

436-465 Advanced Fluid Mechanics

Credit Points:	12.50
Level:	4 (Undergraduate)
Dates & Locations:	On campus only
Time Commitment:	Contact Hours: Thirty-six hours of lectures and 12 hours of tutorials, assignments and/or laboratories Total Time Commitment: 120 hours
Prerequisites:	436-432 Thermofluids 4 or equivalent
Corequisites:	None
Recommended Background Knowledge:	None
Non Allowed Subjects:	None
Core Participation Requirements:	<p><p>For the purposes of considering request for Reasonable Adjustments under the Disability Standards for Education (Cwth 2005), and Student Support and Engagement Policy, academic requirements for this subject are articulated in the Subject Overview, Learning Outcomes, Assessment and Generic Skills sections of this entry.</p> <p>It is University policy to take all reasonable steps to minimise the impact of disability upon academic study, and reasonable adjustments will be made to enhance a student's participation in the University's programs. Students who feel their disability may impact on meeting the requirements of this subject are encouraged to discuss this matter with a Faculty Student Adviser and Student Equity and Disability Support: http://services.unimelb.edu.au/disability</p></p>
Subject Overview:	The course may include advanced topics in fluid mechanics such as critical point theory, topology of fluid flow fields, vortex dynamics, theories of turbulence, turbulent smooth and rough wall bounded flows, and modern experimental techniques in the measurement of turbulent flow fields.
Objectives:	Upon completion, students should be able to understand and apply theories and techniques which are at the forefront of fluid mechanics research.
Assessment:	One 3-hour examination (100%) at the end of semester.
Prescribed Texts:	None
Recommended Texts:	Information Not Available
Breadth Options:	This subject is not available as a breadth subject.
Fees Information:	Subject EFTSL, Level, Discipline & Census Date, http://enrolment.unimelb.edu.au/fees
Generic Skills:	Information Not Available
Notes:	MCEN40016 Advanced Fluid Mechanics was formerly 436465 Advanced Fluid Mechanics. Not available 2009.
Related Course(s):	Bachelor of Engineering (Engineering Management) Mechanical & Manufacturing Bachelor of Engineering (Mechanical & Manufacturing) & Bachelor of Science Bachelor of Engineering (Mechanical & Manufacturing) / Bachelor of Commerce Bachelor of Engineering (Mechanical and Manufacturing Engineering) Bachelor of Engineering (Mechatronics) and Bachelor of Computer Science