No. 19

Course syllabus for Second cycle studies					
1.	**Course title**	Special Yarns			
2.	**Code**	CDE4E12			
3.	**Study Program**	Clothing Design and Engineering			
4.	**Study program organizer (unit, institute, department, division)**	Faculty of Technology and Metallurgy, Institute of Textile Engineering			
5.	**Degree (first, second, third cycle)**	First Cycle			
6.	**Academic year / semester**	2th year 4th semester	7.	**Number of ECTS**	5
8.	**Instructors**	Dr. Emilija Toshikj, Associate Professor			
9.	**Prerequisites for course enrollment**				
10.	**Objectives of the course syllabus (competences):** Familiarization with the structure, properties, and methods of production of various types of specialty yarns. Acquiring knowledge about the role of individual properties of specialty yarns in the production of surface textile materials. Competencies: Students are equipped to know special yarns depending on their structure, and to understand the properties of special yarns and the technological procedures for special yarns production. **Acquired skills (competences):** Students will acquire knowledge about the classification and production of special yarns, and the technological procedures for producing special yarns.				
11.	**Content of the course:** Quality of textile material in function of the basic properties fiber-yarn-textile surface. Classification of yarns based on their physical properties. Continuous (filament) yarns, production processes, types, properties, and applications. Textured yarns, texturing processes. Elastic yarns, types, properties, and applications. Bulky yarns, types, properties, and applications. Decorative (effect) yarns. Methods for achieving effects. Fancy twisted yarns, types, properties, and applications. Industrial yarns. Manufacturing processes, types, properties, and applications				
12.	**Study methods:** Method of oral presentation, method of programmed instruction, method of independent work with a textbook, method of problem-based teaching (problem situation, problem, problem task, and problem question, conditions for implementing problem-based teaching and levels of application of the problem-based teaching method), method of using technical aids (need and opportunities for using computers and dialogic educational methods), selection and combination of teaching methods.				

13.	**Total available time**		120	
14.	**Allocation of available time**			
15.	**Teaching activities**	15.1.	Lectures-theoretical instruction	30
		15.2.	Exercises (laboratory, auditorium), seminars, team work	15
16.	**Other types of activities**	16.1.	Project tasks	
		16.2.	Independent tasks	25
		16.3.	Home learning	50

17.	**Grading system**		
	17.1.	Tests	80 points
	17.2.	Successfully completed laboratory/auditorium exercises	12 points
	17.3.	Activity and participation	4 points
	17.4.	Homework and/or seminar work	4 points

18.	**Grading criteria (points/grade)**	Up to 61 points	5 (five) (F)
		From 61 to 69 points	6 (six) (E)
		From 70 to 79 points	7 (seven) (D)
		from 80 to 89 points	8 (eight) (S)
		From 90 to 95 points	9 (nine) (B)
		from 95 to 100 points	10 (ten) (A)

19.	**Prerequisites for taking the final exam**	12 points from activity 17.2. and a minimum of 4 points from activities from 17.3 to 17.4.
20.	**Language in which lectures are conducted**	English
21.	**Method for monitoring the quality of lectures**	Anonymous Student Survey

22. **LITERATURE**

22.1. Compulsory literature

No.	Author	Title	Publisher	Year
1.	R.H Gong	Special Yarns and Fabric Structures Developments and applications	Woodhead Publishing, Oxford	2011
2.	Alagirusamy R., Das A.	Technical Textile Yarns	Woodhead Publishing, Oxford	2010
3.				

22.2. Additional literature

No.	Author	Title	Publisher	Year
1.	M. Prendzova	Special Yarns	Internal script, Skopje	2007
2.				
3.				