SIENAcollege
Physics and Astronomy

Physics BS[1] (Education Track) 4-Year Schedule

Fall Year 1

PHYS 130: General Physics I[3]	4
PHYS 132: General Physics Review	0
MATH 110: Calculus I[4]	4
FYSN 100: First-Year Seminar	3
CSIS 200: Software Tools for Physicists	3

Spring Year 1[2]

PHYS 140: General Physics II	4
PHYS 142: General Physics Review	0
MATH 120: Calculus II	4
FYSN 101: First-Year Seminar	3
Creative Arts Core (CDE)	3
EDUC 210: Issues in Contemp Ed(CDS)	3

Fall Year 2

PHYS 220: Modern Physics[5]	4
SCDV 230: Electronic Instrumentation	4
MATH 210: Calculus III	4
EDUC 260: Educational Psychology	3

Spring Year 2

PHYS 260: Thermal Physics	3
PHYS 250: Computational Physics	3
MATH 325: Differential Equations	3
EDUC 261: Found of Lang and Lit	3
Franciscan Diversity Core (CFD)	3

Fall Year 3

PHYS 310: Mechanics I	4
PHYS 470: Advanced Lab 1	1
CHEM 110: General Chemistry I	4
History Core (CDH)	3
EDUC 365: Exception and At Risk	3

Spring Year 3

PHYS 410: Electromagnetic Theory	4
PHYS 470: Advanced Lab 2	1
PHYS 370: Experimental Techniques[6]	2
Physics Elective	3
Social Justice Franciscan Core (CFJ)	3
Philosophy Core (CDP)	3

Fall Year 4

PHYS 440: Quantum Physics	3
Heritage Franciscan Core (CFH)	3
Religion Core (CDR)	3
English Core (CDA)	3
EDUC 481:Instr Theory+Prac Inclu(Sci)	3
EDUC 481:Instr Theory+Prac Inclu Class	1

Spring Year 4

Student teaching and the following courses:	
EDUC 461: Literacy+Reflective Practnr	3
EDUC 462: Literacy+Reflective Practnr	1
EDUC 487: Clinical Exper in Middle Sch	5
EDUC 488: Clinical Exper in Middle Sch	5
EDUC 495: Drug Alcohol Tobacco Workshop	0
EDUC 496: Child Abuse and Schl Viol Wrks	0

Summer[7]

Foreign Language(s)

[1]A minimum of 120 credit-hours is required to graduate (average 15 credit-hours per semester). Courses in italics have a lab component (generally indicating a larger time commitment).

[2]17 credit-hours are required for this semester.

[3]General Physics satisfies the Natural Science Core (CDN) requirement.

[4]Calculus satisfies the Quantitative Core (CDQ) requirement.

[5]Modern Physics satisfies the Natural World Franciscan Core (CFN) requirement.

[6]This requirement can be satisfied by taking *ASTR 380: Observational Astronomy* (a 3-credit course offered in the fall).

[7]The two disciplinary core courses in Year 3 can be moved to the summer and replaced with MATH 330 and MATH 230 to get a math minor and build courses for a second certification in math.