

Eugenio María de Hostos Community College of the City University of New York
 Academic Advisement, Division of Academic Affairs
 For an Associate in Science (A.S) Degree in Chemical Engineering Science

Chemical Engineering Science

- *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).*
- *This program is designed to provide HCC students with the same curriculum as the first two years of the licensure qualifying Chemical Engineering program required at CCNY. The collegial nature of the program will facilitate the transition to the professional portion of the curriculum.*
- *HCC students will be enrolled in the existing science and mathematics courses at Hostos and will enroll in eight engineering/chemistry courses at CCNY until there is sufficient enrollment to offer the courses at Hostos.*

Hostos Community College

First Year – Fall	Credits
MAT 210 Calculus I	4.0
ENG 110 Expository Writing	3.0
CHE 210 Chemistry I	4.0
HUM 100 OR SOC 101 OR PSY 101	6.0
Subtotal	17

First Year – Spring	Credits
MAT 220 Calculus II	4.0
ENG 111 Literature and Composition	3.0
CHE 220 Chemistry II	4.0
VPA 192 Public Speaking.....	3.0
Subtotal	14

Second Year – Fall	Credits
MAT 310 Calculus III.....	4.0
ChE 228* Intro to Chemical Engineering Principles & Practice.....	5.0
CHE 310 Organic Chemistry I	3.0
CHE 312 Organic Chemistry Lab I.....	2.0
PHY 210 Physics I	4.0
Subtotal	18

Second Year – Spring	Credits
MAT 360 Differential Equations	3.0
MAT 320 Linear Algebra & Vector Analysis.....	3.0
CHE 320 Organic Chemistry II.....	3.0
PHY 220 Physics II.....	4.0
ENG 202 Writing for Engr.....	3.0

Subtotal	16
Total Hostos Credits for Degree	65

City College of New York (CCNY)

CCNY - Third Year – Fall	Credits
CHEM 33200..... Physical Chem II	3.0
ChE 33000..... Engr Thermo II.....	3.0
ChE 34100..... Trans Phenomena I.....	3.0
ChE 34900..... Prob, Stat & Design Expt.....	2.0
ChE 34600..... Transport Operations	3.0
ChE 34500..... Separations Operations	3.0
Chem 24300..... Quantitative Analysis.....	3.0
Subtotal	20

CCNY - Third Year – Spring	Credits
ChE 31000..... Intro/Materials Science.....	3.0
ChE 36000..... ChE Science Lab.....	2.0
ChE 34200..... Trans Phenomena II.....	3.0
Subtotal	8

CCNY - Fourth Year – Fall	Credits
ChE 43200..... Chemical Reactions.....	3.0
ChE 46000..... Transport Operations Lab.....	2.0
ChE 47900..... Process & Control	3.0
ChE 49500..... Techn Chem Engr Design.....	3.0
LA	3.0
Technical Electives (select one course)	3.0
Subtotal	17

CCNY - Fourth Year – Spring	Credits
ChE 46200..... Separ Opers & Contr Lab.....	2.0
ChE 49600..... Chem Engr Design Project.....	3.0
Technical Electives (select 3 courses).....	9.0
Subtotal	14

Technical Electives (see note below+)

ChE 45200..... Powder Sci & Tech	
ChE 46700..... Polymer Sci & Eng	
ChE 49800..... Research I	
ChE 49808..... Nanomaterials	
ChE 49812..... Energy Sys Glob Sust	
ChE 49900..... Research II	
ChE 51200..... Pharmaceutical Appl	
ChE 54800..... Comp Methods	
ChE 57700..... Advanced Materials	
ChE 58000..... Bioprocess Engr	
ChE 59000..... Nanotechnology	
CE 38000..... Environmental Engr	
ChE 59802..... Fluidization	
Engr 49808..... Nanomaterials	
Engr 49812..... Energy Sys Glob Sust	
BIO 32100..... Human Physiology**	
BME 50300..... Cell/Tiss Biomat'ls	
BME 50100**..... Cell/Tissue Mech**	

BME 50200.....	Cell/Tissue Transport**	
Engr 27600.....	Engr Economics	
ME 53600.....	Energy Conversion	
Subtotal.....		17
TOTAL CCNY CREDITS.....		59

Bachelor of Engineering in Chemical Engineering - B.E. (ChE)

+ *Technical Elective Requirements:*

*Select three courses from the Technical Electives, but not more than one 2-cr course and not more than one Biomedical Engineering course (denoted by asterisks**). Students who select the Biomedical Engineering Option must take BIO 32100, ME 50100, 50200 & 50300 (total 13 credits) as their Technical Electives, for a total of 131 degree credits.*

1. New freshmen engineering students are no longer required to take NSS 10000: New Freshman Seminar (0 cr.).
2. **“C” Passing Grade Requirement:** MAT 210; MAT 220; MAT 310; MAT 360; CHE 210; CHE 220; CHE 310; CHE 312; ChE 22800; PHY 210; PHY 220
3. **CUNY ACT & SKAT Requirements:** Students must pass the CUNY/ACT in Reading and Writing and CUNY Mathematics Skills Assessment Test (SKAT) before completing 61 credits.
4. **General Education/ Liberal Arts Requirements:** ChE students must take six approved courses (18 credits) of which at least two (6 credits) must be at the 20000 level or higher. The six courses must satisfy at least three of the four approved general education clusters. Only courses in these four clusters are eligible: Professional and Ethical Responsibilities Cluster (Outcome f), Communication Cluster (outcome g), Global and Societal Context Cluster (outcome h), and Contemporary Issues Cluster (Outcome j). A list of approved courses is posted on the School of Engineering web site at: <http://www.ccny.cuny.edu/engineering/genreq.html> and can be viewed at the Office of Undergraduate Affairs (ST-209) or the Office of Student Programs (ST-2M). This list is subject to periodic review and updates.
5. **Other Graduation Requirements:** Apply for graduation during registration for the last semester. Minimum GPA of 2.00. Minimum QPA of zero. Residency Requirement: 33 credits of 30000-level or higher Civil Engineering courses.
6. **New Transfer** Students who have already completed the equivalent of Calculus II (Math 20200) should not take Engr. 10100. They are required to complete an additional 1-credit design project by taking CE 51000 (Independent Study).
7. **Program Changes:** Substitution of other courses for required courses must be approved by the Chair of the Civil Engineering Department (ST-119), and the Associate Dean of the Office of Undergraduate Affairs (ST-209).
8. **Declaring Your Major:** Freshmen, sophomores, juniors and new transfer