Name of the Program	***Master of Science in Aerospace Engineering***
	Study Program Director Prof. Mariano Andrenucci m.andrenucci@dia.unipi.it
Outline	The Master of Science (MS) Degree (*Laurea Magistrale*) in Aerospace Engineering provides a world-class education in aerospace engineering, preparing the students for a successful career in the aerospace sector, or for access to a doctoral program, in Europe or elsewhere. Major areas of study and research in aerospace engineering include space systems, space mission analysis and design, flight mechanics, fluid dynamics and aerodynamics, aerothermodynamics, chemical and electric rocket propulsion, airbreathing propulsion, structures and materials. To this purpose the Aerospace Engineering Department runs a number of dedicated facilities and specialized laboratories.
Program Overview	The Master of Science Degree in Aerospace Engineering requires two years of study after successful completion of the Bachelor of Science (BS) Degree (*Laurea*) in Aerospace Engineering or of a recognized equivalent degree. During each academic year full-time students normally take the equivalent of five courses during two semesters, for a total of 60 ECTS credits per year. A thesis on an original research or design topic is also required. The educational program is articulated in two alternative options: Aeronautics (*Aeronautica*) Space (*Spazio*) Instruction of the Space option of the MS Degree in Aerospace Engineering is imparted in English Students are required to take two years of approved courses and research work, for a total of 120 ECTS credits. The final thesis required for graduation can be carried out either at the University of Pisa or at an approved external institution, like a second university, a research center or an industry. Graduation is awarded at the end of the second academic year, upon successful fulfillment of the established requirements for the MS Degree program in Aerospace Engineering. The standard requirements of the MS program (Space option) are:

FIRST YEAR			
Aerospace Control Systems	12 ECTS		
Aerospace Structures 1	6 ECTS		
Aerospace Structures 2	6 ECTS		
Spaceflight Mechanics	12 ECTS		
Thermal Fluid Sciences	6 ECTS		
Satellite Instrumentation	6 ECTS		
Electric Propulsion 1	6 ECTS		
Electric Propulsion 2	6 ECTS		
TOTAL	60 ECTS		
SECOND YEAR			
Space Systems 1	6 ECTS		
Space Systems 2	6 ECTS		
Spacecraft Design	12 ECTS		
Rocket Propulsion 1	6 ECTS		
Rocket Propulsion 2	6 ECTS		
Final thesis work	24 ECTS		
TOTAL	60 ECTS		

Academic Calendar

The academic calendar defines the periods of lectures, examinations and vacations for all of the Engineering courses offered at the University of Pisa. All Engineering courses are taught over two semesters, from September to February and from February to July, separated by a period reserved for the examinations.

Yearly courses are also held in two segments, with intermediate exams, if any, held during the recess period between lectures.

Lecture Periods:

1st period: October 1 – mid December

2nd period: March 1 – end of May with one week vacation for Easter

Examinations:

3 sessions in January and February (three weeks between sessions)

3 sessions in June and July (three weeks between sessions)

2 sessions in September (three weeks between sessions)

Professional Perspectives	The Master of Science Degree in Aerospace Engineering opens the way to further academic education as well as to professional work in the aerospace industry, in public and private research institutions active in the aerospace field, in the Air Force, and in other industrial enterprizes where the application of technologies derived from the aerospace sector is especially relevant. Finally, as a consequence of the multidisciplinary nature of the educational program, space engineering graduates will also easily find employment in the mechanical industry, with specific reference to structural and fluid mechanical design work.
Admission	**EU applicants and non-EU applicants resident in Italy** Admission to the Master of Science Degree in Aerospace Engineering is open to all candidates in possession of a the relevant requirements. A yearly tuition fee, established on the basis of academic ability and economic conditions of the student, is due. **Non-EU applicants (citizens of countries not belonging to the European Union) not resident in Italy**: The University establishes every year the maximum number of non-EU students that can be admitted in each educational program. Within this limit, admission is granted on a competitive basis to the candidates of superior ability in possession of the relevant requirements. A yearly tuition fee, established on the basis of academic ability, country of origin and economic conditions of the student, is due. To be admitted to the Master of Science Degree in Aerospace Engineering applicants must have received an undergraduate degree in science or engineering approved by the Consiglio del Corso di Laurea Magistrale in Ingegneria Aerospaziale (Program Degree Board of the Master of Science Degree in Aerospace Engineering). The academic records and recommendations submitted with the application will be used to assess the fitness of the candidates to pursue, with distinction, advanced study and research in aerospace engineering. For admission to the space option of the Master of Science Degree in Aerospace Engineering, international students from non-English-speaking countries are expected to read, write, and speak and understand English language. In addition, to be a candidate for the award of the Degree at the conclusion of the educational program, students must have acquired the power of clear and forceful self-expression in both oral and written English.
Requirements for Admission	Applicants with a first-level Degree from an Italian university: Candidates must hold a *Laurea di primo livello* (Bachelor of Science Degree -/First Cycle Degree in Aerospace Engineering) awarded by an Italian University. Other *Lauree di primo livello* awarded by an Italian University in other

	subjects will be also accepted upon approval by the Program Degree Board of the Master of Science Degree in Aerospace Engineering.. Applicants with a first-level Degree from a foreign university: Candidates are required to hold a Bachelor of Science Degree in Aerospace Engineering or an equivalent first-cycle degree awarded by a foreign University after the completion of a three-years or longer educational program. Under specific terms and conditions, admission of EU applicants can also be granted to non-graduated candidates. In this case, successful application will be conditional to subsequent completion of the first level degree and submission of pertinent documentation not later than December 31 of the current academic year.
Application Deadlines	Applicant are requested to apply on line following instructions available at: http://www.spaceatdia.org/ Completed applications for enrollment at the beginning of the next academic year are due no later than June 30.
Website and Contacts	www.spaceatdia.org Study Program Director – Prof. Mariano Andrenucci: m.andrenucci@ing.unipi.it General Information: Ms. Sara Andrenucci: s.andrenucci@ing.unipi.it; Coordination Manager – Ms. Alessandra Bacci a.bacci@ing.unipi.it