

Biotechnical Faculty / MEDITERRANEAN FRUIT GROWING / PHYTOPHARMACY

Course:	PHYTOPHARMACY			
Course ID	Course status	Semester	ECTS credits	Lessons (Lessons+Exercises+Laboratory)
4807	Mandatory	5	6	3+1+1
Programs	MEDITERRANEAN FRUIT GROWING			
Prerequisites	No			
Aims	To introduce students to the basic concept of pesticides, as well as issues related to their application, the movement in the environment and the pesticide regulation.			
Learning outcomes	After passing this exam, students will be able to: - Define the basic concepts in the field of phytopharmacy such as the rate of application, pesticide concentration, pre-harvest intervals and MRL, - Defines the basic properties and mode of action of different plant protection products (zoocides, fungicides, bactericides and herbicides) - Recommend the appropriate active ingredient or plant protection product for control of plant pathogens, pests or weeds, - Determine the most appropriate application techniques of pesticides, - Implement safety measures in handling pesticides			
Lecturer / Teaching assistant	Tatjana Perović, PhD, Assistant professor			
Methodology	Lectures, Exercises, Individual work, Consultations, Colloquiums, Final exam			
Plan and program of work				
Preparing week	Preparation and registration of the semester			
I week lectures	Introduction. Pesticide uses			
I week exercises	Chemical structure and biological activity			
II week lectures	Pesticide Classification. Nomenclature of pesticides			
II week exercises	Determination of the systemic effect of insecticides on aphids			
III week lectures	Physical and chemical properties of pesticides			
III week exercises	Calculating results			
IV week lectures	Pesticide formulations			
IV week exercises	Solid formulations			
V week lectures	Mode of Action			
V week exercises	Liquid formulations. Specialist formulations			
VI week lectures	Regulations in production, transport and use of pesticides			
VI week exercises	The mixing of pesticides			
VII week lectures	Toxicology of pesticides			
VII week exercises	Pesticide pack and labels			
VIII week lectures	Colloquium I			
VIII week exercises	Storage and transport of pesticides			
IX week lectures	The consequences of pesticide application. Pre-harvest intervals and MRL			
IX week exercises	Protective equipment for work with pesticides.			
X week lectures	Correctional Colloquium I. Fungicides in subtropical fruit growing			
X week exercises	First aid			
XI week lectures	Fungicides and bactericides in subtropical fruit growing			
XI week exercises	Application of pesticides			
XII week lectures	Zoocides in subtropical fruit growing			
XII week exercises	Determination of the efficacy of fungicides for seed treatment			
XIII week lectures	Zoocides in subtropical fruit growing			
XIII week exercises	Calculating results			
XIV week lectures	Colloquium II. Herbicides in subtropical fruit growing			

XIV week exercises		Determination of the phytotoxicity of copper sulphate				
XV week lectures		Correctional Colloquium II. Herbicides in subtropical fruit growing				
XV week exercises		Calculating results				
Student workload						
Per week		Per semester				
6 credits x 40/30=8 hours and 0 minuts 3 sat(a) theoretical classes 1 sat(a) practical classes 1 excercises 3 hour(s) i 0 minuts of independent work, including consultations		Classes and final exam: 8 hour(s) i 0 minuts x 16 =128 hour(s) i 0 minuts Necessary preparation before the beginning of the semester (administration, registration, certification): 8 hour(s) i 0 minuts x 2 =16 hour(s) i 0 minuts Total workload for the subject: 6 x 30=180 hour(s) Additional work for exam preparation in the preparing exam period, including taking the remedial exam from 0 to 30 hours (remaining time from the first two items to the total load for the item) 36 hour(s) i 0 minuts Workload structure: 128 hour(s) i 0 minuts (cources), 16 hour(s) i 0 minuts (preparation), 36 hour(s) i 0 minuts (additional work)				
Student obligations		presence to lectures and exercises, to take seminar paper, colloquiums and final exam				
Consultations		In accordance with students				
Literature		Recommended literature: 1. Indić, D., Vuković, S. (2012) Praktikum iz fitofarmacije (fungicidi i zoocidi), Novi Sad: Poljoprivredni fakultet; 2. Šovljanski, R., Klokočar-Schmit, Z., Lazić, Sanja (2002): Praktikum iz fitofarmacije, Novi Sad; 3. Mitić N. (2004): Pesticidi u poljoprivredi i šumarstvu u Srbiji i Crnoj Gori, Beograd; 5.Janjić, V. Mitrić, S. (2004): Pesticidi u poljoprivredi i šumarstvu, Banja Luka; 6. Tomlin, C., D., S. (2004): The Pesticide Manual. Brithish Crop protection Council, UK				
Examination methods		Activity on lecturers and exercises 5 points Seminar paper 5 points Two colloquiums, 20 points each = 40 points Final exam 50 points Grades and points: A (≥ 90 to 100 points); B (≥ 80 to < 90); C (≥ 70 to < 80); D (≥ 60 to < 70); E (≥ 50 to < 60); F < 50.				
Special remarks						
Comment						
Grade:	F	E	D	C	B	A
Number of points	less than 50 points	greater than or equal to 50 points and less than 60 points	greater than or equal to 60 points and less than 70 points	greater than or equal to 70 points and less than 80 points	greater than or equal to 80 points and less than 90 points	greater than or equal to 90 points