

SUBJECT DATA SHEET AND REQUIREMENTS

Last modified: 2013.08.29.

Valid from: 2013-2014-I. semester

MAJOR PROJECT DIPLOMATERVEZÉS 1.

1.	Code	Semester Nr. or fall/spring	Contact hours / week (lect.+semin.+lab.)	Requirements p / e / s	Credit	Language
	BMEGEÁTMWD1	3.	0+0+11	p	14	English

2. Subject's responsible:

Name:	Title:	Affiliation (Department):
Dr. Jenő Miklós Suda	assistant professor	Dept. Fluid Mechanics

3. Lecturer:

Name:	Title:	Affiliation (Department):	%
-	-	Dept. Fluid Mechanics	- %

4. Thematic background of the subject (A tantárgy az alábbi témakörök ismeretére épít):

Knowledge of the subjects of the MSc curriculum and specialisation.

5. Compulsory / suggested pre-requisites (Kötelező/ajánlott előtanulmányi rend):

	Subject name (tárgynév)	Code (tárgykód)
Compulsory pre-requisites:	Differential Equations and Numerical Methods	BMETE90MX46
	Laser Physics	BMETE12MX00
	Analytical Mechanics	BMEGEMMMW01
	Advanced Fluid Mechanics	BMEGEÁTMW01
	Advanced Thermodynamics	BMEGEENMWAT
	Electronics	BMEVIAUM001
	Advanced Control and Informatics	BMEGEMIMW01
	Computational Fluid Mechanics	BMEGEÁTMW02
	Flow Measurements	BMEGEÁTMW03
Suggested pre-requisites:	-	-

6. Main objectives of the subject (A tantárgy célkitűzései):

The aim of the course is to develop and enhance the capability for complex problem solving of the students under advisory management of their project leader and advisors. Each student's project is guided by the supervisor and depending on the problem -if applicable- by advisor(s). They form the so-called evaluation team.

7. Detailed thematic description of the subject (A tantárgy részletes tematikája):

Experimental and/or numerical (CFD) major project proposals will be announced by the supervisors on the registration week or before. The major project proposals are defined as being complex problems for the 3rd semester and also can be continued in course of the Final Project (BMEGEÁTMWD2) in the 4th semester, hence resulting in the MSc Thesis of the student.

8. Mode of education of the subject (A tantárgy oktatásának módja):

In course of the Major Project one single student (or group of max. 2 students) will work on one selected challenging problem of fluid mechanics.

9. Requirements (Követelmények):

1st evaluation team meeting: on the 6th week: 1st project presentation by the student
 2nd evaluation team meeting: on the 13th week: 2nd major project presentation by the student

Evaluation team members assess the students work, the presentations & the report in %.

The final grade (practical mark) is calculated based on the % marks of the supervisor and the advisors.

1 st ETM	20% of the final grade
2 nd ETM	35% of the final grade
Report	45% of the final grade

Major Project Report: Submission deadline: see on the Project Assignments (4PM on the last working day (Friday) of the semester: 14th week) in printed and electronic (CD/DVD) format. It is obligatory to use a common template for format: see detailed template on the subject's website. Document: max. 30 pages (body text from the Introduction and chapters to the Conclusion, including Figures, Tables, etc.). The Report must contain the signed original Project Assignment document.

Minimum requirements: students work must pass the minimum 40%, i.e. (2) "acceptable" level, as a given informative final grade.

10. Disciplinary Measures Against the Application of Unauthorized Means at Mid-Terms, Term-End Exams and Homework

Supplement to 1/2013. (I.30.) Dean's Order / Codicil /: The following students are subject to disciplinary measures.

- (a) ~*Those students who apply unauthorized means (book, lecture notes, etc.), different from those listed in the course requirements and/or adopted by the lecturer in charge of the course assessment, in the written mid-term exams taken, and/or
*invite/accept any assistance of fellow students, with the exception of borrowing authorized means, will be disqualified from taking further mid-term exams in the very semester as a consequence of their action. Further to this, all of their results gained in the very semester will be void, can get no term-end signatures, and will have no access to Late Submission option. Final term-end results in courses with practical mark will automatically become Fail (1), the ones with exam requirements will be labelled Refused Admission to Exams.
- (b) *Those students whose homework verifiably proves to be of foreign extraction, or alternatively, evident results or work of a third party, are referred to as their own, will be disqualified from taking further assessment sessions in the very semester as a consequence of their action. Further to this, all of their results gained in the very semester will be void, can get no term-end signatures, and will have no access to Late Submission options. Final term-end results in courses with practical mark will automatically become Fail (1), ones with exam requirements will be labelled Refused Admission to Exams.
- (c) *Those students who apply unauthorized means (books, lecture notes, etc.), different from those listed in the course requirements and/or adopted by the lecturer in charge of the course assessment, in the written term-end exams taken, and/or
*invite/accept any assistance of fellow students, with the exception of borrowing authorized means, will immediately be disqualified from taking the term-end exam any further as a consequence of their action, and will be inhibited with an automatic Fail (1) in the exam. No further options to sit for the same exam can be accessed in the very same exam period.
- (d) *Those students who alter, or make an attempt to alter the already corrected, evaluated, and distributed test or exercise/problem,
i.) as a consequence of their action, will be disqualified from further assessments in the respective semester. Further to this, all of their results gained in the very semester will be void, can get no term-end signatures, and will have no access to Late Submission options. Final term-end results in courses with practical mark will automatically become Fail (1), the ones with exam requirements will be labelled Refused Admission to Exams;
ii.) and will immediately be inhibited with an automatic Fail (1) in the exam. No further options to sit for the same exam can be accessed in the very same exam period.

11. Consulting opportunities (Konzultációs lehetőségek):

Supervisor / advisors / evaluation team members are available in weekly consulting hours.

12. Reference literature (Jegyzet, tankönyv, felhasználható irodalom):

– Website of the subject: <http://www.ara.bme.hu/oktatas/tantargy/NEPTUN/BMEGEATMWD1>

Preliminary literature survey is essential part of the project start, but reference literature will be provided by the supervisor / advisors, too.

13. Home study required to pass the subject:

Contact hours	154	h/semester
Home study for the courses	154	h/semester
Home study for the mid-semester checks	10	h/check
Preparation of mid-semester homework	102	h/homework
Home study of the allotted written notes	-	h/semester
Home study for the exam	-	h/semester
Altogether:	420	h/semester

14. The data sheet and the requirements are prepared by (A tantárgy tematikáját kidolgozta):

Budapest, 5th of September, 2013.

<i>Name (név):</i>	<i>Status (beosztás):</i>	<i>Department (Tanszék):</i>
Dr. Jenő Miklós SUDA	assistant professor	Dept. Fluid Mechanics