Ph.D course in Astrophysics and Cosmology

Head of the Ph.D course: Prof. Andrea Lapi

Web site: **Astrophysics and Cosmology**

Research lines:

- Early Universe Physics and CMB Data Analysis
- **Galaxy Formation and Evolution**
- Stellar Structure and Evolution
- Dark Matter and Dark Energy
- Gravitation Theory and Gravitational Waves
- High Energy and Multimessenger Astrophysics
- Galaxy Clusters and Large Scale Structures
- Astrochemistry and Astrobiology
- Computational Astrophysics
- Data Science specific topic Machine Learning Methods for Supernova Type Ia Cosmology

Fellowships available: Astrophysics and Cosmology: 5

Data Science specific topic - Machine Learning Methods for

Supernova Type Ia Cosmology: 1

Candidates can apply to only one activity

Admission: Academic and scientific qualifications + oral exam

Beginning of the Courses: 1 October, 2020

Evaluation of academic and scientific qualifications: 30 points

Access to Oral Exam: minimum mark of 21/30 in the academic and scientific qualifications

evaluation up to a maximum of 15 admitted candidates.

Evaluation of Oral Exam: 70 points

Total Evaluation: 100 points

Eligibility: 70 points

First Session

Astrophysics and Cosmology

Deadline for online submission of applications: 3 March, 2020

Oral Exam: 24 and 25 March, 2020

Machine Learning Methods for Supernova Type Ia Cosmology

Deadline for online submission of applications: 3 March, 2020 Oral Exam: 23 March, 2020

Second Session (only if there should still be places available after the first one)

Astrophysics and Cosmology

Deadline for online submission of applications: 31 August, 2020

Oral Exam: 15 and 16 September, 2020 Machine Learning Methods for Supernova Type Ia Cosmology

Deadline for online submission of applications: 31 August, 2020

Oral Exam: 15 and 16 September, 2020

Admission to the oral exam and results of all evaluations will be notified by email.