AYDIN ADNAN MENDERES UNIVERSITY
COURSE INFORMATION FORM

Course Title	Vaccine Production Techniques and Practices								
Course Code	MİK557		Couse Level	Second Cycle (Master's Degree)					
ECTS Credit	4	Workload	100 *(Hours)*	Theory	2	Practice	0	Laboratory	0
Objectives of the Course	The objective of this course is to give information about vaccine production techniques and practices.								
Course Content	Production techniques and practical fields of attenuated and inactivated bacterial-viral vaccines for protection of infectious diseases.								
Work Placement	N/A								
Planned Learning Activities and Teaching Methods	Explanation (Presentation), Demonstration, Discussion, Case Study								
Name of Lecturer(s)									

Assessment Methods and Criteria		
Method	Quantity	Percentage (%)
Midterm Examination	1	20
Final Examination	1	40
Quiz	2	20
Assignment	2	20

Recommended or Required Reading	
1	Koneman's Color Atlas and Textbook of Diagnostic Microbiology
2	Bergey's manual of systematic bacteriology
3	Veteriner Bakteriyoloji

Week	Weekly Detailed Course Contents	
1	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
2	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
3	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
4	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
5	Theoretical	Production techniques and practical fields of live and inactive bacterial vaccines
6	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
7	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
8	Intermediate Exam	Midterm Examination
9	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
10	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
11	Theoretical	Production techniques and practical fields of live and inactive bacterial vaccines
12	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
13	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
14	Theoretical	Production techniques and practical fields of attenuated and inactivated bacterial vaccines
15	Theoretical	Discussion

Workload Calculation				
Activity	Quantity	Preparation	Duration	Total Workload
Lecture - Theory	14	0	2	28
Assignment	2	5	1	12
Laboratory	14	0	2	28
Quiz	2	5	1	12
Midterm Examination	1	8	2	10

Final Examination	1	8	2	10
			Total Workload (Hours)	100
			[Total Workload (Hours) / 25*] = **ECTS**	4
**25 hour workload is accepted as 1 ECTS*				

Learning Outcomes	
1	1. To be able to use vaccine production techniques and practices
2	2. To be able to perform vaccine applications
3	3. To be able to use the necessary information
4	To have knowledge about live vaccine production.
5	To have knowledge about the production of inactive vaccine.

Programme Outcomes *(Microbiology (Veterinary Medicine) Master's Without Thesis)*	
1	Department has the ability to identify and apply information about bacteriology, virology, mycology and has the ability to recognize diseases about veterinary medicine
2	Department has the ability to take the advantage of technology and has the ability to diagnose, treat and prevent the diseases by using appropriate equipments
3	Department has the ability to analyze the epidemiological compounds of an animal population and has the ability to get precautions.
4	Department has the ability to test or analyze the diseases and has the ability to evaluate the results.
5	Department has the ability to perform, produce and conclude projects for scientific researches.

Contribution of Learning Outcomes to Programme Outcomes *1:Very Low, 2:Low, 3:Medium, 4:High, 5:Very High*

	L1	L2	L3	L4	L5
P1	5	4	4	4	5
P2	5	4	4	4	5
P3	4	5	5	4	4
P4	5	4	4	5	5
P5	3	3	5	3	4