

# Research in Environmental Contamination and Toxicology (INCyTA)

## Synopsis

Annually, a general workshop is held in the facilities of the PiE-UPV/EHU, where students have experiences for 2 weeks. Teaching staff from all the institutions in the ECT Consortium and world-wide renowned environmental scientists participating as guest lecturers are present. PhD candidates of the local CTA PhD programme present their PhD outputs to ECT EMJMD students.

The topics covered will allow getting knowledge in main aspects of research in the field of environmental toxicology and chemical contaminants, including on the main global problems and challenges, mainly related with pollution and global changes, and the acquisition of skills and training on methods and approaches expected to contribute to the mitigation of their effects (through prevention, assessment and management).

## Aims

- to provide an updated point of view of the main problems in applied marine research;
- to provide a cross-section viewpoint of hot spots in RiMER; and
- to facilitate contacting with renowned scientists/research groups.

## Objectives

At the end of the Unit, you should:

1. understand the current topics in environmental contamination and toxicology research
2. identify most active research groups in environmental contamination and toxicology
3. have gained a knowledge of the main problems that concern applied environmental research

## Key Skills Acquired

At the end of the Unit, you should be able to:

1. be familiar with science communication skills;
2. develop a critical way of thinking; and
3. acquire a transversal, multidisciplinary perspective of ECT research

## Syllabus

Lectures and Round Tables on the following topics:

- Ecosystem health assessment in water and soil ecosystems
- Environmental Risk Assessment and Regulatory Toxicology
- Emerging and persistent pollutants
- Pollution effects in cultural heritage
- Environmental specimen banking
- Nanotoxicity
- Human risk assessment and Public health

## Learning & Teaching

- Lectures: 36 hr
- Workshops: 24 hr

## Teaching Staff

M Ortiz\_Zarragoitia (Coord.)

I Cancio, M Soto, MP Cajaraville, Nestor

**Semester:** 2

**Timetable slot:** To be advised

**ECTS:** 6

**Level :**Compulsory

## Bibliography

- Kesari, K.K. (Ed.). 2017. Perspectives in Environmental Toxicology. Springer. ISBN 978-3-319-46248-6
- Newman, M.C. (Ed.). 2014. Fundamentals in Environmental Toxicology (4th edition). CRC Press. ISBN 9781466582293
- D'Mello, J.P.F. (Ed.). 2019. A handbook of Environmental Toxicology: Human disorders and ecotoxicology. CABI. 978-1786394675

## Assessment

- Attendance is compulsory. All absences must be justified documentally. Active participation in the activities of the course is required; particular attention will be paid to the participation in open discussions in lectures, seminars and practicals.
  - Written examination (up to 50%)
- Written reports (at least 50%):
  - List of 2 questions per lecture
  - One 5 page journalistic summary of the INCyTA Course
  - One 5 page summary of the student's choice Round Table

## Course Evaluation

By completion of University Unit Evaluation Questionnaire by students, annual assessment by Unit Coordinator.