BEST AVAILABLE TECHNOLOGY IN TEXTILE FINISHING II

1	Course Title:	BEST AVAILABLE TECHNOLOGY IN TEXTILE FINISHING II	
2	Course Code:	TEK5016	
3	Type of Course:	Optional	
4	Level of Course:	Third Cycle	
5	Year of Study:	1	
6	Semester:	2	
7	ECTS Credits Allocated:	6.00	
8	Theoretical (hour/week):	3.00	
9	Practice (hour/week):	0.00	
10	Laboratory (hour/week):	0	
11	Prerequisites:	None	
12	Language:	Turkish	
13	Mode of Delivery:	Face to face	
14	Course Coordinator:	Prof. Dr. PERVİN ANİŞ	
15	Course Lecturers:		
16	Contact information of the Course Coordinator:	Bursa Uludağ Ünviersitesi, Mühendislik Fakültesi, Tekstil Mühendisliği Bölümü, Görükle Kampüs, Bursa, pervin@uludag.edu.tr /Bursa Uludağ University, Faculty of Engineering, Textile Engineering Department, Görükle Campus, Bursa, pervin@uludag.edu.tr	
17	Website:		
18	Objective of the Course:	Evaluating the environmental impact of textile finishing industry, Identification of pollutants parameters, To teach the students alternative printing and finishing processes in order to reduce the pollution.	
19	Contribution of the Course to Professional Development:	Examining the ecological effects of finishing processes and designing environmentally friendly processes	
20	Learning Outcomes:		
		1	Learn to production in order to reduce the pollution in waste water
		2	Learn to production in order to reduce the pollution in waste air
		3	Apply the minimizing of use of the energy consumption
		4	Apply the minimizing of use of the water consumption
		5	Apply the team working and oral presentation
		6	Learn to labels evaluating the production ecology of textiles
		7	
		8	
		9	
		10	
21	Course Content:		
	Course Content:		
Week	Theoretical		Practice

1	Best available technology in reactive printing, Minimizing of use of urea, Two step reactive printing	
2	Alternative printing techniques, Digital ink-jet printing	
3	Minimizing the mass of printing paste feeding system in rotation printing machines, Recovery of printing paste in the feeding system in rotation printing machines	
4	Formaldehyte-free recipes	
5	Avoiding softening via exhaust method	
6	Reduction of the emissions in antibacterial finishing	
7	Decolorasition and cod reduction of wastewater by ozonation, Mechanism of ozonation	
8	Recovery of pigment printing wastewater, Minimizing air emissions	
9	(Tegewa scheme),	
11	Substition of alchylphenoletoxilates	
12	Biodegredable chelating agents,	
13	performance effects of textiles textiles	
14	Labels evaluating the production ecology of	

Activites	Number	Duration (hour)	Total Work Load (hour)
Theoretical	14	3.00	42.00
Practicals/Labs	0	0.00	0.00
Self study and preperation	14	4.00	56.00
Homeworks	14	4.00	56.00
Projects	3	8.00	24.00
Field Studies	0	0.00	0.00
Midterm exams	0	0.00	0.00
Others	0	0.00	0.00
Final Exams	1	2.00	2.00
Total Work Load			180.00
Total work load/ 30 hr			6.00
ECTS Credit of the Course			6.00

22	Textbooks, References and/or Other Materials:	1.IIPC Tekstil Sanayi İçin En Uygun Teknikler (BAT) Referans Dökümanı ve İlgili yönetmelikler, Europen Integretad Pollution Prevention and Control Bureau Yayını. 2.The Textile Industry and The Environment, UNEP (United Nations Environment Programme) Yayını 3.Environmental assessment of Textiles, UNEP (United Nations Environment Programme) Yayını 4.UNEP Cleaner Production Industrial Sector Guide Textile Industry DTI (Danısh Tchnology Institute) Yayını 5.BAT for Textile Industry, UNEP (United Nations Environment Programme) Yayını.
23	Assesment	

TERM LEARNING ACTIVITIES	**NUMBER**	**WEIGHT**

Midterm Exam	0	0.00
Quiz	0	0.00
Home work-project	0	0.00
Final Exam	1	100.00
Total	1	100.00
Contribution of Term (Year) Learning Activities to Success Grade		0.00
Contribution of Final Exam to Success Grade		100.00
Total		100.00
Measurement and Evaluation Techniques Used in the Course		The homeworks of the students and the final exam are taken into consideration in the assessment.

24 ECTS / WORK LOAD TABLE

25 CONTRIBUTION OF LEARNING OUTCOMES TO PROGRAMME QUALIFICATIONS

	PQ1	PQ2	PQ3	PQ4	PQ5	PQ6	PQ7	PQ8	PQ9	PQ10	PQ11	PQ12	PQ13	PQ14	PQ15	PQ16
ÖK1	5	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
ÖK2	5	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
ÖK3	1	1	1	1	1	1	5	1	1	1	1	1	1	1	1	1
ÖK4	1	1	1	1	1	1	5	1	1	1	1	1	1	1	1	1
ÖK5	1	1	1	1	1	1	1	5	1	1	1	1	1	1	1	1
ÖK6	1	1	1	1	5	1	1	1	1	1	1	1	1	1	1	1

LO: Learning Objectives PQ: Program Qualifications

Contribution Level:	**1 very low**	**2 low**	**3 Medium**	**4 High**	**5 Very High**