AFYON KOCATEPE UNIVERSITY
INSTITUTES OF NATURAL AND APPLIED SCIENCES
DEPARTMENT OF MOLECULAR BIOLOGY AND GENETICS

DOCTOR OF PHILOSOPHY (PhD) PROGRAM

FIRST YEAR

FIRST SEMESTER							
COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6501	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6601	THESIS PREPARATION	C	0	1	1	0	1
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
T O P L A M			20	1	21	12	30

SECOND SEMESTER							
COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6502	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6602	THESIS PREPARATION	C	0	1	1	0	1
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
T O T A L			20	1	21	12	30

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SECOND YEAR

THIRD SEMESTER							
COURSE CODE	**COURSE NAME**	**C/E**	**COURSE CREDIT***				
			TH	**AP**	**TO**	**CR**	**EC**
MBG-6503	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6603	THESIS PREPARATION	C	0	1	1	0	1
MBG-6701	SEMINAR	C	0	2	2	0	5
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
	ELECTIVE COURSE	E	3	0	3	3	5
T O T A L			**17**	**3**	**20**	**9**	**30**

FOURTH SEMESTER							
COURSE CODE	**COURSE NAME**	**C/E**	**COURSE CREDIT***				
			TH	**AP**	**TO**	**CR**	**EC**
MBG-6504	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6604	THESIS	C	0	1	1	0	21
T O T A L			**8**	**1**	**9**	**0**	**30**

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THIRD YEAR

COURSE CODE	FIFTH SEMESTER						
COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6505	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6605	THESIS	C	0	1	1	0	21
T O T A L			**8**	**1**	**9**	**0**	**30**

COURSE CODE	SIXTH SEMESTER						
COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6506	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6606	THESIS	C	0	1	1	0	21
T O T A L			**8**	**1**	**9**	**0**	**30**

FOURTH YEAR

COURSE CODE	SEVENTH SEMESTER						
COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6507	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6607	THESIS	C	0	1	1	0	21
T O T A L			**8**	**1**	**9**	**0**	**30**

COURSE CODE	EIGHTH SEMESTER						
COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6508	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6608	THESIS	C	0	1	1	0	21
T O T A L			**8**	**1**	**9**	**0**	**30**

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FIFTH YEAR

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
	NINTH SEMESTER						
			TH	AP	TO	CR	EC
MBG-6509	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6609	THESIS	C	0	1	1	0	21
T O T A L			8	1	9	0	30

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
	TENTH SEMESTER						
			TH	AP	TO	CR	EC
MBG-6510	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6610	THESIS	C	0	1	1	0	21
T O T A L			8	1	9	0	30

SIXTH YEAR

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
	ELEVENTH SEMESTER						
			TH	AP	TO	CR	EC
MBG-6511	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6611	THESIS	C	0	1	1	0	21
T O T A L			8	1	9	0	30

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
	TWELFTH SEMESTER						
			TH	AP	TO	CR	EC
MBG-6512	DIRECTED FIELD STUDIES	C	8	0	8	0	9
MBG-6612	THESIS	C	0	1	1	0	21
T O T A L			8	1	9	0	30

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GRADUATE PROGRAMS

ELECTIVE COURSES

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
FBE-5001	SCIENTIFIC RESEARCH AND METHODS	E	3	0	3	3	5
MBG-5001	HERPETOLOGY	E	3	0	3	3	5
MBG-5002	WATER POLLUTIONS AND ITS CONTROLS	E	3	0	3	3	5
MBG-5003	BIOLOGICAL PHOTOGRAPY AND DRAWING TECHNIQUES	E	3	0	3	3	5
MBG-5004	RESEARCH AND WRITING UP TECHNIQUES IN BIOLOGICAL SCIENCES	E	3	0	3	3	5
MBG-5005	STATISTICS FOR BIOLOGICAL SCİENCE	E	3	0	3	3	5
MBG-5006	ENZYMES AND HORMONES	E	3	0	3	3	5
MBG-5007	CELLULAR SIGNALING MECHANISMS	E	3	0	3	3	5
MBG-5008	THE CONTROL OF CELL DIVISION	E	3	0	3	3	5
MBG-5009	USEFUL PLANTS	E	3	0	3	3	5
MBG-5010	HERBARIUM TECHNIQUES	E	3	0	3	3	5
MBG-5011	PLANT TAXONOMY APPLICATIONS I	E	3	0	3	3	5
MBG-5012	PLANT TAXONOMY APPLICATIONS II	E	3	0	3	3	5
MBG-5013	ETHNOBOTANY	E	3	0	3	3	5
MBG-5014	MICROBIAL BIOTECHNOLOGY	E	3	0	3	3	5
MBG-5015	METABOLISM OF PLANT CELL	E	3	0	3	3	5
MBG-5016	PLANT GROWTH REGULATORS	E	3	0	3	3	5
MBG-5017	PLANT BREEDING TECHNIQUES AND APPLICATIONS	E	3	0	3	3	5
MBG-5018	INDUSTRIAL MICROBIOLOGY	E	3	0	3	3	5
MBG-5019	STERİZLİZATİON AND DISINFECTION	E	3	0	3	3	5
MBE-5020	DIAGNOSIS AND METHODS USED IN MICROBIOLOGY	E	3	0	3	3	5
MBG-5021	PRINCIPLES OF TAXONOMIC ZOOLOGY	E	3	0	3	3	5
MBG-5022	LIMNOLOGY	E	3	0	3	3	5
MBG-5023	ACAROLOGY	E	3	0	3	3	5
MBG-5024	INVERTEBRATE ONTOGENESIS	E	3	0	3	3	5
MBG-5025	ICHTHYOLOGY	E	3	0	3	3	5
MBG-5026	SPECIAL PARASİTOLOGY	E	3	0	3	3	5
MBG-5027	HELMINTHOLOGY	E	3	0	3	3	5
MBG-5028	ZOOLOGICAL PREPARATION TECHNIQUES	E	3	0	3	3	5

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GRADUATE PROGRAMS

ELECTIVE COURSES

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-5029	DNA MUTAGENESIS, AND DNA REPAIR MECHANISM	E	3	0	3	3	5
MBG-5030	CELL CULTURE TECHNIQUES	E	3	0	3	3	5
MBG-5031	DNA FINGERPRINTING	E	3	0	3	3	5
MBG-5032	THE RELATIONSHIP BETWEEN VEGETATION SOIL	E	3	0	3	3	5
MBG-5033	SPECIAL TYPES OF VEGETATION	E	3	0	3	3	5
MBG-5034	POLLEN MORPHOLOGY	E	3	0	3	3	5
MBG-5035	COMPARATIVE ANATOMY OF PLANTS	E	3	0	3	3	5
MBG-5036	THE PREPARATION TECHNIQUES IN SYSTEMATIC BOTANY	E	3	0	3	3	5
MBG-5037	PLANT CHEMISTRY	E	3	0	3	3	5
MBG-5038	GERMINATION PHYSIOLOGY	E	3	0	3	3	5
MBG-5039	GENETIC ENGINEERING APPLICATIONS	E	3	0	3	3	5
MBG-5040	ADVANCED PLANT ECOLOGY	E	3	0	3	3	5
MBG-5041	ADVANCED BIOLOGY OF FOOD	E	3	0	3	3	5
MBG-5042	ADVANCED PALINOLOGY	E	3	0	3	3	5
MBG-5043	COMPUTER APPLIED BIOSTATISTICS	E	3	0	3	3	5
MBG-5044	MOLECULAR ECOLOGY AND TRACKING TECHNIQUES	E	3	0	3	3	5
MBG-5045	ECOPATHOLOGY	E	3	0	3	3	5
MBG-5046	PLANT MOLECULAR BIOLOGY	E	3	0	3	3	5
MBG-5047	IN ZOOLOGY MOLECULAR APPLICATIONS	E	3	0	3	3	5
MBG-5048	EFFECT OF PLANT HORMONES AND MOLECULAR MECHANISMS	E	3	0	3	3	5
MBG-5049	SECONDARY METABOLITES	E	3	0	3	3	5
MBG-5050	PROTEINS AND ENZYMES	E	3	0	3	3	5
MBG-5051	BIOLOGY AND ECOLOGY OF RIVERS	E	3	0	3	3	5
MBG-5052	ECOLOGY OF INSECTS	E	3	0	3	3	5
MBG-6001	MOLECULAR BASIS OF CANCER	E	3	0	3	3	5
MBG-6002	PHARMACOGENOMICS AND GENOTOXICITY	E	3	0	3	3	5
MBG-6003	PCR-BASED GENETIC ANALYSIS AND GENETIC ANALAYSIS METHODS	E	3	0	3	3	5
MBG-6004	TECHNOLOGY FOR PLANT PROTECTION	E	3	0	3	3	5

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GRADUATE PROGRAMS

ELECTIVE COURSES

COURSE CODE	COURSE NAME	C/E	COURSE CREDIT*				
			TH	AP	TO	CR	EC
MBG-6005	TAXONOMICALTERMINOLOGY IN BOTANY	E	3	0	3	3	5
MBG-6006	ADVANCED ENVIRONMENTAL BIOLOGY	E	3	0	3	3	5
MBG-6007	PLANT MOLECULAR SYSTEMATIC	E	3	0	3	3	5
MBG-6008	PLANT GENOMICS AND PROTEOMICS	E	3	0	3	3	5
MBG-6009	PLANT GROWTH REGULATORS AND MOLECULAR MECHANISMS	E	3	0	3	3	5
MBG-6010	PLANT CHEMISTRY AND MOLECULAR BIOLOGY	E	3	0	3	3	5
MBG-6011	MOLECULAR BASIS OF STRESS PHYSIOLOGY OF PLANTS	E	3	0	3	3	5
MBG-6012	AQUATIC ENTOMOLOGY	E	3	0	3	3	5
MBG-6013	COMPUTER APPLIED STATISTIC	E	3	0	3	3	5
MBG-6014	MICROBIAL ECOLOGY	E	3	0	3	3	5
MBG-6015	SYSTEMATIC ZOOLOGY	E	3	0	3	3	5
MBG-6016	BIOCLIMATOLOGY AND METHODS	E	3	0	3	3	5
MBG-6017	PLANT DIVERSITY IN AQUATIC AREAS	E	3	0	3	3	5
MBG-6018	GROWTH AND DEVELOPMENT PHYSIOLOGY	E	3	0	3	3	5
MBG-6019	RECOMBİNANT DNA TECHNOLOGY	E	3	0	3	3	5
MBG-6020	METHODS ON GENETIC TOXICOLOGY	E	3	0	3	3	5
MBG-6021	PLANT SECONDER METHOBOLİTES	E	3	0	3	3	5
MBG-6022	PROCARYOTIC GENE EXPRESSION	E	3	0	3	3	5
MBG-6023	BIOMATHERİALS	E	3	0	3	3	5
MBG-6024	MICROBIAL SYSTEMATICS	E	3	0	3	3	5
MBG-6025	BIOCHEMISTRY OF FREE RADICALS	E	3	0	3	3	5
MBG-6026	BIOCHEMISTRY OF CARCINOGEN AND MUTAGENS	E	3	0	3	3	5
MBG-6027	ADVANCED MOLECULAR BIOLOGY	E	3	0	3	3	5
MBG-6028	SPECIAL SUBJECTS IN ECOLOGY	E	3	0	3	3	5
MBG-6029	BIOAVAILABILITY OF NATURAL PLANTS	E	3	0	3	3	5
MBG-6030	COMPUTER APPLIED BIOINFORMATICS	E	3	0	3	3	5
MBG-6031	WILDLIFE DISEASE MOLECULAR DIAGNOSIS	E	3	0	3	3	5
MBG-6032	EPIDEMILOGY	E	3	0	3	3	5

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			TH	AP	TO	CR	EC
MBG-6033	PLANT GROWTH	E	3	0	3	3	5
MBG-6034	CURRENT TOPICS IN MOLECULAR BIOLOGY	E	3	0	3	3	5
MBG-6035	MOLECULAR TAXONOMY METHODS IN ZOOLOGY	E	3	0	3	3	5
MBG-6036	POLYAMINES AND CANCER	E	3	0	3	3	5
MBG-6037	CELL CYCLE AND APOPTOSİS	E	3	0	3	3	5
MBG-6038	DNA MARKERS AND PLANT BREEDING	E	3	0	3	3	5
MBG-6039	PLANT SIGNAL TRANSDUCTION AN GENE REGULATION	E	3	0	3	3	5
MBG-6040	MOLECULAR GENETICS OF PLANT DEVELOPMENT	E	3	0	3	3	5
EGT-6001	DEVELOPMENT AND LEARNING	E	3	0	3	3	5
EGT-6002	INSTRUCTIONAL PLANNING AND EVALUATION	E	3	0	3	3	5

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