

[붙임2]

## 강 의 계 획 서

교과목명	Fluid Machinery (유체기계)		교과 코드	2011	이수구분	교양 (선택( ), 필수( )) 전공 (선택( ), 필수(○))
학 점	3학점	주당시수	이론(3) / 실기( )		강의구성 (%)	이론(70), 실기(20), 발표(10), 설계( )
개설학년	2학년	개설학기	2학기		강의시간	월요일 2교시 ~ 3교시 화요일 3교시 ~ 3교시
담당교수	차동진	상담일시	월요일 17시 ~ 18시	연구실	N13동	전 화:042-821- e-mail:
담당조교	안유경	상담일시	월요일 09시 ~ 18시	사무실		전 화:042-821- e-mail:
인증구분	인증( ) 비인증(○)	교과구분	소양( ) MSC( ) 전공(○)		선수권장 교과목	Fluid Mechanics*)

교과목의 교육목적	<ol style="list-style-type: none"> <li>1. To develop a sound knowledge of engineering fundamentals required for fluid machinery</li> <li>2. To develop skills to integrate, synthesize, and apply engineering principles to the design and operation of fluid machinery</li> <li>3. To develop an appreciation for the importance of professional behavior, ethics, and life-long learning in the engineering profession</li> <li>4. To develop effective skills i both written and oral communications, and the ability to work effectively in a multi-functional team environment</li> </ol>
교과목의 개 요	The basic principles of a common and important application of fluid machinery, that is, pumps and turbines, will be discussed. We emphasize their preliminary design and overall performance. In addition, we discuss how to properly match the requirements of a fluid flow system including building services systems to the performance characteristics of a fluid machinery.

구 분	교 재 명	저 자	출판사	출판년도
교재	주교재 Fluid Mechanics, 3rd/e	Cengel and Cimbala	McGraw-Hill	2014
	참고 서 적	EES를 활용한 설비유체공학 기초설계 차동진	-	2013

비고	Material download: WEBDISK at HBNU homepage <a href="http://webhard.hanbat.ac.kr/xWebDisk/login/login.jsp">http://webhard.hanbat.ac.kr/xWebDisk/login/login.jsp</a> (ID: djcha; PSWD: dj1234). Guest disk -> Download folder -> "19FluidMachinery" (Reference, power point files, EES S/W, etc.) or (HW) Cyber Hanbat homepage <a href="http://cyber.hanbat.ac.kr/index.jsp">http://cyber.hanbat.ac.kr/index.jsp</a> *) For videos of Fluid Mechanics which is a prerequisite, visit <a href="http://www.kocw.net/home/search/kemView.do?kemId=1160985">http://www.kocw.net/home/search/kemView.do?kemId=1160985</a>
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강의진행 방 식	강의(○) 토의(○) 과제평가(○) 현장학습( ) Computer 사용(○) Beam Project 사용(○) OHP사용( ) VTR 사용( ) 기타( ) ※해당란에 모두 표시
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강의평가 방 식	정기평가(60%) 수시평가(0%) 과제평가(20%) 출석평가(10%) 기타 (동영상 시청, 10%) ※합은 100 %
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## 주별 강의진행계획

주	강 의 내 용	비고
1	Introduction to the course	Syllabus
2	Dimensional Analysis and Modeling I (Chapter 7)	Lecture & discussion
3	Dimensional Analysis and Modeling II	Lecture & discussion
4	Dimensional Analysis and Modeling III	Lecture & discussion
5	① External Flow: Drag and Lift I (Chapter 11)	Lecture & discussion
6	② External Flow: Drag and Lift II	Lecture & discussion
7	③ External Flow: Drag and Lift III	Lecture & discussion
8	④ Mid-term exam(중간고사)	Exam
9	⑤ Open-Channel Flow I (Chapter 13)	Lecture & discussion
10	⑥ Open-Channel Flow II	Lecture & discussion
11	⑦ Open-Channel Flow III	Lecture & discussion
12	⑧ Turbomachinery I (Chapter 14)	Lecture & discussion
13	⑨ Turbomachinery II	Lecture & discussion
14	⑩ Turbomachinery III	Lecture & discussion
15	Final exam(기말고사)	Exam