

CHEMISTRY, ASSOCIATE IN GENERAL STUDIES



College(s): DA, HW, KK, MX, OH, TR, WR

Program Code: 0203

Sample Program Pathway

When you think of chemistry, you might think of atoms and bonds, bubbling beakers and smoking test tubes. In reality, chemistry students use mathematics, theory, and experimentation to study the matter that makes up physical substances. People working in the field of chemistry make valuable contributions in a range of fields, including medicine, biology, psychology, and geology. Follow the chemistry pathway and you'll explore many different topics, from the chemical basis for life to the environmental problems caused by chemicals. The chemistry pathway leads to an associate degree which will allow you to transfer as a junior to a four-year college to complete your bachelor's degree. You might become a pharmacist, scientist, forensics specialist, food scientist, dentist, materials engineer or hazardous materials specialist.

This is an **example course sequence** for students interested in earning a degree in Chemistry. It does not represent a contract, nor does it guarantee course availability. If this pathway is followed as outlined, you will earn an Associate in General Studies (AGS) degree. One course will satisfy the Human Diversity (HD) requirement, and is labeled with an (HD) in the sequence below.

Semester-by-Semester Example Program Plan for Full-Time Students

All plans can be modified to fit the needs of part-time students by adding more semesters.

Semester 1		Hours
ENGLISH 101	Composition ¹	3
CHEM 201	General Chemistry I ¹	5
MATH 207	Calculus & Analytic Geometry I ¹	5

Social and Behavioral Sciences course (HD) ¹		3
Hours		16
Semester 2		
ENGLISH 102	Composition ²	3
CHEM 203	General Chemistry II ²	5
MATH 208	Calculus & Analytic Geometry II ²	5
Fine Arts & Humanities course ¹		3
Hours		16
Semester 3		
CHEM 205	Organic Chemistry I ²	6
PHYSICS 235	Engineering Physics I: Mechanics & Wave Motion ²	5
Social and Behavioral Sciences course ¹		3
Hours		14
Semester 4		
CHEM 207	Organic Chemistry II ²	6
PHYSICS 236	Engineering Physics II: Electricity & Magnetism ^{2,3}	5
Fine Arts & Humanities course ¹		3
Hours		14
Total Hours		60

¹ General Education Requirement

² Pathway Elective

³ Students interested in a Bachelor of Arts in Chemistry rather than a BS should substitute PHYSICS 221 Mechanics, Waves, and Heat/PHYSICS 222 Electricity, Light and Modern Physics for PHYSICS 235 Engineering Physics I: Mechanics & Wave Motion/PHYSICS 236 Engineering Physics II: Electricity & Magnetism. Students interested in a Bachelor of Science in Chemistry should take MATH 209 Calculus & Analytic Geometry III.

Recommended electives may vary by transfer institution. Choose your courses with your College Advisor.

Institution-specific transfer guides and agreements can be found on CCC's transfer site (<https://www.ccc.edu/services/Pages/Transfer-Guides.aspx>).