# Aerospace Engineering, PhD

**ESAERSPPHD** 

### **Program description**

#### Degree awarded: PHD Aerospace Engineering

The PhD program in aerospace engineering emphasizes original research and provides students with a strong background for employment in academic institutions, government laboratories and industrial research laboratories with a focus on aerospace engineering.

The program stresses a sound foundation in technical fundamentals, communication and professionalism. To this end, a broad-based curriculum is offered in design, system dynamics and control; fluid mechanics and aerodynamics; mechanics and dynamics of solids and structures; transport phenomena; thermodynamics and energy. Modern computational and laboratory facilities are available to support timely research investigations.

# At a glance

• College/School: <u>Ira A. Fulton Schools of Engineering</u>

• Location: <u>Tempe</u>

### **Degree requirements**

84 credit hours, a written comprehensive exam, an oral comprehensive exam, a prospectus and a dissertation

All students pursuing the doctorate are required to pass both a qualifying and a comprehensive examination administered by the program committee. In addition, the following are required:

coursework directly related to the research area (18) mathematics (9)

graduate courses outside the major research area (9)

MAE 792 Research

MAE 799 Dissertation credit hours (12)

Students in the doctoral program who have not completed an MS degree previously are allowed to apply for a Master of Science in Passing after successfully completing the comprehensive exams.

### **Admission requirements**

Applicants must fulfill the requirements of both the Graduate College and the Ira A. Fulton Schools of Engineering.

Applicants are eligible to apply to the program if they have earned a bachelor's or master's degree in any field from an accredited U.S. or international institution.

Applicants must have a minimum cumulative GPA of 3.25 (scale is 4.00 = "A") in the last 60 hours of their first bachelor's degree program or a minimum cumulative GPA of 3.25 (scale is 4.00 = "A") in an applicable master's degree program.

All applicants must submit:

- 1. graduate admission application and application fee
- 2. official transcripts
- 3. GRE scores
- 4. personal statement
- 5. resume or curriculum vitae
- 6. three letters of recommendation
- 7. proof of English proficiency

#### **Additional Application Information**

An applicant whose native language is not English must provide proof of <u>English proficiency</u> via a minimum of score of 80 on the internet-based TOEFL regardless of their current residency.

ASU does not accept the GRE® General Test at home edition.

Admission to the aerospace engineering doctoral program is highly competitive, and preferred applicants have an undergraduate or master's degree in aerospace engineering or mechanical engineering. The admission process considers all aspects of the student's application. The typical successful applicant has a cumulative GPA of at least 3.25 (scale is 4.00 = "A") in engineering and science coursework in a bachelor's or master's degree program, and high GRE and TOEFL scores.

### **Tuition information**

When it comes to paying for higher education, everyone's situation is different. Students can learn about <u>ASU tuition and financial aid</u> options to find out which will work best for them.

# **Application deadlines**

Fall

**Spring** expand

expand

## **Career opportunities**

Professionals with a doctorate in aerospace engineering have strong opportunities at all levels in aerospace engineering in research, design and manufacturing at companies of all sizes, as well as national laboratories (DOE, DOD, NASA). Analytical skills learned in aerospace engineering are also valued for other nonengineering positions.

Career examples include:

- engineer
- engineering manager or director
- engineering professor
- research engineer

### **Contact information**

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