Course Name:	Applied Mathematics I		
Course Code	FEC101		
Faculty Name:	Shirly C., Sonali J and Pallavi M		
Year	1	Sem	I

CO Number	Course Outcome
	The Student will be able to
FEC101.1	Recall different representations and algebra of complex numbers, De-Moivre's theorem, Inverse and transpose of a matrix, the derivatives of standard functions,find the partial derivatives of different types of functions .
FEC101.2	Identify different types of matrices, identify the real and imaginary parts of complex numbers appearing in the circular, hyperbolic and logarithmic functions, Classify the vectors as linearly independent or dependent, solve partial differentiation problems using Euler's theorem. Identify composite, implicit functions and evaluate their partial derivatives.
FEC101.3	Apply De Moivre's theorem in finding the powers and roots of complex numbers, determine the rank of a matrix and apply the concept in solving the system of linear equations by analytical and numerical methods, apply the concept of matrices to coding theory, apply the concept of partial differentiation in finding maxima and minima of functions, apply the concepts of successive differentiation in obtaining Taylor's series expansion of different functions, and apply L-Hospital's rule in finding limits of indeterminate forms
FEC101.4	Compare the solutions of transcendal equations and system of linear equations by using different numerical methods. Analyse the question and use proper deduction of Euler's theorems
FEC101.5	Apply Open source software Scilab to solve system of linear equations using numerical methods and to find maxima minima of functions of two variables.

Course Name:	Applied Physics I		
Course Code	FEC102		
Faculty Name:	Jyoti Nimbhorkar and Sameer Hadkar		
Year	1	Sem	I

CO Number	Course Outcome
	The student will be able to
FEC102.1	Understand & explore the basic concepts of core Physics topics like Solid State, Semiconductor, Superconductivity and Wave Mechanics.
FEC102.2	Integrate knowledge of the above mentioned Physics topics with their engineering disciplines.
FEC102.3	Apply fundamental principles of Physics to solve numericals and problems relating to wave mechanics, energy and materials.

Course Name:	Applied Chemistry I		
Course Code	FEC103		
Faculty Name:	Kartiki B. and Anice M.		
Year	1	Sem	I

CO Number	Course Outcome
FEC103.1	Student will be able to define and recall the different engineering chemistry concepts and fundamentals of material science which include water, polymer, lubricants,phase rule, cements and nanomaterials.
	Student will be able to
	a) reason out, justify, and explain the various mechanisms and processes involved in the study of materials like water, polymer, lubricants, cements and nanomaterials
	b) explain the concept of phase rule.
FEC103.2	c) solve numerical problems based on water hardness and lubricants properties.
FEC103.3	Student will be able to perform experiments, obtain data, analyze data and draw inference on basis of their study on water, lubricants and cements.

Course Name:	Engineering Mechanics		
Course Code	FEC104		
Faculty Name:	Babitha D, Georgena K, and Sachin S		
Year	1	Sem	I

CO Number	Course Outcome
	The Student will be able to
FEC104.1	State the fundamental laws and basic concepts that define the effect of forces on rigid bodies at rest and in motion(statics & dynamics)
FEC104.2	Estimate the support reactions and motion parameters in terms of magnitude and direction due to the effect of forces on bodies at rest and in motion.
FEC104.3	Apply the knowledge of conditions of equilibrium to find internal forces in members of plane truss.

Course Name:	BEE		
Course Code	FEC105		
Faculty Name:	Poonam , Gejo, Anjum		
Year	1	Sem	I

CO Number	Course Outcome
FEC105.1	The students will be able to define or state the basic principle and definations of an electrical network (DC+AC), basic operation of single phase transformer and DC motors and generators.
FEC105.2	The students will be able to explain the fundamentals of DC circuits, single phase AC circuits, three phase AC circuits , construction of transformers and DC motors and generators.
FEC105.3	The students will be able to apply the fundamental laws of electricity to solve any given electrical circuit.
FEC105.4	The students will be able to analyze the various parameters for the given AC (single and three phase) and DC circuits and the performance of single phase transformer
FEC105.5	The students will be able to evaluate the various parameters for the given AC (single and three phase) and DC circuits and single phase transformer

Course Name:	Environmental Studies		
Course Code	FEC106		
Faculty Name:	Kartiki B., Anice M., and Mili S.		
Year	1	Sem	I

CO Number	Course Outcome
FEC106.1	The student will be able to recall/define the structural and functional features of ecosystem, sustainable development, types of pollution, renewable energy sources.
FEC106.2	The student will be able to i) explain, justify and describe the structure of ecological pyramids under different conditions, different pollution control measures, renewable energy production methods and disaster management techniques. ii) describe/explain legislative measures to protect the environment, concept and importance of carbon credits, green buildings, measures for sustainable develpoment