

**Science Profile (120 extended credit programs, i.e. non-CEGEP entry, only)**

Chemistry:	CHEM 205 & 206 (General Chemistry I & II)
Biology:	BIOL 201 (Introductory Biology)
Math:	MATH 201 (Elementary Functions), MATH 202 (College Algebra, <i>required for Mature Students only</i> ), MATH 203 (Calculus I), MATH 205 (Calculus II)
Physics:	PHYS 204/224 (Mechanics and associated lab course), PHYS 205/225 (Electricity and Magnetism & associated lab course), PHYS 206/226 (Waves and Modern Physics & associated lab course)

**Biochemistry Major = core program only (45 credits = 15 courses)**

Analytical Chemistry:	CHEM 217 (Introductory Analytical Chemistry I, offered Fall only) CHEM 218 (Introductory Analytical Chemistry II, offered Winter only) <i>Exemptions for both courses possible for students entering from Dawson's Laboratory Technology – Analytical Chemistry program</i>
Organic Chemistry:	CHEM 221 (Introductory Organic Chemistry I, offered Fall, Winter and some Summers) CHEM 222 (Introductory Organic Chemistry II, offered Fall and Winter) CHEM 324 (Organic Reactions, offered Fall only) <i>Exemptions for CHEM 221 and CHEM 222 possible for CEGEP students</i>
Physical Chemistry:	CHEM 234 (Thermodynamics, offered Fall and Winter) CHEM 235 (Kinetics of Chemical Reactions, offered Fall and Winter)
Inorganic Chemistry:	CHEM 241 (Introduction to Periodicity and Valence Theory, offered Fall and Winter)
Biochemistry:	CHEM 271 (Biochemistry I, offered Fall, Winter and odd-year Summers) CHEM 375 (Biochemistry II, offered Winter and Summer)
Spectroscopy:	CHEM 293 (Spectroscopy and Structure of Organic Compounds, offered every term)
Biology:	BIOL 261 (Molecular and General genetics), BIOL 266 (Cell Biology), BIOL 364 (Cell Physiology), BIOL 368 (Genetics and Cell Biology Lab); all offered Fall and Winter

**Course numbering system**

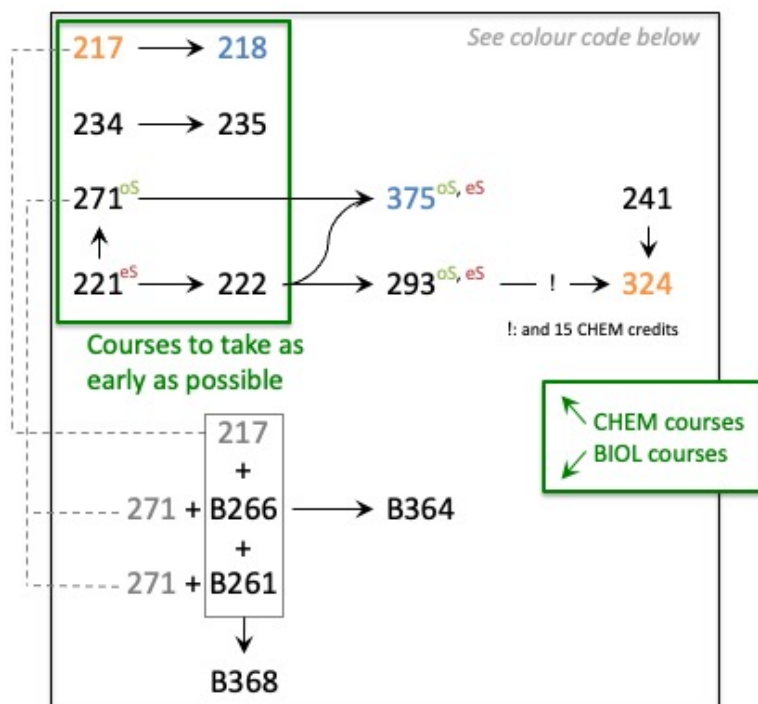
First digit gives level	200 = introductory	300 = intermediate	400 = advanced		
Middle digit denotes discipline	1 = analytical,	2 = organic,	3 = physical,	4 = inorganic,	5 = multidisciplinary,
Last digit gives sequence	7 = biochemistry,	9 = spectroscopy/spectrometry			

## Typical Biochemistry Major Sequence\*

	Fall	Winter
Year 1	CHEM 217 CHEM 221 CHEM 234 or BIOL 261 elective elective	CHEM 218 CHEM 222 CHEM 271 elective elective
Year 2	CHEM 234 or BIOL 261 CHEM 241 BIOL 266 elective elective	CHEM 235 CHEM 293 CHEM 375 elective elective
Year 3	CHEM 324 BIOL 364 elective elective elective	BIOL 368 elective elective elective elective

\* All courses are 3 credits except where noted. There are forty five (45) credits of electives that must include six credits of general education courses and fifteen credits of out of program electives. The remainder may be freely chosen (chemistry, other science or non-science). Note: some courses can be taken in Summer or online.

## Biochemistry Major Course Flowchart



Legend: 221 <sup>is a prerequisite for:</sup> → 222

Additional courses:

- Organic replacement(s) if exempt from 221 &/or 222

Summer course offerings:

oS ODD years	alternating with	eS EVEN years
271		221
293		293
375		375
325	←-----→	312

Tentative Schedule

Terms when courses are traditionally offered:

- Fall & Winter
- Fall only
- Winter only
- and sometimes on:
  - oS: Summer ODD years
  - eS: Summer EVEN years