AYDIN ADNAN MENDERES UNIVERSITY
COURSE INFORMATION FORM

Course Title	Dairy Science								
Course Code	VBH606		Couse Level	Third Cycle (Doctorate Degree)					
ECTS Credit	7	Workload	175 *(Hours)*	Theory	2	Practice	2	Laboratory	0
Objectives of the Course	Learn to composition and nutritive value of milk, milk formation, The components of milk, infections passed to humans from milk and public health protection measures, getting to healty of milk and storage, The importance of milk transportation to the processing plants								
Course Content	Definition and composition of milk, the place and importance of milk in nutrition, the factors affecting the amount and composition of milk, the effects of technological applications on milk.								
Work Placement	N/A								
Planned Learning Activities and Teaching Methods	Explanation (Presentation), Experiment, Demonstration, Discussion, Individual Study, Problem Solving								
Name of Lecturer(s)									

Assessment Methods and Criteria		
Method	Quantity	Percentage (%)
Midterm Examination	1	40
Final Examination	1	60

Recommended or Required Reading	
1	İnal, T. Süt ve Süt Ürünleri Hijyen ve Teknolojisi
2	Üçüncü, M. Süt bilimi
3	Tekinşen, C. Süt ve Süt Teknolojisi

Week	Weekly Detailed Course Contents	
1	Theoretical	Description of milk, The place and importance of milk in the diet
	Practice	Determination of milk density
2	Theoretical	Formation of milk
	Practice	PH and acidity of milk
3	Theoretical	Milk characteristics, organoleptic and physical properties of milk
	Practice	Determination of milk fat
4	Theoretical	The composition of milk; protein, fat, carbohydrates of milk
	Practice	Determination of dry matter and ash content of milk
5	Theoretical	milk enzymes
	Practice	Enzyme activity tests
6	Theoretical	Milk vitamins
	Practice	To seek of preservative substance from milk
7	Theoretical	Mineral mineral substances of milk, organic acids, milk gases
	Practice	Determination of milk protein
8	Intermediate Exam	Midterm exam
9	Theoretical	Colostrum and other milk groups
	Practice	Determination of antibiotic presence in milk
10	Theoretical	Determination of factors affecting the amount and composition of milk
	Practice	General microorganism count in milk
11	Theoretical	abnormal milk
	Practice	Identification of yeasts and molds in milk
12	Theoretical	Microflora of milk and the origin of the microorganisms that make up the microflora, breast skin and the microflora of the breast
	Practice	Sütte koliform bakteri varlığının araştırılması
13	Theoretical	Technological applications applied to milk (homogenization, heat, cooling, irradiation and freezing) and their effects
	Practice	Counting micrococci and satafilococci in milk

14	Theoretical	Pasteurized and sterile milk technology
	Practice	Investigation of S. aureus in milk
15	Theoretical	Cleaning and disinfection and HACCP applications in dairy
	Practice	Investigation of pathogen bacteria in milk

Workload Calculation

Activity	Quantity	Preparation	Duration	Total Workload
Lecture - Theory	14	0	2	28
Lecture - Practice	14	0	2	28
Assignment	14	0	3	42
Reading	14	0	2	28
Midterm Examination	1	17	1	18
Final Examination	1	30	1	31
			Total Workload (Hours)	175
			[Total Workload (Hours) / 25*] = **ECTS**	7

**25 hour workload is accepted as 1 ECTS*

Learning Outcomes

1	To learn about nutritional value of milk and its components
2	To learn the mechanism of milk formation
3	To learn the conditions for healthy milk production
4	To have necessary knowledge about microbial flora of raw milk and milk quality
5	To learn and apply milk platform tests
6	Raw milk preservation and processing

Programme Outcomes *(Food Hygiene and Technology (Veterinary Medicine) Doctorate)*

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

	L1	L2	L3	L4	L5	L6
P1	5	5	5	5	5	5
P2	5	5	5	5		5
P3				4	5	5
P4			5	5	4	
P7	5	5				
P9	5	5	5	5	5	5
P10	5	5	5	5	5	5
P11				4	5	
P12				4	4	
P13			5	5	5	5