

Title	Safety, legal and ethical questions concerning biotechnology		
Code	3MN24NAK07M		
Prerequisites	Plant biotechnology (BSc)		
Description	<p>The course gives an overview about risks associated with creating and commercial use of genetically manipulated organisms (GMOs), their acceptance in the human society and about their legal treatment. Methods, aims, trends in microbial, animal and plant biotechnology in agriculture will be presented. Properties of different GMOs (microorganisms, plants, animals) will be highlighted together with biotechnological methods and strategies of risk assessment, as well as food safety issues. Legal and ethical aspects of their use and the economic consequences will be discussed. Further topics are: History and presence of regulation of biotechnology in the EU and elsewhere in the world. Ecological and economical effects of biotechnology, ethical concerns and social impact.</p>		
Lecturer	<p>: Dr Noémi Lukács, professor emerita, Dr István Papp, DSc professor; Kissné Dr. Erzsébet Bába PhD, assistant professor; Dr. Anita Szegő PhD, assistant professor; and invited teachers including Dr Ervin Balázs, Dr Dénes Dudits, Dr László Hiripi, Dr Gyula Kasza, Dr Anna Maráz, Dr Béla Maczák, Dr Norbert Potori and other experts of the field</p>		
Semester	2nd, spring	Contact hours/week	2+0
Level	MSc	ECTS	3
Teaching and Learning Methods:			
Reading:	<p>Compulsory literature:</p> <ul style="list-style-type: none"> - online teaching material available through the e-learning system of SZIU - Balázs E, Dudits D, Sági L (szerk.): Plain Facts about GMOs.: Hungarian white paper, Szeged: Barabás Zoltán Federation of Biotechnology (2011) 136 p., available online: http://www.pannonbiotech.hu/_upload/editor/book-small_angol-javitott_VEGSO_1_.pdf <p>Recommended literature:</p> <ul style="list-style-type: none"> - Current reviews as recommended by the lecturers, relevant information from the European Food Safety Agency: https://www.efsa.europa.eu/ - Eds Altman and Hasegawa, Plant Biotechnology and Agriculture Academic Press 2017 		
Assessment:	exam		

