

**School Name: School of Computing Science and Engineering**

**Program Name: M.Tech.**

**Scheme: 2018-2020**

**1<sup>st</sup> Semester**

Subject Code	Name of the Course	Teaching Scheme			Credits	
		L	T	P		
<b>Theory</b>						
1	MATH5001	Advanced Numerical and Statistical Methods	3	1	0	4
2	MCSE1110	Advanced Design and Analysis of Algorithms	3	0	0	3
3	MCSE1120	Advanced Computer Networks	3	0	0	3
4	MCSE1130	Advanced Operating Systems	3	0	0	3
5	MCSE1140	Big Data Technologies	3	0	0	3
<b>Practical</b>						
1	CENG5001	Professional Communication Skills	0	0	2	1
2	MCSE1111	Advanced Design and Analysis of Algorithms Lab	0	0	2	1
3	MCSE1121	Advanced Computer Networks Lab	0	0	2	1
4	MCSE1141	Big Data Technologies Lab	0	0	2	1
<b>Total:</b>			<b>15</b>	<b>1</b>	<b>8</b>	<b>20</b>

**2<sup>nd</sup> Semester**

Subject Code	Name of the Course	Teaching Scheme			Credits	
		L	T	P		
<b>Theory</b>						
1	MCSE1210	Network Security	3	0	0	3
2	MCSE1220	Advanced Computer Graphics	3	0	0	3
3	MCSE1230	Cloud Computing Technologies	3	0	0	3
4		Program Elective-1	3	0	0	3
5		Program Elective-2	3	0	0	3
<b>Practical</b>						
1	MCSE1211	Network Security Lab	0	0	2	1
2	MCSE1221	Advanced Computer Graphics Lab	0	0	2	1
<b>Total:</b>			<b>15</b>	<b>0</b>	<b>4</b>	<b>17</b>

**3<sup>rd</sup> Semester**

Subject Code	Name of the Course	Teaching Scheme			Credits	
		L	T	P		
<b>Theory</b>						
1	MCSE2310	Software Requirements Engineering	3	0	0	3

2		Program Elective-3	3	0	0	3
3		Program Elective-4	3	0	0	3
<b>Practical</b>						
1	SLMT5001	Quantitative and Communication Proficiency	0	0	4	2
2	MCSE2311	Software Requirements Engineering Lab	0	0	2	1
3	MCSE2381	M. Tech Dissertation Part-1	0	0	10	5
<b>Total:</b>			<b>9</b>	<b>0</b>	<b>16</b>	<b>17</b>

<b>4<sup>th</sup> Semester</b>						
Subject Code	Name of the Course	Teaching Scheme			Credits	
		L	T	P		
<b>Project</b>						
1	MCSE2481	M. Tech Dissertation-Final	0	0	30	15
<b>Total:</b>			<b>0</b>	<b>0</b>	<b>30</b>	<b>15</b>

<b>Program Elective</b>						
Program Elective-1	Subject Code	Name of the Course	L	T	P	C
1	MCSE9110	IoT Technology and Applications	3	0	0	3
2	MCSE9120	IoT on Cloud	3	0	0	3
3	MCSE9130	Big Data Mining and Analytics	3	0	0	3
4	MCSE9140	Data Science and Big Data Analytics	3	0	0	3
Program Elective-2	Subject Code	Name of the Course	L	T	P	C
1	MCSE9210	Real Time Systems	3	0	0	3
2	MCSE9220	Mobile and Pervasive Computing	3	0	0	3
3	MCSE9230	Parallel Programming Paradigms	3	0	0	3
4	MCSE9240	Information Retrieval Techniques	3	0	0	3
Program Elective-3	Subject Code	Name of the Course	L	T	P	C
1	MCSE9310	Formal models of software systems	3	0	0	3
2	MCSE9320	Embedded Software Development	3	0	0	3
	MCSE9330	Social Network Analysis	3	0	0	3
3	MCSE9340	Bio-inspired Computing	3	0	0	3
Program Elective-4	Subject Code	Name of the Course	L	T	P	C
1	MCSE9410	Data Visualization Techniques	3	0	0	3
2	MCSE9420	Reconfigurable Computing	3	0	0	3
3	MCSE9430	Mobile Application Development	3	0	0	3
4	MCSE9440	Information Storage Management	3	0	0	3