

Course Outcomes

Course Name: Linear Algebra and Calculus - MA101BS	
1	Analyse the solution of the system of equations. Find the Eigen values and Eigen vectors
2	Explain the quadratic form, Canonical form using orthogonal transformations.
3	Solve the applications on the mean value theorems
4	Evaluate the improper integrals using Beta and Gamma functions.
5	Find the extreme values of functions of two variables with/ without constraints
Course Name: Chemistry- CH102BS	
1	Find The knowledge of atomic, molecular and electronic changes, band theory related to conductivity.
2	Explain the quality and utility of suitable water for industrial as well as domestic applications.
3	Find the knowledge of cell, electrode, cathode, anode, electrolysis, electromotive force and reference electrodes .And principles of corrosion.
4	Explain the knowledge of configurationally and conformational analysis of molecules and reaction mechanisms.
5	Find The required skills to get clear concepts on basic spectroscopy and application to medical and other fields.
Course Name: Basic Electrical Engineering- EE103ES	
1	Analyze and solve electrical circuits using network laws and theorems
2	Understand of AC circuits.
3	Study the principle of operation and construction of Transformer and
4	Study the principle of operation and construction of DC and AC machines
5	Analyze the concept of switch gear equipment and batteries.
Course Name: Engineering Workshop- ME105ES	
1	Identify and apply suitable tools for different trades of Engineering processes like carpentry and foundry
2	Practice on manufacturing of components using workshop trades including fitting and welding
3	Interpret basic electrical engineering knowledge for house wiring practice.
4	Prioritize various tools and operations to perform black smithy and tin smithy.
5	Demonstration and exposure of Machine Shop, Metal Cutting (Water Plasma), Power tools in construction and Wood Working
Course Name: English- EN105HS	
1	Apply the concepts of English Language effectively in spoken and written forms.
2	Rephrase the texts and respond appropriately.
3	Take part confidently in various activities relevant to different contexts and cultures.
4	Develop basic proficiency in English including reading and listening comprehension, writing and speaking skills.
5	Relate principles of English grammar to enhance language skills of a student.

Course Name: Engineering Chemistry Lab- CH106BS	
1	Determine parameters like hardness and chloride content in water.
2	Explain various titrations by different types of analysis using instrumental methods.
3	Prove rate constant of a reaction from concentration – time relationships.
4	Find physical and chemical properties like acid value ,adsorption, surface tension, partition coefficient, acid value and viscosity.
5	Identify Rf values of some organic molecules by TLC technique and Analyze the synthesis of Drug molecules.
Course Name: English Language and Communication Skills Lab- EN107HS	
1	Take part in computer – assisted multi – media language learning activities to learn individually and independently.
2	Identify nuances of English language through audio- visual experience and group activities.
3	Demonstrate consistent accent and intelligibility in pronunciation of English through practice
4	Improve the fluency of students in spoken English and neutralize their mother tongue influence.
5	Relate the use of English language appropriately for public speaking and interviews.
Course Name: Basic Electrical Engineering Lab- EE108ES	
1	Verify ohm's law
2	Verification KVL and KCL
3	Identify different electrical machines and understand their characteristics
4	Identify transient response of RL and RC, RLC circuits.
5	Calculation of Impedance for RLC series circuits
Course Name: Advanced Calculus – II-MA201BS	
1	Identify whether the given differential equation of first order is exact or not
2	Solve higher differential equation and apply the concept of differential equation to real world problems
3	Evaluate the multiple integrals
4	Apply the concept to find areas, volumes, centre of mass and Gravity for cubes, sphere and rectangular parallelepiped
5	Evaluate the line, surface and volume integrals and converting them from one to another
Course Name: Applied Physics-AP202BS	
1	The student would be able to learn the fundamental concept of the quantum behavior of matter in its micro state
2	The concepts of semiconductor physics helps the students to understand the working of semiconductors and its devices
3	The Knowledge of opto electronics, Lasers and fiber optics enables the students to apply to various systems like communications, solar cell, photo cells
4	Design characterization and study of properties of material help the students to prepare new materials for various engineering applications

5	The course also helps the students to be exposed to the phenomena of electromagnetism and also to have exposure on magnetic materials and dielectric materials
Course Name: Programming for Problem Solving-CS203ES	
1	Write algorithms and draw flowcharts for solving problems.
2	Convert the algorithms/flowcharts to C programs.
3	Decompose a problem into functions and to develop modular reusable code.
4	Use arrays, pointers, strings and structures to write C programs.
5	Implement Searching and sorting algorithms.
Course Name: Engineering Graphics-ME204ES	
1	Preparing working drawings to communicate the ideas and information.
2	Read, understand and interpret engineering drawings
3	Analyse the drawings of isometric projections and orthographic projections
4	Apply the knowledge to develop surface of regular solids and intersection of solids
5	Understand the basic levels of cad software's.
Course Name: Applied Physics Lab-AP205BS	
1	Explain the importance of light phenomena in thin films and resolution
2	Relate the working of various laser systems and light propagation through optical fibers.
3	Experiment with semiconductor physics and Opto electronics
4	Examine the phenomena of electromagnetism and also have exposure on magnetic materials
5	Design characterization and study of properties of material help the students to prepare new materials for various engineering applications.
Course Name: Programming for Problem Solving Lab-CS206ES	
1	Formulate the algorithms for simple problems
2	Correct syntax errors and translate given algorithms to a working and correct program
3	Identify and correct logical errors encountered during execution
4	Represent and manipulate data with arrays, pointers , strings and structures and functions
5	Create, read and write to and from simple text and binary files
Course Name: Environmental Science-MC209ES	
1	Define the scope and importance of ecosystem, its values and services.
2	Summarize the significance of various natural resources and its management
3	Make use of a comprehensive study of the world's biodiversity and the importance of its conservation.
4	Categorize different types of pollutions, their control measures and effective methods of waste management.
5	Assess global environmental problems and come out with best possible solutions, interpret environmental laws and sustainable development

Course Name: Engineering Mechanics & ME201ES	
1	Determine resultant of forces acting on a body and analyse equilibrium of a body subjected to a system of forces.
2	Solve problem of bodies subjected to friction.
3	Find the location of centroid and calculate moment of inertia of a given section.
4	Understand the kinetics and kinematics of a body undergoing rectilinear, curvilinear, rotatory motion and rigid body motion.
5	Solve problems using work energy equations for translation, fixed axis rotation and plane motion and solve problems of vibration.
Course Name: Engineering Physics & 21PH103BS	
1	The knowledge of physics relevant to engineering is critical for converting ideas into technology
2	An understanding of physics also helps engineers understand the working and limitations of existing devices and techniques, which eventually leads to new innovations and improvements.
3	In the present course, the students can gain knowledge on the mechanism of physical bodies upon the action of forces on them, the generation transmission and the detection of the waves.
4	Students can gain knowledge on optical phenomena like interference diffraction, the principles of lasers and fiber optics.
5	Various chapters establish a strong foundation on the different kinds of characters of several materials and pave a way for them to use in at various technical and engineering applications.
Course Name : : Engineering Physics lab & 21PH104BS	
1	The knowledge of physics relevant to engineering is critical for converting ideas into technology
2	An understanding of physics also helps engineers understand the working and limitations of existing devices and techniques, which eventually leads to new innovations and improvements.
3	In the present course, the students can gain knowledge on the mechanism of physical bodies upon the action of forces on them, the generation transmission and the detection of the waves.
4	Students can gain knowledge on optical phenomena like interference diffraction, the principles of lasers and fiber optics.
5	Various chapters establish a strong foundation on the different kinds of characters of several materials and pave a way for them to use in at various technical and engineering applications.