

**National Central University**  
**Department of Space Science and Engineering**  
**PhD Program Guidelines**

**Article 1:**

These guidelines are established in accordance with the university's "Academic Regulations" and the "Regulations for the Degree Examinations for Doctoral and Master's Students."

**Article 2:**

The thesis advisor must be a full-time faculty member of the Department (including primary and secondary appointments). The advisor shall be confirmed by the end of the first semester, and the "Advisor Confirmation Form" shall be submitted with the department head's signature. Any change of advisor requires the "Advisor Change Application Form" signed by both the former and current advisors and approved by the Department Chair. Special cases will be handled by the Student Affairs Committee convened by the Department Chair and reported to the Department Affairs Meeting. For students participating in the Ministry of Education's Industry-Academia Collaboration Elite Cultivation Program (hereafter referred to as "Industry PhD students"), at least one industry expert (including a co-advisor from the industry) must be included on the advisory committee.

**Article 3:**

The duration of doctoral study is limited to two to seven years. Students admitted as degree-seeking full time students who fail to complete the required courses or thesis within the specified period may extend their study period by one year. Students directly admitted to the PhD program will follow the PhD regulations from the time of admission.

**Article 4:**

Students must complete a minimum of 18 credits during their study period. For students directly admitted to the PhD program, a minimum of 34 credits is required, with a passing grade of 70.

#### **Article 5:**

Students may apply to transfer credits from courses previously taken in the master's program that are recognized by the Department as PhD courses. The credit transfer process follows the Department's "Credit Transfer Guidelines," which are specified separately.

#### **Article 6:**

Students must complete and pass the PhD seminar course for two semesters during their study period. Industry PhD students must complete 4 credits of industry-related special topics courses (included in the 18 credits).

#### **Article 7:**

Students may apply for the qualification exam once per semester and must complete it within that semester. The application period starts from the beginning of the semester and ends six weeks before the end of the semester. The oral exam must be completed two weeks before the end of the semester. The qualification exam committee consists of three members, including the advisor, an invited committee member (with the same qualifications as a PhD oral exam committee member), and a committee member suggested by the Department's Academic Committee (selected by the advisor). The exam is convened by the committee member suggested by the Academic Committee.

#### **Article 8:**

The qualification exam is conducted orally, where the student presents their preliminary research results and future research plan. The committee evaluates the student's basic academic abilities and research plan. The exam result is decided by majority vote of the committee and documented in a written report with the committee's recommendations, which is archived by the Department. Upon passing the qualification exam, the student becomes a PhD candidate.

#### **Article 9:**

The qualification exam can be taken a maximum of two times and must be passed within two years of admission to the PhD program (excluding periods of leave). Full

time students and those who are pregnant or have given birth may extend the period by one year. Students who fail to pass within the specified period will be dismissed.

#### **Article 10:**

Before the degree examination, students must publish (or have formally accepted) at least one first-author SCI or SCIE journal paper related to their PhD dissertation. For Industry PhD students, they must publish at least one first-author SCI or SCIE journal paper, or obtain one invention patent related to their dissertation, or have a technical report related to their dissertation approved by the collaborating industrial partner or the Department's Academic Committee.

#### **Article 11:**

Students who meet the program requirements, pass the qualification exam, and fulfill other relevant regulations may apply for the degree examination with the approval of their advisor.

#### **Article 12:**

The degree examination is conducted in accordance with the University's "Regulations for the Degree Examinations for Doctoral and Master's Students."

#### **Article 13:**

Students directly admitted to the PhD program who pass the qualification exam but fail the doctoral degree examination may be awarded a master's degree, if they meet the requirements of Article 8 of the University's "Direct Admission to PhD Program Guidelines."

#### **Article 14:**

Before graduation, students must prepare their thesis and abstract in the specified format and submit the electronic version one week before leaving the university.

#### **Article 15:**

Before leaving, students must clear the laboratory space and equipment they used, return all borrowed items, and have the "Leave Application Form" signed by the Department Office and the Department Chair before completing the University's departure procedures.

**Article 16:**

Matters not covered by these guidelines shall be handled in accordance with the relevant regulations of the Ministry of Education and the University.

**Article 17:**

These guidelines shall be implemented after approval by the Department Affairs Meeting, college-level meetings, and the Academic Affairs Meeting. Amendments shall follow the same procedure.