

MSME 2022 Batch					
SEM	Course Code	CourseName	Credits	Basket	Sem-total
1	MS10210	Introduction to Materials Science and Engineering	2	DC	15
	LA10760	Communication Skills	2	LA/CA	
	IDP10063	Introduction to Programming	3	BE	
	CY10010	Environmental Chemistry	2	BS	
	EP11010	Modern Physics	2	BS	
	EP11030	Maths for Physics	2	BS	
	MA10010	Calculus-I	1	BS	
	MA10020	Calculus-II	1	BS	
2	MS10220	Structure of Materials	2	DC	15
	MS10230	Physics of Solids – I	3	BE	
	CY10031	Chemistry Laboratory	2	BS	
	EP12011	Physics Lab	2	BS	
	MA10060	Elementary Linear Algebra	1	BS	
	MA10070	Differential Equations	1	BS	
	ID10050	Artificial Intelligence	1	BE	
	ID10054	Digital Fabrication	2	BE	
	LAXxxx	LA elective	1	LA/CA	
3	MS20213	X-Ray Diffraction in Materials Science	3	DC	18
	MS20211	Metallography Laboratory	1	DC	
	MS20220	Fundamentals of Physical Metallurgy	3	DC	
	MS20230	Physics of Solids – II	3	DC	
	MS20240	Thermodynamics of Materials	3	DC	
	ID10041	Engineering Drawing	2	BE	
	ME20110	Mechanics of Solids	3	BE	
4	MS20250	Imaging in Materials Science	3	DC	18
	MS20260	Materials Synthesis	3	DC	
	MS20270	Mechanical Behaviour of Materials	3	DC	
	MS20280	Transport Phenomena in Materials Processing	2	DC	
	MS20290	Diffusion in Solids	3	DC	
	MS20300	Computational Methods in Materials Science	3	DC	
	BT10010	Introduction to Life Sciences	1	BS	
5	MS3051	Functional Materials Lab	1	DC	19
	MS3061	Mechanical Behaviour Lab	1	DC	
	MS3840	Bio and Soft Materials	3	DC	
	MS2330	Fundamentals of Extractive Metallurgy	2	DC	
	MS2120	Ironmaking	1	DC	
	MS3363	Powder Metallurgy Processing	1	DC	
	MS3410	Electrochemical Processing of Materials	2	DC	
	MS3150	Corrosion	1	DC	
	MS3890	Properties of Materials	2	DC	
	LAXXXX	LA Elective	2	LA/CA	
FExxxx	Free Elective	3	FE		
6	MS2130	Steelmaking	2	DC	17
	MS2140	Thermomechanical Processing	2	DC	
	MS3960	Spectroscopy	1	DC	
	MS3081	Diffraction and Spectroscopy Lab	1	DC	
	MS3315/MS3305	Internship/Project/Dept. Elective	6	DE	
	LAXxxx	LA Elective	2	LA/CA	
	FExxxxx	Free Elective	3	FE	
7	MS4410	Casting and Welding	3	DC	14
	MS4061	Functional Device Lab	1	DC	
	MSXXXX	Departmental Elective	3	DE	
	MS4071	Thermomechanical Processing and Heat Treatment Lab	1	DC	
	CC1010	Introduction to Climate Change	1	BE	
	FEXXXX	Free Elective	2	FE	
	LAXxxx	LA Elective	3	LA/CA	
8	MS2850	Phase Transformations	2	DC	12
	MSxxxx	Departmental Elective	3	DE	
	FEXXXX	Free Elective	6	FE	
	ID4000	Ethics and Values	1	LA/CA	
				Total	128