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| **UNIVERSITY OF NIŠ** | | | | | | |
| **Course Unit Descriptor** | | **Faculty** | | | **Faculty of Sciences and Mathematics** | |
| **GENERAL INFORMATION** | | | | | | |
| Study program | | | | **Physics** | | |
| Study Module (if applicable) | | | | **1. General Physics,**  **2. Applied Physics,**  **3. Physics-informatics** | | |
| Course title | | | | **Methodology for solving physics problems** | | |
| Level of study | | | | Bachelor  Master’s  Doctoral | | |
| Type of course | | | | Obligatory  Elective | | |
| Semester | | | | Autumn Spring | | |
| Year of study | | | | First | | |
| Number of ECTS allocated | | | | 5 | | |
| Name of lecturer/lecturers | | | | Ivan Mančev | | |
| Teaching mode | | | | Lectures Group tutorials  Individual tutorials  Laboratory work  Project work  Seminar  Distance learning  Blended learning  Other | | |
| **PURPOSE AND OVERVIEW (max. 5 sentences)** | | | | | | |
| When setting the goal of this subject we had in mind that only  **by solving physics problems we can understand Physics laws and we can understand how to apply them.** We understand Physics – it means that we can solve physics problems. At the same time to understand physics we need to solve as many physics problems as possible. | | | | | | |
| **SYLLABUS (brief outline and summary of topics, max. 10 sentences)** | | | | | | |
| There are few general rules we need to follow when we solve **Physics Problems.** Such as:   * **drawing the picture of the -** the correct picture of physics problem is more then 80 % of success**.** * **having the same** [units](http://www.solvephysics.com/units.htm) **in the problem;** * **checking the dimensionality of analytical expressions.**   Solving selected problems from general physics with special attention to different methods of solving the same problem. | | | | | | |
| **LANGUAGE OF INSTRUCTION** | | | | | | |
| Serbian (complete course)  English (complete course)  Other \_\_\_\_\_\_\_\_\_\_\_\_\_ (complete course)  Serbian with English mentoring Serbian with other mentoring \_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | | | | | |
| **ASSESSMENT METHODS AND CRITERIA** | | | | | | |
| **Pre exam duties** | **Points** | | **Final exam** | | | **points** |
| **Activity during lectures** | **7** | | **Written examination** | | | **40** |
| **Practical teaching** |  | | **Oral examination** | | | **25** |
| **Teaching colloquia** | **28** | | **OVERALL SUM** | | | **100** |
| **\*Final examination mark is formed in accordance with the Institutional documents** | | | | | | |