



ILES LA

INTERDISCIPLINARY LIFE AND ENVIRONMENTAL
SCIENCE LANDSCAPE AWARD

Open Day
13th December 2024

www.ilesla.ox.ac.uk

 [@iles_la](https://www.instagram.com/iles_la)

 [@ilesla.bsky.social](https://bsky.app/profile/ilesla.bsky.social)



Biotechnology and
Biological Sciences
Research Council



Natural
Environment
Research Council



Schedule

12.00-12.45	Introduction to ILES LA* and Q&A
12.45-1.15	Informal Q&A in breakout rooms/lunch
1.15-1.30	Break
1.30-2.00	What assessors are looking for in an application – Panel Q&A
2.00-2.40	The application process* & Q&A
2.40-3.10	The student experience
3.10-3.30	Meet with current students
3.30	Close

*Presentations will be recorded – but Q&A sessions will not

Interdisciplinary Life and Environmental Science Landscape Award (ILES LA)

- 4-year Doctoral Programme (part-time study possible)
- Funded by BBSRC and NERC
- ~55-60+ students per annum
- 25% projects in collaboration with industry and non-academic partners

Doctoral Training Centre
1 to 4 Keble Rd
Oxford

Founded 2002



A brief history of the DTC...

- University of Oxford's Doctoral Training Centre (DTC) founded 2002
- 11 programmes, 8 academic partner Universities and Institutions, 70+ non-academic partners
- ~1350 students admitted to date, > 900 graduated
- ...
- EPSRC Systems Approaches to Biomedical Sciences Industrial Doctorate programme founded in 2009
- BBSRC Doctoral Training Partnership (DTP) founded in 2012
- BBSRC DTP Expanded to include Oxford Brookes, Harwell organisations and the Pirbright Institute in 2015
- NERC DTP founded 2014
- NERC DTP integrated into the DTC in 2020
- BBSRC and NERC-funded Interdisciplinary Life and Environmental Science Landscape Award - 2025
- Expanded to include the Open University, Collaborative Partners and the Open Innovation Industrial Consortium



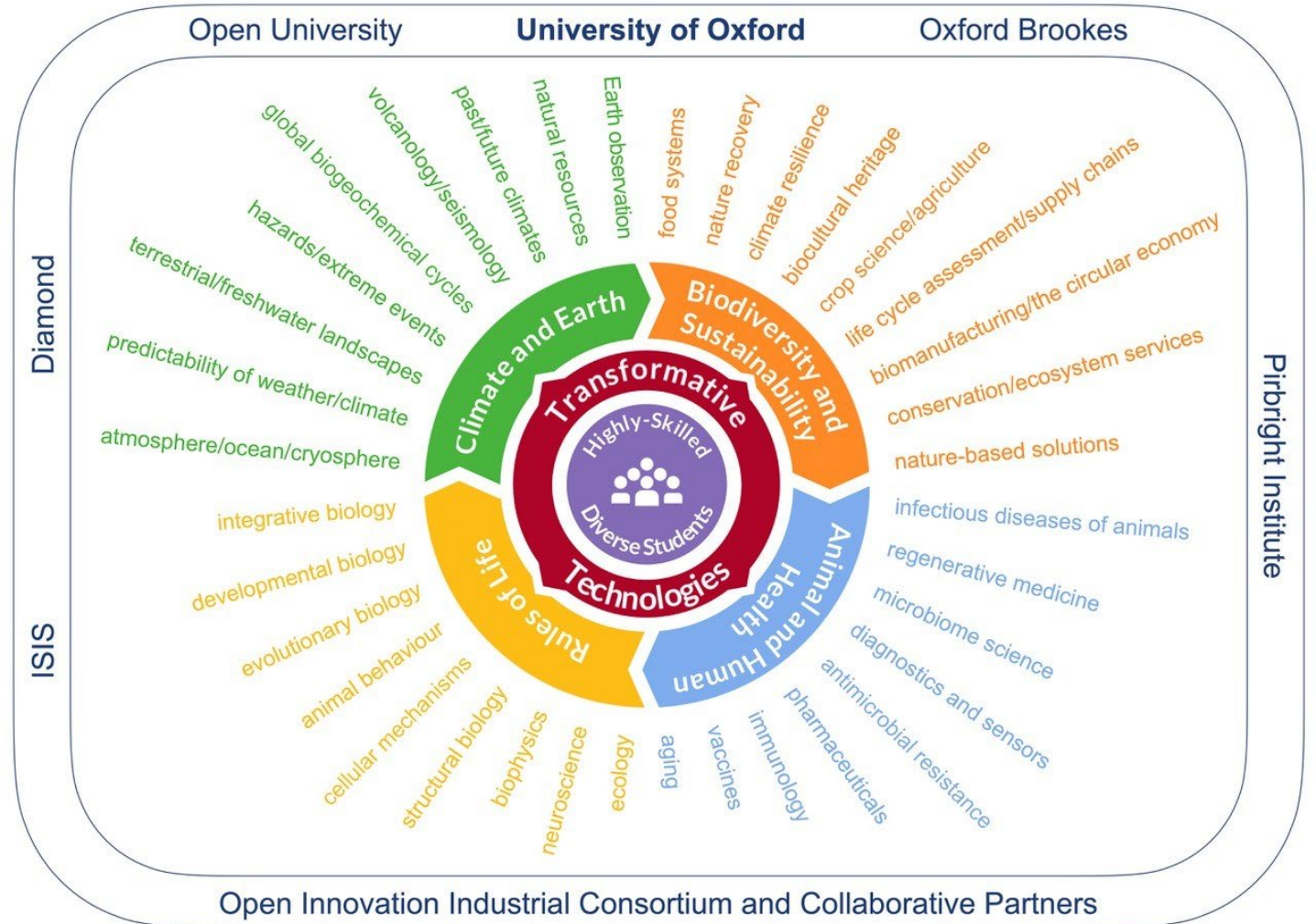
Hosting partners (academic partners)

- Six hosting partners
- Three universities: **Oxford, Oxford Brookes & The Open University**
- **The Pirbright Institute, Diamond Light Source & ISIS Neutron & Muon Source**
- Eligible researchers can act as **primary supervisors** for students
- Students admitted via any of the three universities
- Students are required to work with a supervisory team that includes a supervisor at their registered university



Five Research Themes

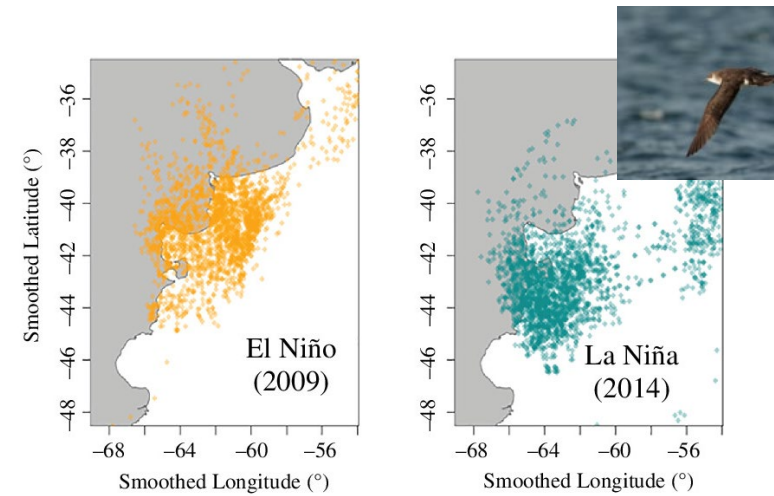
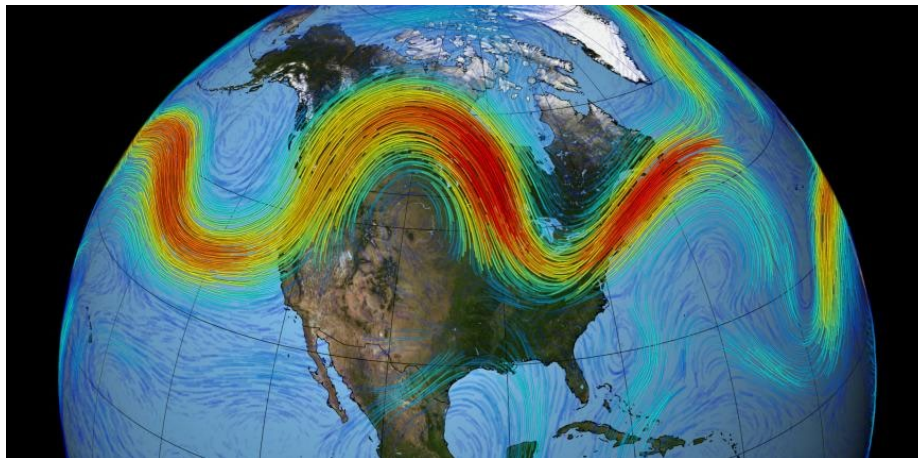
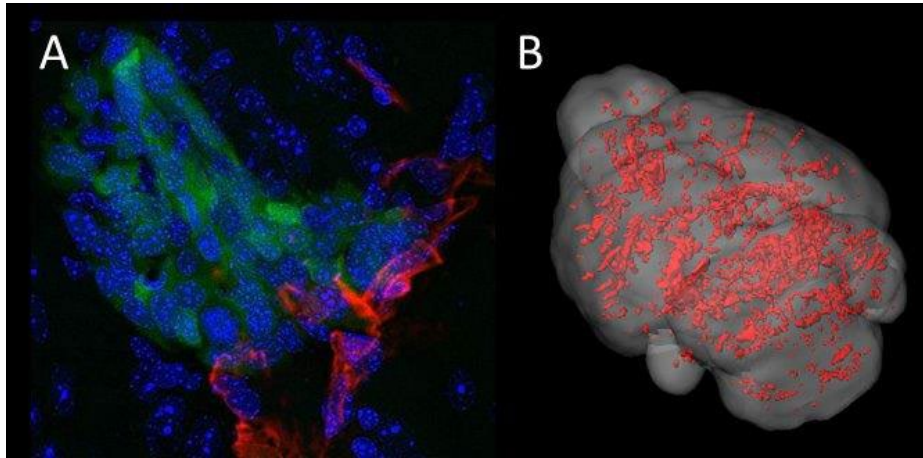
- Climate & Earth
- Biodiversity and Sustainability
- Animal and Human Health
- Rules of Life
- Transformative Technologies



Please read the full theme descriptions on the website

Why do a DPhil/PhD at the University
of Oxford's Doctoral Training Centre?

21st Century Science is Collaborative and Interdisciplinary





More postdocs, more data skills top biology sector wish list

Early results of 2014 vulnerable skills survey by BBSRC and MRC highlight concerns and importance of multidisciplinary

October 23 2014



Becoming an employable researcher

- Critical thinking and analysis skills
- Problem solving skills (including knowing when and how to seek assistance)
- Motivation, commitment and resilience
- Time and project management
- Communication skills
- Interpersonal, team and leadership skills
- Specific technical skills/academic background knowledge (depends on the job)
- Broad knowledge of your discipline and other disciplines (flexibility and adaptability)

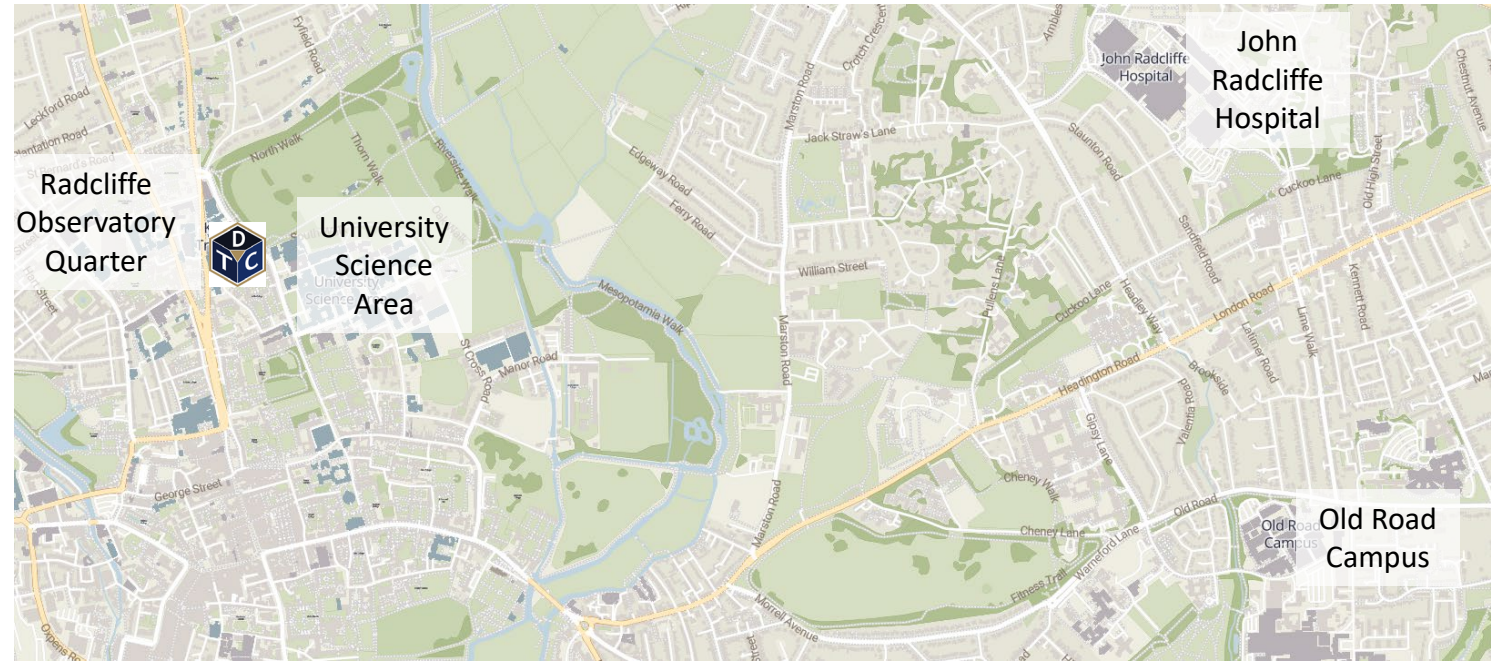
Our priorities

- Supporting scientific breakthroughs
- Developing new skills & interdisciplinary collaborations
- Underpinning industrial innovation
- Equity, equality, diversity, inclusion and societal impact
- Community, collaboration and kindness



University of Oxford

- Ranked first in the *Times Higher Education* World University Rankings from 2017 - 2025
- More than 26,000 students, including 12,470 undergraduates and 13,920 postgraduates
- 450 postgraduate courses



Departments/Institutes

Archaeology
Biochemistry
Biology
Chemistry
Computer Science
Dunn School of Pathology
Earth Sciences
Engineering
Experimental Psychology
Geography & the Environment
INEOS Oxford Institute

Jenner Institute
Kavli Institute
Kennedy Institute
Mathematical Institute
Nuffield Department of Medicine
Nuffield Department of Clinical
Neurosciences
Oxford e-Research Centre
Pharmacology
Physics
Physiology, Anatomy & Genetics
Statistics



Oxford Brookes University



Department of Biological and Medical Sciences (Animals, Plants and Microbes)

- Cell and Developmental Biology
- Genetics and Genomics

Centre for Bioimaging
Centre for Functional Genomics
Centre for Nutrition and Health

The Pirbright Institute



World-leading Centre of Excellence in the research and surveillance of viral disease of livestock and viruses that spread from animals to humans

Major new high-biological containment science facility (Brooksby Building) established in 2024 – focus on pandemic preparedness



University of Oxford & The Pirbright Institute

Development of vaccines for human and veterinary diseases

Harwell Science and Innovation Campus

Diamond Light Source

- Structural biology
- Bioimaging
- Spectroscopy

ISIS Neutron and Muon Source

- Materials analysis
- Biosurfactants
- Biopolymers
- Plant transport processes
- Membranes and protein-membrane interactions



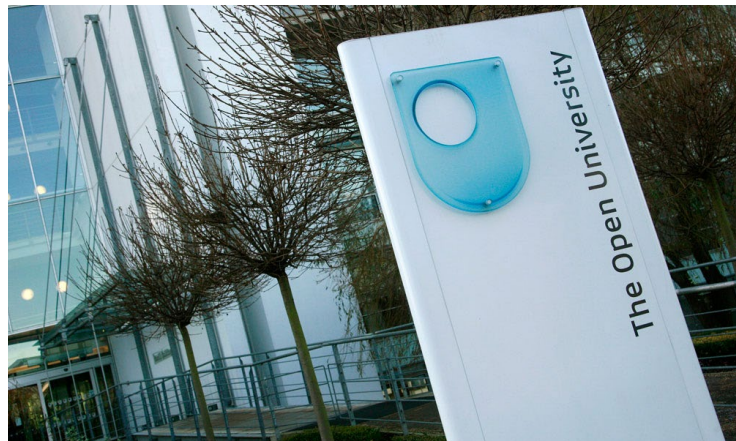
Also STFC Central Laser Facility, Rosalind Franklin Institute, RAL Space, ESA, Research Complex at Harwell...



The Open University



- The largest university in the UK
- Diverse community of ~900 postgraduate research students, doing cutting-edge PhD and Professional Doctorate projects
- Main campus in Milton Keynes



Open Innovation Industrial Consortium (Open-IIC)

- An alliance of industry partners committed to supporting students in ILESLA
- Supervisors can work with Open-IIC partners to offer rotation and DPhil projects
- Partners normally provide £45K in years 2-4 if students select their project for a DPhil/PhD – plus any additional project-specific support agreed
- IP covered by an Open Innovation agreement
- Students undertake a 12 week+ internship with Open-IIC partners
- Students receive a £1K stipend uplift in years 2-4



Current Open-IIC partners



New partners are being added to the consortium...

Collaborative Partners

- Public and third sector partners
- Can co-supervise projects

STFC Central Laser Facility



Research Complex at Harwell



The Met Office



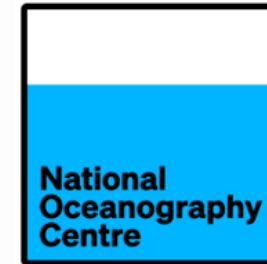
National Centre for Earth Observation



National Centre for Atmospheric Science



National Oceanography Centre



Natural History Museum London



Royal Botanic Gardens



European Space Agency



The Rosalind Franklin Institute



Earthwatch



Centre for Ecology and Hydrology



Natural England



Zoological Society Institute of Zoology



RAL Space



The Training Programme

Core and advanced scientific training

Two 10-week research projects

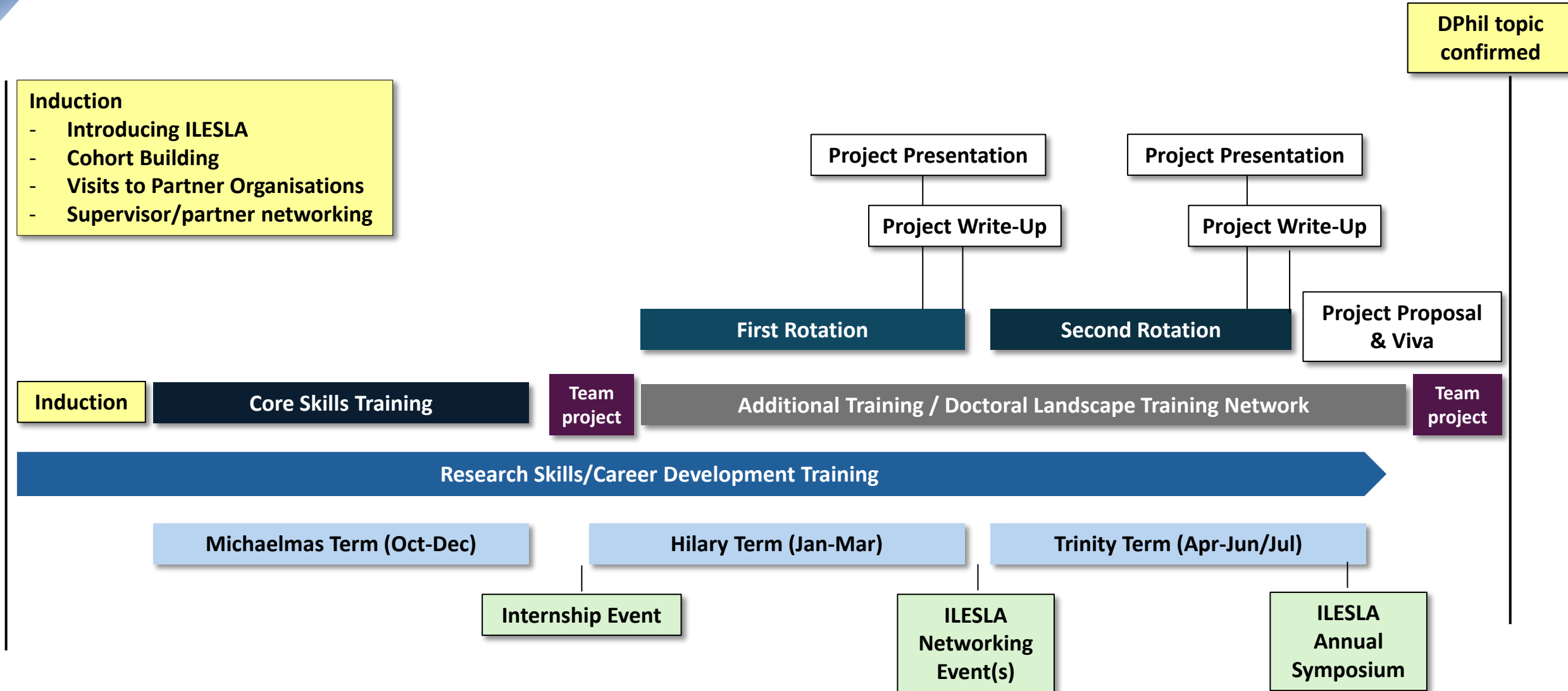
Three-year DPhil/PhD project

Career Development

12-week professional internship or
industrial placement (12 weeks-18 months) (iCASE)



ILES LA Year 1



Core Training

- Strong focus on computational and data analysis skills
- Experiential learning
- Progress from where you start
- Research context
- Communication & Collaboration



Team projects

- Students will undertake a team project in year 1 - typically involving software development, data analysis or consultancy
- Team projects will normally be co-supervised by a collaborative partner or Open-IIC partner mentor and an academic mentor

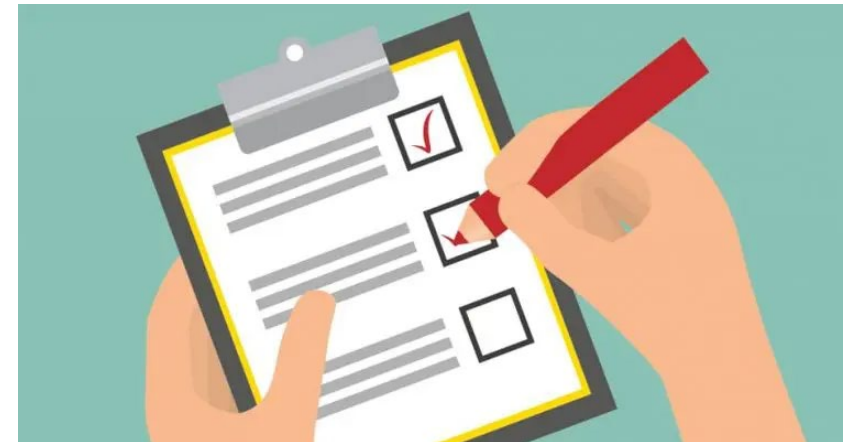


Rotation projects

- Supervisors asked for project ideas in April/early May with a July 31st deadline
- Students given details of eligible supervisors and projects during induction
- Primary supervisor from a hosting partner
- All projects in BBSRC and/or NERC remit
- Projects signposted as BBSRC, NERC, BBSRC/NERC or Open-IIC/iCASE
- Students meet with supervisors during induction and their first term
- Choose first project by the end of November
- Choose second project by the end of February
- Choose DPhil/PhD topic and supervisory team by June

Project proposals

- During the first six weeks of their substantive doctoral project, students write a research proposal in consultation with their supervisory team
- Assessed in a viva with two ILES LA supervisors for suitability and fit to remit
- Assessors provide formative feedback for students
- Assessor reports are reviewed by Directors
- Decision on project suitability & feasibility



Doctoral Innovation

- We encourage projects with translational/commercial potential
- Students and supervisors can access specific training and support in entrepreneurship and business skills
- Strong alumni network
- Students can use their 12-week internship for commercialisation activities with suitable mentorship and support



Internships

- All ILES LA students will undertake a 12 week internship or placement to gain work experience
- Open-IIC/iCASE students will undertake an internships with their partner
- Entrepreneurial students can work on translating their research/ideas
- Wide range of internship options

Conservation

Education

Media

Industry

Policy

Publishing

Museums & science centres

Patent agencies

Scientific societies

Charities

Public sector

Entrepreneurship & innovation

Admissions 2025

- Deadline **January 29th, 12 noon** – applicants who miss this deadline will not be considered for funding
- Applicants can apply via any of the 3 universities – but must have a primary supervisor at the University they are registered at when they choose their DPhil/PhD project
- Applicants can apply to a department or CDT in MPLS or MedSci at Oxford and ILES LA and pay a single fee (£20) for up to 3 applications
- Applicants can apply for the DPhil in Geography and the Environment *or* the DPhil in Archaeological Science and ILES LA and pay a single fee
- Eligible low income applicants can request a fee waiver

In subsequent years the application deadline will be **early January**

Interviews late Feb / early March
Offer decisions mid-March onwards
Scholarship decisions March-May

Researching supervisors

- Primary supervisors can be from any of the six hosting organisations
- All students will have two (or more) supervisors
- Look up research interests on departmental / organisational websites
- Remember that supervisors with relevant interests can work in several different departments & organisations
- Read recent publications
- Make sure that there are multiple supervisors you are interested in working with as we cannot guarantee that you will be able to work with a specific supervisory team on a specific project
- You do not need to contact supervisors in advance of applying – but you may wish to do so to learn more about their current interests

Studentship and scholarship funding

- ~55-60 students in total
- 25% iCASE - matched funding from Open-IIC and collaborative partners
- Core studentships: nominally BBSRC or NERC (maximum 30% international)
- Other/matched: partners, colleges, departments
- Academic Futures - University of Oxford
- Integrated (scholarship funding covers 100% of fees and stipend)

- Entry will be competitive
- Funded offers will specify any restrictions on research topic or host organization
- Unfunded offers will be made and candidates considered for competitive scholarships

Equity, equality, diversity and inclusion is at the heart of ILES LA

- Inclusive and fair admissions
- Community and wellbeing
- Positive research culture
- Reasonable adjustments for disabled students
- Accelerating Futures Network
- Support for students with caring responsibilities
- UNIQ+
- Academic Futures Scholarships (Oxford)
- Returning, employed and part-time students

