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| Course: | Diseases and pests in organic agriculture |
| Course id: 3OOP4O19 |
| Number of ECTS:6 |
| Teacher:  | **Ferenc F. Bagi, Pero M. Štrbac****Dragana B. Budakov, Aleksandra M. Konjević** |
| Course status | **Mandatory** |
| Number of active teaching classes (weekly) |
| Lectures:3 | Practical classes:2 | Other teaching types: | Study research work: | Other classes: |
| Precondition courses: -Microbiology | None/ |
| 1. Educational goal

Introducing the harmful pests and economically most important diseases in plant production, which provides the basis for their timely management or reduction of the population to tolerate level according to the principles of organic production. |
| 1. Educational outcomes

This course will provide the basis for recognizing the most important pests and diseases symptoms in organic plant production. Special attention will be addressed to their biology and ecology, as well as the degree of damage to the affected plants, which will enable timely and cost-effective management in accordance with good agricultural practice in the framework of organic production. |
| 1. Course content

*Theory lessons* Phytopathology: History of plant pathology, basic information on parasitism, pathogenesis, epidemiology, basic characteristics of plant pathogenic fungi, bacteria and viruses, general principles for control of plant diseases, biocontrol. The economic importance, distribution, symptoms, epidemiology and management of the most important diseases of cultivated plants in organic production. Entomology: Impact of polyphagous pest species on quantity and quality of agricultural products yield. Polyphagous pest species in field crops, cereals and arable crops, industrial plants, forage crops, vegetables, fruits and vineyards. Importance and distribution of pest species, biology and ecology of their development. Crop protection measures in organic production. Integrated pest management in organic production including administrative measures, cultural practice, mechanical measures and biological control. *Practical teaching: Exercises, Other modes of teaching, Study research work* Phytopathology: General techniques in laboratory work with phytopathogenic microorganisms. Identification of pathogens, the detection of pathogens. Types of symptoms of plant diseases. Fundamentals of morphology and systematics of the causal agents of plant diseases, lifecycles. Entomology: Morphology of insects, use of keys for determination of live and preserved material, recognition of the most important pest species feeding symptoms of organic cultivated plants.  |
| 1. Teaching methods

 Lectures, Practical classes, Consultations |
| Knowledge evaluation (maximum 100 points) |
| Pre-examination obligations | Mandatory | Points | Final exam (izabrati) | Mandatory | Points |
| Colloquium Phytopathology | Yes | 15 | *Oral part of the exam Phytopathology* | Yes | 35 |
| Colloquium Entomology | Yes | 15 | *Oral part of the exam Entomology* | Yes | 35 |
| Literature  |
| Ord. | Author | Title | Publisher | Year |
|  | Stojšin, V., Bagi, F., Balaž, F. | Plant pathology textbook- mycosis and pseudomycoses of field and vegetable crops (in Serbian) | Faculty of Agriculture Novi Sad | 2008 |
|  | Balaž, F., Balaž, J., Tošić, M., Stojšin, V., Bagi, F.  | Phytopathology. Diseases of crops and vegetables (in Serbian) | Faculty of Agriculture Novi Sad | 2010 |
|  | Čamprag, D., Kereši, T., Štrbac, P. | Seed pests of field crops in fields and storagehouses. (in Serbian)  | Novi Sad | 2001 |
|  | Štrbac, P | Pests in field and vegetable crops (in Serbian) | Faculty of Agriculture Novi Sad | 2012 |
|  | Štrbac, P., Čamprag, D. | Integrated pest management (Cultural Practices) and Pests in field crops (in Serbian). | Faculty of Agriculture Novi Sad | 2013 |
|  | Ivanović M., Ivanović, D. | Plant mycosis and pseudomycoses (in Serbian) | Faculty of Agriculture Beograd  | 2001 |

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| Znak univerziteta | UNIVERSITY OF NOVI SADFACULTY OF AGRICULTURE 21000 NOVI SAD, TRG DOSITEJA OBRADOVIĆA 8 | Znak fakulteta2 |
| Study Programme Accreditation**BACHELOR STUDIES**  Organic Agriculture |
| Table 5.2 Course specification |