

**VIDYA JYOTHI INSTITUTE OF TECHNOLOGY**  
*Department of Humanities & Sciences (EEE)*  
**I Year II Semester – R15**  
**Course outcomes**

<b>English-II/A12005</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Acquire the real life skills in the light of literature.
<b>CO2</b>	Develop managerial skills for successful careers. By making critical decisions
<b>CO3</b>	Demonstrate physical and mental fitness with true sportsman spirit.
<b>CO4</b>	Build collaborative knowledge and cultivate social responsibility.
<b>CO5</b>	Enhance communication skills through grammar, vocabulary with emphasis on LSRW skills.

<b>Mathematics-II/A12006</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Solve first order differential equations and their applications.
<b>CO2</b>	Identify different types of higher order differential equations and their applications in engineering problems
<b>CO3</b>	Apply Fourier series and defining it for various types of functions
<b>CO4</b>	Evaluating the Fourier transforms of functions of single variable
<b>CO5</b>	Justify integrals of functions or vector-related quantities over curves, surfaces, and domains in two- and three-dimensional space.

<b>Engineering Physics-II/A12007</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Understand the principles of Quantum mechanics & free electron theory.
<b>CO2</b>	Differentiate the types of solids based on band theory of solids and to understand the applications of optical fibers in various fields.
<b>CO3</b>	Explain the basics of semiconductors and semiconductor devices
<b>CO4</b>	Explain superconductivity and their applications in modern technology
<b>CO5</b>	Identify the importance of Nanomaterials in various fields

<b>C Programming -II /A12503</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Develop various sorting and searching algorithms
<b>CO2</b>	Design solutions using derived data types and user defined data types- structures, arrays, pointers
<b>CO3</b>	Develop programs on dynamic memory allocation for effective memory utilization
<b>CO4</b>	Implement linear data structures-list, stack and queue
<b>CO5</b>	Apply various file handling techniques for better data management

<b>Mathematics -III/A12009</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Solve engineering problems involving Algebraic and transcendental equations
<b>CO2</b>	Acquires the knowledge of interpolation in predicting future outcomes based on the present knowledge
<b>CO3</b>	Evaluating the Numerical Solutions for Integrals and Fitting of different types of curves to the given data
<b>CO4</b>	Solve Initial Value Problems by Numerical Methods
<b>CO5</b>	Explain the applications of Partial Differential Equations

<b>Electrical Circuit Theory /A12202</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Understand fundamentals of the basic circuit components & their characteristics
<b>CO2</b>	Analyze A.C circuits for different excitations
<b>CO3</b>	Understand the concepts of locus diagrams, resonance, magnetic circuits
<b>CO4</b>	Analyze network topology for planar networks and dual networks
<b>CO5</b>	Analyze D.C and A.C circuits using theorems

<b>English Language Communication Skills Lab-II/A12085</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Build the language proficiency in English with emphasis on LSRW skills.
<b>CO2</b>	Develop communication skills through various language learning activities.
<b>CO3</b>	Summarize the nuances of English speech sounds, stress, rhythm, intonation and syllable division.
<b>CO4</b>	Acquire and exhibit acceptable etiquette essential in social & professional settings.
<b>CO5</b>	Improve the fluency in spoken English and neutralize mother tongue influence.

<b>C Programming Lab- II/A12584</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Develop various sorting and searching algorithms
<b>CO2</b>	Design solutions using derived data types and user defined data types- structures, arrays, pointers
<b>CO3</b>	Develop programs on dynamic memory allocation for effective memory utilization
<b>CO4</b>	Implement linear data structures-list, stack and queue
<b>CO5</b>	Apply various file handling techniques for better data management

<b>Engineering Physics Lab/A12088</b>	
<b>After completing this course the student must demonstrate the knowledge and ability to</b>	
<b>CO1</b>	Estimate the numerical aperture of optical fibers
<b>CO2</b>	Visualize the fundamental optical phenomenon like Interference and diffraction
<b>CO3</b>	Study the basic Electrical characteristics of LCR circuit
<b>CO4</b>	Calculate the moment of inertia of Fly wheel and frequency of AC source using sonometer.
<b>CO5</b>	Study the characteristics of photodiode and to calculate the band gap of a given semiconductor diode