEER	HEALTH & SAFETY ENGINEER



19 CHEMICAL ENGINEER	ENVIRON- MENTAL ENGINEER	GENETIC ENGINEER	BIOMEDICAL ENGINEER	MANU- FACTURING ENGINEER
MECHANICAL ENGINEER	AEROSPACE ENGINEER	PETROLEUM ENGINEER	CONSTRUCTION ENGINEER	ELECTRONICS ENGINEER
MINING ENGINEER	COMPUTER HARDWARE ENGINEER	FREE SPACE	MARINE ENGINEER	AGRI- CULTURAL ENGINEER
ACOUSTICAL ENGINEER	MATERIALS ENGINEER	HEALTH & SAFETY ENGINEER	INDUSTRIAL ENGINEER	GEOLOGICAL ENGINEER
FIRE PROTECTION ENGINEER	CIVIL ENGINEER	NUCLEAR ENGINEER	AUTOMOTIVE ENGINEER	ELECTRICAL ENGINEER

20 MATERIALS ENGINEER	SOFTWARE ENGINEER	FIRE PROTECTION ENGINEER	MANU- FACTURING ENGINEER	COMPUTER HARDWARE ENGINEER
TEST ENGINEER	ELECTRICAL ENGINEER	HEALTH & SAFETY ENGINEER	ACOUSTICAL ENGINEER	CIVIL ENGINEER
CHEMICAL ENGINEER	CONSTRUCTION ENGINEER	FREE SPACE	ENVIRON- MENTAL ENGINEER	GEOLOGICAL ENGINEER
GENETIC ENGINEER	STRUCTURAL ENGINEER	MECHANICAL ENGINEER	ROBOTICS ENGINEER	PETROLEUM ENGINEER
MINING ENGINEER	INDUSTRIAL ENGINEER	ELECTRONICS ENGINEER	MARINE ENGINEER	NUCLEAR ENGINEER

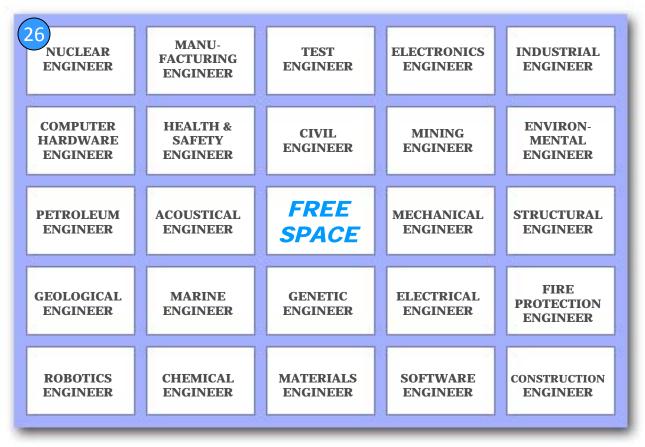
21 AUTOMOTIVE ENGINEER	ELECTRONICS ENGINEER	CIVIL ENGINEER	CONSTRUCTION ENGINEER	ACOUSTICAL ENGINEER
FIRE PROTECTION ENGINEER	MECHANICAL ENGINEER	INDUSTRIAL ENGINEER	NUCLEAR ENGINEER	GEOLOGICAL ENGINEER
BIOMEDICAL ENGINEER	MATERIALS ENGINEER	FREE SPACE	MARINE ENGINEER	CHEMICAL ENGINEER
HEALTH & SAFETY ENGINEER	PETROLEUM ENGINEER	MANU- FACTURING ENGINEER	MINING ENGINEER	GENETIC ENGINEER
AEROSPACE ENGINEER	ELECTRICAL ENGINEER	COMPUTER HARDWARE ENGINEER	ENVIRON- MENTAL ENGINEER	AGRI- CULTURAL ENGINEER

2 NUCLEAR ENGINEER	ELECTRONICS ENGINEER	CHEMICAL ENGINEER	MARINE ENGINEER	SOFTWARE ENGINEER
ACOUSTICAL ENGINEER	GENETIC ENGINEER	ROBOTICS ENGINEER	MATERIALS ENGINEER	INDUSTRIAL ENGINEER
ENVIRON- MENTAL ENGINEER	FIRE PROTECTION ENGINEER	FREE SPACE	CONSTRUCTION ENGINEER	MANU- FACTURING ENGINEER
MINING ENGINEER	TEST ENGINEER	ELECTRICAL ENGINEER	MECHANICAL ENGINEER	STRUCTURAL ENGINEER
CIVIL ENGINEER	GEOLOGICAL ENGINEER	PETROLEUM ENGINEER	COMPUTER HARDWARE ENGINEER	HEALTH & SAFETY ENGINEER

23 CONSTRUCTION ENGINEER	ACOUSTICAL ENGINEER	HEALTH & SAFETY ENGINEER	ENVIRON- MENTAL ENGINEER	MATERIALS ENGINEER
MARINE ENGINEER	AEROSPACE ENGINEER	MINING ENGINEER	AUTOMOTIVE ENGINEER	BIOMEDICAL ENGINEER
INDUSTRIAL ENGINEER	MANU- FACTURING ENGINEER	FREE SPACE	PETROLEUM ENGINEER	CIVIL ENGINEER
COMPUTER HARDWARE ENGINEER	ELECTRONICS ENGINEER	GENETIC ENGINEER	AGRI- CULTURAL ENGINEER	FIRE PROTECTION ENGINEER
ELECTRICAL ENGINEER	NUCLEAR ENGINEER	MECHANICAL ENGINEER	CHEMICAL ENGINEER	GEOLOGICAL ENGINEER

24 CHEMICAL ENGINEER	MATERIALS ENGINEER	ELECTRONICS ENGINEER	NUCLEAR ENGINEER	GEOLOGICAL ENGINEER
MECHANICAL ENGINEER	TEST ENGINEER	HEALTH & SAFETY ENGINEER	PETROLEUM ENGINEER	ACOUSTICAL ENGINEER
CIVIL ENGINEER	MARINE ENGINEER	FREE SPACE	GENETIC ENGINEER	FIRE PROTECTION ENGINEER
STRUCTURAL ENGINEER	ELECTRICAL ENGINEER	ROBOTICS ENGINEER	COMPUTER HARDWARE ENGINEER	MINING ENGINEER
SOFTWARE ENGINEER	INDUSTRIAL ENGINEER	ENVIRON- MENTAL ENGINEER	MANU- FACTURING ENGINEER	CONSTRUCTION ENGINEER

25 CIVIL ENGINEER	GEOLOGICAL ENGINEER	MATERIALS ENGINEER	CONSTRUCTION ENGINEER	ENVIRON- MENTAL ENGINEER
MINING ENGINEER	AEROSPACE ENGINEER	GENETIC ENGINEER	MARINE ENGINEER	ELECTRONICS ENGINEER
HEALTH & SAFETY ENGINEER	NUCLEAR ENGINEER	FREE SPACE	AGRI- CULTURAL ENGINEER	MECHANICAL ENGINEER
COMPUTER HARDWARE ENGINEER	CHEMICAL ENGINEER	PETROLEUM ENGINEER	ELECTRICAL ENGINEER	MANU- FACTURING ENGINEER
ACOUSTICAL ENGINEER	INDUSTRIAL ENGINEER	FIRE PROTECTION ENGINEER	AUTOMOTIVE ENGINEER	BIOMEDICAL ENGINEER



27 GENETIC ENGINEER	FIRE PROTECTION ENGINEER	AGRI- CULTURAL ENGINEER	AEROSPACE ENGINEER	ELECTRICAL ENGINEER
AUTOMOTIVE ENGINEER	MINING ENGINEER	NUCLEAR ENGINEER	ACOUSTICAL ENGINEER	CONSTRUCTION ENGINEER
PETROLEUM ENGINEER	ENVIRON- MENTAL ENGINEER	FREE SPACE	HEALTH & SAFETY ENGINEER	INDUSTRIAL ENGINEER
BIOMEDICAL ENGINEER	MATERIALS ENGINEER	CHEMICAL ENGINEER	GEOLOGICAL ENGINEER	COMPUTER HARDWARE ENGINEER
MECHANICAL ENGINEER	ELECTRONICS ENGINEER	MARINE ENGINEER	MANU- FACTURING ENGINEER	CIVIL ENGINEER

