

Information sheet for the course
Special articles II – Theory of cutting property and workability

University: <i>Alexander Dubček University of Trenčín</i>					
Faculty: <i>Faculty of special technology</i>					
Course unit code: <i>STaM/D/3-33/d</i>			Course unit title: <i>Special articles II – Theory of cutting property and workability</i>		
Type of course unit: <i>optional</i>					
Planned types, learning activities and teaching methods: <i>2 lecture hours, attendance teaching method.</i>					
Number of credits: <i>5</i>					
Recommended semester: <i>3st semester in the 2nd year</i>					
Degree of study: <i>III.</i>					
Course prerequisites: <i>none</i>					
Assessment methods: <i>Active participation in laboratory exercises and submission semester work. The test consists of a written test and an oral preparation in the range of curriculum subject.</i>					
Learning outcomes of the course unit: <i>The student will be able to analyze the nature of workability and cutting property, their experimentally determined and practically applied in demanding machining operations with possible application in science and research.</i>					
Course contents: <i>Machining of metal materials and porosity of cutting tool materials. Definition machinability. Účelovozťažné criteria machinability. The effect of chemical composition of the material to its machinability. Definition Reznos. Cutting tool materials. Experimental research machinability and cutting ability. The application of advanced materials cutting. Machining of difficult to machine materials. Dry, hard and high contact ion.</i>					
Recommended of required reading: [1] BEŇO, J.: <i>Teória rezania kovov. Košice, Viena, 1999.</i> [2] BÉKÉS, J. - HRUBEC, J. - KICKO, J. - LIPA, Z.: <i>Teória obrábania. Bratislava, Vydavateľstvo STU, 1999.</i> [3] HRUBEC, J.: <i>Obrobiteľnosť - metódy trieskového obrábania. Bratislava, ES SVŠT, 1981.</i> [4] NESLUŠAN, M. - CZÁN, A.: <i>Obrábanie titanových a niklových zliatin. Žilina, EDIS, 2001.</i> [5] MIKOVEC, M.: <i>Obrábění materiálů s vysokou pevností a tvrdostí. Praha, SNTL, 1982.</i>					
Language: <i>Slovak</i>					
Remarks: <i>The subject is provided in the winter semester of the second year of full-time study. Compulsory subject.</i>					
Evaluation history <i>Total number of students being evaluated: 0</i>					
A	B	C	D	E	FX
0	0	0	0	0	0
Lecturers: <i>prof. Ing. Vojtech Hrubý, CSc. – lecturer</i>					
Last modification: <i>15.4.2014</i>					
Supervisor: <i>prof. Ing. Vojtěch Hrubý, CSc., guarantee of the study program “Technologies and Materials in Mechanical Engineering“, Assoc. prof. Ing. Ondrej Híreš, CSc., Assoc. prof. Ing. Viliam Cibulka, CSc. – together-guarantors.</i>					