Taunggoke University

B.Sc in Physics

First Year					
Semester 1			**Semester 2**		
Module No.	**Module Name**	CP (L,P/T)	**Module No.**	**Module Name**	CP (L,P/T)
Foundation			Foundation		
Myan 1001	Myanmar	3(2,2)	Myan 1002	Myanmar	3(2,2)
Eng 1001	English	3(2,2)	Eng 1002	English	3(2,2)
Core			Core		
Phys 1101	General Physics I	4(3,2)	Phys 1102	General Physics II	4(3,2)
Elective (three courses)			Elective (three courses)		
Chem 1001	General Chemistry I	3(2,2)	Chem 1002	General Chemistry II	3(2,2)
Math 1001	Mathematics	3(2,2)	Math 1002	Mathematics	3(2,2)
AM 1001*	Aspects of Myanmar	3(2,2)	AM 1002*	Aspects of Myanmar	3(2,2)

Second Year					
Semester 1			**Semester 2**		
Module No.	**Module Name**	CP (L,P/T)	**Module No.**	**Module Name**	CP (L,P/T)
Foundation			Foundation		
Eng 2001	English	3(2,2)	Eng 2002	English	3(2,2)
Core			Core		
Phys 2101	Mathematical Physics	4(3,2)	Phys 2102	Computational Physics	4(3,2)
Phys 2103	Electric and Magnetic Fields	4(3,2)	Phys 2104	Thermal Physics	4(3,2)
Phys 2105	Atomic Physics	4(3,2)	Phys 2106	Analytical Mechanics	4(3,2)
Elective (two courses)			Elective (two courses)		
Phys 2107	Statistical Mechanics	3(2,2)	Phys 2108	Optics & Photonics III	3(2,2)
Math 2001	Mathematics	3(2,2)	Math 2004	Mathematics	3(2,2)

Third Year					
Semester 1			**Semester 2**		
Module No.	**Module Name**	CP (L,P/T)	**Module No.**	**Module Name**	CP (L,P/T)
Foundation			Foundation		
Eng 3001	English	3(2,2)	Eng 3002	English	3(2,2)
Core			Core		
Phys 3101	AC Circuit & Electronics	4(3,2)	Phys 3102	Electronics	4(3,2)
Phys 3103	Nuclear Physics	4(3,2)	Phys 3104	Nuclear Physics	4(3,2)
Phys 3105	Classical Mechanics	4(3,2)	Phys 3106	Classical Mechanics	4(3,2)
Phys 3107	Electromagnetic Wave Theory	4(3,2)	Phys 3108	Electromagnetic Wave Theory	4(3,2)
Elective			Elective		
Phys 3109	Mathematical Physics	3(2,2)	Phys 3110	Mathematical Physics	3(2,2)

Fourth Year					
Semester 1			**Semester 2**		
Module No.	**Module Name**	CP (L,P/T)	**Module Name**	**Module Name**	CP (L,P/T)
Foundation			Foundation		
Eng 4001	English	3(2,2)	Eng 4002	English	3(2,2)
Core			Core		
Phys 4101	Electronics	4(3,2)	Phys 4102	Electronics	4(3,2)
Phys 4103	Nuclear Physics	4(3,2)	Phys 4104	Nuclear Physics	4(3,2)
Phys 4105	Quantum Mechanics	4(3,2)	Phys 4106	Quantum Mechanics	4(3,2)
Phys 4107	Condensed Matter Physics	4(3,2)	Phys 4108	Condensed Matter Physics	4(3,2)
Phys 4109	Theoretical Physics	4(3,2)	Phys 4110	Theoretical Physics	4(3,2)
It is compulsory for all students to submit term papers at the end of the semester					

B.Sc. (Honours) in Physics

Students who passed second year with GPA 4 or GPA greater than 4 are eligible to attend B.Sc. (Honours) classes for three more years. After Finished successfully, they earn B.Sc. (Hons:) degree specializing in physics.

B. Sc (Honours) in Physics

First Year Honours					
Semester 1			Semester 2		
Module No.	**Module Name**	CP (L,P/T)	**Module No.**	**Module Name**	CP (L,P/T)
Foundation			Foundation		
Eng 3001	English	3(2,2)	Eng 3002	English	3(2,2)
Core			Core		
Phys 3201	AC Circuit & Electronics	4(3,2)	Phys 3202	AC Circuit & Electronics	4(3,2)
Phys 3203	Nuclear Physics	4(3,2)	Phys 3204	Nuclear Physics	4(3,2)
Phys 3205	Classical Mechanics	4(3,2)	Phys 3206	Classical Mechanics	4(3,2)
Phys 3207	Electromagnetic Wave Theory	4(3,2)	Phys 3208	Electromagnetic Wave Theory	4(3,2)
Phys 3209	Mathematical Physics	4(3,2)	Phys 3210	Mathematical Physics	4(3,2)

Second Year Honours					
Semester 1			Semester 2		
Module No.	**Module Name**	CP (L,P/T)	**Module No.**	**Module Name**	CP (L,P/T)
Foundation			Foundation		
Eng 4001	English	3(2,2)	Eng 4002	English	3(2,2)
Core			Core		
Phys 4201	Electronics	4(3,2)	Phys 4202	Electronics	4(3,2)
Phys 4203	Nuclear Physics	4(3,2)	Phys 4204	Nuclear Physics	4(3,2)
Phys 4205	Quantum Mechanics	4(3,2)	Phys 4206	Quantum Mechanics	4(3,2)
Phys 4207	Condensed Matter Physics	4(3,2)	Phys 4208	Condensed Matter Physics	4(3,2)
Phys 4209	Theoretical Physics	4(3,2)	Phys 4210	Theoretical Physics	4(3,2)

Third Year Honours/ M.A. Qualifying					
Semester 1			**Semester 2**		
Module No.	**Module Name**	CP (L,P/T)	**Module No.**	**Module Name**	CP (L,P/T)
Core			Core		
Phys 5201	Electronics	4(3,2)	Phys 5202	Electronics	4(3,2)
Phys 5203	Nuclear	4(3,2)	Phys 5204	Nuclear	4(3,2)
Phys 5205	Quantum Mechanics	4(3,2)	Phys 5206	Quantum Mechanics	4(3,2)
Phys 5207	Condensed Matter Physics	4(3,2)	Phys 5208	Condensed Matter Physics	4(3,2)
Phys 5209	Electromagnetic Wave Theory	4(3,2)	Phys 5210	Electromagnetic Wave Theory	4(3,2)
Phys 5211	Mathematical Physics	4(3,2)	Phys 5212	Mathematical Physics	4(3,2)

COURSE DESCRIPTIONS

Phys 1101/ 1001: General Physics I

The module deals with Motion in a Plane: Components of Motion, Projectile Motion, Uniform Circular Motion and Centripetal Acceleration; Forces: Newton's Law of Gravitation, a closer look at grtavity, apparent weightlessness; Friction: Causes and Types, Coefficients of Friction, Air Resistance; Work, Energy and Power: Work, Energy, The Conservation of Energy, Power; and Rotational Motion and Dynamics: Description of Rotational Motion, Torque and Moment of Inertia, Rotational Work, Power, and Kinetic Energy, Angular Momentum. It is also concerned with Sound: The Nature of Sound and Hearing, Sound Phenomena; Fluid Mechanics: Fluid Properties, Pressure and Pressure Measurement, Buoyancy and Archimedes'"Principle, Fluid Flow; and Thermodynamics, Heat Engines & Pumps: The First Law of Thermodynamics and Thermodynamic Processes, The Second and Third Laws of Thermodynamics.