Pre-Pharmacy Program Matrix

	v C	BIO 101 General Biology I*	CHM 203/CHM 204 Organic Chemistry I/II	BIO 205 Microbiology	PHY 201 General Physics I	MAT 203 Calculus I	MAT 109
	Apply computer and information literacy skills to access and evaluate cientific data and conclusions	Students will access, process, analyze and synthesize scientific information. Students will use technology to gain knowledge and understanding of specific topics in biology.	X	X	X	X	Use visualization, special reasoning, as well as geometric properties and strategies to model and solve problems.
2. E	Evaluate and interpret aspects of the natural world using scientific methods	Students will apply the scientific method and scientific reasoning to generate and evaluate hypothesis, experiments, data and conclusions.	Access, process, analyze and synthesize scientific information. Collect, analyze, and evaluate empirical data to substantiate chemical concepts.	X	Access, process, analyze and synthesize scientific information.	X	X
3. S	Solve numeric problems and accurately interpret graphical data	Students will solve numeric problems to analyze biological data. Students will accurately depict and interpret graphical data.	X	X	Use graphical models to analyze laboratory data.	Students will use calculus to solve applied problems from a variety of disciplines ranging from biology, economics, business, engineering, and the social sciences, but primarily focusing on applications from physics and mathematics.	Collect, organize, and display data as well as use appropriate statistical methods to analyze data and make inferences and predictions. Interpret and analyze numerical data, mathematical concepts, and identify patterns to formulate and validate reasoning.

^{*}BIO 101 is included because it is a likely pre-requisite to other Biology classes such as BIO 205.

X indicates that none of the learning goals listed for this course are aligned with the Program Learning Outcome listed.