**COURSE PLAN**

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| **Course title** | **Statistics for Business and Economics** |
| **Aims of the course** | Mass phenomenon is one of the basic features of modern civilization. Therefore, it is necessary to scientifically describe, analyze and report such occurrences through different indicators. This is precisely the task of statistics as a scientific discipline. Students are introduced to basic statistical concepts and statistical methods. |
| **Learning outcomes** | After passing exam in Statistics, students are expected to be able to:<br>• correctly interpret basic statistical concepts;<br>• select and apply appropriate statistical methods in the specific case;<br>• analyse and interpret the results obtained using statistical methods;<br>• follow and understand professional and scientific literature in which results are expressed in statistical terms and symbols;<br>• plan, implement and interpret simple research tasks in which the acquired statistics knowledge is used. |
| **List of topics/name of the lecturer (including visiting lecturers and experts where applicable)** | |
| **Week I** | Statistics, data and statistical thinking. |
| **Week II** | Sorting and processing of statistical data, statistical series, and graphics. |
| **Week III** | Descriptive statistics: Mean values. |
| **Week IV** | Descriptive statistics: measures of variation. |
| **Week V** | Probability: basic concepts. |
| **Week VI** | Probability: discrete random variables. |
| **Week VII** | Probability: continuous random variables. |
| **Week VIII** | Midterm. April 8, 2025 |
| **Week IX** | Corrective Midterm. April 15, 2025 |

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| **Week X** | Sampling distributions. |
| **Week XI** | Inferences based on a single sample: estimation with confidence intervals. |
| **Week XII** | Inferences based on a single sample: tests of hypothesis. |
| **Week XIII** | Analysis of variance. |
| **Week XIV** | Simple linear regression. Correlation analysis. |
| **Week XV** | Time series: components, trend, MA; Index numbers. |
| **Mandatory readings** | James. T. McClave, Benson G.B., Sincich T., *Statistics for Business and Economics*, 14th Edition, Published by Pearson (July 13, 2021)©2022 |
| **Semestral assessment** | 2 in-class mini-tests, group mini-research project and individual presentations (4x5 points=20 points)<br>Colloquium 40 points and Final exam 40 points.<br>Grading system: 51-60=E; 61-70=D; 71-80=C; 81-90=B; 91-100=A. |
| **List of lecturers (academic)** | Prof. Dr. Vesna K. Karadžić, Ass. Prof. Dr. Julija Cerović Smolović, Dr Bojan Pejović |
| **Name of the course coordinator** | Prof. Dr. Vesna K. Karadžić |
| **List of visiting lecturers (experts), (where applicable)** | |