



ADVISING WORKSHEET
BACHELOR OF SCIENCE DEGREE
MAJOR IN CHEMISTRY
General Bulletin 2013-2015

TRANSFER INSTITUTION(S):

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Name _____

Student ID # _____

GENERAL EDUCATION REQUIREMENTS – SEE ATTACHED PAGE FOR SPECIFIC COURSES

General Education Category	Course #	Credits	Grade	Semester	Equivalent
Category I: Global Academic Skills (9 credits)					
A. Mathematics (3 credits)					
B. English (3 credits)	WRIT 101				
C. Communication & Information Literacy (3 credits)					
Category II: Natural Sciences (7 credits)					
2 lectures (6 credits) & 1 lab (1 credit) (1 life science & 1 physical science & 1 lab)	BIOB 160				
	BIOB 161				
Category III: Social Sciences and History (6 credits)					
A. Social Science (3 credits)					
B. History (3 credits)					
Category IV: Cultural Diversity (3 credits)					
Category V: Arts & Humanities (6 credits)					
A. Fine Arts (3 credits)					
B. Humanities (3 credits)					

A minimum grade of "C-" required in all General Education courses.

Note: Certain degrees may require a minimum grade of "C" in General Education courses.

Reviewed:

GENERAL EDUCATION REQUIREMENTS

CATEGORY I: GLOBAL ACADEMIC SKILLS 9 credits

Students are required to take one course from each subcategory

Subcategory A - Mathematics 3 credits

M	105	Contemporary Mathematics	3
M	114	Extended Technical Mathematics	3
M	121	College Algebra	3
M	122	College Trigonometry	3
M	131	Mathematics for Elementary Teachers II	3
M	143	Finite Mathematics	4
M	171	Calculus I	4
STAT	141	Introduction to Statistical Concepts	3
STAT	216	Introduction to Statistics	4

Subcategory B - English 3 credits

WRIT	101	College Writing I	3
WRIT	121	Introduction to Technical Writing	3
WRIT	122	Introduction to Business Writing	3
WRIT	201	College Writing II	3
WRIT	220	Business & Professional Writing	3
WRIT	221	Intermediate Technical Writing	3

Subcategory C - Communication & Information Literacy 3 credits

BMIS	150	Computer Literacy	3
COMX	111	Introduction to Public Speaking	3
COMX	115	Introduction to Interpersonal Communication	3
LSCI	125	Research in the Information Age	3

CATEGORY II: NATURAL SCIENCES 6 cr. lecture & 1 cr. lab

Students are required to take one course from each subcategory and at least one corresponding lab or SCIN 101, 102, 103 & 104

Subcategory A – Life Sciences 3-4 credits

BIOB	101	Discover Biology	3
BIOB	102	Discover Biology Lab	1
BIOB	160	Principles of Living Systems	3
BIOB	161	Principles of Living Systems Lab	1

Subcategory B – Physical Sciences 3-4 credits

ASTR	110	Introduction to Astronomy	3
ASTR	111	Introduction to Astronomy Lab	1
CHMY	121	Introduction to General Chemistry	3
CHMY	122	Introduction to General Chemistry Lab	1
CHMY	141	College Chemistry I	3
CHMY	142	College Chemistry Laboratory I	1
GEO	101	Introduction to Physical Geology	3
GEO	102	Introduction to Physical Geology Laboratory	1
GPHY	111	Introduction to Physical Geography	3
GPHY	112	Introduction to Physical Geography Lab	1
PHSX	103	Our Physical World	3
PHSX	104	Our Physical World Lab	1
PHSX	205	College Physics I	3
PHSX	206	College Physics I Lab	1
PHSX	105	Fundamentals of Phys Sci	3
PHSX	106	Fundamentals of Phys Sci Lab	1

Subcategories A and B – Integrated Sciences 7 credits

SCIN 101, 102, 103 & 104 Integrated Sciences	3, ½, 3, ½
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CATEGORY III: SOCIAL SCIENCES AND HISTORY 6 credits

Students are required to take one course from each subcategory

Subcategory A – Social Sciences 3 credits

ANTY	217	Physical Anthropology & Archeology	3
BGEN	105	Introduction to Business	3
COMX	106	Communicating in a Dynamic Workplace	3
ECNS	201	Principles of Microeconomics	3
ECNS	202	Principles of Macroeconomics	3
EDU	105	Education and Democracy	3
GPHY	141	Geography of World Regions	3
HTH	110	Personal Health and Wellness	3
PSCI	210	Introduction to American Government	3
PSCI	220	Introduction to Comparative Government	3
PSYX	100	Introduction to Psychology	3
PSYX	231	Human Relations	3
SOCI	101	Introduction to Sociology	3
SOCI	201	Social Problems	3

Subcategory B - History 3 credits

HSTA	101	American History I	3
HSTA	102	American History II	3
HSTR	101	Western Civilization I	3
HSTR	102	Western Civilization II	3
HSTR	103	Honors Western Civilization I	3
HSTR	104	Honors Western Civilization II	3
PSCI	230	Introduction to International Relations	3

CATEGORY IV: CULTURAL DIVERSITY 3 credits

A&SC/WGSS	274	Women, Culture, and Society	3
ANTY	220	Culture and Society	3
ARTH	160	Global Visual Culture	3
COMX	212	Introduction to Intercultural Communication	3
GPHY	121	Human Geography	3
HTH	270	Global Health Issues	3
LIT	230	World Literature Survey	3
MUSI	207	World Music	3
NASX	105	Introduction to Native American Studies	3
NASX	205	Native Americans in Contemporary Society	3
PHL	271	Philosophy & Religion of India	3
PHL	272	Philosophy & Religion of China/Tibet/Japan	3
REHA	201	Introduction to Diversity in Counseling	3
RLST	170	The Religious Quest	3
SPNS	150	The Hispanic Tradition	3

CATEGORY V: ARTS & HUMANITIES 6 credits

Students are required to take one course from each subcategory

Subcategory A – Fine Arts 3 credits

ARTZ	101	Art Fundamentals	3
ARTZ	105	Visual Language-Drawing	3
ARTZ	131	Ceramics for Non-majors	3
CRWR	240	Intro Creative Writing Workshop	3
FILM	160	Introduction to World Cinema	3
LIT	270	Film & Literature	3
MART	260	Computer Presentation and Animation	3
MUSI	101	Enjoyment of Music	3
MUSI	114	Band: MSUB Symphonic	1
MUSI	131	Jazz Ensemble I: MSUB	1
MUSI	147	Choral Ensemble: University Chorus	1
THTR	101	Introduction to Theatre	3
THTR	120	Introduction to Acting I	3

Subcategory B - Humanities 3 credits

ARTH	150	Introduction to Art History	3
HONR	111	Perspectives and Understanding	3
LIT	110	Introduction to Literature	3
LIT	240	The Bible as Literature	3
PHL	110	Introduction to Ethics	3
PHL	111	Philosophies of Life	3

Total 31

Course			Credits	Grade	Semester	Equivalent
<i>A minimum grade of C or better is required in all major coursework</i>						
Chemistry Requirements						
*CHMY	141	College Chemistry I	3			
*CHMY	142	College Chemistry Laboratory I	1			
CHMY	143	College Chemistry II	3			
CHMY	144	College Chemistry Laboratory II	1			
CHMY	311	Analytical Chemistry – Quantitative Analysis	3			
CHMY	312	Analytical Chemistry Laboratory – Quantitative Analysis	1			
CHMY	321	Organic Chemistry I	3			
CHMY	322	Organic Chemistry Laboratory I	1			
CHMY	323	Organic Chemistry II	3			
CHMY	324	Organic Chemistry Laboratory II	1			
CHMY	371	Physical Chemistry – Quantum Chemistry and Spectroscopy	3			
CHMY	372	Physical Chemistry Laboratory I	1			
CHMY	373	Physical Chemistry – Kinetics and Thermodynamics	3			
CHMY	374	Physical Chemistry Laboratory II	1			
BCH	380	Biochemistry	3			
BCH	381	Biochemistry Lab	1			
CHMY	401	Advanced Inorganic Chemistry	3			
CHMY	421	Advanced Instrument Analysis	3			
CHMY	422	Advanced Instrumental Analysis Laboratory	2			
BCH	480	Advanced Biochemistry I	3			
BCH	481	Advanced Biochemistry I Lab	1			
CHMY	490	Undergraduate Research	2			
CHMY	494	Seminar / Workshop	1			
CHMY	498	Internship / Cooperative Education	1			
Chemistry Electives (9 credits):						
CHMY	411	Advanced Organic Chemistry	3			
CHMY	412	Advanced Organic Chemistry Laboratory	1			
CHMY	490	Undergraduate Research	1-5			
CHMY	491	Special topics	3			
CHMY	498	Internship / Cooperative Education	1-5			
Chemistry Total			57			
Physics Requirements						
PHSX	220	Physics I	3			
PHSX	221	Physics I Lab	1			
PHSX	232	Physics II and Thermo	3			
PHSX	233	Physics II and Thermo Laboratory	1			
Physics Total			8			
Mathematics Requirement						
*M	171	Calculus I	4			
M	172	Calculus II	4			
*STAT	216	Introduction to Statistics	4			
Mathematics Total			12			

*May satisfy General Education requirements.

