Course Number and Name
BMA301 – MATHEMATICS III

Course Objective

To introduce Fourier series analysis which is central to many applications in engineering apart From its use in solving boundary value problems systems.
To acquaint the student with Fourier transform techniques used in wide variety of situations.
To introduce the effective mathematical tools for the solutions of partial differential equations that model several physical processes and to develop Z transform techniques for discrete time

Prerequisites	Co-requisites
Engineering Mathematics I & II	Nil

Course Outcomes (COs)

CO1	Solve a set of algebraic equations representing steady state models formed in engineering problems
CO2	Fit smooth curves for the discrete data connected to each other or to use interpolation methods over these data tables
CO3	Find the trend information from discrete data set through numerical differentiation
CO4	To summary information through numerical integration
CO5	Solve PDE models representing spatial and temporal variations in physical systems through numerical method
CO6	Have the necessary proficiency of using MATLAB for obtaining the above solution

Student Outcomes (SOs) from Criterion 3 covered by this Course

COs/SOs	a	b	c	d	e	f	g	h	i	j	k	l
CO1	L		H				M					
CO2		H	H				M					
CO3							M	H				
CO4									H	H		
CO5							M			H	H	
CO6							M					L