University of Southern California
VITERBI SCHOOL OF ENGINEERING

Master of Science in Aerospace and Mechanical Engineering (Computational
Fluid and Solid Mechanics)
Program Learning Objectives

The Master of Science in Aerospace and Mechanical Engineering (Computational
Fluid and Solid Mechanics) prepares students to practice engineering at an
advanced level in a specialization within aerospace and mechanical engineering
and to recognize the benefit of solving problems using expertise from other
engineering disciplines. Students improve their skills in setting up and solving
problems by using contemporary tools and leveraging interaction with peers. In
addition, this degree introduces students to the computational techniques and
tools used in the analysis and design of systems involving complex flows and
solid structures.

The Master of Science in Aerospace and Mechanical Engineering (Computational
Fluid and Solid Mechanics) program in the Department of Aerospace &
Mechanical Engineering is designed to satisfy the following learning objectives:

a. to provide breadth of knowledge to further an awareness of the
   interdisciplinary nature of aerospace engineering;

b. to provide depth of knowledge in a particular field of study;

c. to further develop the ability to formulate problems, to synthesize and
   integrate information, to work collaboratively, and to communicate
   effectively;

d. to educate students in methods of advanced analysis and the use of tools
   appropriate to an increasingly complex field; and

e. to prepare students for successful careers regardless of the path they
   follow.