

## SAMPLE FOUR YEAR PLAN FOR BS IN PHYSICS

### FRESHMAN YEAR

<i>Fall</i>		<i>Spring</i>	
Course	#Hours	Course	#Hours
First Year Seminar	4	Foreign Language	4
Writing	4	Wellness	2
PHYS 231 Introductory Physics I	4	PHYS 232 Introductory Physics II	4
PHYS 231L Introductory Physics I Lab	0	PHYS 232L Introductory Physics II Lab	0
MATH 231 Calculus I	4	PHYS 294 Phys/Eng Seminar	2
		MATH 232 Calculus II	4
<b>Total</b>	<b>16</b>	<b>Total</b>	<b>16</b>

### SOPHOMORE YEAR

<i>Fall</i>		<i>Spring</i>	
Course	#Hours	Course	#Hours
Old Testament	4	Public Speaking	2
Thematic Core (1 of 4*)	4	PHYS 341 Analytical Mechanics	4
PHYS 334 Computer Modeling	2	PHYS 331 Spacetime and Quanta	4
PHYS 351 Analog Electronics	2	Math 245 Linear Algebra	4
PHYS 351L Analog Electronics Lab	0	Math 331 Vector Calc	2
Math 333 Differential Equations	4		
<b>Total</b>	<b>16</b>	<b>Total</b>	<b>16</b>

### JUNIOR YEAR

<i>Fall</i>		<i>Spring</i>	
Course	#Hours	Course	#Hours
Advanced Seminar (includes at least one Theme)	4	New Testament	4
Visual and Performing Arts (1 of 2)	2	Thematic Core (2 of 4*)	4
PHYS 344 Quantum Mechanics (odd yrs) PHYS 342 Electromagnetic Theory (even yrs)	4	Visual and Performing Arts (1 of 2)	2
PHYS 345 Data Analysis and Presentation	2	PHYS 343 Experimental Physics**	2

CHEM 231 General Chemistry I	4	PHYS Elective***	2
CHEM 231L Gen Chem Lab	0		
<b>Total</b>	<b>16</b>	<b>Total</b>	<b>14</b>
<b>SENIOR YEAR</b>			
<i>Fall</i>		<i>Spring</i>	
<b>Course</b>	<b>#Hours</b>	<b>Course</b>	<b>#Hours</b>
Thematic Core (3 of 4*)	4	Thematic Core (4 of 4*)	4
Christian Thought	4	PHYS 494 Senior Capstone	2
PHYS 344 Quantum Mechanics (odd yrs) PHYS 342 Electromagnetic Theory (even yrs)	4	Elective	4
Elective	4	Elective	4
<b>Total</b>	<b>16</b>	<b>Total</b>	<b>14</b>
*7 Themes not covered by major requirements or VPA but some courses count for 2 Themes and Advanced Seminar counts for one Theme. Sample plan assumes 2 double tagged courses within set of 4 Thematic Core taken.		**PHYS 343 requirement can be satisfied without credit by approved research experience. ***PHYS 359 Thermodynamics (even yrs) is strongly recommended for students planning on graduate physics studies	