Solapur University, Solapur
School of Computational Sciences
M.Sc. Statistics Choice Based Credit System (CBCS)
Course Structure

M.Sc. Part-I (STATISTICS) w.e.f. June 2018-19

M.Sc. STATISTICS SEMESTER-I								
Paper Code	**Title of the Paper**	**Semester Examination**			**L**	**T**	**P**	**Credits**
		Theory	**IA**	**Total**				
	Hard Core Theory							
HCT 1.1	Real Analysis	70	30	100	4	--	--	4
HCT 1.2	Linear Algebra	70	30	100	4	--	--	4
HCT 1.3	Distribution Theory	70	30	100	4	--	--	4
HCT 1.4	Estimation Theory	70	30	100	4	--	--	4
	Soft Core-Theory (Any one)							
SCT 1.1	Statistical Computing	70	30	100	4	--	--	4
SCT 1.2	Demography							
	Practical							
HCP1.1	Practical based on HCT 1.2, 1.4	35	15	50	--	--	4	2
HCP1.2	Practical based on HCT 1.3 and SCT	35	15	50	--	--	4	2
	Tutorial	---	25	25	--	1	--	1
Total for Semester-I		**420**	**205**	**625**	**--**	**--**	**--**	**25**
M.Sc. STATISTICS SEMESTER-II								
Code	**Title of the Paper**	**Semester Examination**			**L**	**T**	**P**	**Credits**
		Theory	**IA**	**Total**				
	Hard Core Theory							
HCT 2.1	Probability Theory	70	30	100	4	--	--	4
HCT 2.2	Stochastic Processes	70	30	100	4	--	--	4
HCT 2.3	Theory of Testing of Hypotheses	70	30	100	4	--	--	4
***HCT/ P 2.4**	Communicate in English Confidently	55	20	75	3	-	1	3
	Soft Core Theory (Any One)							
SCT 2.1	Sampling Theory	70	30	100	4	--	--	4
SCT 2.2	Actuarial Statistics							
	Open Elective Theory (Any one)							
OET 2.1	Statistical Methods	70	30	100	4	--	--	4
OET 2.2	Mathematical Statistics							
	Practical (Hard and Soft core)							
HCP 2.1	Practical based on HCT and SCT	35	15	50	--	--	4	2
	Practical (Open Elective) Any One							
OEP 2.1	Practical based on OEP 2.1	35	15	50	--	--	4	2
OEP 2.2	Practical based on OEP 2.2							
	Tutorial	---	25	25	--	1	--	1
Total for Semester-II		**420**	**205**	**625**	**--**	**--**	**--**	**25**

M.Sc. STATISTICS SEMESTER-III								
Paper Code	Title of the Paper	Semester Examination			L	T	P	Credits
		Theory	IA	Total				
	Hard Core Theory							
HCT 3.1	Asymptotic Inference	70	30	100	4	--	--	4
HCT 3.2	Multivariate Analysis	70	30	100	4	--	--	4
HCT 3.3	Planning and Analysis of Industrial Experiments	70	30	100	4	--	--	4
***HCT/ P 3.4**	Technical English Communication Skills	55	20	75	3	-	1	3
	Soft Core Theory (Any one)							
SCT 3.1	Regression Analysis	70	30	100	4	--	--	4
SCT 3.2	Official Statistics							
	Open Elective Theory (Any One)							
OET 3.1	Applied Statistics	70	30	100	4	--	--	4
OET 3.2	Modeling and Simulation							
	Practical (Hard and Soft core)							
HCP 3.1	Practical based on HCT and SCT	35	15	50	--	--	4	2
	Practical (Open Elective) Any One							
OEP 3.1	Practical based on OEP 2.1	35	15	50	--	--	4	2
OEP 3.2	Practical based on OEP 2.2							
	Tutorial	---	25	25	--	1	--	1
Total for Semester-III		**420**	**205**	**625**	--	--	--	**25**

M.Sc. STATISTICS SEMESTER-IV								
Code	Title of the Paper	Semester Examination			L	T	P	Credits
		Theory	IA	Total				
	Hard Core Theory							
HCT 4.1	Discrete Data Analysis	70	30	100	4	--	--	4
HCT 4.2	Industrial Statistics	70	30	100	4	--	--	4
HCT 4.3	Reliability and Survival Analysis	70	30	100	4	--	--	4
HCT 4.4	Optimization Techniques	70	30	100	4	--	--	4
	Soft Core Theory (Any one)							
SCT 4.1	Time Series Analysis	70	30	100	4	--	--	4
SCT 4.2	Clinical Trials							
SCT 4.3	Data Mining							
	Practical and Project							
HCP 4.1	Practical based on HCT and SCT	35	15	50	--	--	4	2
HCP 4.2	Project	35	15	50	--	--	4	2
	Tutorial	---	25	25	--	1	--	1
Total for Semester-IV		**420**	**205**	**625**	--	--	--	**25**
Total				**2500**	--	--	--	**100**

L: Lecture **T**: Tutorial, **P**: Practical **IA**: Internal Assessment HCT: Hard Core Theory SCT: Soft Core Theory HCP: Hard Core Practical OET: Open Elective Theory OEP: Open Elective Practical

HCT/P = Hard Core Theory / Project

*HCT/P is mandatory for every student who seeks M.Sc. degree and has to earn 3 credits each in Sem.-II & Sem.-III. In order to pass in the above course, the students should secure at least 27 marks for theory and 10 marks for internal assessment. However these credits will not accumulated for CGPA, in case student fails in these courses he will be declared as fail.