

**Curriculum Plan: B.Sc. (Hons) Mathematics (Semester V)- Elementary Mathematical Analysis  
2024-25 Odd Sem**

<p align="center"><b>Mr. Manish Kumar</b> Assistant Professor Department of Mathematics Kalindi College University of Delhi Delhi- 110008 Mobile: 7503244811 E- mail: manishkumar@kalindi.du.ac.in</p>		<b>Marks Distribution</b>	<b>Theory - 90</b>
			<b>Internal Assessment- 30</b> <b>Tutorial 40</b>
		<b>Classes Assigned</b>	<b>Lectures: 2 per week</b>
	<b>References</b>	<b>1. Denlinger, Charles G. (2011). Elements of Real Analysis. Jones &amp; Bartlett India Pvt. Ltd. Student Edition. Reprinted 2015.</b>	
	<b>Week</b>	<b>Topics</b>	
	<b>1<sup>st</sup> week</b>	Limit and Continuity	
	<b>2<sup>nd</sup> week</b>	Sequences	
	<b>3<sup>rd</sup> week</b>	Series	
	<b>4<sup>th</sup> week</b>	Sequential criterion for limits	
	<b>5<sup>th</sup> week</b>	Sequential criterion for continuity	
	<b>6<sup>th</sup> week</b>	Continuity on intervals	
	<b>7<sup>th</sup> week</b>	Intermediate value theorem	
	<b>8<sup>th</sup> week</b>	Applications of Intermediate value theorem	
	<b>9<sup>th</sup> week</b>	Uniform continuity	
	<b>10<sup>th</sup> week</b>	Uniform continuity	
	<b>11<sup>th</sup> week</b>	Riemann integration	
	<b>12<sup>th</sup> week</b>	criterion for integrability	
	<b>13<sup>th</sup> week</b>	Examples of Riemann integration	
	<b>14<sup>th</sup> week</b>	Integrability of continuous functions	
	<b>15<sup>th</sup> week</b>	Integrability of monotone functions	