

Course Outcomes

B. Sc F.Y. (Semi- I) (Paper – I)

Course Code – PHY-101-Mechanics, Properties of Matter and Sound

CO-1 :Study of Mechanics, gravitational, potential field.

CO-2 :Introduction of Elasticity and study of elastic material.

CO-3 :Understanding Viscosity and surface tension of liquids.

CO-4 :Study Ultrasonic sound and its applications and Acoustics.

B. Sc F.Y. (Semi -I) (Paper – II)

Course Code – PHY-102-Heat and Thermodynamics

CO-1 :introduce about Thermal Conductivity of different , materials.

CO-2 :Learn about Real gases and Transport Phenomena.

CO-3 :Understand Thermodynamics and Thermo dynamical processes.

CO-4 :Introduction to entropy and Thermo dynamical relations.

B. Sc F.Y. (Semi - II) (Paper – IV)

Course Code – PHY-104-Geometrical and Physical Optics

CO-1 :Review about Geometrical optics and optical instruments.

CO-2 :Study interference phenomena of light and different experiments.

CO-3 :Concept of diffraction of light and its types.

CO-4 :Polarization of light and its applications.

B. Sc F.Y. (Semi-II) (Paper – V)

Course Code – PHY-105-Electricity and Magnetism

CO-1 :Need of Vector Algebra in electricity and magnetism.

CO-2 :Study Electrostatics and related laws.

CO-3 :Introduction of Magneto statics and related laws and applications.

CO-4 :Concept of Transient current and study of L-C-R.

- **Three theory periods per paper per week.**
- **Three practical periods per paper per week**

B. Sc S.Y. (Semi-III) (Paper – VII)

Course Code –PHY-201-Mathematical, Statistical Physics and Relativity.

CO-1 :Study about Differential and Ordinary Differential equation.

CO-2 :Introduction of Statistical basis and Classical statistics, and distribution laws.

CO-3 :Understanding of Quantum Statistics and concept of Fermi Gas

CO-4 :Theory of Relativity, Relativistic transformation equations.

B. Sc S.Y. (Semi-III) (Paper – VIII)

Course Code –PHY-202-Modern and Nuclear Physics.

CO-1 :Introduce about Photoelectric Effect and its applications.

CO-2 :Learn about X-Rays , Bragg's law , X-ray spectrum and its applications.

CO-3 :Understand Nuclear Forces and Nuclear Models.

CO-4 :Types of Particle, Accelerators and Detectors.

B. Sc S.Y. (Semi-IV) (Paper – XI)

Course Code –PHY-205- General Electronics.

CO-1 :Review Semiconductor Effect and its applications.

CO-2 :Study transistor biasing , its types, Amplifiers and its applications.

CO-3 :Concept of Oscillator and Multi vibrator and their types.

CO-4 :Introduce about Modulations, its types and demodulation.

B. Sc S.Y. (Semi-IV) (Paper – XII)

Course Code – PHY-206- Solid State Physics.

CO-1 :introduction to crystal structure and its types.

CO-2 :Study of Bonding and Bond theory of solids.

CO-3 :Study an Thermal properties of solid.

CO-4 :Study about Free Electron theory and metals and Transport Properties.

B. Sc T.Y. (Semi-V) (Paper – XV)

Course Code –PHY-301- Classical and Quantum Mechanics

CO-1 :Introduction of Classical Mechanics and its application.

CO-2 : Study of Quantum theory.

CO-3 : Learn about de-Broglie's hypothesis, Davidson – German expert, Heisenberg
Uncertainty principle

CO4 : Introduce about Modulations, its types and demodulation.

B. Sc T.Y. (Semi-V) (Paper – XVI)

Course Code –PHY-302- Electrodynamics.

CO-1 : Introduction to Electrodynamics

CO-2 : Study of Time Varying Fields.

CO-3 : Study of Electromagnetic Waves.

CO-4 : Introduction of Electromagnetic Wave with Matter.

B. Sc T.Y. (Semi-VI) (Paper – XIX)

Course Code –PHY-305- Atomic , Molecular physics and LASER

CO-1 : Study of Atomic models

CO-2 : Introduction to vector atom model

CO-3 : Study of Molecular Spectra.

CO-4 : Introduction to LASER, Its type and Applications.

B. Sc T.Y. (Semi-VI) (Paper – XX)

Course Code –PHY-306- Non-conventional Energy Sources and Optical Fiber

CO-1 : Study of Non-conventional Energy Sources.

CO-2 : Introduction and Study of photovoltaic system.

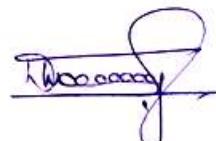
CO-3 : Introduction of Optical Fiber.

CO-4 : Study on Fiber Cable and Fabrications.



Head

Department of Physics



Principal