

Note that this is a "Typical Program." Actual programs will vary. See the Academic Catalog for official details.

CHEMISTRY B.S. DEGREE**Advisor: Drs. Bordeaux and Nalliah**

Fall 2009		Spring 2010			
CH 161:	<u>Principles of Chemistry I</u>	4	CH 162:	<u>Principles of Chemistry II</u>	4
MA 171:	<u>Analytic Geometry & Calculus I¹</u>	4	MA 172:	<u>Analytic Geometry & Calculus II¹</u>	4
HS 115:	Hist Persp on Cult & Civ I	3	BI 161:	Cell Biology ³	4
EN 121:	Academic Writing and Research	3	HS 116:	Hist Persp on Cult & Civ II	3
PE 110:	Introduction to Physical Wellness	1			
SS 111:	University Life ²	.5			
total		15.5	total		15
Fall 2010		Spring 2011			
CH 263:	<u>Organic Chemistry I</u>	4	CH 264:	<u>Organic Chemistry II</u>	4
MA 273:	<u>Analytic Geometry & Calculus III</u>	4	PH 212:	<u>Principles of Physics II</u>	4
PH 211:	<u>Principles of Physics I</u>	4	* PH 261:	<u>Analog and Digital Electronics⁴</u>	2
EN 151:	Perspectives on Literature	3	BR 111:	Biblical History and Literature	3
			PE 111:	Physical Education Activities	1
			115:	Introduction to AR/MU/TH	2
total		15	total		16
Fall 2011		Spring 2012			
* CH 331:	<u>Quantitative Analysis</u>	4	* CH 333:	<u>Instrumental Analysis</u>	4
* CH 411:	<u>Biochemistry³</u>	3	* MA 371:	<u>Differential Equations</u>	4
* CH 451:	<u>Senior Seminar in Chemistry</u>	1	* CH 445:	<u>Advanced Laboratory Analysis⁴</u>	2
CO 215:	Public Speaking	3	PL____:	Introduction to Philosophy/Ethics	3
MI 285:	Core Curriculum Christian Faith	3		Elective [300+ level] ⁶	2
total		14	total		15
Fall 2012		Spring 2013			
* CH 361:	<u>Physical Chemistry I</u>	4	* CH 371:	<u>Physical Chemistry II</u>	4
* CH 441:	<u>Advanced Inorganic Chemistry</u>	3	CAP 475:	Capstone Seminar	2
CH 490:	<u>Independent Study⁵</u>	1-2		Core Curriculum Social Science	3
BR____:	Bible Elective [300+ level]	3		Core Curriculum Social Science	3
	Creative Studio Arts	1		Elective	4
	Elective	4			
total		16-17	total		16

NOTES:

1. Chemistry majors not yet placing into MA 171/172 should take MA 141 in the Spring of the freshman year (*see mathematics placement policy in Catalog under Academic Information*).
2. SS 111 is required in the fall semester of the freshman year for first-time freshman only.
3. BI 161 Cell Biology, is recommended as an elective. Students may choose to take BI 161 in the Spring of the Freshman, Sophomore, or Junior year depending on the need for early fulfillment of prerequisites for other Biology courses. BI 161 is recommended before CH 411 Biochemistry.
4. CH 445 may be substituted for PH 261 or taken as an elective in the major. CH 445 is offered on sufficient demand.
5. Chemistry majors must complete an independent study in chemical research for graduation. It is imperative that the student apply to summer programs in the winter of the junior year at the latest. Application in the sophomore year is encouraged.
6. Majors must be careful in selection of electives so that a sufficient number of upper division courses are taken. A minimum of 36 hours of 300+ courses is required for graduation.

*Indicates alternating year course.

Underlining indicates required for major.