A.S. in Chemical Engineering

Description of the Chemical Engineering Program:

Hostos Community College (HCC) offers the Associate in Science (A.S.) degree in Chemical Engineering as a jointly registered, dual admission program with the existing Bachelor of Engineering in Chemical Engineering (B.E./ChE.) at the City College of New York. The program has been designed to meet the licensure guidelines of the Accreditation Board for Engineering and Technology (ABET).

Chemical engineering techs seek to improve or produce the chemicals we use to make our lives easier. Many techs work as chemical plant operators, producing chemicals (for example, synthetic motor oils and window cleaners) in an assembly line environment. Other techs evaluate and fix equipment used in chemical procedures. Some techs work in labs, performing tasks such as analyzing chemicals to develop new products or preparing solutions for use in experiments.

For more information, see link below

http://www.hostos.cuny.edu/Hostos/media/Pathways/Chemical-Engineering-AS.pdf

Skills:

Science - Using scientific rules and methods to solve problems.

Critical Thinking - Using logic and reasoning to identify the strengths and weaknesses of alternative solutions, conclusions or approaches to problems.

Complex Problem Solving - Identifying complex problems and reviewing related information to develop and evaluate options and implement solutions.

Engineering and Technology - Knowledge of the practical application of engineering science and technology. This includes applying principles, techniques, procedures, and equipment to the design and production of various goods and services.

Chemistry - Knowledge of the chemical composition, structure, and properties of substances and of the chemical processes and transformations that they undergo. This includes uses of chemicals and their interactions, danger signs, production techniques, and disposal methods.

Physics - Knowledge and prediction of physical principles, laws, their interrelationships, and applications to understanding fluid, material, and atmospheric dynamics, and mechanical, electrical, atomic and sub- atomic structures and processes.

Production and Processing - Knowledge of raw materials, production processes, quality control, costs, and other techniques for maximizing the effective manufacture and distribution of goods.

Employment Opportunities:

Biological Tech, Chemical Engineer, Chemist, Civil Engineering Tech, and Electrical Engineering Tech.

Employment Outlook:

Employment of chemical technicians is projected to grow 2 percent from 2014 to 2024, slower than the average for all occupations. Declines in the employment of chemical technicians are projected in all chemical manufacturing industries, including pharmaceutical manufacturing. However, the development of cheaper energy and sources of raw materials, such as shale gas, is expected to spur some chemical manufacturing activity to return to the United States. Their return should generate demand for these workers in the next decade.

Career Path: http://www.bls.gov/ooh/life-physical-and-social-science/chemical-technicians.htm

The median annual wage for chemical technicians was $45,840 in May 2016. Chemical technicians need an associate's degree or 2 years of postsecondary education for most jobs. Most chemical technicians also receive on-the-job training.

Career Coach – Search career information and current local wage data
https://hostos-cuny.emsicc.com/careers/chemical-technician/about