Curriculum

❑ Undergraduate Course

Classification	Subject No.	Subject Name	Lecture: Lab.: Credit (Assignment)	Semester	Remark
Mandatory Major Course	BS200	Biochemistry Experiment	0:9:3(2)	Fall	
	BS202	Cell Biology	3:0:3(4)	Fall	
	BS205	Biochemistry I	3:0:3(3)	Spring	
	BS208	Biochemistry II	3:0:3(3)	Fall	
	BS209	Molecular Biology	3:0:3(4)	Spring	
	BS305	Physical Chemistry for Life Science	3:0:3(0)	Spring	
Elective Major Course	BS223	Introductory Biotechnology	3:0:3(0)	Spring	
	BS232	Microbiology	3:0:3(1)	Fall	
	BS312	Evolution and Ecology	3:0:3(0)	Fall	
	BS315	Genetics	3:0:3(3)	Spring	
	BS318	Developmental Biology	3:0:3(0)	Fall	
	BS319	Laboratory in Cell Biology & Genetics	0:9:3(4)	Spring	
	BS322	Biological Engineering	3:0:3(3)	Fall	
	BS325	Microbial and Cell Biotechnology	3:0:3(2)	Spring	
	BS326	Biotechnology Experiment	0:9:3(2)	Fall	
	BS332	Microbial Chemistry	3:0:3(2)	Fall	
	BS342	Enzymology	3:0:3(1)	Fall	
	BS351	Physiology	3:0:3(2)	Spring	
	BS355	Pharmacology	3:0:3(1)	Spring	
	BS357	Introduction to Neuroscience	3:0:3	Fall	
	BS358	Plant Biology	3:0:3	Spring	
	BS365	Environmental Microbiology	3:0:3(1)	Fall	
	BS371	Animal Cell Culture and Engineering	3:0:3	Spring	
	BS431	Virology	3:0:3(3)	Spring	**
	BS433	Molecular Biology of Gene Regulation	3:0:3(3)	Spring	**
	BS452	Immunology	3:0:3(0)	Spring	**
	BS462	Environmental Biotechnology	3:0:3(1)	Fall	**
	BS463	Genetic Engineering	3:0:3(3)	Spring	**
	BS465	NanoBioTechnology	3:0:3	Fall	**
	BS480	Selected Topics	3:0:3(0)		**
Research	BS490	B.S. Thesis Research	0:6:3		Required
	BS495	Specified Research	0:6:1		Required
	BS496	Seminar	1:0:1		Elective

※ ** designates courses for both undergraduate and graduate programs.

❏ Graduate Course

Classification	Subject No.	Subject Name	Lecture:Lab.:Credit (Assignment)	Semester	Remark
Elective Major Course	BS512	Biostatistics	3:0:3(4)	Fall	**
	BS516	Advanced Genetics	3:0:3(0)	Spring	**
	BS518	Chemical Genomics&Medicinal Systems Biology	3:0:3(1)	Fall	**
	BS524	Advanced Molecular Biology	3:0:3(3)	Fall	**
	BS525	Gene Expression	3:0:3(3)	Spring	**
	BS526	Molecular Virology	3:0:3(3)	Fall	**
	BS528	Epigenetics	3:0:3	Fall	**
	BS531	Advanced Microbiology	3:0:3(2)	Spring	**
	BS532	Applied and Environmental Microbiology	3:0:3(1)	Spring	**
	BS536	Environmental Toxicology	3:0:3(2)	Fall	**
	BS538	Microbial Genomics	3:0:3(4)	Fall	**
	BS541	Advanced Cell Biology	3:0:3(0)	Spring	**
	BS543	Advanced Neurobiology	3:0:3(1)	Fall	**
	BS545	Stem Cell Biology	3:0:3	Spring	**
	BS547	Neural Development	3:0:3	Spring	**
	BS552	Advanced Fermentation Technology	3:0:3(2)	Fall	**
	BS554	Advanced Biological Engineering	3:0:3(3)	Fall	**
	BS562	Protein Design	3:0:3(0)	Fall	**
	BS582	Food Engineering I	3:0:3(2)	Fall	**
	BS583	Structural Biology	3:0:3(1)	Spring	**
	BS584	Novel Drug Delivery Systems	3:0:3(3)	Fall	**
	BS586	Plant Developmental Biology	3:0:3(0)	Fall	**
	BS611	Advanced Molecular Cell Biology I	3:0:3(3)	Spring	
	BS612	Advanced Molecular Cell Biology II	3:0:3(3)	Fall	
	BS620	Physical Biochemistry	3:0:3(0)	Spring	
	BS622	Enzyme Chemistry	3:0:3(0)	Fall	
	BS624	Protein Chemistry and Engineering	3:0:3(0)	Fall	
	BS626	Nucleic Acid Biochemistry	3:0:3(3)	Fall	
	BS628	Biological Membranes	3:0:3(0)	Fall	
	BS631	Microbial Genetics	3:0:3(2)	Spring	
	BS633	Microbial Physiology	3:0:3(2)	Spring	

※ ** designates courses for both undergraduate and graduate programs.

Classification	Subject No.	Subject Name	Lecture:Lab.:Credit (Assignment)	Semester	Remark
Elective Major Course	BS642	Behavioral Genetics	3:0:3	Spring	
	BS662	Bioseparation Technology	3:0:3(0)	Fall	
	BS664	Numerical Methods for Biochemical Engineering	3:0:3(0)	Fall	
	BS671	Advanced Animal Cell Engineering	3:0:3(2)	Spring	
	BS685	Advanced Developmental Biology	3:0:3(6)	Fall	
	BS710	Selected Topics in Life Science	3:0:3(0)	Fall	
	BS711	Bioinformatics	3:0:3(3)	Fall	
	BS713	Human Genomics	3:0:3(2)	Spring	
	BS720	Selected Topics in Biochemistry	3:0:3(0)		
	BS722	Biochemistry of Carcinogenesis	3:0:3(3)	Fall	
	BS730	Selected Topics in Microbiology	3:0:3(0)		
	BS740	Selected Topics in Cell Biology	3:0:3(0)		
	BS742	Molecular Cell Biology	3:0:3(2)	Fall	
	BS750	Selected Topics in Biotechnology	3:0:3(0)		
	BS760	Selected Topics in Environmental Biotechnology	3:0:3(0)	Spring	
	BS781	Special Topics in Food Science & Technology	3:0:3(0)	Spring	
	BS782	Cell Signal Transduction	3:0:3(6)	Fall	
	BS791	Scientific Writing in English	3:0:3(4)	Spring	
Research	BS960	M.S. Thesis Research			
	BS965	Independent Study in M.S.			
	BS966	M.S. Seminar	1:0:1	Spring · Fall	
	BS980	Ph.D. Thesis Research			
	BS986	Ph.D. Seminar	1:0:1	Spring · Fall	
	BS990	Graduate Student Seminar	1:0:1	Spring · Fall	