## **ENGINEERING PHYSICS**(Optical Engineering Concentration)

Freshman Fall Semester			Freshman Spring Semester		
Course	Course Name	Cr	Course	Course Name	Cr
PHYS-201	General Physics I	4	PHYS-202	General Physics II	4
MTSC-251	Calculus I	4	MTSC-252	Calculus II	4
PHYS-200	Analysis of Physical Systems	3	PHYS-220	Scientific Programming	3
ENGL-101	English Composition I	3	ENGL-102	English Composition II	3
PHYS-191	University Seminar I	1	PHYS-192	University Seminar II	1
			MVSC-101	Lifetime Fitness and Wellness	2
	Total Credits	15		Total Credits	17
Sophomore Fall Semester			Sophomore Spring Semester		
Course	Course Name	Cr	Course	Course Name	Cr
PHYS-313	Mechanics I: Statics	3	PHYS-314	Mechanics II: Dynamics	3
CHEM-101	Gen. & Elem. Chemistry I	4	ENGR-205	Electrical Circuit Analysis	
ENGR-210	Digital Logic Design	4	MTSC-351	Differential Equations	
MTSC-313	Linear Algebra	3	MTSC-253	Calculus III	
ENGL-xxx	World Literature Elective	3	ENGL-200	Speech	3
	Total Credits	17		Total Credits	17
Junior Fall Semester			Junior Spring Semester		
Course	Course Name	Cr	Course	Course Name	Cr
PHYS-361	Modern Physics	4	PHYS 342	Electricity and Magnetism II	3
PHYS 341	Electricity & Magnetism I	3	PHYS 362	Quantum Mechanics	
ENGR-302	Signals and Systems	4	xxxx-xxx	Technical Elective 1	
PHYS-316	Introduction to Optics	4	xx-xxx	Social Science Elective	3
	Total Credits	15		Total Credits	12
Senior Fall Semester				Senior Spring Semester	
Course	Course Name	Cr	Course	Course Name	Cr
PHYS-305	Thermal Physics	3	PHYS-418	Theoretical & Exp Research **	3
PHYS-451	Introduction to Research*	3	ENGR-342	Material Science for Engineers	4
XXXX-XXX	Technical Elective II	3	xxxx-xxx		
GLOB-395	Global Societies	3	XX-XXX	Arts and Humanities Elective	
xx-xxx	Arts and Humanities Elective	3	HIST-xxx	World History Elective	3
	Total Credits	15		Total Credits	16

Total Credits:	12/

Students will complete a course that addresses the African-American experience. This course may also satisfy the arts & humanities elective, the social science elective or can be taken to fulfill a free elective. Please see your advisor.

<sup>\*\*</sup> Senior Capstone

<sup>\*</sup> Writing Intensive Course(s)