

Title	Physiology of metabolism, pathophysiology and stress biology		
Code	3MN24NAK36M		
Prerequisites	Plant pathology or equivalent BSc		
Description	<p>The aim of the course is to acquire knowledge about pathophysiological processes occurring in interactions of plant and its biotic environment. This field will be covered by treating the following subject areas: General overview of interactions between plants and pathogens. The processes of infection. Pathological incidences in photosynthesis, respiration and metabolic pathways. Roles of plant hormones and secondary metabolites in defence. Toxins. Resistance to diseases. Molecular biological and biotechnological aspects of plant diseases. Replication and expression strategies of viruses. Mechanisms of plant virus resistance.</p>		
Lecturer	Dr István Papp, professor, Dr. Balázs Barna member of HAS; Dr. Miklós Pogány PhD; Dr. Lóránt Király PhD		
Semester	2nd, spring	Contact hours/week	2+2
Level	MSc	ECTS	4
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 - Király et al. Plant resistance to pathogen infections: forms and mechanisms of innate and acquired resistance <p>J. Phytopathol., 158 (2007), pp. 385-396</p> <p>Recommended literature:</p> <ul style="list-style-type: none"> - Eds Taiz and Zeiger Plant Physiology and Development, Chapter 23, Biotic interactions, Sinauer 2015 		
Assessment:	exam		