

CURRICULUM GUIDE FOR CHEMISTRY DEPARTMENT

(This is an example. Not all general education courses are listed or noted.)

BA DEGREE WITH A MAJOR IN CHEMISTRY†

30 or 31 semester hours in Chemistry 3 or 4 semester hours in Pre-Calculus or Calculus I

YEAR 1

FALL	COURSE TITLE	CREDITS
CHEM 110	General Chemistry I	4
MATH 117 OR MATH 225	Precalculus with Algebra OR Calculus I	3-4

SPRING	COURSE TITLE	CREDITS
CHEM 111	General Chemistry II	4

YEAR 2

FALL	COURSE TITLE	CREDITS
CHEM 221	Organic Chemistry I	4

SPRING	COURSE TITLE	CREDITS
CHEM 222	Organic Chemistry II	4
CHEM 233	Analytical Chemistry	4

YEAR 3

FALL	COURSE TITLE	CREDITS
CHEM 385	Scientific Information	1
	Chemistry Elective*	2-4

SPRING	COURSE TITLE	CREDITS
	Chemistry Elective*	2-4

YEAR 4

FALL	COURSE TITLE	CREDITS
	Chemistry Elective*	2-4

SPRING	COURSE TITLE	CREDITS
CHEM 499	Capstone/Research	1

† A BS in Chemistry is also offered as a contract major. Please consult the Chemistry department for more information.

*8-9 credit hours of Chemistry electives are also required.

**Please contact the Chemistry department for scheduling of electives.

CHOOSE FROM AMONG THESE ELECTIVES**		
CHEM 310	Medicinal Chemistry	3
CHEM 340	Biochemistry	4
CHEM 347	Biochemical Methods	2
CHEM 435	Molecular Spectroscopy	2
CHEM 436	Separation Methods	2
CHEM 446	Biochemistry II Metabolism (even years)	3

CLARKE UNIVERSITY DPT 6 YEAR CURRICULUM FOR BA CHEMISTRY MAJORS

(This is an example. Not all general education courses are listed or noted.)

FRESHMAN YEAR

FALL	COURSE TITLE	CREDITS
PT 101	Intro to Physical Therapy	2
CU 101	Transitions	1
GNEC 110	Cornerstone I	3
BIOL 115	Fundamentals of Cell Biology & Genetics	4
CHEM 110	General Chemistry I	4
MATH 117 MATH 225	Precalculus with Algebra* OR Calculus I	3 - 4
TOTAL		17 - 18

SPRING	COURSE TITLE	CREDITS
GNEC 111	Cornerstone II	3
CHEM 111	General Chemistry II	4
	General Education Course	3
	General Education Course	3
	General Education Course	3
TOTAL		16

SOPHOMORE YEAR

FALL	COURSE TITLE	CREDITS
BIOL 211	Human Anatomy & Physiology I	4
CHEM 221	Organic Chemistry I	4
	General Education Course	3
	General Education Course	3
	General Education Course	3
TOTAL		17

SPRING	COURSE TITLE	CREDITS
BIOL 212	Human Anatomy & Physiology II	4
CHEM 222	Organic Chemistry II	4
CHEM 233	Analytical Chemistry	4
	General Education Course	3
	General Education Course	3
TOTAL		18

JUNIOR YEAR

FALL	COURSE TITLE	CREDITS
BIOL 385	Scientific Information	1
PHYS 110	Elements of Physics I	4
	Chemistry Elective*	4
	Chemistry Elective*	3
	General Education Course (if needed)	3
TOTAL		12-15

SPRING	COURSE TITLE	CREDITS
CHEM 499	Capstone: CHEM Research	1
PHYS 111	Elements of Physics II	4
	Chemistry Elective*	2
	General Education Course	3
	General Education Course	3
	General Education Course	3
TOTAL		16

*8-9 credit hours of Chemistry electives required.

Apply to DPT Program by November 1st of your Junior Year

COURSE	PRE-REQUISITES*
CHEM 110	General Chemistry I (ACT Math sub score of 22 or higher or successful completion of MATH 090 (Intermediate Algebra) or equivalent)
MATH 117	Precalculus with Algebra (Three years of high school mathematics or equivalent and ACT Math sub score of 23 or higher)
PHYS 110	Elements of Physics I (MATH 117 (Precalculus with Algebra) or equivalent or consent)

COURSE	REQUIRED SUPPORTING COURSES
PSYC 111	Introductory Psychology
PSYC	Psychology Elective
PHIL 225	Applied Ethics: Biomedical

PHYSICAL THERAPY PREREQUISITES

Courses:

- Biology (4 hours)
- Human A&P I + II (8 hours)
- General Chemistry I + II (8 hours)
- Elements of Physics I + II (8 hours)
- Psychology (6 hours)
- Math (if required for Physics)

Minimum Requirements (All Candidates):

- 3.0 Cumulative GPA
- 3.0 Prerequisite GPA
- 75 hours of PT Observation (*across 3 PT settings*)
- Essay
- Competitive GRE (Graduate Record Exam)
- 3 Letters of Recommendation

Direct Pathway Admissions Requirements

(Clarke Undergraduates Only):

- 3.3 Cumulative GPA
- 3.3 Prerequisite Science GPA
- No more than 2 re-take courses
- Competitive GRE Score
- 3 “highly recommend” Letters of Recommendation
- 30 hours of PT Observation (*across 3 PT settings*)
- Essay
- First time PT applicant

YEAR 1/ SENIOR YEAR - BEGINNING OF THE DOCTOR OF PHYSICAL THERAPY PROGRAM

FALL	COURSE TITLE	CREDITS
BIOL 410	Human Gross Anatomy	4
BIOL 420	Human Physiology	4
DPT 514	Functional Anatomy & Biomechanics	3
DPT 515	Issues in Health Care	2
DPT 518	Physical Agents	3
TOTAL		16

SPRING	COURSE TITLE	CREDITS
BIOL 425	Excercise Physiology	4
BIOL 445	Neuroscience	4
DPT 524	Patient Care	3
DPT 526	Intro to PT Exam & Intervention	4
DPT 528	Therapeutic Exercise	2
DPT 529	Clinical Practicum I	1
TOTAL		18

YEAR 2 Summer - DPT 631 Internship I (Total 8 weeks) - 8 Credits

FALL	COURSE TITLE	CREDITS
DPT 612	Pathophysiology	3
DPT 613	Neuromuscular PT I	4
DPT 614	Musculoskeletal PT I	4
DPT 615	Education & Consulting in PT	2
DPT 617	Biostatistics & Research Methods	3
DPT 619	Clinical Practicum II	1
TOTAL		17

SPRING	COURSE TITLE	CREDITS
DPT 620	Integumentary PT	1
DPT 621	Pharmacology	2
DPT 623	Neuromuscular PT II	4
DPT 624	Musculoskeletal PT II	4
DPT 625	PT Management I	3
DPT 626	Cardiopulmonary PT	2
DPT 629	Clinical Practicum III	1
DPT 632	<i>Internship II (Winterim)</i>	4
TOTAL		21

Winterim - DPT 632 Internship II - 4 weeks - 4 credits

YEAR 3 Summer - DPT 733 Internship III (Total 8 weeks) 8 - Credits

FALL	COURSE TITLE	CREDITS
DPT 710 DPT 716	Advanced Specialty Elective OR Pediatric Specialty Elective	1-2
DPT 711	Orthotics & Prosthetics In PT	2
DPT 712	Primary Care in PT	3
DPT 713	Neuromuscular PT III	4
DPT 714	Musculoskeletal PT III	4
DPT 715	PT Management II	3
DPT 717	Doctoral Project	3
TOTAL		20-21

SPRING	COURSE TITLE	CREDITS
DPT 734	<i>Internship IV (8 wks)</i>	8
DPT 735	<i>Internship V (8 wks)</i>	8
DPT 720	Graduate Seminar	3
TOTAL		19