**BioMed Planning Worksheet: B.S., Biological Sciences, Biomedical Science Specialization**
Revisions for 2017-2018 (120 hours)

Student Name: _____

Email:_____ Matriculation Date: _____

Faculty Mentor: _____ Home Dept. _____

**University Core Curriculum** (see Undergraduate Catalog for list of course options): 39 hours

**Foundation Skills**

Composition (6 hours)

◯ _____

◯ _____

University College (1 hour)

◯ UCOL 101 Foundations of Inquiry

Speech Communication (3 hours)

◯ CMST 101 (3 hours)

Mathematics (3 hours)

◯ *MATH 108 and 109, or 111 or 141 or 151*

**Disciplinary Studies**

◯ Fine Arts (3 hours)

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Science (6 hours)
Group I: ◯ *CHEM 200 and 201*
Group II: ◯ *BIOL 211*

◯ Human Health (2 hours): *PHSL 310*

Humanities (6 hours)

◯ _____

◯ _____

Social Science (6 hours)

◯ _____

◯ _____

**Integrative Studies**

◯ Multicultural (3 hours): _____

**College of Science Requirements**: 6 hours

Biological Sciences: completed with the Biological Sciences major
Mathematics: completed with the Biological Sciences major
Physical Sciences: completed with the Biological Sciences major
Supportive Skills: *6 hours* chosen from the following

◯ CS 105 Introduction to Application Software *or* CS 200B Computer Concepts *or* CS 201 Problem Solving with Computers *or* CS 202 Introduction to Computer Science [3]

◯ ENGL 290 Intermediate Analytical Writing *or* ENGL 291 Intermediate Technical Writing; *or* ENGL 391 Precision in Reading and Writing[3]

◯ Two-semester sequence of a foreign language

**Requirements for the Biological Sciences Major (Biomedical Science Track)**: 70-72 hours

**Biology Core**: 29 hours

- ◯ BIOL 211 Introductory Cell Biology and Genetics [1 (+ 3)]
- ◯ BIOL 212 Introductory Evolution and Ecology [4]
- ◯ BIOL 213 Introductory Organismal Biology [4]
- ◯ BIOL 305 Principles of Genetics [3]
- ◯ BIOL 306 Cell Biology [3]
- ◯ BIOL 409 Developmental Biology [3]
- ◯ BIOL 450 Biomedical Genetics [3]
- ◯ MICR 301 Principles of Microbiology [4]
- ◯ MICR 302 Molecular Biology [3]
- ◯ PHSL 310 Principles of Physiology [3(+2)]
- ◯ BIOL 485 Senior Seminar in Biomedical Science *or* MICR 495 Senior Seminar *or* PHSL 490 Senior Seminar *or* PLB 480 Senior Seminar *or* ZOOL 482 Zoology Seminar for Seniors [1]

**Physical Sciences**: 25 hours

Chemistry: 12 hours

- ◯ CHEM 200, 202 Intro. to Chemical Principles [1(+3)]
- ◯ CHEM 201 General Chemistry Lab I [1]
- ◯ CHEM 210, 212 General and Inorganic Chemistry [4]
- ◯ CHEM 211 General Chemistry Lab II [1]
- ◯ CHEM 340 Organic Chemistry I [3]
- ◯ CHEM 341 Organic Chemistry Lab I [2]

Biological Chemistry: 5 hours

- ◯ CHEM 442 Organic Chemistry II and CHEM 443 Organic Chemistry Laboratory II, *or* CHEM 350 Introduction to Biological Chemistry *and* CHEM 351 Biochemistry Laboratory

Physics: 8 hours

- ◯ PHYS 203A, 253A College Physics A [4]
- ◯ PHYS 203B, 253B College Physics B [4]

**Mathematics**: 1-3 (+3) hours

- ◯ MATH 108 College Algebra and MATH 109 Trigonometry and Analytic Geometry, *or* MATH 111 Precalculus, *or* MATH 141 Short Course in Calculus for Biological Sciences, *or* MATH 150 Calculus I

**Statistics**: 3 hours

- ◯ QUAN 402 Basic Statistics *or* MATH 282 Intro. to Statistics *or* PLB 360 Intro. Biostatistics

**Life Science Electives**: choose *12 hours* from the following

- ◯ BIOL 304 Evolution
- ◯ MICR 403 Medical Microbiology Lecture [3]
- ◯ MICR 421 Biotechnology [3]
- ◯ MICR 425 Biochem. Physiol. of Micro. [3]
- ◯ MICR 441 Viruses and Disease [3]
- ◯ MICR 453 Immunology Lecture [3]
- ◯ MICR 460 Bacterial and Viral Genetics [3]
- ◯ MICR 470 Prokaryotic Diversity [3]
- ◯ MICR 477 Microbial Ecology [3]
- ◯ MICR 480 Molec. Biol. Microorganism Lab [3]
- ◯ MICR 481 Diagnostic & Applied Micro Lab [3]
- ◯ PHSL 301 Survey of Human Anatomy [4]
- ◯ PHSL 320 Reproduction & Sexuality [3]
- ◯ PHSL 401A, B Adv. Human Anatomy [5, 5]
- ◯ PHSL 410A, B Mammalian Physiology [4, 4]
- ◯ PHSL 430 Cellular & Molecular Physiology [3]
- ◯ PHSL/ZOOL 433 Comp. Animal Physiol. [3]
- ◯ *PHSL/ZOOL 434 Environmental Physiology [3]*
- ◯ PHSL 450 Advanced Human Sexuality [3]
- ◯ PHSL 462 Biomedical Instrumentation [3]
- ◯ PHSL 470 Biological Clocks [3]
- ◯ PLB 317 Introduction to Medical Botany [4]
- ◯ PLB 419 Plant Molecular Biology [3]
- ◯ PLB 425 Environmental Physiology of Plants [4]
- ◯ PLB 427 Plant Biochemistry [4]
- ◯ PLB/ZOOL 438 Plant-Animal Mol. Gen. Lab [3]
- ◯ PLB 455/ZOOL 450 Genome Evolution [3]
- ◯ PLB 471/ZOOL 472 Intro. to Systems Biology [3]
- ◯ PLB 475 Advanced Cell Biology [3]
- ◯ ZOOL 407 Parasitology [4]
- ◯ *ZOOL 409 Vertebrate Histology [4]*
- ◯ ZOOL 418 Vertebrate Anatomy Lab [3]
- ◯ ZOOL 426 Comparative Endocrinology [3]
- ◯ ZOOL 432 Principles of Toxicology [3]

**Free Electives** (3-5 hours)

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