

# Pre-PharmD Sample Program

	Fall	Winter	Spring	Requirements
Year 1	<ul style="list-style-type: none"> <li><b>BIO SCI 93 (4)</b></li> <li><b>CHEM 1A (4)</b></li> <li><b>PHRMSCI 1 (1, P/NP)</b></li> <li>WRITING 39B (4)</li> </ul>	<ul style="list-style-type: none"> <li><b>BIO SCI 94 (4)</b></li> <li><b>CHEM 1B (4)</b></li> <li>WRITING 39C (4)</li> </ul>	<ul style="list-style-type: none"> <li><b>CHEM 1C/1LC (6)</b></li> <li>MATH 2A (4)</li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li>WR 39A must be completed before Fall 2nd year</li> </ul>
Year 2	<ul style="list-style-type: none"> <li><b>BIO SCI 97 (4)</b></li> <li><b>CHEM 51A/1LD (6)</b></li> <li>MATH 2B (4)</li> <li>BIO SCI 194S (1, P/NP)</li> </ul>	<ul style="list-style-type: none"> <li><b>BIO SCI 98 (4)</b></li> <li><b>CHEM 51B/51LB (6)</b></li> <li>PHRMSCI 42 (1)</li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li><b>BIO SCI 99 (4)</b></li> <li><b>CHEM 51C/51LC (6)</b></li> <li>GE</li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li>WR 39C must be completed before Fall 3rd year</li> <li>Math 2A is a co-req for Physics 3A</li> <li>Study Abroad (optional)</li> </ul>
Year 3	<ul style="list-style-type: none"> <li><b>PHRMSCI 120, 120L (7)</b></li> <li>PHYSICS 3A (4)</li> <li>BIO SCI 100 (3,P/NP)</li> <li>CHEM 51LD (2)</li> </ul>	<ul style="list-style-type: none"> <li><b>PHRMSCI 170A (4)</b></li> <li>PHYSICS 3B (4)</li> <li>STATS 7, 8 or MATH 2D, 3A (4)</li> </ul>	<ul style="list-style-type: none"> <li><b>PHRMSCI 170B (4)</b></li> <li>PHYSICS 3C (4)</li> <li>PHRMSCI 76 (2)</li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li>Bio 100 &amp; Physics 3C must be completed before Fall of 4th year</li> <li>Study Abroad (optional)</li> </ul>
Year 4	<ul style="list-style-type: none"> <li><b>PHRMSCI 171 (4)</b></li> <li><b>PHRMSCI 172 (2,P/NP)</b></li> <li><b>PHRMSCI 174, 174L (7)</b></li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li><b>PHRMSCI 177, 177L (7)</b></li> <li>UD Elective</li> <li>GE</li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li>PHRMSCI 173 (4)</li> <li>UD Elective</li> <li>GE</li> </ul>	<ul style="list-style-type: none"> <li>*180 minimum units needed to graduate</li> </ul>

\***Bolded courses MUST be taken in the indicated quarter/year**

\* **PharmD courses (can be taken at any time as long as prerequisites are met)**

## Upper Division Electives (8 units to graduate)

### Biological Sciences

- D103 Cellular Biology**
  - D104 Developmental Biology
  - D111L Developmental and Cell Biology Lab
- D136 Human Anatomy (summer only, no lab)**
  - D145 Genomics and Proteomics
  - D148 Development and Disease2
- D170 Applied Human Anatomy (includes lab)**
  - E136 The Physiology of Human Nutrition
  - E139 Animal Locomotion
  - E142 Writing/Philosophy of Biology
  - M114 Advanced Biochemistry
  - M114L Biochemistry Laboratory
  - M116L Molecular Biology Laboratory
- M118L Experimental Microbiology Laboratory**
  - M121 Immunology with Hematology
- M122 General Microbiology**
  - M123 Introduction to Computational Biology
  - M124A Virology
  - M124B Viral Pathogenesis and Immunity
  - M124L Virus Engineering Laboratory
  - M125 Molecular Biology of Cancer
  - M137 Microbial Genetics
  - M143 Human Parasitology
  - M144 Cell Organelles and Membranes
  - N110 Neurobiology
  - N113L Neurobiology Laboratory
  - N153 Neuropharmacology
  - N154 Molecular Neurobiology

### Pre-PharmD Recommended Courses

- Anthro 2A (GE III and VIII) - 4 units**
- Psych 7A (GE III) - 4 units**
- Sociol 1 (GE III and VII) - 4 units**
- Econ 20A (GE III) - 4 units**
- Stats 7 (Math requirement)- 4 units**
- PharmSci 90 - 4 units**
- Physics 3LB & 3LC - 1.5 units each**
- Research 199**

### Physical Sciences

- 107 Inorganic Chemistry I
- 107L Inorganic Chemistry Laboratory
- 125 Advanced Organic Chemistry
- 128 Introduction to Chemical Biology
- 128L Introduction to Chemical Biology Lab Techniques
- 138 Introduction to Computational Organic Chemistry
- 156 Advanced Lab in Chemistry and Synthesis of Materials
- 160 Organic Synthesis Laboratory

### Public Health

- 121 Introduction to Complementary and Alternative Medicine
- 135 Medical Sociology
- 147 Drug Abuse Prevention

### Pharmaceutical Sciences

- 163 Pharmacogenomics and Epigenetics
- 175 Drug Discovery Computing Techniques
- 179 Emerging Technologies in Pharmaceutical Sciences and Medicine