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# NXVA SCIENCE

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#### TITLE

NOVA Science

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December 2025 Published Annually

#### COORDINATION

Research & Innovation Office Communication Office

Ana Ventura www.helloanaventura.tumblr.con

NOVA's Rectorate and Academic Units Projects' Principal Investigators

#### PRINTING

IDG - Imagem Digital Gráfica PRINTING RUN 500 LEGAL DEPOSIT 447909/18

contribution of all Academic and Research Units of NOVA that NOVA coordinates or participate, for all the images, figures and schemes a ded for this year's magazine edition

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# Message from the Rector Defining Excellence

Paulo Pereira
Rector of NOVA University Lisbon

It is with great pleasure that I address our community for the first time as Rector of NOVA University of Lisbon. Since my election in October 2025, I have had the opportunity to observe closely the remarkable vitality of our academic and scientific ecosystem. The theme of this year's edition, Excellence in Research: Transforming the Future, could not be more appropriate for the moment we collectively face: a moment of consolidation, ambition, and renewed commitment to the role that knowledge must play in shaping society. In a complex and uncertain world, universities stand as beacons of hope and spaces of intellectual freedom - places where ideas take shape, where curiosity is protected, and where new knowledge emerges. At NOVA, we will continue to champion curiosity-driven research, uphold the intrinsic value of producing new knowledge, and affirm science as a public good.

NOVA's identity as a research-intensive university is reflected in the outstanding performance of our research ecosystem. The excellency of NOVA's research units attests to the scientific quality, creativity, and resilience of our researchers. These units, built from the bottom up and driven by the University's best talent, constitute the foundation on which we will continue to advance NOVA's strategic vision for research.

Looking ahead, one of our central priorities will be to attract, develop, and retain exceptional researchers. Strengthening stable career pathways, ensuring rigorous and transparent evaluation, and investing in modern infrastructures are indispensable conditions for sustained excellence. This new mandate provides an important opportunity to refine a more strategic and competitive approach to recruitment, enabling the university to



bring world-class researchers into our community and deepen our international standing.

In parallel, the challenges and opportunities of global research funding require us to reinforce NOVA's capacity to compete at the highest level. Expanding our participation in major European programmes and strengthening our presence in international networks will be essential to securing new partnerships and contributing to the definition of future scientific agendas.

Equally central to our mission is the University's commitment to **innovation** and **knowledge valorisation**. By enhancing the protection of high-potential intellectual property, supporting the creation of start-ups and spin-offs, and fostering early collaboration with industry and society, NOVA will continue to ensure that its

research generates economic and social value.

Excellence in research is not only a defining characteristic of NOVA, as it is the engine that will allow us to contribute meaningfully to a more informed, equitable, and sustainable future.

NOVA Science



# A word from the Vice-Rectors Reflections on the Last Year at NOVA: Shared Perspectives

 $Cecilia\ Roque$ , Vice-Rector for Research and Advanced Training  $Isabel\ Rocha$ , Vice-Rector for Innovation, Value Creation and Global Affairs

The past 12 months at NOVA have once again highlighted the strength, ambition, and international visibility of our scientific community, as clearly reflected in this year's **Facts & Figures**.

NOVA remains committed to strengthening its position as a research-intensive and innovative institution, where talent development, scientific excellence, and societal impact form an increasingly central part of our strategic vision.

Our shared purpose is clear: to ensure that NOVA continues to be a dynamic, internationally connected, and attractive environment for those who produce knowledge, train future generations, and generate impact. The solid foundations laid during the previous mandate now allow us to deepen our commitment to talent, advanced training, high-impact science, and global competitiveness.

# GROWING EXCELLENCE AND INTERNATIONAL RECOGNITION

Our community continues to expand and diversify, reaching 1,760 teaching & research staff, almost half of whom are women, and

over **2,300 PhD students**. Scientific output remains remarkable, with **3,253 indexed publications**, nearly **50% co-authored internationally**, and a normalized impact **24% above the global average**, consolidating the University's position in the upper tiers of international rankings. International collaboration continues to deepen, with these networks being fundamental in sustaining our competitive edge in European funding and in positioning NOVA as a global research player.

NOVA's research activity also confirms its dynamism and focus on high-impact and international research, with €21.6M in research income and more than 350 ongoing projects representing €162.7M. Of those, 185 are European projects, with new 32 Horizon Europe projects only in 2024, totalling €14M, and reflecting a focus on consolidating high-value initiatives. NOVA has also a strong engagement in national initiatives, including 30 PRR collaborative agendas. Compared to 2023, ongoing projects slightly decreased, with fewer national projects and more European collaborations, highlighting the competitiveness of NOVA researchers in participating in European consortia, when national R&D funding becomes less attractive.



The national evaluation of NOVA's 41 Research Units further reinforces its trajectory with 73% classified as Excellent and 20% as Very Good, a notable increase in Excellent classifications. Funding associated with NOVA's R&D Units continues to support the University's strategic research objectives, totalling € 68,8M.

# FRONTIER SCIENCE AND COMPETITIVE SUCCESS

NOVA's strong scientific culture is also evident in our success in highly competitive programmes. In 2025, the University secured three new ERC grants bringing NOVA's cumulative total to 42 ERC projects and €52.9M since 2007. The University was also selected for two EIC Pathfinder Open projects, standing among only 44 selected in Europe: a significant recognition of NOVA's contribution to disruptive innovation and deep-tech research.

# INTERDISCIPLINARITY, OPEN SCIENCE AND RESEARCH CULTURE

Our long-term commitment to **interdisciplinarity** continues to bear fruit through existing platforms such as NOVA Health, NOVA4TheGlobe, and the NOVA Tourism and Hospitality Platform, as well as the interdisciplinary programme in Sustainable Energy Systems sponsored by Galp. This year also marked the successful launch

of the first Santander Ignition Grants@ NOVA, a programme designed to support high-potential early-stage interdisciplinary research ideas and help transform them into future competitive projects. Three projects were selected in this inaugural edition, each representing NOVA's commitment to fostering promising scientific directions and strengthening the pipeline of innovative research across disciplines.

Open Science remains a strategic pillar, with initiatives such as the NOVA.ID Research Data Management Competence Centre and the Re.Data initiatives, reflecting a broader cultural shift towards more transparent, responsible and impactful research. NOVA also contributes to improving research careers as a pilot institution in the SECURE2 project, helping define the future European framework for sustainable and predictable research trajectories.

#### **EXCELLENCE WITH IMPACT**

NOVA's societal contribution continues to grow. This year, 105 NOVA researchers were included in the World's Top 2% Scientists list (a 20% increase from last year). In the Leiden Ranking 2025, NOVA improved its normalized impact to 1.24 and achieved 72.1% open-access publications, ranking second nationally. The Research Impact Narratives programme further showcased NOVA's societal relevance, with ten new narratives selected this year, reinforcing the University's mission of science with purpose.

#### **LOOKING AHEAD WITH CONFIDENCE**

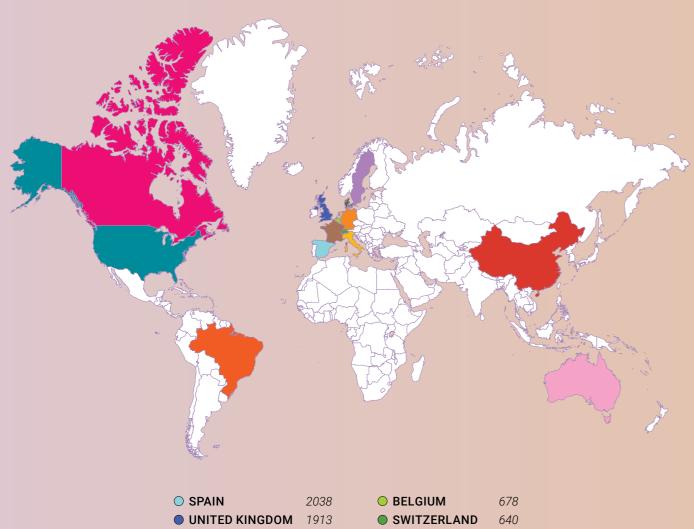
The new Rectorate team took office in October 2025, bringing stability, vision, and renewed energy to meet the challenges ahead in 2026. We are committed to fostering internal cohesion, sharing talent and resources, and aligning our scientific priorities across the institution.

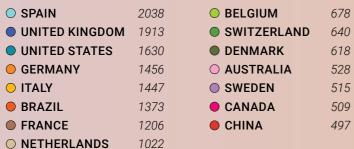
NOVA Science

**Figures** 

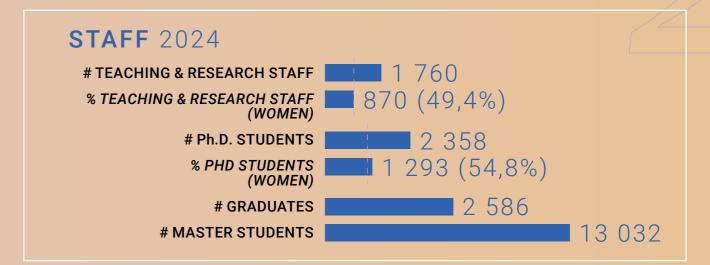
# Facts & Figures

## TOP 15 COLLABORATION PER COUNTRY 2024





SOURCE SciVal





€ 162,7 M 350+ ONGOING PROJECTS 2024

€ 61 M Active National Projects: 181 € 96 M Active European Projects: 185 Other International Projects: 31 € 5,5 M

€ 14 M **HORIZON EUROPE 2024\*** New Projects: 32

**NOVA RESEARCH UNITS 2025-2029** € 68,8 M Research Units: 40\*\*

EVALUATION 72,5% EVALUATION 20%

11% Increase in Excellent Research Units

ONGOING COLLABORATIVE R&D AGENDAS FOR BUSINESS INNOVATION (PRR):

30 PROJECTS € 32,5 M

**TOTAL RESEARCH INCOME 2024** 

€ 21,6 M

\* Includes interface institutes \*\* NOVA funding

# **PUBLICATIONS** 2024

INDEXED PUBLICATIONS 3 253 SCOPUS & WEB OF SCIENCE

(24% ABOVE WORLD AVERAGE)

NORMALIZED IMPACT **SCOPUS PUBLICATIONS 2023** 

% OF PUBLICATIONS IN TOP 10% 12,5% OF MOST CITED WORLDWIDE:

% OF PUBLICATIONS WITH INTERNATIONAL COLLABORATION: 49,7%

NXVA

#### Research **Highlights**

# Research Highlights



#### 3 NEW ERC GRANTS IN 2025\*:

- NOVA SBE Researcher Miguel Ferreira (Nova SBE) has won an ERC Advanced Grant (€ 2,5M), with the project FINANCEforALL, to study the impact of financial literacy on the active population. It is the first ERC Advanced ever granted in Portugal within this panel.
- NOVA FCT Researcher Filipe Natálio (UCIBIO) has won another ERC Proof-of-Concept (PoC) (€ 150K) to study sustainable solutions for coloring cotton fibers - BioDenim. Natalio's groundbreaking ideas have already secured 3 ERC grants: an ERC Consolidator Grant worth €2M (2022), and 2 ERC PoC in 2024 and 2025.
- NOVA FCT Paula Nabais (LAQV) has won an ERC Starting Grant (€ 1,5M), with the project SCARLET, to study the study of historical textile dyeing techniques, from the 15th to the 18th centuries, and the recovery of traditional practices, to develop sustainable solutions for today's textile industry.

ERC GRANTS 2007-2025: 42 ERCS | € 52,9 M \*by November 2025



ENVISIONING EXCELLENCE: Spotlighting NOVA's projects started late 2024-2025 and funded at over €500K (NOVA's budget) - by November 2025



CaixaResearch Health 2025 € 500 K

VirusAwareScopes.

Ricardo Henriques, ITQB NOVA



Health 2024 € 1 M Ana Pina, ITQB NOVA w/NMS and NOVA FCT

Pep-SICO, CaixaResearch

DxHub, HE WIDERA € 994 K Pedro Pedrosa, ITQB w/IHMT



CAIOC, DIGITAL € 542 K José Barata, NOVA FCT

EXPOSIM. HE HEALTH € 772.5 K Susana Viegas, ENSP

SHIELD, HE HEALTH € 618 K Cláudio M. Soares, ITQB NOVA

i2X. DIGITAL € 596 K Ricardo Gonçalves, NOVA FCT

POEMS, DIGITAL € 763 K Rodrigo Martins, NOVA FCT

HUBP2C, LISBOA2030 w/Fundação Haddad €3,2 M Paula Macedo, NMS



NOVA is strategically committed to strengthening a culture of trusted and reusable research data, notably through the NOVA.ID Research Data Management Competence Centre (NOVA.ID-RDM-CC) and the participation in the national Re.Data project - Network for Research Data Management, funded by the National Programme for Open Science and Open Research Data, which unites experts from NOVA to provide guidance, infrastructure, and training aligned with FAIR principles.





EIC Pathfinder Open 2025: Two NOVA projects among the 44 selected in Europe to support visionary science and disruptive innovation

- NOVA University Lisbon stands out in the EIC Pathfinder Open 2025, with two projects selected among only 44 chosen from over 2,000 applications.
- · At NOVA FCT CENIMAT|i3N, researchers Asal Kiazadeh and Emanuel Carlos join GAIA project, developing biodegradable, battery-free IoT devices and leading work on low-power components. Funding: € 522 K
- · At ITQB NOVA, James Yates participates in RamanProSeq, creating technology to sequence individual proteins with >99.9% accuracy, opening new possibilities for disease detection and personalised medicine. Funding: € 261 K



In 2025 NOVA recognized 10 impactful narratives from different scientific fields (5 award winning narratives and 5 honorable mentions)



A total of 105 researchers from NOVA are featured in the World's Top 2% Scientists List, marking a 20% increase compared to last year's 86. This recognition highlights the growing global impact and excellence of NOVA's research community.

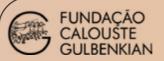


Following its participation in SECURE, NOVA is again a pilot institution in SECURE2, a 4-year EU-funded project. For the action plan, NOVA will test the implementation of the Research Career Framework (RCF) developed in SECURE, a practical toolbox for institutions to reform research careers. Through SECURE2, NOVA will continue to build a more sustainable, attractive and empowered research ecosystem.



#### NOVA rises in the Leiden Ranking 2025

In the Leiden Ranking 2025, NOVA achieved a normalized scientific impact (MNCS) of 1.24, placing it 24% above the world average. The University also improved its performance in Open Science, with 72.1% of its publications in open access, securing second place nationally. Enhanced data validation in PURE and the efficient daily PURE-RUN connector have been key drivers of this progress.



5 NOVA Students were awarded the Gulbenkian New Talents Scholarships. This programme seeks to identify and support exceptionally talented students and foster their first steps into research in core scientific disciplines. NOVA awardees: Mariana Duarte - FCT (Biology & Geology) | Tomás Vaz -FCT (Chemistry) | Luís Rodolfo – SBE (Social Sciences) | Rodrigo Cardoso - FCSH (Social Sciences) | Afonso Azevedo - FCSH (Humanities).

**NOVA Science** 

# Where Excellence happens: Research Units at NOVA

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ENGINEERING & TECHNOLOGY SCIENCES

HUMANITIES

MEDICAL & HEALTH SCIENCES

NATURAL SCIENCES

SOCIAL SCIENCES

Scientific excellence at NOVA takes shape within its Research Units — vibrant hubs where knowledge is created, tested, and transformed into innovation. Spread across diverse scientific fields, these 41 units embody the strength and diversity of NOVA's research ecosystem, reflecting the University's commitment to quality, interdisciplinarity, and global impact.

# Agriculture Sciences





> NAME

GREEN-IT BIORESOURCES FOR SUSTAINABILITY

> ACRONYM GREEN-IT

#### > COORDINATOR

M. Margarida Oliveira

#### > LOCATION

**ITOB NOVA** Avenida da República, Quinta do Marquês, Oeiras 2780-157 Oeiras, Portugal

#### > WEBSITE

www.itqb.unl.pt/green-it

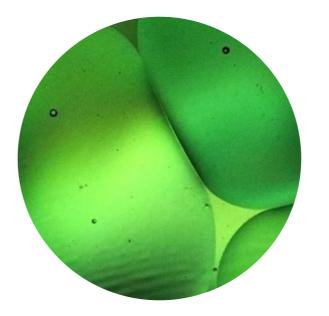
#### SCIENTIFIC AREAS

New bio-based and digital solutions for biotic threats

Plant Phenotyping and data management

Green-it is currently the only Portuguese R&D Unit fully dedicated to research in plant sciences, bringing together agronomists, biologists, biochemists, and engineers from ITQB, iBET, INIAV, INSA, GIMM and InnovPlantProtect, with 164 members (77 Integrated researchers, 44 PhD students). Green-it cross-talks in a field-tobench-to-field approach, contributing to the 2nd UN Sustainable Development goal and the 2nd European Societal Challenge. Framed by the "One Health" concept, Green-it addresses the challenges of an increasing population in a climate change scenario to promote environmental and economic sustainability, food security, and food transition towards healthier plant-based diets, with a focus on Mediterranean crops. Green-it firmly believes in inter-institutional cooperation for complementarity and alignment of strategies, to shape the future and impact society and policy.





#### **FACTS AND FIGURES**

> TEAM - 164 TOTAL PEOPLE

77 BEING PHD HOLDERS/INTEGRATED **MEMBERS** 

AND OTHER COLLABORATORS

44 PHD STUDENTS 43 MSC STUDENTS, TECHNICIANS

> PUBLICATIONS (2024)



#### **151 PUBLICATIONS OF WHICH:**

- 86 were international publications
- 49 were national publications
- 7 were edited books and book chapters
- 9 were non-indexed technical publications
- · Number of citations of abovementioned publications totaled 355, as of October 2025

#### > COMPETITIVE FUNDING/ PROJECTS (2024)

- From 2020 to 2024, Green-it secured 4.5M EUR in international competitive funding calls, mainly from the Horizon Europe programme, but also from La Caixa Foundation and other sources.
- · Green-it had 46 ongoing national projects and 63 international projects.

#### > NUMBER OF PATENTS AND SPIN-OFF COMPANIES (2024)

Green-it has submitted 9 patent applications, and developed 1 model, 5 computational apps, and 3 pilot installations.

# **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 2.4M

#### **CONSORTIUM MEMBERS**

Green-it is coordinated by ITQB NOVA, but has iBET and GIMM also as management institutions, gathering plant science researchers from these Institutions as well as from INIAV, InnovPlantProtect and INSA.

#### HIGHLIGHTS FOR THE FUTURE

Green-it envisions becoming an R&D Unit internationally recognized as a leader in plant sciences research and innovation, mainly focused on Mediterranean species. Green-it's mission for the future is: (1) to develop fundamental knowledge in plant sciences and interactions with the environment, integrating those in systems biology approaches; (2) to apply this knowledge to new varieties/solutions/practices for improved crop production and quality; (3) to empower new generations of scientists, entrepreneurs, farmers and technicians through tailored courses at the postgraduate & technical level and; (4) to raise "plant awareness" through outreach and citizen science. Operating at a high excellence level, Green-it has defined 3 key areas of intervention: 1) plant productivity and plant(/bio)-based products, 2) plant protection, and 3) soil health.





# **i3N**

Sciences |



> NAME

INSTITUTE FOR NANOSTRUCTURES, NANOMODELLING AND NANOFABRICATION

> ACRONYM

i3N

> COORDINATOR

Rodrigo Martins

> LOCATION

Campus de Caparica 2829-516 Caparica, Portugal

> WEBSITE

www.i3n.org

#### SCIENTIFIC AREAS

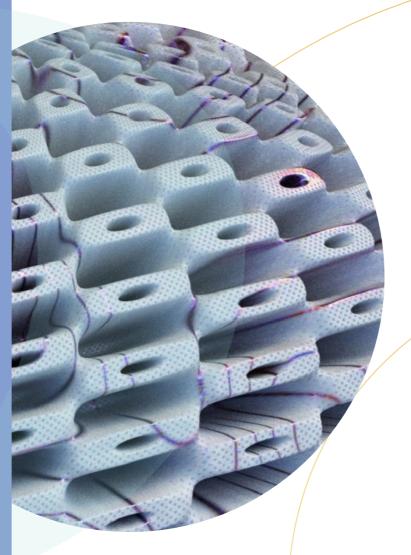
Sustainable Micro and Nanofabrication

Green and Clean Energy Systems

Nanomaterials Engineering and Functional Interfaces

Biomedical Devices and Systems

Aligned with the European Advanced Materials Strategy, the UN Sustainable Development Goals and the Green Deal, i3N aims to tackle challenges in nanotechnologies, nanomaterials, and nanoscience's, advancing materials science for multi-sector applications. Building on the strengths of NOVA and the University of Aveiro, i3N designs innovative materials and nanostructures (OD to 3D) for environmentally sustainable solutions across electronics, energy, mobility, construction, and healthcare. The 2025-2029 program focuses on attracting top talent, fostering creativity, and promoting education to meet future needs. Organized into four thematic lines and six groups, research emphasizes advanced micro/nanomaterials, breakthrough concepts, sustainable technologies, industry transfer, and public engagement. Committed to ethics and collaboration, i3N contributes to sustainable development and quality of life.



## **FACTS AND FIGURES**

#### > TEAM - 256 TOTAL PEOPLE

58 ACADEMIC STAFF
67 RESEARCHERS & POSTDOCS

56 PHD STUDENTS
63 COLLABORATORS

12 TECHNICIANS/ADMINISTRATIVE STAFF

More than 22 nationalities, 20% of international members, more than 35% female.



#### > PUBLICATIONS

- Over 1600 Scientific Publications, including 42 Highly Cited Papers, and more than 110000 Citations
- Scientific Publications with 63% of International Collaboration
- 123 h-index
- More than 1400 communications in national and international scientific events
- 75 National and International Awards and Distinctions

#### > COMPETITIVE FUNDING/ PROJECTS

- 12 European Research Council (ERC) Grants Awarded to i3N Researchers
- 16.91 M € projects from the PRR under Mobilizing Agendas
- **65.9 M €** national and European projects during the 2018-2025 period
- 1 174 632,52 € (from FCT 2020-2024)

# > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

Patents: 58 patents issued.

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 1,86 M NOVA FCT € 669 K NOVA.ID.FCT € 2,5 M TOTAL

#### **CONSORTIUM MEMBERS**

- NOVA University Lisbon
- · University of Aveiro
- NOVA.ID.FCT Associação para a Inovação e Desenvolvimento da FCT
- Instituto de Desenvolvimento de Novas Tecnologias

#### HIGHLIGHTS FOR THE FUTURE

Over the next five years, i3N aims to boost Portugal's competitiveness by driving innovation in sustainable, high-value, knowledge-based products, aligned with the EU Green Deal, the digital and green transitions, and the UN Sustainable Development Goals. We will leverage cross-disciplinary expertise to develop eco-friendly materials, manufacturing processes, biomedical devices, clean energy systems, and lot solutions beyond scientific frontiers. i3N will foster a culture of innovation, promote education and entrepreneurship through advanced training and startups, and strengthen collaborations nationally and internationally. By transferring knowledge to industry and society, we will accelerate technology adoption, support Industry 4.0, and build resilient innovation ecosystems, establishing the Institute as a leader in scientific and technological excellence.



# Engineering & Technology Sciences





> NAME

CENTER FOR ENVIRONMENTAL AND SUSTAINABILITY RESEARCH

> ACRONYM

CENSE

> COORDINATOR

Francisco Ferreira

> LOCATION

DCEA FCT NOVA – Campus de Caparica 2829-516 Caparica, Portugal

> WEBSITE

www.cense.fct.unl.pt/

#### SCIENTIFIC AREAS

Bioresources and Green Technologies

Computation for Sustainability

**Ecological Economics and Environmental Management** 

**Energy and Climate** 

Sustainable Water and Sanitation

Wastes and Resources Recovery

CENSE develops its activities through the promotion of research projects, outreach initiatives, training programs, collaboration with private and public organizations, and sciencepolicy dialogues. CENSE promotes interdisciplinary research in environmental sciences and engineering, focusing on the interaction between human and ecological systems, to encourage sustainable development. Its main goal seeks to improve understanding of environmental and human systems to drive technological and social innovations for sustainability. Its work is guided by five principles: commitment to a sustainable future, inter- and transdisciplinary research, methodological pluralism, freedom of research, and a science-in-society approach. Through co-creation with society, CENSE translates its research into impactful programs and policies. The center excels in sustainability science, technology transfer, policy advice, and public engagement, with innovation and societal outreach.





#### **FACTS AND FIGURES**

> TEAM - 95 TOTAL PEOPLE (2025)

32 PHD HOLDERS
28 PHD STUDENTS

35 COLLABORATORS

> PUBLICATIONS (2020-2024)



- 288 Publications in international journals
- **13** Books
- 58 Book chapters

#### > COMPETITIVE FUNDING/ PROJECTS (2020-2024)

- National Research Projects: 10 (ex. Cityself, ENVISION, Roteiro para a neutralidade carbónica da Economia Portuguesa)
- International Research Projects: 28 (ex. H2tALENT, EPAH, HORIS, ENTRACK, HUB IN, LOCATEE, CircleUp)
- Policy and Technical support projects: 61 (ex. Transition Point NEXT2U, Air quality management policy support to APA, ECO360, "Vale Eficiência" – Fundo Ambiental)



- FCT, I.P. NATIONAL FUNDING: € 1,9 M
- OTHER NATIONAL FUNDING: € 1,3 M
  INTERNATIONAL FUNDING: € 1.6 M
- > NUMBER OF PATENTS AND SPIN-OFF COMPANIES (2020-2024)

Patents: 8

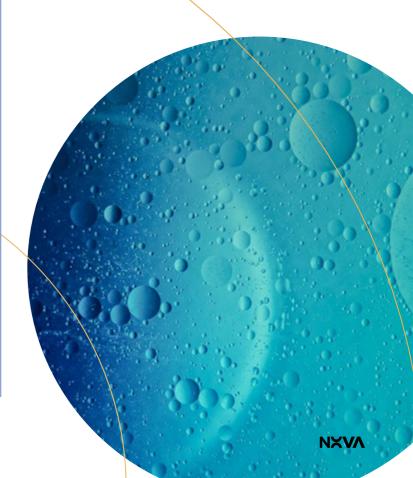
**Computational Applications: 2** 

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 230 K NOVA FCT € 1,3 M NOVA.ID.FCT € 1,57 M TOTAL

#### HIGHLIGHTS FOR THE FUTURE

In the future, CENSE envisions itself as a leading center of excellence in sustainability research and education, driving innovation, collaboration, and meaningful societal impact. It strives to generate knowledge that informs decision-making, co-creates transformative solutions, and inspires a global community of researchers. To realize this vision, CENSE is committed to delivering originality, quality, and passion across all its activities, sparking curiosity and engagement worldwide. This ambition will be pursued through its theory of change pathways, emphasizing co-creation with society to enhance research impact. CENSE will also translate its thought leadership into actionable societal programs with both local and global relevance. Furthermore, it aims to remain a key player in nurturing start-ups with strong potential for global markets.



# Engineering & Technology Sciences





> NAME

CIVIL ENGINEERING RESEARCH AND INNOVATION FOR SUSTAINABILITY

> ACRONYM

CERIS

> COORDINATOR

Rodrigo Gonçalves

#### > LOCATION

Campus de Caparica 2829-516 Caparica, Portugal

#### > WEBSITE

https://ceris.pt/

#### SCIENTIFIC AREAS

Hydraulics

Environment and water resources

Systems and management

Transportation system

Studies on construction

Structures and geotechnics

CERIS aims to create and disseminate scientific knowledge in the broad field of Civil Engineering while fostering higher education and advanced training. It brings together and actively engages creative scientists, exceptionally talented students, and industry-leading professionals in both fundamental and applied research at national and international levels. Addressing key societal challenges, CERIS conducts cutting-edge research using an interdisciplinary approach, with expertise spanning from fluvial systems to eco-friendly and advanced technologies. The unit focuses on collaboratively delivering state-ofthe-art advances and developing innovative Civil Engineering solutions that serve the industry, the natural and built environments, and society. These outcomes are grounded in a robust scientific background and advanced engineering methods, encompassing analytical, numerical, and experimental approaches.



#### **FACTS AND FIGURES**

> TEAM - 450+ TOTAL PEOPLE (JULY 2025)

190 MEMBERS AND PHD COLLABORATORS

@ 250 PHD STUDENTS

18 TECHNICAL AND ADMINISTRATIVE STAFF

> PUBLICATIONS (2018-2024)



- 2649 WoS/Scopus articles
- 2280 Conference papers
- 270+ Book chapters
- 40+ Book editions
- 35+ Books

#### > COMPETITIVE FUNDING/ PROJECTS (2018-2024)

- @ 25 M € raised
- 146 national projects
- 105 international projects

# > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

Products/prototypes: 21 Materials developed: 12 Software solutions: 20

Patents: 11





€ 155 K NOVA FCT € 168,7 K NOVA.ID.FCT € 323,7 K TOTAL

## **CONSORTIUM MEMBERS**

- IST
- UAveiro
- ITECONS (UCoimbra)

# HIGHLIGHTS FOR THE FUTURE

Over the next five years, CERIS will reinforce its position as an international reference in Civil Engineering research and innovation, addressing global challenges in climate change, energy transition, circular economy, and digital transformation. Its strategy focuses on strengthening human resources by hiring and consolidating talented researchers, expanding doctoral training, and supporting career development. CERIS will invest in upgrading experimental and IT laboratories, while broadening participation in international networks and consortia to secure major funding opportunities. By fostering knowledge transfer, partnerships with industry, and impactful dissemination, CERIS aims to maximise its societal impact. A strong commitment to inclusiveness, sustainability, and organisational resilience will ensure long-term growth and leadership at both national and global levels.



# **Engineering & Technology Sciences**





> NAME

CENTER OF TECHNOLOGY AND SYSTEMS

> ACRONYM
CTS

> COORDINATOR

Luis M. Camarinha-Matos

> LOCATION

UNINOVA-CTS, FCT Campus 2829-516 Caparica, Portugal

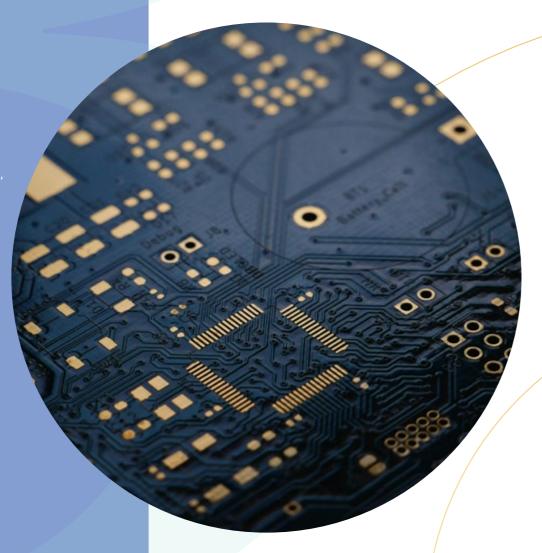
> WEBSITE

https://cts.uninova.pt/

#### SCIENTIFIC AREAS

Electrical and Computer Engineering Cyber-Physical Systems CTS research focuses on engineering systems with a cyber-physical dimension, covering modeling, design, development of support technologies and methods, proposition of adequate governance models, application and assessment. It contributes to developing the next generation of human-Alcentric, collaborative, safe, sustainable, and resilient cyber-physical systems (CPS), establishing CTS as a global reference in "Integrated Human-AI CPS."

Ongoing activities target intelligent, autonomous, and hyper-connected systems that prioritize human-Al collaboration and value creation. CTS focuses on human-centric, safe, and secure CPS with self-healing and cyber-defense capabilities, and resilient or antifragile CPS that improve after disruptions. Guided by sustainability, including energy efficiency and systems optimization, CTS integrates multiple disciplines to address all CPS layers - from smart devices to large collaborative systems-of-systems.



#### **FACTS AND FIGURES**

> TEAM - 184 TOTAL PEOPLE



92 RESEARCHERS WITH PHD (56 INTEGRATED, 36 COLLABORATORS)

92 PHD STUDENTS



#### > PUBLICATIONS

- Last 5 years: 1374 publications (598 journal articles, 705 conference papers, 37 book chapters, 34 books and books editions)
- In 2024: 318 publications (107 journal articles, 197 conference papers, 6 book chapters, 8 books and books editions)

#### > COMPETITIVE FUNDING/ PROJECTS 2020-2024

- 77 active projects in 2024 (14 started in 2024, 63 running from previous years)
- Total projects: 129 | 23 109 795 €
- > NUMBER OF PATENTS
   AND SPIN-OFF COMPANIES
   (2020-2024)

Patents: 4

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 89,7 K NOVA FCT

#### **CONSORTIUM MEMBERS**

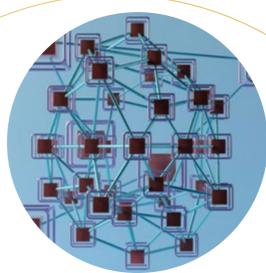
Instituto de Desenvolvimento de Novas Tecnologias (UNINOVA), Instituto Superior de Engenharia de Lisboa (ISEL/IPL), NOVA University Lisbon (UNL), Instituto Politécnico de Beja (IPBeja), Instituto Politécnico de Setúbal (IPSetúbal), COFAC - Cooperativa de Formação e Animação Cultural, Instituto Politécnico de Portalegre (IPPortalegre)

CTS is part of LASI – Associated Lab on Intelligent Systems.

#### HIGHLIGHTS FOR THE FUTURE

#### CTS is committed to the following strategic goals:

- Establish a solid foundation for human-centric CPS: Advance human-Al collaboration to enhance quality of life and foster value creation aligned with trends of Society 5.0. This entails role sharing, mutual introspection, and collaborative decision-making, aligned with Society 5.0 and cyber-physical-social systems.
- Develop safe and secure CPS technologies: Create selfhealing mechanisms, enhance protection from cyber threats, and promote technological sovereignty.
- Foster sustainable and resilient CPS: Address societal challenges in line with the UN Agenda 2030, developing systems that adapt, recover, and grow stronger after disruptions.
- Cultivate multidisciplinary integration: Ensure seamless collaboration across fields, from electronics, sensors, and embedded systems to communication infrastructures, systems-of-systems, and collaborative networks.



NOVA Science





#### > NAME

MECHANICAL ENGINEERING AND RESOURCE SUSTAINABILITY CENTER

> ACRONYM

MEtRiCs

> COORDINATOR

Ana Luísa Almaça da Cruz Fernando

> LOCATION

NOVA FCT, Campus de Caparica 2829-516 Caparica, Portugal

> WEBSITE

www.metrics.com.pt/

#### SCIENTIFIC AREAS

Energy Conversion and Waste utilization

Food, Health & Bioengineering

Advanced Engineering Systems

MEtRICs mission is to create scientific knowledge and provide technical solutions for a cleaner, safer, and sustainable world in the three scientific areas of the unit. MEtRICs aim to have an impact on society and contribute to the social and economic benefits that come hand in hand with a knowledge-based economy. Although fundamental research is considered, in all activities, MEtRICs is mainly oriented for applied research. We believe that a few criteria should be met in order to fulfill our mission: i) research excellence; ii) multidisciplinary approach; iii) proximity with the economic dynamics of the regions; iv) dissemination; v) advanced training; vi) close collaborations with both industry and community.

#### **FACTS AND FIGURES**

- > TEAM 62 TOTAL PEOPLE
  - 25 INTEGRATED MEMBERS WITH PHD



> PUBLICATIONS (2018-2023)

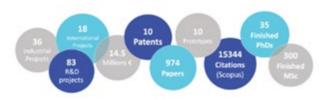


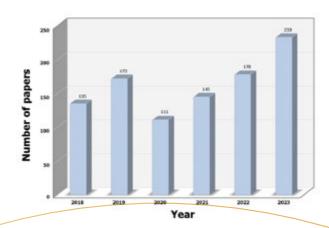
- **974** Papers
- 15344 Citations

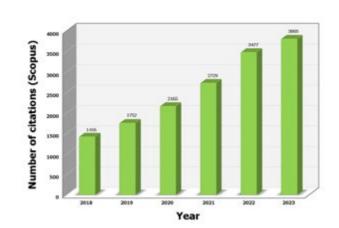
#### > COMPETITIVE FUNDING/ PROJECTS

- 36 industrial projects
- 18 international projects
- 83 R&D projects €14,5M
- € 1,8 M secured funding for the period 2025-2030:
   62% national and industrial funding, 38% international funding
- > NUMBER OF PATENTS AND SPIN-OFF COMPANIES (2018-2023)

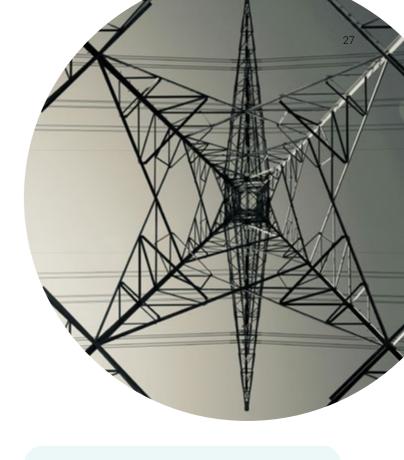
Patents: 10 Prototypes: 10











# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 137 K NOVA FCT € 29 K NOVA.ID.FCT € 166 K TOTAL

#### HIGHLIGHTS FOR THE FUTURE

For the forthcoming period, activities are organized along the areas:

**Energy Conversion and Waste Valorization:** technologies for sustainable use of energy and materials bringing upfront the circular economy concept.

**Food, Health & BioEngineering:** technical solutions to optimize the sustainability of processes: reducing energy demand and use of non-renewable resources, creating opportunities for the valorization of by-products, in a circular economy context.

Advancing Engineering Systems: to delve the physical domain and the distributed control within engineering systems, using advanced digital tools from a research and industrial application perspective.

Objectives rely on maintaining competitive external funding and postdocs; increasing the scientific production, patents and number of PhD/year; organization of one international conference/year; fostering the industrial collaborations.

NOVA Science





> NAME

**CENTRE FOR MUSIC STUDIES** 

> ACRONYM
CESEM

> COORDINATOR

Luísa Cymbron

> LOCATION

Colégio Almada Negreiros Universidade NOVA de Lisboa – Campus de Campolide 1099-032 Lisboa, Portugal

> WEBSITE

https://cesem.fcsh.unl.pt

#### SCIENTIFIC AREAS

Historical musicology

Critical theory, philosophy and sociology of music

Music psychology and pedagogy

Creation, practices and music technologies

Music and media

Musical heritage: identification and preservation



The Centre for Music Studies (CESEM), based at NOVA FCSH in Lisbon, is a research unit founded in 1997. It includes research teams at the University of Évora, Lisbon and Porto Polytechnics, and independent researchers. CESEM focuses on music and its connections with the arts, society, and culture, through historical, aesthetic, sociological, philological, pedagogical, compositional, therapeutic, and performative approaches. An interdisciplinary approach is favored through five research groups, eight thematic lines, and five laboratories. CESEM is internationally recognized in all these areas through its published output's high quality and innovative character. The centre hosts national and international projects (CEEC, Marie Curie, Erasmus+, COST, Europa Criativa) and is part of IN2PAST. The centre promotes an inclusive, collaborative environment, scientific integrity, and gender equality.



#### **FACTS AND FIGURES**

> TEAM - 292 TOTAL PEOPLE (2024)

17 CONTRACT RESEARCHERS

62 PROFESSORS/LECTURERS HEI

1 FCT FUNDED POST-DOCS

23 PHD'S WITH SCHOLARSHIPS

34 PHD'S WITHOUT SCHOLARSHIPS

21 OTHERS

130 COLLABORATORS

**4 SCIENCE MANAGEMENT** 

#### > PUBLICATIONS (2018-2023)



- 159 Books
- 463 Books chapters
- 395 Journal articles
- 177 Indexed articles (Scopus & WoS)

#### > COMPETITIVE FUNDING/ PROJECTS

- 12 FCT funded projects: €1,03M
- European Commission (MSCA-PF; Creative Europe; ERASMUS+): €332K
- Funding received from Participant or Management Institutions: **€55K**
- Companies, industry and other private sources based in Portugal: €325K
- Companies, industry and other private sources not based in Portugal: €52K

# FUNDING AWARDED BY FCT, IP (2025-2029)

€1,1 M

#### **CONSORTIUM MEMBERS**

- School of Social Sciences and Humanities (NOVA FCSH)
- University of Évora
- · Polytechnic Institute of Lisboa (ESML-IPL)
- Polytechnic Institute of Porto (ESMAE-P.PORTO)
- CESEM is part of IN2PAST, the Associate Laboratory for Research and Innovation in Heritage, Arts, Sustainability, and Territory – since 2021.

# HIGHLIGHTS FOR THE FUTURE

The general objectives of CESEM, in line with the Portugal 2030 Agreement, can be summarised as follows:

- 1. To provide a research environment for international teamwork organised in response to clearly identified scientific and societal priorities;
- To provide researchers with the opportunity to develop their work in an inclusive and democratic environment, leading to the establishment of tenuretrack positions in close alignment with general university policies;
- 3. To support the research interests of its members and the dissemination of knowledge;
- 4. To encourage collaborative projects for the study of Portuguese and Latin American music;
- To continue feeding databases and creating research tools and digital resources, supported by a policy of sustainability;
- To promote excellence in graduate and postgraduate studies, in close collaboration with the Department of Musicology and affiliated institutions;
- 7. To promote interdisciplinary work, in particular within the framework of the IN2PAST consortium.







> NAME

CENTRE FOR ENGLISH, TRANSLATION, AND ANGLO-PORTUGUESE STUDIES

> ACRONYM

CETAPS

> COORDINATOR

Carlos Ceia

> LOCATION

Campus de Campolide Colégio Almada Negreiros - Offices 353/352 1099-085 Lisboa, Portugal

> WEBSITE

www.cetaps.com/

#### SCIENTIFIC AREAS

Anglo-Portuguese Studies

**English Studies** 

American Studies

Languages Teaching

Digital Humanities

Jointly hosted by NOVA University Lisbon and University of Porto, CETAPS is a dynamic research centre that brings together in total 63 integrated members and 135 collaborators (mostly junior researchers doing doctoral or postdoctoral training there) from 16 Portuguese educational institutions (11 from higher education), promoting research and activities with high national and international reach.

CETAPS is organised into 7 Research Areas. It runs and manages 11 databases and publishes 4 electronic journals, 2 of them indexed by Scopus: Journal of Anglo-Portuguese Studies and Translation Matters, now a Q1 journal. CETAPS' Digital Laboratory, reflecting the Centre's commitment to developing the Digital Humanities, facilitates open-access research while supporting early-stage researchers in developing their projects and careers.

#### **FACTS AND FIGURES**

> TEAM - 150 TOTAL PEOPLE



46 INTEGRATED RESEARCHERS



48 COLLABORATORS

2 RESEARCH MANAGERS

#### > PUBLICATIONS (LAST 5 YEARS)



- and international journals
- 129 Books and book chapters
- 438 Papers delivered at national and international conferences
- 2 MOOCs (Massive Open Online Courses) at NAU

#### > COMPETITIVE FUNDING/ **PROJECTS**

- 3 Erasmus+ projects
- · 1 CIPSH Chair (UNESCO) on Digital Humanities in Education

# **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 1,04 M

#### CONSORTIUM MEMBERS

- University of Porto/Faculty of Arts and Humanities - Main management institution;
- · NOVA University Lisbon/School of Social Sciences and Humanities - Participating management institution.

#### HIGHLIGHTS FOR THE FUTURE

Strategic project 2025-2029

"Sustainable Cultures: Academia, Imagination and the World out there"

Goal 1: Reinforcing CETAPS's cohesive research identity;

Goal 2: Fostering an ambitious research culture that advances knowledge and attracts high-quality researchers;

**Goal 3:** Ensuring transparent management, dissemination of results, equal opportunities, and accountability;

Goal 4: Further improving the quality of advanced training;

Goal 5: Further extending the Centre's internationalisation through networks and joint projects;

Goal 6: Boosting knowledge transfer through conferences and publications;

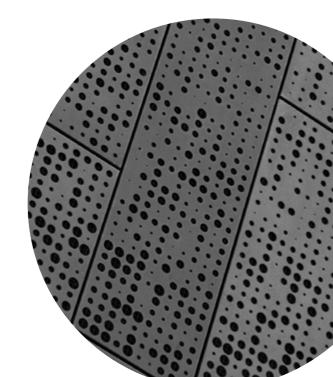
Goal 7: Raising awareness of CETAPS' work through outreach and citizen science;

Goal 8: Raising researchers' awareness of open scholarship and ethical challenges in the Humanities, e.g. Al usage;

Goal 9: Implementing Gender Equality, Diversity and Inclusion policies;

Goal 10: Investing in knowledge and technology transfer through advanced digitisation.









> NAME

CENTRE FOR THE HUMANITIES

> ACRONYM
CHAM

> COORDINATOR

João Luís Lisboa

#### > LOCATION

Colégio Almada Negreiros (CAN) Universidade NOVA de Lisboa — Campus de Campolide 3rd floor — Room 330

#### > WEBSITE

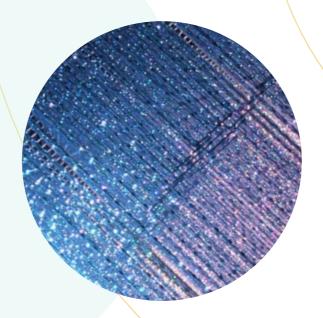
https://cham.fcsh.unl.pt/home.php

#### SCIENTIFIC AREAS

History and Archaeology

Arts

Linguistics and Literary Studies



CHAM is an international benchmark in the Humanities and one of Portugal's most prominent research centres in this area. Acknowledged for its interdisciplinary, multiscale, and multichronological approaches, as well as for its cross-cultural and cross-geographical perspectives, it fosters ground-breaking and collaborative research across diverse disciplines, including history, literature, archaeology, art history, philosophy, and cultural studies. Committed to promoting innovation, CHAM actively engages in advanced training, public outreach, and knowledge transfer, championing the principles of open science and inclusiveness in order to cultivate an inclusive academic community.



#### FACTS AND FIGURES

> TEAM - 180 TOTAL PEOPLE (2025)

125 INTEGRATED PHD (22 HIRED RESEARCHERS)

49 PHD STUDENTS (20 FCT FELLOWSHIPS)

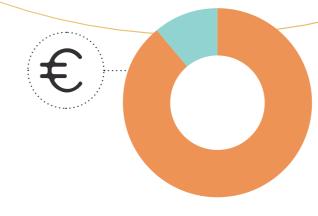
6 RESEARCH MANAGERS

> PUBLICATIONS (2024-2025)



- 160 Papers
- **54** Books
- 169 Chapters of Books
- 43 Papers Indexed to Scopus
- 9 Citations WoS
- 23 Papers Indexed to WoS
- 61 Citations Scopus

#### > COMPETITIVE FUNDING/ PROJECTS (ONGOING ON 2025)



- EUROPEAN COMMISSION:
- ERC SYNERGY GRANT €1,8 M
- · MSCA € 340 K
- 1 STAFF EXCHANGE GRANT
- 1 PF FELLOWSHIP
- CERV € 55 K
- · CINEA € 114 K
- FCT MCTES: €280 K
- 2 R&D PROJECTS
- 2 EXPLORATORY PROJECTS

# FUNDING AWARDED BY FCT, IP (2025-2029)

€3,46 M

#### **CONSORTIUM MEMBERS**

CHAM – Centre for the Humanities is an inter-university research unit of NOVA FCSH and of the University of the Azores (UAc).

#### HIGHLIGHTS FOR THE FUTURE

From 2025 to 2029, CHAM will delve into how the Human and Humanity have been represented, reconstructed, and reimagined across diverse historical periods and cultural contexts.

We will challenge traditional dichotomies – such as human/ nonhuman, subhuman/superhuman, and inhuman/more-than-human – offering alternative perspectives to conventional interpretations of the Humanities and broadening the scope to themes such as the role of power in knowledge construction, the processes of classification that perpetuate exclusion and subordination, and the complex questions surrounding identity, alterity, and otherness.

By doing so, CHAM aims to enrich ongoing debates on these topics within the Humanities and offer fresh insights into the ever-evolving understanding of what it means to be human.





> NAME

INTERUNIVERSITY CENTRE FOR THE HISTORY OF SCIENCE AND TECHNOLOGY

> ACRONYM
CIUHCT

> COORDINATOR

Davide Scarso

#### > LOCATION

Centro Interuniversitário de História das Ciências e da Tecnologia, Faculdade de Ciências e Tecnologia Campus de Caparica, Building VII, Piso 2 2829-516 Caparica, Portugal

> WEBSITE

www.ciuhct.org

#### SCIENTIFIC AREAS

History of Science

Technolog

Medicine

CIUHCT conducts research in the History and Philosophy of Science, Technology, and Medicine, with a focus on the global circulation of knowledge, practices, and material cultures from early modernity to the present. Its work integrates historical, philosophical, and interdisciplinary approaches to understand how technoscientific practices shape societies and environments over time. Current research explores topics such as colonial and tropical medicine, technoscientific diplomacy, the Anthropocene and environmental humanities, digital infrastructures and citizen science, and the heritage of science, technology, and medicine. Through this broad lens, CIUHCT analyses the entanglements between knowledge, power, and material life, connecting past configurations of expertise and innovation to contemporary challenges like sustainability, public health, and technological governance.

#### **FACTS AND FIGURES**

- > TEAM 61 TOTAL PEOPLE
  - 36 INTEGRATED MEMBERS (12 NOVA)
  - 25 COLLABORATORS (15 NOVA, OF WHICH 13 PHD STUDENTS)
- > PUBLICATIONS (2023)



- 8 Books and Edited Volumes (5 international, 3 national)
- 28 Book Chapters (18 international, 10 national)
- 45 Journal Articles in peer-reviewed journals (41 international, 4 national)
- > COMPETITIVE FUNDING/ PROJECTS (2022-2028)
  - . 6 running projects: €396 K

#### **CONSORTIUM MEMBERS**

Faculdade de Ciências e Tecnologia da Universidade Nova de Lisboa. Faculdade de Ciências da Universidade de Lisboa, NOVA.ID.FCT, Fciências.ID.

# FUNDING AWARDED BY FCT, IP (2025-2029)

**€** 5,8 K NOVA FCT **€** 2,54 K NOVA.ID.FCT **€** 2,60 K TOTAL

#### HIGHLIGHTS FOR THE FUTURE

Over the next five years, CIUHCT will consolidate its leadership in the History of Science, Technology and Medicine, while expanding research in Heritage studies, the Anthropocene, digital transformations and public engagement, including science communication, citizen science and sustained work with museums. Strengthening the research team and widening structured opportunities for early-career scholars will be a central priority, supported by training, mentoring and regular seminar programmes. CIUHCT will deepen its international presence through targeted collaborations and participation in global debates linking historical analysis to contemporary challenges in climate, health and the digital sphere. The unit aims to cultivate a coherent, ambitious scientific environment capable of matching its highest previous standards and contributing decisively to the future of HSTM.









> NAME

LINGUISTICS RESEARCH CENTRE OF NOVA UNIVERSITY LISBON

> ACRONYM
CLUNL

> COORDINATOR

Maria Lobo

> LOCATION

NOVA FCSH, Campolide Campus Colégio Almada Negreiros, Room 345 1099-085 Lisbon, Portugal

> WEBSITE

https://clunl.fcsh.unl.pt/en/

#### SCIENTIFIC AREAS

Linguistics (Formal and Experimental Linguistics; Lexicology, Lexicography and Terminology; Grammar and Text) The Linguistics Research Centre of NOVA University Lisbon (CLUNL) is a research unit that aims at promoting research in theoretical and applied Linguistics, to develop the advanced training of researchers and foster the dissemination of scientific data on those domains concerned with the nature and structure of languages and texts. CLUNL is organized in three research groups - Formal and Experimental Linguistics; Lexicology, Lexicography and Terminology; Grammar & Text. The work developed at CLUNL has made a relevant and distinctive contribution to the study of Linguistics, in areas such as language acquisition (native language and non-native language), lexicology, lexicography and terminology, discourse analysis and text theory, as well as in morphology, syntax, semantics, and historical linguistics.





#### **FACTS AND FIGURES**

> TEAM - 190 TOTAL PEOPLE

33 MEMBERS

1 POSTDOC RESEARCHER

24 COLLABORATORS WITH PHD

60 COLLABORATORS WITHOUT PHD

49 PHD STUDENTS

14 PHD STUDENTS WITH GRANTS

4 RESEARCH GRANT HOLDERS

3 OTHERS

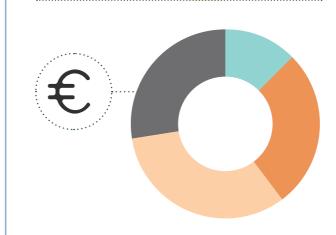
2 STAFF

> PUBLICATIONS (2025)



- 49 Articles
- **5** Books
- 20 Chapters in books
- 15 Indexed articles in Scopus

COMPETITIVE FUNDING/ PROJECTS:



- SPELL2 SYNCHRONIZING PERCEPTUAL AND LEXICAL ABILITIES IN SECOND LANGUAGE ACQUISITION € 191 K
- MULTIPOD MULTILINGUAL AND
  MULTICULTURAL SPACES FOR POLITICAL
  DELIBERATION € 414 K (MANAGED BY IFILNOVA)
- HEREDITARY HETEROGENEOUS SEMANTIC DATA INTEGRATION FOR GUT-BRAIN INTERPLAY € 499 K
- **IREAD4SKILLS** INTELLIGENT READING
  IMPROVEMENT SYSTEM FOR FUNDAMENTAL AND
  TRANSVERSAL SKILLS DEVELOPMENT € 415 K

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 1,28 M

#### HIGHLIGHTS FOR THE FUTURE

- Develop fundamental and applied research in the 3 thematic lines of CLUNL.
- Lead the production of knowledge in the domain of language acquisition, identifying individual differences, social contexts, and early predictors of reading and writing skills, and sharing corpora of oral and written narratives of primary school children.
- Develop new terminological, lexicographic and lexical computational resources, contributing to the development of new models of the lexicon, coding structures, and improvement of LLM.
- Deepen the dialectics between texts/discourses and linguistic stabilizations and questions related to gender sensitive language and gender stereotypes.
- Continue to promote commitment with society, through lifelong learning initiatives, building of resources for teaching/learning L1/L2 Portuguese, cooperation projects, and open access to linguistic resources.

NOVA Science





> NAME

INSTITUTE FOR THE STUDY OF LITERATURE AND TRADITION

> ACRONYM

IELT

> COORDINATOR

Teresa Araúio

#### > LOCATION

Colégio Almada Negreiros (Office 355) Campus de Campolide 1099-085 Lisboa, Portugal

#### > WEBSITE

https://ielt.fcsh.unl.pt

#### SCIENTIFIC AREAS

Humanities and Arts

Linguistics and Literary Studies



The Institute for the Study of Literature and Tradition is an RU dedicated to the study of the literary phenomenon in its multifaceted relationship with tradition, understood as a living collection that participates in the construction and creation of value in the scientific, cultural, artistic and social spheres. IELT has 3 research groups with an intensive interdisciplinary profile: 1) "Literature: Tradition and Archive", 2) "Interart Studies" and 3) "Environmental Humanities". Each of these groups unfolds in projects that combine, according to their specific nature, exploratory, fundamental and applied research using digital tools and spaces. These groups specializing in scientific issues already underway at IELT are simultaneously processing new research areas.

# **FACTS AND FIGURES**

> TEAM - 152 TOTAL PEOPLE

124 RESEARCHERS
27 PHDS

1 SCIENCE MANAGER

> PUBLICATIONS



- Articles 579
- Indexed articles 148
- Books 343
- Chapters 637

## HIGHLIGHTS FOR THE FUTURE

- Create and apply new knowledge in the main fields of IELT: Literature: Tradition and Archive, Interarts Studies and Environmental Humanities.
- Interact with the 'Arts and Humanities' axis of NOVA FCSH's strategic plan, with other UO structures, in partnership with external (inter)national institutions and in formal and informal scientific networks.
- Welcome and support the application of national and foreign researchers to scientific funding programmes.
- Continue the UI's policy in knowledge transfer, focused on 1) the principles of Open Science, 2) the internationalization of its activity, 3) strengthening its cooperation with the 8 doctoral and master's courses it promotes.

 Propose and promote measures for the creation of scientific jobs and career progression in research at NOVA FCSH. FUNDING AWARDED BY FCT, IP (2025-2029)

€ 682 K







NAME

INSTITUTE FOR MEDIEVAL STUDIES

> ACRONYM

IEM

> COORDINATOR

Catarina Tente

#### > LOCATION

Colégio Almada Negreiros, 3rd floor, Office 320 Campus de Campolide 1070-312 Lisboa, Portugal

#### > WEBSITE

https://iem.fcsh.unl.pt/

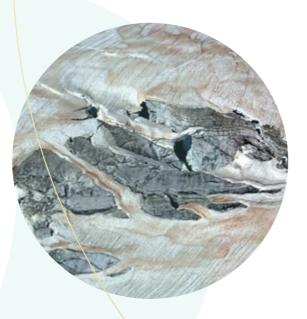
#### SCIENTIFIC AREAS

Archaeology

Art Histor

Histo

Literature and Musicolog



The Institute for Medieval Studies (IEM) aims to promote high quality research in the medieval field by networking with other researchers in Portugal and elsewhere to foster international collaboration that sustains the emergence of new, multidisciplinary and comparative approaches to the Middle Ages. IEM has 144 integrated researchers, with background and training in Archaeology, Art History, History, Literature and Musicology. They jointly work on two main transversal research axes - People and Knowledge in Motion: Portugal in Trans-European Medieval Networks; and Medieval Heritage and Material Culture - and integrated in two research groups -Images, Texts and Representations and Territories and Powers: a «Glocal» Perspective.

#### **FACTS AND FIGURES**

> TEAM - 288 TOTAL PEOPLE

144 INTEGRATED RESEARCHERS

49 WITH PHD
32 WITH MA

16 WITH BA

25 PHD STUDENTS

22 MA STUDENTS

#### > PUBLICATIONS (2020-2024)



- **78** Books
- 279 Articles
- 367 Book Chapters
- 90 Indexed in SCOPUS
- 39 Indexed in WOS
- 601 Papers presented by IEM's researchers

#### > COMPETITIVE FUNDING/ PROJECTS (2020-2024)

- FCT National Projects (IEM as Host RU): 5
- FCT National Projects (IEM as a RU partner with specific budget): 3
- Projects with local funding IEM as Host Institution: 2
- Other national projects: 1
- European Projects (IEM as Participant or Host Institution): 3

FUNDING AWARDED BY FCT, IP (2025-2029)

€ 688 K

#### HIGHLIGHTS FOR THE FUTURE

In the forthcoming years, IEM will be guided by the motto "The Middle Ages in Action", basing its strategy on four main objectives:

- 1. Consolidate IEM as centre of excellence and reference internationally;
- 2. Promote innovative, multi- and transdisciplinary, integrated and inclusive research;
- Share knowledge, guaranteeing the universal availability of data, methods, and research results, as well as interconnectivity in Academic and Societal spheres;
- 4. Support researchers at all activity stages, ensuring quality, advanced training and access to necessary resources, and focusing on stabilizing research careers.







> NAME

NOVA INSTITUTE OF PHILOSOPHY

> ACRONYM
IFILNOVA

> COORDINATOR

João Constâncio

#### > LOCATION

Colégio Almada Negreiros – Office 319
Faculdade de Ciências Sociais e Humanas – NOVA FCSH
Campus de Campolide 1099-032 Lisboa, Portugal

> WEBSITE

https://ifilnova.pt/

SCIENTIFIC AREAS

Philosoph

IFILNOVA's main purpose is to develop research programs focused on values as a philosophical question, particularly by investigating the nature of value, the role of values in human action, as well as their normativity as constituted through cultural life forms, public argumentation and reasoning in the ethical, political and aesthetic realms. The programs aim also to apply philosophical theories to social practices and problems. Within such a framework, IFILNOVA has achieved very significant international recognition in such fields as argumentation theory, epistemology, history of philosophy, and philosophy of education. At a national level, the institute has always been rated as Excellent by the FCT.



#### **FACTS AND FIGURES**

> TEAM - 97 TOTAL PEOPLE

47 INTEGRATED MEMBERS, INCLUDING 17 CONTRACTED RESEARCHERS AND 15 PROFESSORS FROM THE DEPARTMENTS OF PHILOSOPHY AND COMMUNICATION SCIENCES

50 PHD STUDENTS, 28 OF WHOM HOLD FCT DOCTORAL SCHOLARSHIPS

> PUBLICATIONS (2018-2023)



 IFILNOVA's integrated members published over 60 books and more than 700 articles, most of which are indexed in Scopus or Web of Science.

#### > COMPETITIVE FUNDING/ PROJECTS:

9 ongoing research projects, including:

- 2 projects funded by the European Commission
- 3 FCT-funded exploratory projects
- · 2 Erasmus+ projects
- 1 project funded by the Notre Dame-IBM Technology Ethics Lab
- 1 NOVA FCSH exploratory Project

FUNDING AWARDED BY FCT, IP (2025-2029)

€ 2 M

#### HIGHLIGHTS FOR THE FUTURE

Between 2025 and 2029, IFILNOVA will focus on fundamental research into the philosophical problem of values, developing innovative and interdisciplinary approaches with societal impact. The institute currently runs 9 projects, including the first ERC Consolidator Grant in film philosophy and the Horizon Europe "ANTIDOTE" project, and will continue to apply for competitive funding. All four laboratories will strengthen their international collaborations and maintain publication activity in leading journals. IFILNOVA also aims to provide advanced training through the award and supervision of doctoral scholarships within the three PhD programmes at NOVA FCSH: Philosophy, Communication Sciences, and Artistic Studies.







> NAME

ART HISTORY INSTITUTE

> ACRONYM

IHA

> COORDINATOR

Joana Cunha Leal

> LOCATION

Colégio Almada Negreiros Campus de Campolide da NOVA 1099-032 Lisboa, Portugal

> WEBSITE

https://institutodehistoriadaarte.com/

#### SCIENTIFIC AREAS

Humanities and Arts - Arts

The Art History Institute (IHA) at NOVA University Lisbon is a research unit that bridges academic inquiry and cultural engagement. Focused on art history, heritage, museology, curatorial and digital practices, it promotes innovative and interdisciplinary research that connects past and present, local and global. IHA acts as a platform for mediation between researchers, artists, institutions, and communities, translating knowledge into public value through exhibitions, publications, and collaborative projects. With a strong commitment to emerging research, digital transformation, and social impact, IHA fosters art history as a living field, one that shapes critical understanding, cultural dialogue, and creative futures.

#### **FACTS AND FIGURES**

> TEAM - 158 TOTAL PEOPLE

53 PHD INTEGRATED RESEARCHERS
61 STUDENTS

3 STAFF

44 COLLABORATING RESEARCHERS

> PUBLICATIONS (2020-2025)



- 99 Books
- 271 Articles
- 347 Chapters
- 87 Scopus e WoS (Pure)

#### > COMPETITIVE FUNDING/ PROJECTS:



FUNDING AWARDED BY FCT, IP (2025-2029)

€ 1,37 M

#### HIGHLIGHTS FOR THE FUTURE

Over the next five years, IHA aims to strengthen its international visibility and impact through research that connects art history with contemporary global challenges. Key goals include fostering cross-disciplinary projects that link heritage, digital culture, and sustainability; consolidating networks across Europe, the Mediterranean, and the Global South; and enhancing collaboration with museums and cultural institutions. IHA will continue to support emerging researchers and open research to society through participatory and public-facing initiatives. Our ambition is to position IHA as a leading hub for critical thinking,







> NAME

INSTITUTE OF CONTEMPORARY HISTORY

> ACRONYM

IHC

> COORDINATOR

Luís Trindade

> LOCATION

Almada Negreiros College Campolide Campus, NOVA University Lisbon Av. de Berna, 26C – 1069-061 Lisboa, Portugal

> WEBSITE

https://ihc.fcsh.unl.pt/

#### SCIENTIFIC AREAS

History

Arts

Social sciences

The IHC is the largest research centre for historical research in the modern and contemporary periods. We are the only History research centre to participate in an Associate Laboratory, IN2PAST -Associate Laboratory for Research and Innovation in Heritage, Arts, Sustainability and Territory. In addition, we host the Digital Humanities Laboratory (DHLab), where knowledge in the Arts and Humanities converges with methodologies from Computer Sciences. We foster interdisciplinary approaches and a strong internationalization strategy. It is our understanding that it is necessary to overcome the limits of methodological nationalism; to promote the critical practice of comparative, transnational, and global history; and to be open to society and major current debates.

#### FACTS AND FIGURES

> TEAM - 154 TOTAL PEOPLE

100 PHD RESEARCHERS (APPROXIMATELY)

50 PHD CANDIDATES

4 RESEARCH MANAGERS





- 101 Books
- 149 Papers in international peer-reviewed publications
- 131 Book chapters in international peer-reviewed publications

#### > COMPETITIVE FUNDING/ PROJECTS

Ongoing projects: 1 ERC Starting Grant; 10 FCTfunded projects

FUNDING AWARDED BY FCT, IP (2025-2029)

€ 2,86 M

#### **CONSORTIUM MEMBERS**

NOVA FCSH and University of Évora

#### HIGHLIGHTS FOR THE FUTURE

The IHC aims to develop two major lines of reflection. On the one hand, around archives, questioning their role and diversity in the study of modern and contemporary history. We will consider the role of digital humanities, or the importance of oral history and audiovisual archives. On the other hand, we want to question the chronology and geography of our research, opening it up to increasingly broader spaces and periodizations. These questions will be developed through seminars, projects, conferences, and publications, in conjunction with research support structures such as our History in the Public Sphere Program, the Platform of Advanced Studies, the DHLab, or our Joint International Workshops, organized with foreign universities around specific topics.







> NAME

INSTITUTE OF ETHNOMUSICOLOGY - CENTRE FOR STUDIES IN MUSIC AND DANCE

> ACRONYM

INET-MD

> COORDINATOR

Manuel Deniz Silva

> LOCATION

NOVA FCSH Av. Berna, 26C – 1069-061 Lisbon, Portugal

> WEBSITE

#### SCIENTIFIC AREAS

Artistic Studies

Acoustics and Sound Studies

The Institute of Ethnomusicology – Centre for Studies in Music and Dance (INET-md) is a research unit built on the integration of arts, humanities and sciences. Founded in 1995, INET-md works with communities, scholars, artists, policymakers and non-academic partners to promote democratic and decolonising constructions of knowledge.

Research activities take place within and across the following six research groups: Ethnomusicology and Popular Music Studies; Historical and Cultural Studies in Music; Dance Studies; Creation, Performance and Artistic Research; Music Acoustics and Sound Studies; and Education, Music and Theatre in the Community. Headquartered at NOVA University Lisbon, INET-md also operates at the University of Aveiro, Lisbon University, Polytechnic of Porto, and Polytechnic of Lisbon.



## **FACTS AND FIGURES**

> TEAM - 319 TOTAL PEOPLE

140 PHD CANDIDATES

67 FACULTY MEMBERS DISTRIBUTED IN 6 RESEARCH GROUPS

> PUBLICATIONS



 Nearly 30 books per year on average over the last decade

> COMPETITIVE FUNDING/ PROJECTS (ONGOING ON 2025)

126 concluded projects and 33 still ongoing.

**FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 1,25 M

#### CONSORTIUM MEMBERS

- NOVA University Lisbon
- · University of Aveiro
- · Lisbon University
- · Polytechnic of Porto
- · Polytechnic of Lisbon

#### HIGHLIGHTS FOR THE FUTURE

Over the past three decades, INET md has carried out groundbreaking ethnographic and historical work on expressive practices of music and dance; studies on their manifestation and preservation, as well as their political implications and worldwide interconnections; explorations of dance and music as embodied social practices; the study of formal and non-formal pedagogical approaches in these areas; experimentation in artistic research; and acoustic profiling of musical instruments.

INET-md is committed to addressing challenges involving the academic community and other stakeholders, fostering collaboration in strategic areas and further strengthening the interdisciplinary profile of the established research groups through its four newly created thematic lines: Heritage(s), Archives and Museums; Studies on Women, Gender and Sexuality; Power, Politics and Activism; and Digital and Technological Performativities.







> NAME

PORTUGUESE INSTITUTE
OF INTERNATIONAL RELATIONS

> ACRONYM

IPRI-NOVA

> COORDINATOR

Carmen Fonseca

> LOCATION

Colégio Almada Negreiros Campus de Campolide 1099-085 Lisboa, Portugal

> WEBSITE

www.ipri.pt

#### SCIENTIFIC AREAS

Political Science

International Relations

IPRI-NOVA, established in 2004, stands as a cornerstone of scientific research and knowledge production in Portugal, within the ever-evolving landscape of Political Science and International Relations. It has been recognized as a Public Utility Institution since October 1st 2010, for services rendered to the community in the field of culture, through the promotion of academic research. To optimize focus and to promote knowledge exchange as well as to ensure the incorporation of diverse perspectives into projects, IPRI-NOVA's research is structured under two comprehensive Hubs - International Politics and Comparative Politics - which derive in 4 joint Labs: i) Global and Transnational Challenges; ii) Institutions, Policies, and Political Change; iii) Foreign Policy, Security, and Defence; and iv) European Governance.

#### **FACTS AND FIGURES**

> TEAM - 139 TOTAL PEOPLE (2025)

41 INTEGRATED RESEARCHERS

48 PHD STUDENTS

50 ASSOCIATED RESEARCHERS

> PUBLICATIONS



- 200 Scientific Articles
- 61 Scientific Articles in Q1 journals
- 90 Articles in Q1-Q3 journals
- 273 Book Chapters
- 106 Books (authored and co-authored)

#### > COMPETITIVE FUNDING/ PROJECTS (2025)

**7** Scientific Projects = **€135K** national funding and **€375K** international funding

- 3 PhD FCT Grants
- 1 Doctoral Fellowship (EUTOPIA Alliance)

FUNDING AWARDED BY FCT, IP (2025-2029)

€ 634 K

#### HIGHLIGHTS FOR THE FUTURE

IPRI-NOVA's strategic plan encompasses three key areas where the core objectives of the Institute overlap: i) promote a top-level, engaged, and inclusive research community to achieve excellence in interdisciplinary research; ii) foster social scientific innovation and knowledge to develop scientific careers; iii) maximise societal impact to contribute to knowledge transfer. In the framework of its mission (namely attract and retain talent and offer career prospects to researchers) for the next years it is planned to drive resources to ensure good working conditions and career prospects for members of the scientific management team; and ensure the expansion of participation in international networks, projects and conferences through a specific competitive funding managed by Lab's coordinators.





VICARTE VIDRO E CERÂMICA PARA AS ARTES



> NAME

GLASS AND CERAMICS FOR THE ARTS

> ACRONYM

VICARTE

> COORDINATOR

Márcia Vilarigues

#### > LOCATION

NOVA School of Science and Technology Hangar III – Campus de Caparica 2829-516 Caparica, Portugal

> WEBSITE

www.vicarte.org

#### SCIENTIFIC AREAS

Humanities and Arts & Exact and Natural Sciences



The Research Unit VICARTE – Vidro e Cerâmica para as Artes (Glass and Ceramic for the Arts) is devoted to the promotion of transdisciplinary research applied to glass and ceramics, focusing on the intersections between art and science, stimulating sharing of knowledge, experiences and methodologies. The mission of VICARTE is to promote excellence in glass and ceramics studies at national and international level.

The research at VICARTE connects the present and the past, by studying traditional and historical practices, by developing new materials and by exploring different artistic concepts. We are committed to uphold and surpass VICARTE's reputation as an RU that leads worldwide cross-disciplinary research, innovation and creativity in glass and ceramics studies applied to science, art, design and cultural heritage.



#### **FACTS AND FIGURES**

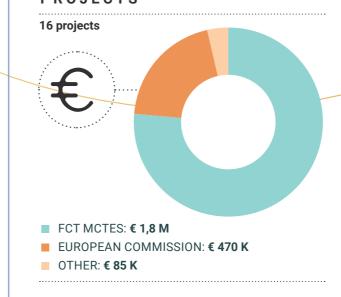
- > TEAM 56 TOTAL PEOPLE
  - 22 INTEGRATED MEMBERS
  - 27 PHDS
  - √ 5 POSTDOCS
  - 2 STAFF

#### > PUBLICATIONS



- c. 200 index publications since 2021
- 22 books and book chapters
- 175 Art and Cultural Heritage Exhibitions

#### > COMPETITIVE FUNDING/ PROJECTS



# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 270 K NOVA FCT € 552 K NOVA.ID.FCT € 822 K TOTAL

#### HIGHLIGHTS FOR THE FUTURE

VICARTE will strengthen its position as a world-leading research center, advancing knowledge and innovation in glass and ceramics at the intersection of art and science. The unit will broaden its global reach by forging strategic international collaborations and inspiring cross-disciplinary initiatives. By developing sustainable, cutting-edge materials and creative methodologies, it will set new standards for excellence in both research and practice. VICARTE foresees impactful contributions to education, cultural heritage, and industry, fostering dialogue between science, art,/ and society. Through these efforts, it will cultivate a vibrant community of researchers and artists, shaping the future of glass and ceramics worldwide while driving innovation, sustainability, and cultural significance.





# Medical & Health Sciences |





#### > NAME

COMPREHENSIVE HEALTH RESEARCH CENTRE - RESEARCH, EDUCATION, TRAINING AND INNOVATION IN CLINICAL RESEARCH AND PUBLIC HEALTH

> ACRONYM

CHRC

> COORDINATOR

Ana Maria Rodrigues

> LOCATION

Campo dos Mártires da Pátria 130 1169-056 Lisboa, Portugal

> WEBSITE

www.chrc.pt/pt

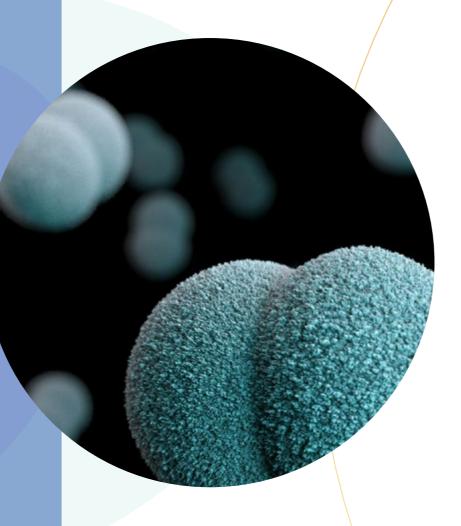
#### SCIENTIFIC AREAS

Personalised Medicine

MedTech and health innovation

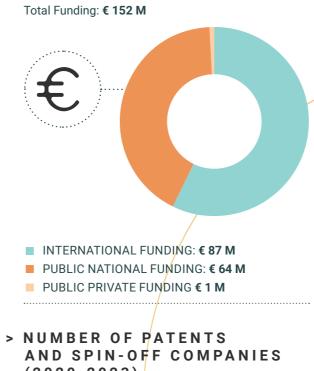
Policies and healthcare systems research

The Comprehensive Health Research Centre (CHRC) is a multidisciplinary, multi-institutional research unit integrating biomedical, clinical, and public health sciences to advance health across the life course. It conducts research across all stages of health innovation, from preclinical studies to population-level interventions, addressing the major determinants and impacts of chronic non-communicable diseases, including rheumatic, metabolic, cardiovascular, respiratory, oncological, and mental health conditions. With recognised expertise in epidemiology, health promotion, and health services research, CHRC combines large population cohorts, clinical trials, and digital innovation in areas such as personalised medicine, nutrition, and motricity. Supported by advanced infrastructures and Aldriven analytics, CHRC generates evidence that informs policy, fosters innovation, and improves population health outcomes.



# FACTS AND FIGURES > TEAM - 401/TOTAL PEOPLE 217 INTEGRATED PHD RESEARCHERS 168 PHD STUDENTS 16 NON-PHD RESEABEHERS & TECHNICIANS > PUBLICATIONS • 2086 Publications • 1120 Q1-Q2 Journals • 1648 Open Access





# (2020 - 2023)

Patents: 15 Prototypes: 16 Tech & Spin-offs: 4

# **FUNDING AWARDED BY** FCT, IP (2025-2029)

**€ 5M NMS & ENSP** 

#### **CONSORTIUM MEMBERS**

CHRC is coordinated by NOVA Medical School in collaboration with four other management partners: National School of Public Health, Évora University, Fraunhofer Portugal and the Lisbon Institute of Global Mental Health.

#### HIGHLIGHTS FOR THE FUTURE

Over the next five years, CHRC will strengthen its global impact through a strategy focused on research excellence, innovation, and societal relevance. Goals include achieving ≥75% Q1 publications, ≥90% open access, and ≥80% of funding from international sources, reflecting both scientific quality and global engagement. CHRC will expand its academic programs, supporting students and early-career researchers through mentoring, training, and mobility initiatives. The centre will continue developing and validating advanced health technologies, including digital tools and Al-driven solutions with strong translational potential. Strategic collaborations with institutions such as the Digital Data Design Institute (Harvard), FIOCRUZ (Brazil), WHO, and the Global Burden of Disease (GBD) initiative will reinforce CHRC's leadership in digital health, personalised medicine, and climate related health research.

# Medical & Health Sciences





> NAME

GLOBAL HEALTH AND TROPICAL MEDICINE

> ACRONYM GHTM

> COORDINATOR

Filomeno Fortes

> LOCATION

Rua da Junqueira Nº100 1349-008 Lisboa, Portugal

> WEBSITE

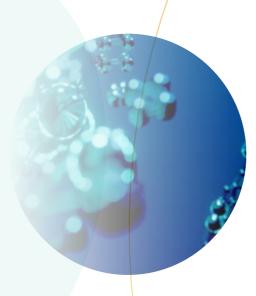
https://ghtm.ihmt.unl.pt/

#### SCIENTIFIC AREAS

Exact and Natural Sciences - Biological sciences Veterinary and Agrarian Sciences - Veterinarian science



GHTM is a multidisciplinary Unit advancing global public health and biomedical sciences through research, training, and the promotion of equity in sustainable Global Health. Its mission is to generate scientific evidence for effective health policies and strengthen Portugal's role as a key international partner within a One Health vision. GHTM's strategic framework integrates four Research Groups and six cross-cutting issues that drive innovation in Genomic Surveillance and Population Mobility, Antimicrobial Resistance and Drug Discovery, Implementation and Translational Research, Host-Pathogen Interactions, Information for Health and Development, and Fair Research Partnerships. By combining population-level and clinical research with cutting-edge pathogen and vector studies, GHTM contributes to global health solutions and capacity building worldwide.



### FACTS AND FIGURES

> TEAM - 216 TOTAL PEOPLE

73 INTEGRATED RESEARCHERS 57 COLLABORATORS 8 TECHNICAL STAFF

78 STUDENTS

> PUBLICATIONS



- 189 Scholarly output
- 75.7% International Collaboration
- 1.45 Field-Weighted Citation Impact
- > COMPETITIVE FUNDING/ **PROJECTS**

Coordinating 2 EU-funded consortium & 28 active projects

> NUMBER OF PATENTS AND SPIN-OFF COMPANIES Patents: 9

response to vector-borne and infectious diseases, and addressing antimicrobial resistance through genomic surveillance and innovative therapies. It will also expand clinical and translational research in tropical and travel medicine to enhance patient care in high-burden settings. Cross-cutting efforts in data-driven health information, implementation science, and equitable partnerships will ensure that discoveries translate into sustainable policies and practices, positioning GHTM

as a catalyst for global collaboration and impact within

the One Health framework.

HIGHLIGHTS FOR THE FUTURE

Over the next five years, GHTM will advance its

integrated strategy to strengthen health equity, disease

control, and clinical innovation worldwide. The Unit

will focus on improving population health and health

systems' governance, reinforcing preparedness and

**FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 2,9 M



# Medical & Health Sciences

i4H



> NAME

INOVA4HEALTH - PROGRAMME
IN TRANSLATIONAL MEDICINE
(NMS, IBET, IPOLFG, ITQB AND NIMSB)

> ACRONYM

i4H

> COORDINATOR

Sílvia Conde

#### > LOCATION

Faculdade de Ciências Médicas da Universidade Nova de Lisboa – Rua Câmara Pestana, 6 1150-082 Lisboa, Portugal

#### > WEBSITE

www.inova4health.com

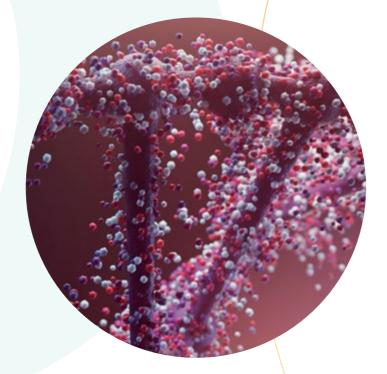
#### SCIENTIFIC AREAS

Medical and Health Sciences: Medical Biotechnology Clinical Medicine; Health Sciences

Engineering and Technology Sciences

Industrial Biotechnology

iNOVA4Health is a translational-oriented Research Unit focused on developing innovative solutions for human health, covering fundamental mechanisms, disease modelling, biomarker discovery and advanced therapeutic strategies. Bringing together leading teams from NMS|FCM, ITQB NOVA, iBET, NIMSB and IPOLFG, the Unit integrates biomedical, clinical, technological and computational expertise to accelerate the path from discovery to application. Its multidisciplinary structure supports research programmes in molecular mechanisms of disease, diagnostics, precision therapeutics, immunology and regenerative medicine, while fostering talent development and strategic collaborations with hospitals, industry and international networks. With a strong scientific output and a clear mission, iNOVA4Health is positioned to deliver impactful science and contribute to improved health outcomes.



## FACTS AND FIGURES

> TEAM - 746 TOTAL PEOPLE (2024 ACTIVITY)

462 RESEARCHERS
228 PHD HOLDERS
56 MDS

> PUBLICATIONS



 251 Peer-reviewed publications in international and national scientific journals

> COMPETITIVE FUNDING/ PROJECTS

Extra Funding € 10 M

> NUMBER OF PATENTS
AND SPIN-OFF COMPANIES
Patents: 1

FUNDING AWARDED BY FCT, IP (2025-2029)

€ 4,2 M

#### **CONSORTIUM MEMBERS**

The partner entities of the iNOVA4Health unit are:

- NOVA Medical School | Faculty of Medical Sciences of NOVA University Lisbon (NMS | FCM)
- Institute for Experimental Biology and Technology (iBET)
- Portuguese Oncology Institute of Lisbon Francisco Gentil (IPOLFG)
- Instituto de Tecnologia Química e Biológica António Xavier (ITQB NOVA)
- NOVA Institute for Medical Systems Biology (NIMSB | NOVA)

# HIGHLIGHTS FOR THE FUTURE

Over the next five years, iNOVA4Health will consolidate its position as a leading translational research unit by strengthening critical mass, expanding clinical integration and accelerating technologydriven approaches to disease. The Unit will deepen its programmes in precision medicine, advanced therapeutics, diagnostics and immunology, while reinforcing in dustrial collaboration and access to national and European infrastructures. A major ambition is to scale the Lighthouse Projects scheme to stimulate high-risk, high-impact research across partners. Talent development remains central; attracting top researchers. securing tenure-track positions and expanding training for young scientists. By aligning scientific excellence with societal needs, iNOVA4Health aims to deliver solutions that improve health outcomes and increase international visibility.







> NAME

CENTRE FOR PHYSICS
AND TECHNOLOGICAL RESEARCH

> ACRONYM
CEFITEC

> COORDINATOR

Orlando Teodoro

#### > LOCATION

Physics Department, NOVA School of Science and Technology – Campus de Caparica 2829-516 Caparica, Portugal

> WEBSITE

www.cefitec.fct.unl.p

#### SCIENTIFIC AREAS

Low-energy gas and surface interactions

Vacuum metrology and instrumentation

Solar-pumped laser physics

CEFITEC is an experimental research unit bridging Physics, Chemistry, Materials Science and Engineering to address technological challenges grounded in solid scientific principles. Our work spans from fundamental studies to proof of concept, prototype development and, in selected cases, operation in real environments. With strong expertise in low-energy gas and surface interactions, vacuum metrology and solar-pumped laser systems, CEFITEC combines advanced instrumentation with applied research to deliver innovation and traceability in key scientific and industrial domains. The unit is equally devoted to advanced training, offering students and young researchers an environment where experimental skills, scientific rigor and engineering creativity



# FACTS AND FIGURES

- > TEAM 32 TOTAL PEOPLE (2025)
  - 12 INTEGRATED RESEARCHERS: 2 WITH FCT TENURE POSITIONS, 2 JUNIOR RESEARCHERS
  - 12 PHD STUDENTS
- 6 MASTER STUDENTS
- 1 2 TECHNICIANS

> PUBLICATIONS (2020-2025)



- 188 peer-reviewed publications
- 194 citations

#### > COMPETITIVE FUNDING/ PROJECTS

€ 3,035 M - total funding allocated to NOVA between 2020 and 2025

85% of total funding was secured through competitive calls

Part of the revenue from services was invested in research

# > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

One European Patent (EP18709071B1) was granted in July 2025, under an active license agreement with Amorim Cork

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 176,6 K NOVA FCT

€ 104,7 K NOVA.ID.FCT

**€ 281 K** TOTAL

## HIGHLIGHTS FOR THE FUTURE

In the coming years, CEFITEC will consolidate its position as a reference in experimental applied physics through focused advances in six key areas. We are deepening studies of low-energy interactions in molecules of atmospheric and biological relevance and developing robust coatings for accelerator components in collaboration with CERN. METROVAC is expanding its role toward Designated Institute status, strengthening European traceability in vacuum and gas-flow metrology. New gas-sensing and pressure-measurement concepts are under development for environmental monitoring and leak detection. Our solar-pumped laser facilities are being upgraded to achieve record efficiencies and support renewable energy applications. These research lines share a common goal: combining fundamental insight, precision instrumentation and technological innovation to address societal and industrial challenges.





## **Natural** Sciences





> NAME

GEOBIOSCIENCES, GEOTECHNOLOGIES AND GEOENGINEERING

> ACRONYM GEOBIOTEC

#### > COORDINATOR

Fernando Rocha (General Coordinator, University of Aveiro) and Maria Manuela Malhado Simões Ribeiro (Coordinator of Polo NOVA FCT)

#### > LOCATION

#### > WEBSITE

https://sites.fct.unl.pt/geobiotec/home

#### SCIENTIFIC AREAS

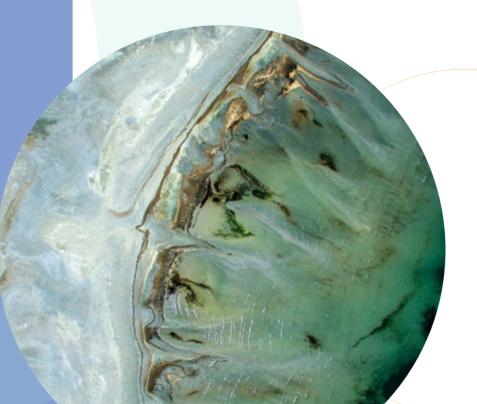
Agroindustrial Technology

Geotechnics and Geomaterials

Sedimentary Basins a



GeoBioTec is a collaborative scientific research partnership between the University of Aveiro (UA), the NOVA School of Science and Technology (NOVA FCT), and the University of Beira Interior (UBI). The NOVA FCT unit includes three autonomous research groups, providing seamless interdisciplinary research across Earth Sciences, Engineering and Agraindustry, including: 1) Agroindustrial Technology (AT) [Coord. Prof. Manuela Silva] - biofortification of food, phytoremediation of contaminated sites, innovation in food; 2) Georesources, Geotechnics and Geomaterials (3G) [Coord. Prof. Paula F. da Silva] - sustainable access to critical raw materials, quality water for all, subsurface geoenergy storage, ornamental stone and aggregates, geohazards, geoenvironmental engineering, geomodelling and geostatistics, geomaterials; 3) Sedimentary Basins and Paleontology (SBP) [Coord. Ricardo Pereira, Researcher] - tectonic and depositional processes, geodynamics, geoheritage, paleontology and paleobotany, ancient climate as proxies for the



#### FACTS AND FIGURES

> TEAM - 89 TOTAL PEOPLE

39 RESEARCHERS 9 COLLABORATORS

41 PHD STUDENTS

#### > PUBLICATIONS



- 454 papers in peer-reviewed and international journals (2020-2024)
- World's most cited scientists Includes world's Top 2% Scientists, Stanford University and Elsevier), with an H-index of 58 and 10,805 citations

#### > COMPETITIVE FUNDING/ **PROJECTS**

Three active projects totaling € 3,25M

- AmbioAgrosense Al, Management System for Agricultural, COMPETE 2023.
- Biochar4@II Long-term sustainable carbon capture and valorization in agricultural production, COMPETE 2023.
- ESA EcoSystem Adapt, Climate transition-support and Territorial resilience to risk, COMPETE 2020,

#### HIGHLIGHTS FOR THE FUTURE

Fully aligned with the Sustainable Development Goals, GeobioTec NOVA has newly implemented research lines in sustainable geoenergy resources (e.g., subsurface energy storage, CCUS, geothermal), responsible ore and mineral resources and agroindustry, and risk to human health and society that are planned to increase the scientific and social impact within 5 years. Fittingly, we aim not only to increase the impact for post-graduate students to develop innovative and transformative topics, but also to promote new academia and social partnerships, supported by modern communication and dissemination channels. With the implementation of this new approach, we aim at growing the number of post-doc researchers, to further consolidate our international research impact and knowledge transfer to post-graduate students. We intend to contribute to scientific and technological development and promote the transfer of knowledge to society.



# **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 278 K

# Natural Sciences





> NAME

ASSOCIATED LABORATORY FOR GREEN CHEMISTRY

> ACRONYM LAQV REQUIMTE

> COORDINATOR

João Carlos Lima

> LOCATION

NOVA FCT

> WEBSITE

https://laqv.requimte.pt/

#### SCIENTIFIC AREAS

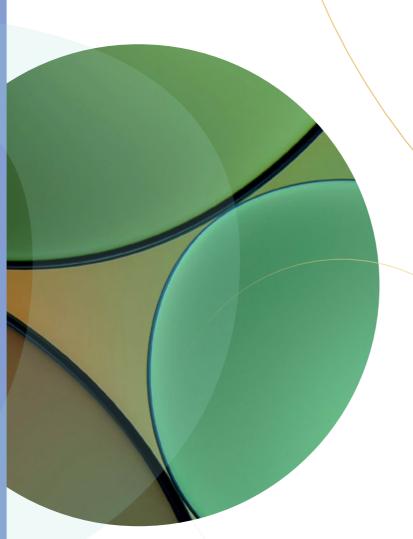
**Exact Sciences** 

Engineering and Technology Sciences

Medical and Health Sciences

Agricultural Sciences

LAQV is the Portuguese Research Centre for Sustainable Chemistry, a leading contributor to scientific innovation for sustainable development. As a science-driven institution, it generates highimpact research and actively participates in international networks and projects. Its research agenda, strategically aligned with the UN Sustainable Development Goals and European funding priorities, advances knowledge across Chemical Synthesis and Catalysis, Food Science and Technology, Natural Products, Analytical Methods, Process Intensification and Clean Technologies, Alternative Solvents, and Smart Materials. Equally central is its role in advanced education and training, fostering a diverse international community of students. Through cutting-edge science and knowledge transfer, LAQV strengthens partnerships with national industry and consumer associations, while ensuring alignment with public policies defined by the Portuguese Government and Funding Agency.



#### FACTS AND FIGURES

> TEAM (2020-2024) - 2040+ TOTAL

950+ RESEARCHERS AND TECHNICIANS 380+ PHD STUDENTS

840+ MSC STUDENTS



#### > PUBLICATIONS

Source: SciVal - Elsevier

• 6200+ research documents 50% w/ international co-authorship

- 23.5 citations per paper (average) 2.09 field-weighted citation impact
- 14.8% rank among the top 10% most cited works
- 38.5% published in top 10% of journals within respective fields

#### > COMPETITIVE FUNDING/ **PROJECTS**

- 44 EU funded Projects and Grants (€ +9.8M)
- 110 National Funded Projects (€ +6.8M)

#### > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

Patents: 45 Spin-Offs: 7 Companies: 2 CoLabs: 6

# **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 1,6 M NOVA FCT

€ 1 M NOVA.ID.FCT

€ 2.6 M TOTAL

#### **CONSORTIUM MEMBERS**

Universidade NOVA de Lisboa, Universidade do Porto, Universidade de Aveiro, Universidade de Coimbra, Universidade de Évora, I. Politécnico do Porto

#### HIGHLIGHTS FOR THE FUTURE

LAQV activities will focus on public policies, with a transversal approach that promotes education and training and advances research and innovation in priority areas aligned with the UN Sustainable Development Goals.

With Sustainable Chemistry as the underlying theme, LAQV has established the following objectives:

- · Create and develop sustainable procedures and technologies towards a circular and climate-neutral exploitation of natural resources;
- · Boost a cooperative research strategy towards a valued, healthy and safe water and food supply;
- Provide processes and methodologies for energy transition and sustainability;
- · Converge and integrate top-notch research and expertise towards an effective improvement of healthy life expectancy and wellbeing;
- Use green and innovative processes towards the protection, enhancement and conservation of Cultural Heritage.



# Sciences





> NAME

LABORATORY FOR INSTRUMENTATION, **PHYSICS** 

> ACRONYM

LIBPhys

> COORDINATOR

Hugo Gamboa

#### > LOCATION

Laboratory for Instrumentation, Biomedical Engineering and Radiation Physics (LIBPhys) -Faculdade de Ciências e Tecnologia, Universidade Nova de Lisboa (NOVA FCT) – Campus da Caparica 2829-516 Caparica, Portugal

> WEBSITE

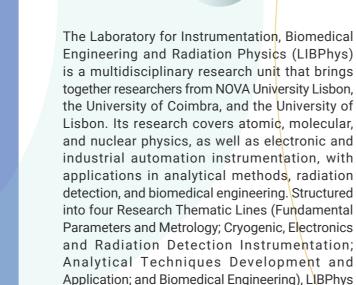
https://libphys.pt/

#### SCIENTIFIC AREAS

Fundamental Parameters and Metrology

Cryogenic, Electronics and Radiation Detection

Analytical Techniques Development and Application



#### **FACTS AND FIGURES**

actively promotes knowledge transfer across

academia, healthcare, industry, and cultural

heritage, promoting innovation, technological

development, and societal impact at both national

> TEAM - 39 TOTAL PEOPLE

22 AFFILIATED MEMBERS FROM NOVA UNIVERSITY LISBON FROM A TOTAL OF 39 MEMBERS

PHD STUDENTS: SUPPORTED BY OVER 66 ACTIVELY PURSUING DOCTORATES

THE RESEARCH TEAM MEMBERS ARE DEDICATED TO EXPERIMENTAL PHYSICS AND/OR BIOMEDICAL ENGINEERING.

> PUBLICATIONS

and international levels.



- Annual Publication Rate: Averaged 140 publications annually in ISI-indexed journals over the past three years
- Productivity: Average of 3.4 publications per researcher per year
- · High-Impact Output: Key contributions published in prestigious journals such as Nature and Science

#### > COMPETITIVE FUNDING/ PROJECTS (2020-2024)

- Total Team Budget Funding for NOVA: € 2,6 M
- · Involvement in 9 European projects, including:
- 3 Horizon Europe projects
- 3 European Metrology Programme For Innovation And Research (EMPIR) projects
- 3 COST Actions | 3 Marie Skłodowska-Curie Actions (MSCA)

#### > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

Granted Patents: Several members are inventors of granted patents

- Device for Assessing the Spinal Column (PT, DE, FR, UK, US)
- · Physical Training Device for Animals (Brazil, EU, China, US)

Technology Transfer: LIBPHys-UNL is a founding member of the 3D Printing Center for Health (3DP4Health) in 2023, focused on developing devices with 3D printing technology for healthcare

Spin-offs: Collaborations with several companies founded by LIBPhys researchers

- PLUX: Wearable biosignal systems developing
- · NMT: Biomedical technologies developing and medical and biotechnological products trading, providing consultancy and technical support

# **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 173 K NOVA FCT

€ 292 K NOVA.ID.FCT

**€ 465 K** TOTAL

#### **CONSORTIUM MEMBERS**

The LIBPhys consortium brings together researchers from three main universities, forming the Institutional Groups: NOVA University Lisbon (Universidade Nova de Lisboa - UNL), University of Coimbra (UC) and University of Lisbon (FMD/ULisboa)

## HIGHLIGHTS FOR THE FUTURE

In the coming years, LIBPhys aims to strengthen its position as a leading research hub in experimental physics, instrumentation, and biomedical engineering. Key goals include advancing its four Research Thematic Lines (RTL), which range from fundamental parameters and metrology to biomedical engineering, while enhancing high-impact international collaborations such as XENON, SPARC, CREMA, and DARWIN. LIBPhys will expand technology transfer initiatives, translating research into healthcare and industrial applications, and support innovation in analytical and spectroscopic methods. Commitment to open science, inclusion, and training of PhD students will continue. Strategic funding acquisition will support sustainable growth, ensuring LIBPhys remains at the forefront of scientific discovery, societal impact, and interdisciplinary innovation across physics, engineering, and biomedical research.

# Natural Sciences





> NAME

MARINE AND ENVIRONMENTAL SCIENCES CENTRE

> ACRONYM

MARE

> COORDINATOR

Graça Martinho

#### > LOCATION

Department of Environmental Sciences and Engineering, NOVA School of Science and Technology

#### > WEBSITE

www.mare-centre.pt/en

#### SCIENTIFIC AREAS

Marine Sciences

**Environmental Sciences** 

**Environmental Engineering** 



MARE-NOVA is the NOVA hub of the Marine and Environmental Sciences Centre at NOVA FCT. We advance solutions for sustainable ocean and environmental management through interdisciplinary research spanning hydraulics and hydrology, aquatic pollution (including emerging pollutants and microplastics), marine living resources, water and wastewater treatment, circular economy and waste management, coastal risk and sustainable urbanism, and ocean literacy and collaborative governance.

MARE-NOVA drives impactful research and delivers policy-relevant science and innovation, provides laboratory and field monitoring capacity, trains students and researchers, and translates research into practical tools and partnerships. We support national and international initiatives and foster collaboration across academia, industry and society to promote biodiversity conservation and a resilient blue future.



## FACTS AND FIGURES

> TEAM - 184 TOTAL PEOPLE

100 RESEARCHERS

54 PHDS

4 POSTDOCS

26 PHD STUDENTS

#### > PUBLICATIONS



Published in 2024

- 6 book chapters
- **49** papers

#### > COMPETITIVE FUNDING/ PROJECTS

21 ongoing research projects (12 national and 9 international)



FCT, I.P. GRANTS AND PROJECTS: € 2 M
 OTHER NATIONAL SOURCES: € 3,7 M
 INTERNATIONAL SOURCES € 1,9 M

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 584 K NOVA FCT

€ 9.5 K NOVA.ID.FCT

**€ 593 K** TOTAL

#### **CONSORTIUM MEMBERS**

- NOVA University Lisbon NOVA School of Science and Technology
- NOVA.ID.FCT Associação para a Inovação e Desenvolvimento da FCT
- University of Évora
- · University of Lisbon
- · University of Coimbra
- · University of Madeira
- · Polytechnic of Leiria
- ISPA Instituto Universitário de Ciências Psicológicas, Sociais e da Vida
- · Instituto Politécnico de Setúbal
- ARDITI Agência Regional para o Desenvolvimento da Investigação, Tecnologia e Inovação
- FCiências.ID Associação para a Investigação e Desenvolvimento de Ciências

#### HIGHLIGHTS FOR THE FUTURE

- Expand interdisciplinary leadership and collaborations in strategic scientific areas
- Scale laboratory, field and observing capacity with open-data platforms
- Lead national and EU-funded projects and strategic partnerships with industry and government
- Translate science into policy, decision-support tools and capacitation
- Strengthen training and career pathways for students, researchers and technicians
- Deliver measurable impacts on biodiversity conservation, pollution reduction and sustainable blue growth



# Natural Sciences





> NAME

NOVA LABORATORY FOR COMPUTER SCIENCE AND INFORMATICS

> ACRONYM
NOVALINCS

> COORDINATOR

Nuno Manuel Robalo Correia

#### > LOCATION

NOVA LINCS, Faculdade de Ciências e Tecnologia, Universidade NOVA de Lisboa, Campus de Caparica, 2829-516 Caparica, Portugal

#### > WEBSITE

https://nova-lincs.di.fct.unl.pt

#### SCIENTIFIC AREAS

Computer Science (Computer Systems, Intelligent Systems, Multimodal Systems, Software Systems

NOVA LINCS is a leading national research unit in Computer Science, internationally recognized for excellence in distributed systems, knowledge representation and reasoning, multimodal conversational agents, and formal methods. With 64 integrated researchers, 76 PhD students, and branches across six Portuguese institutions, it conducts cutting-edge research, fosters advanced education, and promotes innovation with strong societal impact. Its mission is to advance the foundations of Computer Science while developing human-centered intelligent software ecosystems. NOVA LINCS combines fundamental research with applied work in collaboration with industry, public institutions, and international partners, producing influential scientific output and supporting national priorities in AI, digital transformation, sustainability, and cultural heritage.



#### FACTS AND FIGURES

> TEAM - 222 TOTAL PEOPLE

64 INTEGRATED PHD RESEARCHERS (2023)

82 ONGOING PHD SUPERVISIONS
IN 2023 (UP FROM 49 IN 2018)

76 PHD STUDENTS ENROLLED IN NOVA LINCS PHD PROGRAMMES

#### > PUBLICATIONS



- Publications in top venues: IJCAI, AAAI, KR, ICML, AAMAS, ISWC, AIJ, JAIR, TNNLS, Bioinformatics, ACM Multimedia, ACM CHI, ECIR, and others
- Participation in ACM, IEEE, and major international program committees
- More than 1400 communications in national and international scientific events

#### > COMPETITIVE FUNDING/ PROJECTS

NOVA LINCS secured € 14.5 M from competitively awarded projects between 2018–2023, including EU, FCT, and private funding sources. Annual funding grew from € 1.5 M (2018) to € 3.99 M (2023), totalling € 17.6 M over the period

Participation in 30+ EU projects (H2020, CEF, Erasmus+, Marie Curie, COST) and 35 FCT projects, plus 67 industry partnerships

# > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

**5** active start-ups exploiting NOVA LINCS research results

# FUNDING AWARDED BY FCT, IP (2025-2029)

€ 1,09 M NOVA FCT

€ 1,45 M NOVA.ID.FCT

€ 2,5 M TOTAL

#### **CONSORTIUM MEMBERS**

- NOVA University Lisbon (NOVA FCT) coordinating institution
- University of Algarve (UAlg)
- · University of Beira Interior (UBI)
- University of Évora (UEvora)
- University of Madeira (UMa)
- · Instituto Superior de Engenharia de Lisboa (ISEL)

#### HIGHLIGHTS FOR THE FUTURE

In 2025–2029, NOVA LINCS will strengthen its national and international leadership in Computer Science by expanding its critical mass, deepening collaborations, and advancing its strategic theme: *Science and Engineering for Human-Centered Intelligent Software-Driven Ecosystems*. The unit will recruit talented researchers, expand PhD programs, enhance international mobility, and reinforce collaborations with industry and public institutions. Research will focus on generative AI, trustworthy intelligent systems, decentralized swarm intelligence, computing for sustainability, culture, and healthcare, and secure software systems. Investments in advanced computing infrastructure, robotics, and interactive technologies will support ambitious multidisciplinary innovation aligned with emerging societal needs.



### NOVAMATH

CENTER FOR MATHEMATICS
+ APPLICATIONS



> NAME

CENTER FOR MATHEMATICS AND APPLICATIONS

> ACRONYM

NOVA MATH

> COORDINATOR

Ana Luísa Custódio

#### > LOCATION

Department of Mathematics, NOVA School of Science and Technology, Campus de Caparica, 2829-516 Caparica, Portugal

> WEBSITE

https://novamath.fct.unl.pt

#### SCIENTIFIC AREAS

Mathematics

The main mission of NOVA Math is to promote and advance knowledge in Mathematics in its broadest sense. The center focuses on cutting-edge research in Mathematics and its applications, often emerging from interdisciplinary collaborations. It brings together researchers organized into four groups—Algebra and Logic, Analysis, Operations Research, and Statistics and Risk Managementand two thematic lines: Data Science, and Mathematics for Health and Biological Sciences. NOVA Math supports scientific networks, meetings, and research projects in partnership with national and international institutions, many within interdisciplinary consortia. It also contributes to advanced education through courses, seminars, and the integration of research fellows, postdoctoral researchers, and PhD students, while promoting public awareness of Mathematics through outreach initiatives.



#### FACTS AND FIGURES

> TEAM - 112 TOTAL PEOPLE

84 RESEARCHERS
24 PHD STUDENTS

3 POSTDOCS

1 MANAGER OF SCIENCE AND TECHNOLOGY

> PUBLICATIONS (2020-2024)



- 401 Articles
- 87 Proceedings Papers
- · 45 Book Chapter
- 17 Books

> COMPETITIVE FUNDING/ PROJECTS

6 ongoing projects

Amount per funding agency:

- €1M FCT, IP
- £35 314 (€ 40,3K) UKRI

#### HIGHLIGHTS FOR THE FUTURE

NOVA Math is shaping the future of Mathematics at NOVA FCT and aims to consolidate its position as a leading research center in Mathematics and its applications. Building on its four research groups and two thematic lines—Data Science and Mathematics for Health and Biological Sciences—the center will foster excellence in fundamental and applied research, interdisciplinary collaboration, and open science. NOVA Math aims to attract top talent, secure national and international projects, strengthen partnerships with national and international R&D units and deepen partnerships with industry. By supporting young talents and expanding outreach initiatives, NOVA Math seeks to enhance innovation, societal impact, and visibility, positioning Mathematics as a key driver of knowledge and development.



€ 848 K NOVA FCT

€ 2,2 M NOVA.ID.FCT

**€3 M** TOTAL







> NAME

APPLIED MOLECULAR BIOSCIENCES UNIT

> ACRONYM UCIBIO

> COORDINATOR

Cecília Roque

#### > LOCATION

UCIBIO - NOVA School of Science and Campus da Caparica 2829 – 516, Caparica

> WEBSITE

https://www.ucibio.pt/

#### SCIENTIFIC AREAS

Exact and Natural Sciences

- Biological Sciences

Medical and Health Sciences

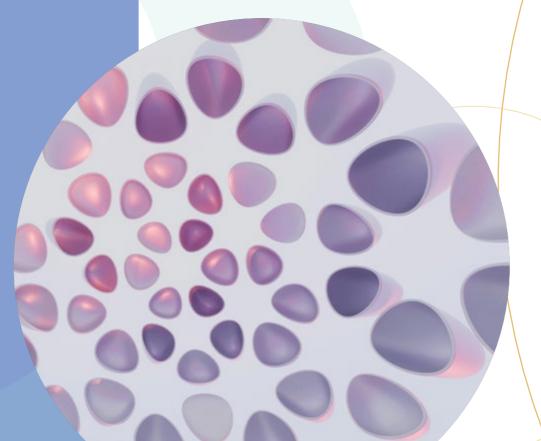
Engineering and Technology Sciences

Engineering and Technology Sciences

- Environmental Biotechnology

UCIBIO, created in 2015 by researchers from NOVA FCT and UPorto, is a top-ranked Portuguese research unit in Applied Molecular Biosciences. In 2020, we co-founded the Associated Laboratory Institute for Health and Bioeconomy (i4HB). Applied Biomolecular Sciences through innovative activities in the intersection of (Bio)Chemistry, Biology, Biotechnology and Bioengineering. Our uniqueness arises from the combination of highapplied science. While addressing pertinent questions at atomic, molecular and cellular levels, UCIBIO researchers combine an excellent capacity to transfer basic knowledge into market-oriented applications addressing societal and sustainable development challenges and needs. Research highlights include breakthroughs in cancer biomarkers, antimicrobial resistance, glycoscience,





#### FACTS AND FIGURES

> TEAM - 353 TOTAL PEOPLE

185 RESEARCHERS 157 PHD STUDENTS

11 TECHNICIANS

> PUBLICATIONS (2024)



- · 351 publications of which:
- 77% Open Access
- 53% in journals with an impact factor higher than 5
- 78% in the first quartile
- 5,885 citations (on 2025-10-03, according to Web of Science)

#### COMPETITIVE FUNDING/ **PROJECTS**

Ongoing international projects funded by the **European Union:** 

- 1 ERA Chair;
- 2 ERC PoC:
- 1 ERC Consolidator grant;
- 10 projects funded by the H2020 and HE programmes;
- 6 COST actions.
- Participation in other international projects funded by:
- Bill and Melinda Gates Foundation;
- 2 «la Caixa» Foundation:
- 1 Human Frontier Science Program (HFSP);
- 1 European Food Safety Authority.

- 49 FCT IP projects: 3.81 M€
- 1 National Industry funding: 5 K€
- 6 International Industry funding: 235 K€
- 8 FEDER & PRR: 2.43 M€
- 21 HE & H2020: 11.01 M€
- 7 Other International funding: 813 K€

#### > NUMBER OF PATENTS AND SPIN-OFF COMPANIES

- Patents: 31 active patents, with 14 already granted.
- Spin Offs: 4 active Spin Offs Nano4 Global, Lda; Agua in Silico; CellmAbs SA; and Nitrogen Sensing Solution

#### **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 2,44M NOVA FCT

€ 986K NOVA.ID.FCT

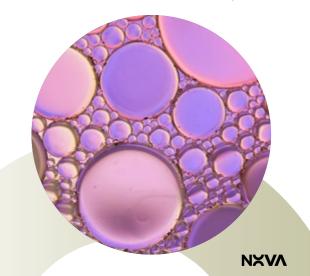
**€ 3.4M** TOTAL

#### **CONSORTIUM MEMBERS:**

UCIBIO gathers integrated researchers from NOVA FCT (87) and University of Porto (98).

#### HIGHLIGHTS FOR THE FUTURE

UCIBIO's vision for 2025-2029 is to consolidate its leadership in Health and Bioeconomy research, while expanding international visibility and maximizing societal impact. In Health, UCIBIO will drive innovation in biomolecular (glyco)sciences and chronic diseases, and advance knowledge in infection control and toxicology, translating discoveries into tangible societal benefits. In Bioeconomy, UCIBIO will foster innovation to develop sustainable solutions in biodiversity-based biotechnology, circular bioeconomy, biomanufacturing, and biodegradable biomaterials. UCIBIO's strategic priorities emphasize nurturing talent at all career stages, promoting interdisciplinary collaboration, strengthening international partnerships, competitive funding, and enhancing engagement with industry, policymakers, and society. These efforts aim to ensure UCIBIO remains positioned as a dynamic, world-class research centre with enduring scientific, social, and economic influence and impact.



#### **Natural** Sciences

### MOSTMICRO-ITQB MOLECULAR STRUCTURAL AND NOVA CELLULAR MICROBIOLOGY NOVA



> NAME

MOLECULAR, STRUCTURAL AND CELLULAR MICROBIOLOGY - INSTITUTO DE TECNOLOGIA QUÍMICA E BIOLÓGICA ANTÓNIO XAVIER

> ACRONYM

> COORDINATOR

MOSTMICRO-ITQB

Cláudio M. Soares

> LOCATION

Av. da República, Oeiras

> WEBSITE

https://www.itqb.unl.pt/mostmicro

#### SCIENTIFIC AREAS

Molecular Microbiology

Infection Biology And Pathogenesis

Molecular And Cellular Biology

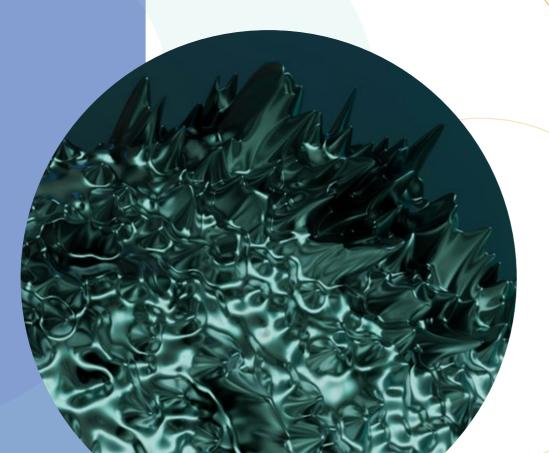
Structural Biology

Microbial Biotechnology

Metabolism And Bioenergetics

MOSTMICRO-ITQB brings together microbiologists, molecular and structural biologists, and chemists to study biological processes in microbes relevant to human health, biotechnology, and the environment. This multidisciplinary unit promotes scientific discovery, integrates research and training, enhances international visibility, and expands its scientific, societal, and economic impact. With around 260 members (118 PhD holders) and 34 laboratories organized into nine Research Groups plus a Science Communication, Funding & Innovation group, MOSTMICRO-ITQB drives research through three thematic lines: 1) Molecular Mechanisms of Biological Processes: 2) Anti-Infective Strategies against Microbial Pathogens, and 3) Microbial Factories for Health and Sustainability, and all laboratories contribute to the goals of one or more of the thematic lines.







#### FACTS AND FIGURES

> TEAM - 260 TOTAL PEOPLE

The Unit has 34 laboratories and approximately 260 researchers, of which:

118 PHD HOLDER RESEARCHERS, INCLUDING LAB HEADS

87 PHD STUDENTS

45 MASTER STUDENTS AND OTHERS

> PUBLICATIONS (2024)



10 STAFF

- Articles published in international peer-reviewed scientific periodicals indexed in SCOPUS in 2024 = 105 publications
- Number of Citations received by the **105** publications referenced above = 454 citations (as of the 3rd of October 2025)

#### > COMPETITIVE FUNDING/ PROJECTS (2020-2024)

- The MOSTMICRO-ITOB Research Unit secured €14,2M in international competitive funding calls, such as from the HE programme, La Caixa Foundation and other sources, of which €11,6M were secured only in the last three years of this period.
- Projects: the **ERC Advanced MISSING** LINKS Grant (2024-29, 3M€), MPS\_NOVA Twinning grant (1M€ for NOVA, 2024-26), **EU-EMBRACES** (2024-2026, 82K €), the Staff Exchange project McGEA (2024-2028, 308K €), the ERC PoC SNAIL project (2024, €150K €), and a MSCA-PF (2024-2026, 200k €).
- > NUMBER OF PATENTS AND SPIN -OFF COMPANIES (2024)
  - 2 new patents were granted and 13 were submitted.

#### **FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 6M

#### HIGHLIGHTS FOR THE FUTURE

Reflecting on past achievements and current strengths, we set out clear goals for 2025-29. We aim to continue excelling in research, incubate and nurture talent, increase our research's socio-economic footprint and expand our influence in society. We need to constantly evolve alongside a changing ecosystem, while working to expand fundamental and applied knowledge, develop solutions for societal challenges, create value, and train highly skilled professionals to meet the demands of the future. We will therefore reinforce our intervention along four Axes: 1-Scientific Development, 2-Training & Career Development, 3-Innovation & Value Creation, and 4-Wider Societal Impact. In addition, three priorities run across all axes, guiding the design of our action - Internationalization, Responsible Research and Efficient use of Resources.

#### Natural Sciences





> NAME

INFORMATION MANAGEMENT RESEARCH CENTER

> ACRONYM

MAGIC

> COORDINATOR

Leonardo Vanneschi

#### > LOCATION

Universidade NOVA de Lisboa Campus de Campolide 1070-312 Lisboa, Portugal

> WEBSITE

https://magic.novaims.unl.pt/en/

#### SCIENTIFIC AREAS

Data Science

Management



Data Science—comprising eight research lines: Information Systems, Marketing, Finance and Risk Management, Public Policy, Evolutionary Computation, Deep Learning, Synthetic Data Generation, and Geoinformatics. Addressing societal challenges in Health, Smart Cities, Sustainability, Tourism, and Education, MagIC develops analytical and computational methods to enhance informed decision-making. The centre brings together 137 researchers, including 52 PhD integrated members and 43 doctoral students, and

has produced over 950 publications in the past five

years, 85.7% in indexed journals with immediate

open access. Eleven members are listed among

the World's Top 2% Scientists (Stanford, 2025).





#### **FACTS AND FIGURES**

#### > TEAM - 139 TOTAL PEOPLE

137 NUMBER OF RESEARCHERS

- TOTAL NUMBER OF RESEARCH MANAGERS: 2
- TOTAL NUMBER OF INTEGRATED MEMBERS
  (IT IS ALSO THE N MEMBERS WITH
  DOCTORAL DEGREE): 52
- PHD STUDENTS: 43
- 26 OTHER RESEARCHERS WORKING IN R&I PROJECTS
- 16 OTHER COLLABORATING RESEARCHERS

#### > PUBLICATIONS (COLLECTED AT 31/10/2025)



- Total number of publications:133
- Total number of Indexed publications (WoS/Scopus): 116
- Total number of Articles in Q1 (Scimago): 74
- % of publications in immediate Open Access: **82,7**%

#### > COMPETITIVE FUNDING/ PROJECTS

- Number of new R&I projects (2025): 14 (4 international | 10 national; 12 as coordinators | 1 as partners)
- Awarded for R&I projects: 3.2 M€
- Number of new capacity-building projects (2025): 5 (4 international | 1 national; 5 as partners)
- Awarded for R&I projects: 1.2 M€
- Funding for scientific infrastructures: 1.1 M€
- Funding for the MagIC research centre (FCT):
   1.5 M€

#### FUNDING AWARDED BY FCT, IP (2025-2029)

€ 1,6M

#### HIGHLIGHTS FOR THE FUTURE

Over the next five years, MagIC aims to advance Information Management research by further integrating Management and Data Science to address complex societal and technological challenges. Research will evolve towards emerging areas such as Generative and Interpretable AI, Synthetic Data Generation, and Geospatial Artificial Intelligence, while exploring their implications for decision-making, governance, and organizational performance. In Management, MagIC will deepen research on technology adoption, financial and cybersecurity risks, and human-technology interaction. These advances will strengthen MagIC's impact across its thematic lines-Health, Smart Cities, Sustainability, Tourism, and Education—fostering responsible data-driven innovation and consolidating MagIC's position as a European reference in interdisciplinary Information Management research.







> NAME

INTERDISCIPLINARY CENTRE OF SOCIAL SCIENCES

> ACRONYM

CICS.NOVA

> COORDINATOR

Dalila Cerejo

#### > LOCATION

Colégio Almada Negreiros - CAN | New University Lisbon | Campolide Campus | 3rd floor – Room 333

> WEBSITE

#### SCIENTIFIC AREAS

Sociology

Geography



CICS.NOVA's mission is to develop interdisciplinary research in social sciences, promoting critical thinking and the integration of knowledge within the communities it is part of, both nationally and internationally.

CICS.NOVA structures its activities around an integrated strategy that encompasses key dimensions such as education and research, science dissemination and communication, co-creation and knowledge transfer, funding acquisition, publishing, and open access. This approach reinforces the unit's mission to produce interdisciplinary knowledge with significant societal impact, aligned with the Sustainable Development Goals (SDGs).

#### **FACTS AND FIGURES**

> TEAM: 199 TOTAL PEOPLE

67 INTEGRATED RESEARCHERS

107 PHD STUDENTS

25 COLLABORATING RESEARCHERS

> PUBLICATIONS(2024)



- · Articles: 142
- Books and books chapters: 125
- Reports: 10

#### > ONGOING FUNDING / PROJECTS

- · International projects: 10 (European Commission: ≈ € 1,34M; Other International Funding: ≈ € 81 457)
- FCT Projects: 5 (≈ € 224 650)
- Other National Projects: 8 (Public institutions: ≈ € 284 505; Private entities: ≈ € 39 929)

#### **CONSORTIUM MEMBERS**

Fundação Gaspar Frutuoso / Universidade dos Açores, Universidade do Minho. Instituto Politécnico de Leiria and Universidade de Évora

#### HIGHLIGHTS FOR THE FUTURE

Currently, CICS.NOVA directs its research towards four key scientific and social challenges, structuring its actions according to specific objectives: Climate Change; Digitalization and Artificial Intelligence; Demographic Transition and Intergenerational Dynamics; and Science and Society.

CICS.NOVA's strategy extends beyond research, emphasizing the integration of education and research as well as advanced training. The unit's work is reinforced by its regional hubs in Leiria, Braga, Évora, and the Azores, strengthening territorial impact and consolidating knowledge transfer to policymakers, businesses, and civil society.

By aligning with the SDGs, CICS.NOVA reaffirms its commitment to economic, social, cultural, territorial, and environmental impact, establishing itself as a reference center for interdisciplinary knowledge production and the promotion of innovative solutions for both global and local challenges.

**FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 2,67M



## CEDIS CENTRO DE IAD SOBRE DIREITO E SOCIEDADE



#### > NAME

RESEARCH & DEVELOPMENT CENTRE ON LAW AND SOCIETY

> ACRONYM
CEDIS

#### > COORDINATOR

Soraya Nour Sckell

#### > LOCATION

NOVA School of Law – Campus de Campolide, 1099-032 Lisbon, Portugal

#### > WEBSITE

https://cedis.novalaw.unl.pt/

#### SCIENTIFIC AREAS

Social Sciences – Law (Law and Society; Human Rights; Sustainability; Institutional and Social Justice; Democracy Citizenship and Peace; Environme

\* CEDIS was recently evaluated by FCT, IP and received an Excellent rating, the highest score awarded among all Portuguese legal research centres.



CEDIS, the Research Centre on Law and Society at NOVA School of Law, adopts a plural, interdisciplinary, and international approach to legal research. It connects with European and Portuguese-speaking academic networks, promotes diversity and inclusion, and supports open-access knowledge.

Its mission is based on three core pillars:

- Research: CEDIS develops innovative legal and interdisciplinary frameworks that go beyond traditional legal thinking, addressing societal challenges and informing legislation, public policy, and institutional reform at national and international levels.
- Education: Young scholars are actively integrated into research projects and outreach activities, gaining hands-on experience and contributing to knowledge production and dissemination.
- Outreach: CEDIS works closely with policymakers, public institutions, NGOs, the private sector, and civil society to ensure research has real-world impact.

Its research is structured around three thematic lines:

Empowering People, Protecting the Planet, and Promoting Strong Institutions, reflecting a strong commitment to justice, sustainability, and democratic governance.

#### **FACTS AND FIGURES**

> TEAM: 345 TOTAL PEOPLE

171 RESEARCH TEAM

45 INTEGRATED PHD HOLDER RESEARCHERS

69 PHD STUDENTS

57 COLLABORATING RESEARCHERS

3 STAFF

> PUBLICATIONS



 80 publications in books, chapters, scientific articles, reports, and other specialized contributions

#### > COMPETITIVE FUNDING/ PROJECTS

- Ongoing projects 2025: 20
- · International projects: 70%
- Total funding: over €1 million

#### FUNDING AWARDED BY FCT, IP (2025-2029)

€ 1,8M

#### HIGHLIGHTS FOR THE FUTURE

- 1. CEDIS's 2025–2029 Strategic Plan is structured around four core pillars: Input, Activities, Output, and Impact.
- CEDIS reinforces transparent governance, equality, and inclusion through strengthened policies and oversight. It prioritizes internationalization, interdisciplinary collaboration, and the attraction of external funding, particularly EU grants.
- Research efforts focus on socio-legal challenges through empirical, interdisciplinary methods. Education strategies promote student engagement, mentorship, and collaboration with NOVA School of Law. Outreach includes legal aid, public events, and community-based initiatives.
- CEDIS supports high-quality publications, policy-relevant outputs, and knowledge-sharing through conferences and thematic events. Investment in multimedia communication broadens the reach of its research.
- Finally, CEDIS seeks to shape public policy and foster societal dialogue through expert engagement, publicfacing initiatives, and strategic dissemination of research findings.



#### Social Sciences





> NAME

CENTRE FOR RESEARCH IN ANTHROPOLOGY

> ACRONYM
CRIA

> COORDINATOR

Catarina Alves Costa

> LOCATION

Building 4, room B1.130, Av. Forças Armadas, n. 40, 1649-026 LISBOA Portugal

> WEBSITE

https://cria.org.pt/pt

SCIENTIFIC AREAS

Anthropology

CRIA is Portugal's leading research center in Anthropology, hosted by four public universities: ISCTE, NOVA FCSH, the University of Coimbra, and the University of Minho.

In 2024, CRIA was rated Excellent - the highest classification - by the Portuguese Foundation for Science and Technology.

The center's strategic research areas include topics such as heritage, environment, sustainability, public policies, inequality, religion, migration, documentaries and archives.

Driven by a strong commitment to societal relevance and grounded in rigorous ethnographic research, CRIA actively addresses social, cultural, and environmental challenges.

The international profile of CRIA's researchers is reflected in their global presence, conducting research projects from Angola to India, from Brazil to Antarctica.



#### FACTS AND FIGURES

> RESEARCH TEAM - 96

32 RESEARCHERS
28 PHDS
34 COLLABORATORS
2 STAFF

> PUBLICATIONS (LAST 5 YEARS)



- 227 Contributions to journals
- 140 Chapters in book, reports and conference proceedings
- 37 Book/report
- 68 Contributions to conferences
- **24** Thesis
- 27 Other

#### > COMPETITIVE FUNDING/ PROJECTS(LAST 5 YEARS)

Two Horizon Europe projects illustrating the core research areas of NOVA FCSH-CRIA researchers:

- TRAST Transmedia stories of insularity | € 100K
- EDGES Entangling Indigenous Knowledges in Universities | € 211K

#### FUNDING AWARDED BY FCT, IP (2025-2029)

€ 434K

#### **CONSORTIUM MEMBERS**

ISCTE, NOVA FCSH, the University of Coimbra, and the University of Minho.

#### HIGHLIGHTS FOR THE FUTURE

In the coming years, CRIA will strengthen its research in key areas like heritage, environment, mobility, and inequality. It will expand its international presence, respond to urgent social issues, and reaffirm its commitment to people-oriented anthropology and collaborative knowledge production. CRIA's five crosscutting projects will guide its work on digital archives, migration, socio-environmental relations, welfare crises, and restitution.





#### **EDUNOVA-ISPA**



> NAME

INTERDISCIPLINARY RESEARCH CENTRE IN EDUCATION

> ACRONYM

EDUNOVA.ISPA

> COORDINATOR

Francisco Peixoto (ISPA), Helena Rocha (NOVA FCT), Sílvia Almeida (NOVA FCSH)

> LOCATION

ISPA, NOVA FCT, NOVA FCSH

> WEBSITE

https://www.edunova-ispa.org

SCIENTIFIC AREAS

Education

EDUNOVA.ISPA is a new research unit founded under the general thematic scope: "Building Bridges in Education Research: From Learners to Systems, from Diversity to Inclusion", assuming as main goals:

- promoting research in Education;
- qualifying and projecting scientific research in education:
- transferring advanced knowledge to young researchers;
- disseminating scientific knowledge and methodological tools in the field of education;
- Intensifying international partnerships in EDUNOVA.ISPA.

The main scientific domains and thematic areas of the research unit are:

- Processes and practices in education
- Learning: contexts, processes and literacies
- Teachers: educational knowledge and professional cultures
- Ideas, policies and social change in education
- Education systems and school organizations
- Diversity and inclusion: curriculum, pedagogical practices and assessment

#### **FACTS AND FIGURES**

> RESEARCH TEAM: 58

23 INTEGRATED MEMBERS

16 COLLABORATORS

19 PHD STUDENTS

> PUBLICATIONS (2020-2025)



- 25 papers in international journals in 2024
- 15 in WoS/Scopus Q1 journals

#### > COMPETITIVE FUNDING/ PROJECTS:

- NOVA FCT: 3 projects funded by Fundação para a Ciência e a Tecnologia, Fundação Calouste Gulbenkian, and Erasmus+ KA2 in a total of €
- NOVA FCSH: 2 project funded by Fundação para a Ciência e Tecnologia in a total of € 59,9K, and Municipalities in a total of € 95 K per year.

#### FUNDING AWARDED BY FCT, IP (2025-2029)

€ 53,8K NOVA.ID.FCT € 67K NOVA FCSH € 121 K TOTAL

#### **CONSORTIUM MEMBERS**

EDUNOVA.ISPA is a consortium that involves partnerships between researchers from ISPA – Instituto Universitário, NOVA School of Science and Technology (NOVA FCT), and NOVA School of Social Sciences and Humanities (NOVA FCSH).

#### HIGHLIGHTS FOR THE FUTURE

GOAL 1. To promote research in education across different dimensions of educational processes and contexts in Processes and Practices in Education, covering Learning Contexts, Processes and Literacies, and Teachers: Educational

Knowledge and Professional Cultures; and in Ideas, Policies and Social Change in Education, encompassing Education Systems and School Organization, and Diversity and Inclusion:

GOAL 2. To enhance and project scientific research in the field of education:

GOAL 3. To transfer advanced knowledge to younger generations of researchers through close collaboration with the postgraduate training of the involved institutions.

GOAL 4. To disseminate scientific knowledge and methodological tools in the field of education:

GOAL 5. To intensify international partnerships in EDUNOVA.ISPA's key research areas.



#### Social Sciences





> NAME

INSTITUTO DE COMUNICAÇÃO DA NOVA

> ACRONYM ICNOVA

> COORDINATOR

Paulo Nuno Vicente

> LOCATION

Universidade NOVA de Lisboa, Avenida de Berna 26C building ID room 3.20, 1069-061 Lisbon

> WEBSITE

https://www.icnova.fcsh.unl.pt/

SCIENTIFIC AREAS

**Communication Sciences** 

ICNOVA - NOVA Institute of Communication is a leading Portuguese research unit dedicated to advanced studies in Communication Sciences, Arts and Humanities. Based at NOVA University Lisbon, ICNOVA develops interdisciplinary and socially engaged research, combining critical approaches with technological and artistic experimentation. Its scientific agenda focuses on media transformations, digital cultures, strategic communication, performance and cognition, and the societal impact of emerging technologies such as artificial intelligence. Through specialized laboratories, observatories and international collaborations, ICNOVA aims to produce highimpact knowledge that contributes to public policy, civic inclusion and scientific innovation.



#### FACTS AND FIGURES

> RESEARCH TEAM - 254



86 INTEGRATED MEMBERS



43 COLLABORATORS

4 MANAGERS

> PUBLICATIONS



- Articles in international indexed journals (WoS/Scopus): 190
- Articles in national indexed journals (WoS/Scopus): 123
- Authored books: 12
- Edited books: 74
- Book chapters in international publishers: 133
- Book chapters in national publishers: 172
- Articles in conference proceedings: 56
- · Working reports: 64
- · Presentations at international conferences: 356
- · Presentations at national conferences: 500
- · Artistic production: 260

#### > COMPETITIVE FUNDING/ PROJECTS:

- Total funding: € 1M
- National funding: € 327K
- International funding: € 713K

**FUNDING AWARDED** BY FCT, IP (2025-2029)

€ 2M

#### HIGHLIGHTS FOR THE FUTURE

ICNOVA aims to consolidate its position as a research unit of excellence through a strategic plan focused on the media, technological and sociocultural transformations that shape contemporary communication practices. The production of knowledge geared towards public policy formulation will be strengthened through both fundamental and applied research, as well as through the development of specialized observatories dedicated to key themes such as Innovation, Artificial Intelligence, and Populism. One of ICNOVA's strategic objectives is to reinforce its access to competitive international funding, with a particular focus on active participation in European programmes. This strategy seeks not only to ensure the sustainability and expansion of the unit's scientific activity but also to enhance its capacity to attract researchers with strong international profiles.







> NAME

NOVA SCHOOL OF BUSINESS & ECONOMICS

> ACRONYM

NOVA SBE

> COORDINATOR

Pedro Oliveira

> LOCATION

Campus de Carcavelos - R. da Holanda 1, 2775-405 Carcavelos

> WEBSITE

https://www.novasbe.unl.pt/en/

#### SCIENTIFIC AREAS

Management

Fconomics

Finance

Nova SBE stands out for its global reach, international faculty and students, top research, and strong global partnerships.



#### FACTS AND FIGURES

#### > RESEARCH TEAM (2024 DATA)

40 FULL PROFESSORS (OF WHICH 9 HAVE CHAIRS)

26 ASSOCIATE PROFESSORS

71 ASSIS TANT PROFESSORS

23 RESEARCHERS (POSTDOCTORAL AND COLLABORATORS)

75 PHD STUDENTS

150 researchers working in three research areas: 34% Economics | 20% Finance | 46% Management - our Research Unit brings together researchers from over 20 countries

#### > PUBLICATIONS(2024)



- 165 Publications
- 122 Articles
- 28 Published in 4\* & 4 journals (ABS ranking)
- **15** Published in journals from FT50 ranking
- 8 Books
- 18 Chapters in Book
- 121 Peer Reviews
- 5 Conference proceedings
- 66 Case studies

#### > COMPETITIVE FUNDING/ PROJECTS (2024 DATA)

- New projects: 6
- New Funds: € 1,2M
- Total projects and funding:
  - 1 European Commission (Postdoctoral Fellowships - Marie Skłodowska-Curie Actions)
  - 3 FCT projects
  - 2 CEEC projects 1 Individual and 1 Institutional

#### FUNDING AWARDED BY FCT, IP (2025-2029)

€ 3,5M

#### HIGHLIGHTS FOR THE FUTURE

Nova SBE's 2025–2029 strategy focuses on global reach, innovation, sustainability, and research excellence worldwide.

More information here: https://www.novasbe.unl.pt/ Portals/0/Files/Reports/2025/EN\_Nova%20SBE\_ Impact%20Report\_2024\_VF3.pdf







**Open Science Guide** 

96

Network for Research Data Management (Re.Data)

3

Research Data Management Competence Centre (NOVA.ID-RDM-CC)

19

NOVA embraces Open Science as a strategic pillar for more collaborative, transparent, and accessible research. Through pioneering initiatives such as the Open Science Guide, the Research Data Management Network (Re.Data), and the Research Data Management Competence Centre (NOVA.ID-RDM-CC), the University promotes responsible data sharing and open dissemination of results — fostering discovery, innovation, and public trust in science.

Open Science: Sharing Knowledge, Advancing Research

## OPEN SCIENCE

A Guide for NOVA Researchers

NOVA University Lisbon is committed to advancing science and the widespread dissemination of knowledge for the benefit of society, through the adoption of open, equitable, reproducible, and responsible research practices.

NOVA recognizes Open Science as a guiding paradigm and aims to promote it by supporting research processes and tools that lead to transparency, integrity, collaboration, inclusivity, and sustainability; promoting new working methods and new social partnerships; encouraging the free dissemination of knowledge and the accessibility and reuse of research results, stimulating open access to publications and data; supporting open participation and dialogue with civil society and other knowledge systems; and building the necessary infrastructures, skills, and incentives for Open Science.

NOVA developed a Guide aimed at researchers across all disciplines from NOVA University Lisbon, providing support through each stage of their research process, offering tools and practices in each chapter.

We hope these guidelines inspire and support you in practicing Open Science by sharing different aspects of your research with a wider audience.



Access the guide:





NΧVΛ

Open Science: Sharing Knowledge, Advancing Research



NOVA University Lisbon is part of the consortium implementing the Re.Data project - Network for Research Data Management. Funded by the National Programme for Open Science and Open Research Data (PNCADAI), the initiative strengthens the University's role as one of the leading institutions promoting innovative practices in line with international standards.

The project's mission is to create and consolidate a community of practice dedicated to research data management in Portugal. This objective aims not only to increase the social and economic impact of research, but also to ensure sustainability

and responsible and expanded access to data, in line with the best international standards.

The consortium is made up of NOVA FCT, NOVA FCSH, IHMT NOVAe NOVA IMS, in collaboration with the University of Coimbra, ISCTE - University Institute of Lisbon, the Polytechnic Institute of Bragança and the University of Minho, which is coordinating the project.



Learn more here:



Open Science at NOVA: building a culture of trusted and reusable research data

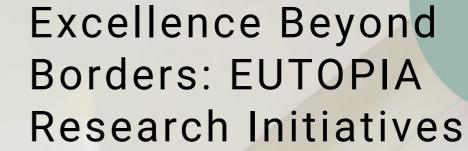
NOVA is strategically committed to making the science produced within its research units more open, transparent, and reusable. The creation of the NOVA.ID Research Data Management Competence Centre (NOVA.ID-RDM-CC), hosted at NOVA.ID.FCT, is a fundamental and strategic step in this direction: an initiative that brings together experts from all NOVA schools to develop guidance, infrastructure, and training that help researchers manage, document, preserve, and share their research data according to FAIR principles - Findable, Accessible, Interoperable, Reusable.

The centre acts on multiple fronts: it clarifies policies and requirements; provides guides and technical support; identifies trustworthy platforms and tools; promotes the harmonization of practices across disciplines;

and builds capacity through training, mentorship, and communities of practice. The activity of the competence center directly answers European and national Open Science mandates, and more importantly, creates the conditions for research data produced at NOVA to be easier to find, verify, reproduce, and reuse - maximizing the scientific and societal impact of research activities at NOVA.

More than a compliance exercise, NOVA.ID-RDM-CC promotes a cultural shift: from a "publish and move on" logic to a form of science that leaves a qualified, readable, and reusable trace - inside and beyond academia. By strengthening the quality, integrity, and openness of research data, NOVA reinforces its role as a university that leads by example in building a truly open scientific ecosystem for the benefit of all.





EUTOPIA\_HEALTH

Project 102

**EUTOPIA Innovation Challenges** 

104

EUTOPIA PhD in co-tutelle

105

**EUTOPIA Week | Research Days** 106

**EUTOPIA Young Leaders Academy program** 

7

Within the European University Alliance EUTOPIA, NOVA strengthens its international reach through collaborative projects that transcend borders and disciplines. Initiatives like EUTOPIA\_HEALTH exemplify NOVA's capacity to co-create knowledge, drive innovation, and build research networks with meaningful European and global impact.

## Excellence Beyond Borders: EUTOPIA Research Initiatives



## EUTOPIA\_HEALTH Project

On its second year, the EUTOPIA\_ HEALTH project was rich with training activities aimed at diverse audiences, including PhD students, researchers, and research managers.

As part of the project, an **Impact and Science Communication Training** was held in January 2025 at the Rectorate of NOVA University Lisbon. The event brought together around 20 researchers and science management professionals from seven NOVA academic units. On the first day, participants explored pathways to enhance research impact, strategies for stakeholder engagement, and opportunities for local and European funding. The second day focused on science communication, emphasizing the importance of clarity, audience targeting, and storytelling in scientific outreach.



The EUTOPIA\_HEALTH Training Programme for Research Managers: Advancing Institutional Excellence was held for the first time at NOVA. This training brought together research managers across all NOVA's Academic Units to explore their evolving roles throughout the research lifecycle: from project design and grant applications to ethics, implementation, and dissemination. It highlighted cross-departmental collaboration, strategic alignment, and the development of a professional identity for research managers, aiming to equip them with the skills and knowledge needed to thrive in an increasingly global research ecosystem.

In addition to NOVA staff, experienced research managers from the EUTOPIA\_HEALTH consortium participated in the on-site sessions, fostering interaction across institutions and sharing of experiences and best practices.

Reflections on the goals, methods, and impact of the training were presented by the Facilitation Team and highlights from the programme are summarized in this YouTube video.

The second edition, scheduled for 2026, is expected to attract NOVA research managers with diverse levels of experience and services (pre-award, communication, research/lab management, postaward, infrastructure, library).





The **EUTOPIA\_HEALTH** hackathon, hosted by the University of Ljubljana, brought together interdisciplinary teams of PhD students, researchers, and technology transfer officers from across the consortium to co-create solutions to real-world challenges proposed by Roche Slovenia and Juicy Marbles. Roche invited participants to make preventive healthcare more visible and motivating, while Juicy Marbles asked how to design the food of the future to balance health, sustainability, and joy. Following an online session, participants met in person for three intensive days of design, prototyping, and pitching. By combining industry challenges, academic expertise, and user input, participants developed innovative solutions with clear potential for impact, bridging the gap between research and real-world application.







## Excellence Beyond Borders: EUTOPIA Research Initiatives

# EUTOPIA INNOVATION CHALLENGES: Empowering Collaboration Between Academia and Industry

As part of the EUTOPIA MORE project, NOVA University Lisbon has taken an active role in fostering a culture of innovation, entrepreneurship, and cross-disciplinary collaboration through the EUTOPIA Innovation Challenges — flagship initiatives designed to connect academia with real-world industry challenges.

#### **Driving Innovation Through Research**

From May 5 to 9, 2025, NOVA hosted the **EUTOPIA Innovation Challenges for Researchers**, under the theme "Industry-Driven Solutions for Ocean Challenges." This edition focused on one of Lisbon's most relevant and pressing topics — the ocean — inviting researchers to co-develop sustainable, science-based, and impactful solutions.

Embedded in the Work Package 4 (WP4) of the EUTOPIA MORE project, this event brought together 16 researchers and 1 staff member from across Europe, representing: NOVA University Lisbon, Vrije Universiteit Brussel, Ca' Foscari University of Venice. Technische Universität Dresden, University of Gothenburg, University of Warwick and Babeş-Bolyai University.

Through interdisciplinary teamwork, innovation methodologies, and direct



engagement with industry partners, participants tackled complex challenges related to ocean health, sustainability, and technology. The initiative reflected the EUTOPIA alliance's shared mission to transform academic knowledge into practical, market-ready solutions — advancing Europe's blue economy and environmental sustainability goals.

#### Inspiring the Next Generation of Innovators

In parallel, NOVA has also been deeply engaged in the EUTOPIA Innovation Challenges for Students, another

key activity within WP4. In 2025, NOVA students proudly represented the university in two editions:

- Innovation Challenges at Universitat Pompeu Fabra (May 13-15, 2025)
- Innovation Challenges at Vrije Universiteit Brussel
   Autumn School on Multilingualism (November 17–21, 2025)

For each event, eight NOVA students from various schools and faculties were selected to participate in these immersive, challenge-based learning experiences. Working alongside peers from across the EUTOPIA alliance, they tackled real-world issues through collaborative problem-solving, creativity, and entrepreneurial thinking.

#### A Vision for the Future

The EUTOPIA Innovation Challenges embody the alliance's commitment to bridging academia and society, fostering European collaboration, and empowering both researchers and students to turn ideas into impactful innovations. Through these initiatives, NOVA University Lisbon continues to strengthen its role within EUTOPIA as a hub for knowledge exchange, creativity, and sustainable solutions to the challenges of our time.

## EUTOPIA PHD IN CO-TUTELLE

EUTOPIA PhD in co-tutelle is great example of a program that promotes collaborative research within the EUTOPIA Alliance in early-stage careers. These research grants support high quality doctoral projects, in all fields of knowledge, that have NOVA as home or host institution, in collaboration with EUTOPIA institutions. In 2025, 6 new PhD students joined NOVA awarded with 4-year fellowships funded by the Foundation for Science and Technology (FCT I.P.).

Over the course of 4 editions, NOVA currently sums 33 PhD students, with already established partnerships with Vrije Universiteit Brussel (VUB), CY Cergy Paris Université (CY), University of Warwick (UW), Technische Universität Dresden (TUD) and Ca' Foscari University of Venice (UNIVE). These doctoral students can benefit from their dual research environment and enhance synergies between the two joined partners.



## Excellence Beyond Borders: EUTOPIA Research Initiatives

## EUTOPIA WEEK Research Days 2025

The University of Warwick hosted the **EUTOPIA Week** in June 2025, under the topic Creating Global Connections. This topic reflects EUTOPIA's mission to address the pressing challenges faced by communities across the globe. As part of this week's events, the two-day Research Days drew on EUTOPIA's strengths and diverse expertise to foster interdisciplinary dialogue and develop new initiatives supporting the advancement of *Regulatable Artificial Intelligence*.

Researchers from the ten universities of the EUTOPIA Alliance presented their work and participated in networking sessions focused on building synergies and exploring future collaborations. Representing NOVA University Lisbon, Professor João Leite (FCT NOVA), Professor Vera Lúcia Raposo (NSL) and Professor Leonardo Vanneschi (NOVA IMS) were selected to join this initiative, which occurs twice per year and aims to promote the submission of European-funded project proposals.



## EUTOPIA YOUNG LEADERS ACADEMY PROGRAM

The **Young Leaders Academy** (YLA) program was established to enrich career development of doctoral researchers, by providing training programmes and mobility allowances. With participation in 2 cohorts, NOVA has 4 YLA ambassadors that have promoted scientific exchange and research collaborations over the EUTOPIA alliance, including visits to VUB, Pompeu Fabra University (UPF), University of Ljubljana (UL) and Babeş-Bolyai University (UBB).

In December 2025, the first cohort of NOVA fellows will conclude their two-year journey, with the organization of a highly anticipated symposium in Venice on "Power Dynamics in Academia". Their participation has already fostered a more connected academic community, resulting in several joint research proposals and shared PhD supervision across partners.

In fact, a survey conducted among YLA alumni revealed that the impact on their EUTOPIA network outlives the program, with long-time outcomes like shared publications, grants and invitations to lectures and events. As ambassadors, fellows also tend to engage more in other EUTOPIA activities, continuing to sustain their skill development and personal growth.

Obs: Core training opportunities within the program include Leadership, Supervision, Grant Writing, Impact, Engagement and Visual Communication.





## NOVA Interdisciplinary Research

## Sustainable Energy Systems

## galp



Within the scope of NOVA Interdisciplinary Research Community (NIRC) on Sustainable Energy Systems, three interdisciplinary research projects are being funded with the support of Galp, aiming to address complex and emerging societal challenges:

Communities

#### SOLACE

The EU Internal Electricity Market Directive 2019/944 and the EU Renewable Energy Directive 2018/200 establish, for the first time, an enabling legal framework for collective citizen participation in the energy system. These directives place consumers and energy communities at the forefront of the energy transition, granting them the right to produce renewable energy (CEP, 2019). In response to these directives, **SOLACE**, proposed by Professor Iva Pires (NOVA FCSH), Professor Teresa Santos (NOVA FCSH), Professor Francesca Poggi (NOVA FCSH), Professor Daniel Aelenei (NOVA FCT), and Professor Ricardo Martins (NOVA IMS) under the thematic area of Energy Communities, began in September 2025. The project seeks to contribute to the effective implementation of energy communities by synthesizing scientific and practical knowledge, and by fostering civil society's participation in the transition towards energy efficiency. Through community engagement, education, and collaborative action, SOLACE aims to build resilient and thriving communities that prioritize energy efficiency and environmental stewardship.

By engaging with Galp's *Living Lab* to test innovative energy balance concepts, new technologies, and behavioral models, the project aligns with the goals of the **Caxias Living Lab Energy Community** and supports the transition towards energy-efficient and sustainable communities.

According to Iva Pires, "SOLACE is a collaborative project created within the NIRC community, bringing together scientists from a variety of backgrounds. It explores what motivates consumers to join and actively engage in Energy Communities, and the key pull factors and barriers shaping this market. The project aims to provide valuable insights for policymakers, developers, municipalities and participants to support the growth of energy communities, empowering the community members to take collective action and drive positive change towards the use of renewable sources of energy."

#### BioCircle

The Crops to Biomethane Production: A Circular Vision on the Potential of Biomass from Non-Usable Soils to Produce Biomethane (BioCircle), led by Ana Luísa Fernando (NOVA FCT) and Ricardo Louro (ITQB NOVA), advances a sustainable model for renewable energy generation and soil valorization. Since its launch in January 2025, the project explores the cultivation of energy crops on degraded Portuguese soils to produce biomethane through codigestion with wastewater, thereby creating a circular bioeconomy system.

To date, approximately 750,000 hectares of nonusable soils, representing around 8.5% of Portugal's land, have been successfully mapped, revealing strong potential for energy crops such as giant reed, cardoon, and sorghum. Moreover, techno-economic and SWOT analyses have demonstrated the feasibility of biomethane production under optimized and incentivized conditions.

By converting marginal lands into productive bioenergy hubs, **BioCircle** contributes to the EU Green Deal and the UN Sustainable Development Goals, particulaly Goal 7 (Affordable Clean Energy) and Goal 15 (Life on Land), promoting decarbonization, rural development, and efficient resource reuse through integrated biomass and wastewater valorization.

#### **ENCOMPASS**

Project ENergy COmplexity Mapping for Pathways to Advance Sustainable Systems (ENCOMPASS), led by Ian Scott (NOVA IMS), António Vicente (NOVA FCT), and Flávio Pinheiro (NOVA IMS), examines how Europe can build a resilient and inclusive greentechnology manufacturing base. Motivated by the EU's Net-Zero Industry, which aims to produce 40% of strategic green-tech components domestically by 2030, the project addresses a core challenge: the Act's decentralized implementation risks widening regional disparities, as areas with deeper industrial capabilities may capture benefits first, leaving others behind. ENCOMPASS responds by mapping the value chains of net-zero technologies and applying economic complexity analysis to identify realistic pathways for European industrial development, with particular emphasis on opportunities in the Iberian

During the last months, ENCOMPASS has built a cross-NOVA collaboration and developed Al-assisted tools to automate the identification of value chains under the NZIA, with initial results for the Iberian

region now being explored. In parallel, new interactive visualization tools are being designed to assist policymakers, by translating complex data into digestible insights designed for real-world impact. Untimately, ENCOMPASS exists to ensure that Europe's path to climate leadership is also a path to shared prosperity: one where every region finds its place in the green economy, and where building resilience means fostering an inclusive industrial future for all.

**Bridging Disciplines:** 

Interdisciplinary Research at NOVA

## **IGNITION GRANTS**

PARA INVESTIGAÇÃO INTERDISCIPLINAR

for Interdisciplinary Research





NOVA has launched the first edition of the Ignition Grants for Interdisciplinary Research, in partnership with Fundação Santander Portugal. This initiative reflects the shared commitment of both institutions in advancing collaborative and interdisciplinary research with significant scientific and societal impact.

Open to all disciplines, this seed funding call was designed to empower early-tomid-career PhDs in transforming their innovative ideas into impactful research while fostering collaborations across NOVA's R&D Units.

Out of numerous high-quality proposals submitted, three outstanding scientific projects were selected for funding, each awarded 30.000€ to support their work. Since June 2025, the three teams have been working to develop their innovative ideas over a one-year period. The outcomes of these projects are expected to open new avenues for new research ideas and strengthen their potential to secure more competitive funding.

#### **NOVA CryoSkin**

Innovation in epidermis cryopreservation

Filipe Oliveira (PI, NOVA FCT), Duarte Barral (co-PI, NMS), Ana Rita Duarte (NOVA FCT), Luís Cabaço and Marta Cerejo (NMS).

This project proposes a new paradigm in the cryopreservation of biological materials, suggesting the use of cryoprotective agents based on natural compounds for the preservation of reconstructed human epidermis. This is particularly innovative since currently long-term preservation of biological material requires extremely low temperatures combined with highly toxic cryoprotectants.

The work combines two emerging and highly successful technologies developed at NOVA - Eutectic Systems and NOVA Skin® - with an approach that may allow the use of low-toxicity cryoprotectants and enable preservation at milder temperatures, eliminating the need for extreme cold. If successful, this alternative could significantly reduce the ecological footprint and technical complexity associated with cryopreservation processes, representing a major step forward in regenerative medicine.



#### **Bridging Disciplines:** Interdisciplinary Research at NOVA

#### **Toy Story**

Old toys, new perspectives

Isabel Tissot (PI, NOVA FCT), Maria Fernanda Rollo (co-PI, NOVA FCSH), Marta Manso, Paula Urze and Tiago Silva (NOVA FCT).

This work intents to explore tinplate toys produced in Portugal between 1920 and 1960, analysing them as both cultural and material artefacts. These toys reflect the industrial, technological, and social dynamics of the time, including gender roles and educational approaches. Despite the significance of the Portuguese toy industry – known for creatively reusing materials and adapting international techniques - its history remains underexplored.

The interdisciplinary team brings together conservation, history, sociology, physics, and engineering to provide insights on preservation, industrial context, socio-cultural impact, and sustainable innovation. By connecting materials, production methods, aesthetics, and societal context, Toy Story will reveal the role of toys in inspiring sustainability, fostering creativity, and enriching our understanding of material culture.



#### **INSUBIO**

New biosensor for diabetes control

Tomás Pinheiro (PI, NOVA FCT), Tatiana Burrinha (co-PI, NMS), Elvira Fortunato (NOVA FCT) and Paula Macedo (NMS).

The young and interdisciplinary team proposes the development of an innovative insulin biosensor, designed to complement the current methods of glycemic control used in diabetes monitoring, promoting a more personalized and effective approach to the treatment of this disease.

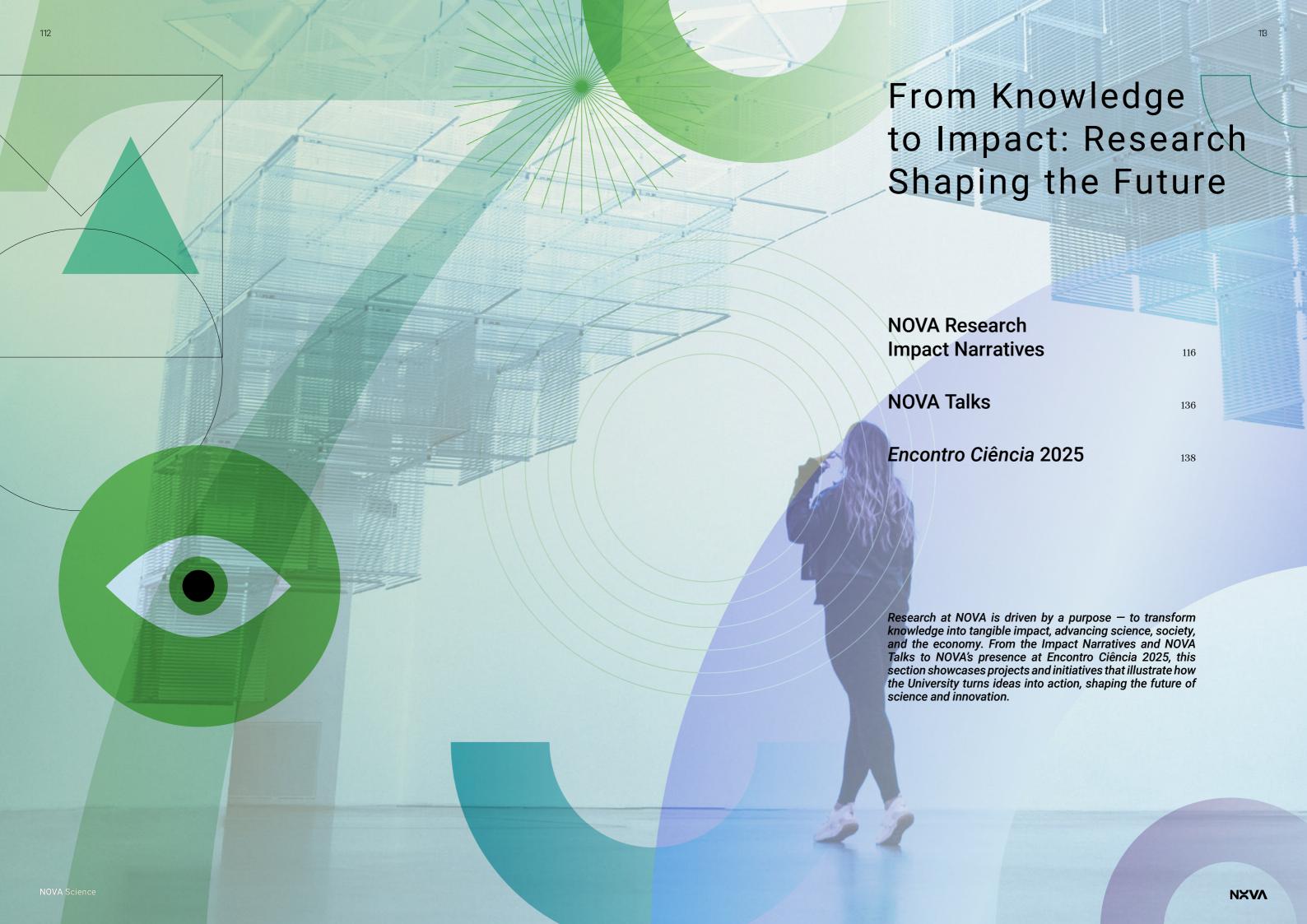
INSUBIO seeks to democratize access to healthcare by developing more affordable and reliable solutions for monitoring diabetes, with an idea that stands out for its low environmental impact, combining technological innovation with ecological responsibility. The project exemplifies the strategic collaboration between two research centers of excellence, bringing together engineering, materials science and biomedicine to respond to challenges with an impact on quality of life.

Obs: The Ignition Grants for Interdisciplinary Research replaced the previous "Santander/NOVA Collaborative Research Award".









# Transforming Legislative Impact Assessment: Using AI to Produce Better Regulations for Citizens and Society

Principal Researcher: Mauro Castelli

Academic Unit: NOVA IMS

Main Scientific Area:
Engineering and Technology
Sciences

Types of Impact: Impact on Public Policies

SDGs: **8, 9, 10, 16 and 17** 

SDGs Targets: 8.3, 9.5, 10.3, 16.6, 16.10, 16.b and 17.6

- > AI4IA, developed by NOVA IMS, automates regulatory impact assessments using AI and NLP.
- > Reduces analysis time from days to minutes while maintaining high accuracy.
- > Supports evidence-based legislation, helping policymakers identify costs and burdens.
- > Improves transparency and fairness for citizens and reduces compliance costs for businesses.
- > Modular and scalable, serving as a replicable model for EU-wide legislative innovation.

Every law affects lives. But before a law is passed, it should be clear who it will affect, how much it will cost, and whether it creates unnecessary burdens. Traditionally, understanding these effects—known as regulatory impact assessment—has been a slow, manual, and error-prone task, often constrained by limited human resources and document complexity. In Portugal, assessments could take days or even weeks and often lacked full consistency and transparency. This hindered timely decision-making, discouraged stakeholder participation, and introduced subjectivity into a process that should be evidence-based. The Al4IA project changed that.

Funded by the European Commission's Technical Support Instrument and developed by NOVA IMS in collaboration with PlanAPP, Portugal's policy and foresight unit, the Al4IA initiative created a pioneering Al-based proof of concept. This tool automates the extraction, classification, and analysis of legislative burdens. With cutting-edge Natural Language Processing and deep learning models, it scans legal documents to detect where and how new laws impose obligations on businesses and citizens.

The tool does more than flag issues—it quantifies economic impact, compares different versions of laws (e.g., EU directives vs. national transpositions), and supports human experts through continuous feedback loops. It's a hybrid AI system: the machine learns from the legal experts, and the legal experts benefit from the machine's speed and consistency.

The impact for science is significant: AI4IA demonstrated how advanced machine learning models, such as custom-trained BERT-based architectures, can be effectively fine-tuned for the legal domain. The project generated model pipelines and benchmarking methods now available for the broader research community. It also fostered interdisciplinary collaboration between legal scholars, data scientists, and policymakers, creating a research environment at the intersection of law, AI, and public administration.

But the real transformation is for citizens, businesses, and institutions. Al4IA has already shown that it can reduce the time of analysis from up to three workdays to under 15 minutes per document—with 92.1% recall and 100% precision when combining Al with human validation. In practical terms, this means legal experts can shift focus from mechanical document analysis to

thoughtful evaluation and policy refinement, enhancing the overall quality and relevance of legislation.

Forcitizens, this translates into clearer, more proportionate, and more transparent laws. By systematically identifying and categorizing administrative obligations, Al4IA ensures that excessive or unnecessary burdens—especially on individuals or vulnerable groups—are flagged early. The result is a legislative process that feels more understandable and fairer, increasing public trust in institutions.

For businesses, particularly SMEs, the impact is equally profound. Legislative complexity and gold-plating often create unseen compliance costs that hamper competitiveness. Al4IA identifies these layers of administrative burden, enabling regulators to streamline obligations and remove unnecessary friction. In the words of the Portuguese Business Confederation, the tool directly supports their priority of regulatory simplification, making Portugal's legislative environment more innovation- and investment-friendly.

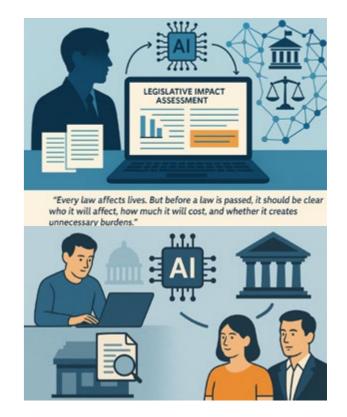
For governments and policymakers, Al4IA delivers a data-driven decision-support system. The tool enables not just faster assessments but also deeper insights, allowing ministries to understand the cost implications of legislative proposals across different sectors and company sizes. This facilitates evidence-based governance, where policies are shaped by real-world data, not assumptions.

The impact is quantifiable and validated. Stakeholder confidence in the legislative process rose from 50% to 80% after exposure to the tool. User satisfaction was rated at 92%, and legal experts at PlanAPP confirmed that they could confidently use the system despite not having AI expertise—demonstrating the accessibility of the technology. Most importantly, PlanAPP highlighted that the tool enabled them to anticipate legal risks, make timely interventions, and better align laws with real-world outcomes.

"Al4IA shows that artificial intel-ligence cannot only accelerate legislative analysis but also make it fairer, more transparent, and evidence-based, bringing technology closer to public service and democracy."

Compared to the situation before AI4IA, where legislative assessment was fragmented, subjective, and slow, the new approach is systematic, transparent, and fast. What used to take days of reading, tagging, and manually comparing texts is now reduced to minutes, with AI surfacing the most relevant content and guiding expert judgment. The result is not merely improved productivity—it is structural transformation of how governments craft and assess laws.

Finally, Al4IA's design is modular and scalable. While first implemented in Portugal, it is already being positioned as a blueprint for replication across EU Member States. Because the system relies on openaccess EU legislation and follows interoperable standards, retraining the models with local data is straightforward. This makes Al4IA a promising European public innovation, showing how Al can serve not only science but democracy and the public good.





Mauro Castelli

### Measuring to Transform: The Sustainable Health Index as a Compass for Health Policy

Principal Researcher: **Pedro Simões Coelho** 

Academic Unit: NOVA IMS

Main Scientific Area:
Medical and Health Sciences;
Social Sciences

Types of Impact:
Impact on Public Policies

SDGs: **3, 9 and 17** 

SDGs Targets: **3.8, 3.c, 9.5 and 17.17** 

- > NOVA IMS, with AbbVie and Expresso, created the Sustainable Health Index to track Portugal's health system.
- > Measures value, access, activity, cost and innovation in healthcare.
- > Used by policy-makers, hospitals, and media to guide decisions.
- > Promotes transparency and debate through annual public events.
- > A benchmark for sustainable healthcare and cross-sector collaboration.

The Sustainable Health Index is a landmark research-based initiative that has transformed how Portugal monitors and discusses the sustainability of its health system. Developed by researchers at NOVA Information Management School (NOVA IMS) in partnership with AbbVie Portugal and the national newspaper Expresso, the index offers a robust, multidimensional framework for evaluating the system across several pillars: activity, cost, quality/value in health, access to care, and innovation.

Before the creation of the index, Portugal lacked a composite, longitudinal, and publicly visible tool to synthesise health system performance. The Sustainable Health Index addressed this gap by combining primary data gathered among users of health system, secondary data analysis, expert scoring, and stakeholder validation to produce an annual sustainability score that enables year-on-year comparison and fosters transparency.

Since its launch in 2018, the Index has had widespread impact. Policy-makers presently use it as a reference to inform reforms and investment prioritisation. Hospital administrators apply it in internal benchmarking and planning. The media, particularly Expresso, has incorporated the index into national reporting cycles, helping raise public awareness of structural challenges and health system progress. It has been cited in parliamentary committees, public health reports, and expert opinion articles. Furthermore, the methodology has been referenced in academic outputs and adapted for institutional planning by regional health authorities.

What sets this project apart is the sustained and strategic engagement with stakeholders. Every year, the results of the index have been presented and discussed in dedicated public events—particularly during AbbVie's Sustainable Health Conferences—bringing together leading figures from across the healthcare ecosystem. Key participants in these events have included President of Portugal; Health Ministers, Members of the Parliment, Healthcare Professionals and patient representatives.

These multi-sector debates have enriched the index's credibility, facilitated policy alignment, and ensured practical relevance. They have also created a platform for translating academic insight into concrete proposals—some of which have informed the design of national strategies

for access to innovation and chronic disease management.

The methodology itself was developed by NOVA IMS through a rigorous research process. It combined public data sources (INE, ACSS, PORDATA, OECD,...), performance modelling, primary data collect through a national survey to the population, and expert validation. The scoring model is revised annually to ensure responsiveness to health system changes. AbbVie provided institutional support and stakeholder coordination, while Expresso offered a dissemination channel that bridged science and society.



The key innovation behind the project lies in its ability to convert complex datasets into a policy-relevant, accessible, and mobilising tool. Rather than focusing solely on scientific publications or academic metrics, the index was designed to trigger change—by providing all stakeholders with a common language to assess sustainability and demand improvement.

Since 2018, the index has become a recurring reference in public health dialogue. Its results are published yearly and disseminated through opinion pieces, infographics, and panels. In doing so, it has contributed to a more informed and transparent debate on pressing challenges such as digital health integration, waiting times, workforce pressures, and patient-centred outcomes.

The project's success stems from its long-term vision and the strength of its cross-sector partnership. It is a case study in how universities can generate public value by collaborating with industry and the media—without compromising scientific independence or methodological rigour. It also illustrates the importance of sustained engagement: the index is not a one-time report, but a living research-based intervention that evolves alongside the healthcare system it evaluates.

In summary, the Sustainable Health Index has influenced policy, empowered public discourse, and helped align diverse actors around the common goal of building a more resilient, equitable, and innovative healthcare system in Portugal. Through data, dialogue, and design, it has become a trusted compass in the search for sustainable health.

"By integrating scientific evidence with policy dialogue, the Sustainable Health Index has become a trusted instrument for shaping decisions and priorities in health-care — a benchmark of how data-driven insight can sustain public value. We are committed to guiding Portugal toward a health system that is not only more efficient, but fair, transparent, and resilient."

Pedro Simões Coelho



## Award-winning narrative 2025

### LEGO to Labs: How NanoJ-Fluidics (Pumpy) Democratised Advanced Microscopy from Bench to Classroom

Principal Researcher:
Ricardo Henriques

Academic Unit: ITOB NOVA

Main Scientific Area:
Natural Sciences; Engineering
and Technology Sciences;
Medical and Health Sciences

Types of Impact: Social Impact

SDGs: **4, 9, 10 and 17** 

- > NanoJ-Fluidics (Pumpy) is a LEGO-built, opensource fluidics system for precision microscopy.
- > Offers a low-cost, accessible alternative to commercial instruments.
- > Transforms research and education, from labs to classrooms.
- > Sparked a global #pumpy movement promoting science democratization.
- > Integrated into ITQB NOVA's cutting-edge research, including ERC and RT-SuperES projects.

Imagine a technology so innovative yet simple that it simultaneously transforms cutting-edge research capabilities while being buildable by schoolchildren using toy bricks. This is the story of NanoJ-Fluidics, affectionately known as "Pumpy".

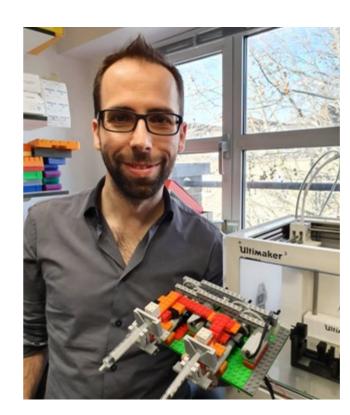
The journey began in 2017 when our research team faced a fundamental challenge in microscopy - the need to precisely exchange fluids at the microscope sample while maintaining imaging continuity. Commercial solutions were prohibitively expensive, complex to operate, and largely inaccessible to most laboratories worldwide. Rather than designing yet another expensive black box, we took a radical approach – could we build a solution using components so familiar that even children could understand and assemble them?

The result was NanoJ-Fluidics (Pumpy) – an automated, precise fluid delivery system built entirely from LEGO components, controlled by open-source software. The system uses LEGO motors and gears to create syringe pumps that can deliver nanolitre-precision fluid exchange directly on microscope stages. This seemingly simple innovation unlocked entirely new experimental capabilities. Researchers could now perform complex protocols like live-to-fixed correlative imaging, sequential labelling, and multiplexed super-resolution microscopy with previously impossible precision and reproducibility.

The publication of our approach in Nature Communications in 2019 garnered immediate attention, but what happened next surprised even us. Beyond transforming research capabilities in well-equipped laboratories, Pumpy catalysed a movement in democratising science and education. The core strength of our approach – using familiar LEGO components – made advanced scientific concepts accessible to students and the general public in unprecedented ways.

Working alongside Pedro Pereira, who coinvented Pumpy and now leads his own research group at ITQB NOVA studying Staphylococcus aureus intracellular infection, we witnessed how this technology enabled sophisticated experiments assisting in understanding cellular behaviour and structure at the nanoscale. Here Pumpy facilitated precise coordination between live-cell imaging, fixation, and immunolabelling – critical capabilities for understanding infection mechanisms in cells. The educational impact quickly extended beyond research laboratories into classrooms. Workshops were developed where students could build their own scientific instruments using LEGO bricks, learning principles of fluidics, microscopy, and experimental design through hands-on engagement. The inherent familiarity of LEGO removed traditional barriers to understanding complex scientific equipment. Suddenly, the black box of scientific instrumentation became transparent, buildable, and understandable.

As word spread, particularly through social media with the #pumpy hashtag, educators worldwide began adopting these approaches. Children who might have previously seen science as abstract or inaccessible were now building functional scientific instruments with their own hands, using components they already understood. This transformation in science education represents one of Pumpy's most profound impacts – making sophisticated science tangible and approachable for young learners.



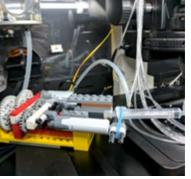
"It turns out toy bricks can power highend research. Pumpy shows that making science tools open, accessible (and at times fun) is a way to accelerate discovery and inspire the next generation."

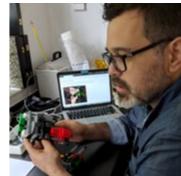
Ricardo Henriques

The evolution continued as we transitioned many components from LEGO to 3D printing, maintaining the open-source philosophy while enabling more precise and customised designs. This development allowed for the creation of ever more sophisticated microscopy tools while preserving the educational value of having students understand and participate in the building process. Today, these technologies form core components of major research initiatives at ITQB NOVA, including my ERC Consolidator Grant focused on Al-driven live-cell super-resolution microscopy and the multinational RT-SuperES consortium.

Perhaps most excitingly, the RT-SuperES project now uses Pumpy-enabled techniques to bridge the worlds of live-cell imaging and small-scale proteomics at the light microscope. This capability, unimaginable before our development, allows researchers to transition seamlessly between observing dynamic cellular processes and performing detailed molecular analyses of the same cells.

The story of Pumpy exemplifies how seemingly simple innovations can catalyse profound changes across multiple domains. By reimagining scientific instrumentation as something that could be built from children's toys, we not only transformed research capabilities but also redefined how scientific concepts could be taught and understood. The impact extends from primary school classrooms to the most advanced research laboratories, united by a common thread – the democratisation of knowledge and technology.





#### Award-winning narrative 2025

## From Research to Societal Change – NOVA's Digital Health Model Recognised as a European Lighthouse

Principal Researcher:
Ricardo Jardim Gonçalves

Academic Unit: **NOVA SST/FCT** 

Main Scientific Area: **Natural Sciences; Engineering** and Technology Sciences; **Medical and Health Sciences: Social Sciences** 

Types of Impact: **Social Impact** 

3, 4, 6, 9, 11 and 17

SDGs Targets: T3.3; T3.4; T3.8: T3.d; T4.3; T4.4; T4.7; T6.3; T6.b; T9.1; T9.5; T11.3; T11.5; T11.b; T17.16 and T17.17

- > NOVA (UNINOVA/CTS) created a model linking digital health, environment, and citizen engagement.
- > Piloted in Madeira, now replicated across Europe and Asia.
- > Improved older adults' health through digital tools and monitoring systems.
- > Made Madeira Europe's first Super Site for wastewater-based public health monitoring.
- > Recognised by the European Commission as a best practice in societal impact.

Research led at NOVA University Lisbon, through UNINOVA's Centre for Technology and Systems (CTS), enabled the creation of a pioneering model that bridges digital health, environmental monitoring and citizen engagement. This model was piloted at regional level in Madeira and is now inspiring replication across Europe and Asia.

The initiative addressed one of the most pressing societal challenges of our time: how to promote healthier, more resilient communities in the face of ageing, pandemics and climate-related risks. The change achieved is multifaceted, improving health outcomes, empowering citizens, enhancing public policy tools and reinforcing regional innovation. It is the product of over five years of international interdisciplinary research, co-creation with stakeholders and implementation through European-funded projects.

Thousands of older adults directly benefited from the large-scale piloting of innovative digital health technologies. These included personalised mobile health applications, wearable biosensors, fallprevention systems and telemonitoring platforms, enabling older citizens to manage their health proactively. In parallel, continuous wastewater surveillance, developed in collaboration with the European Commission's Joint Research Centre (JRC), provided early warnings of public health risks, spanning major public health risks, like pandemics and emerging societal challenges as substance misuse.

The model's integrated approach to health, environment and citizen engagement allowed Madeira to become the first European Super Site for wastewater-based public health monitoring, referenced by the European Commission as a unique testbed in Europe. This work informed public health strategy and strengthened health system preparedness through advanced analytics and data-driven foresight. It also inspired participation, empowered citizens and created lasting engagement between communities, researchers and policymakers through the launch of the Digital Health and Wellbeing Pavilion in Funchal, a first-of-its-kind public space where citizens explore, co-design and test digital health solutions. The Pavilion became a physical and symbolic hub in Europe for inclusive innovation, digital health literacy and generational dialogue.

These achievements were only possible through strong institutional and cross-sectoral collaboration. The initiative was implemented locally with the support of the governmental and healthcare authorities, the Madeira's Institute for Development and Technology Innovation (IDEA), and through partnerships with municipalities, universities, companies and international research centres across Europe. The European Commission recognised the societal impact of this work in a formal letter sent to the President of Madeira's Regional Government and to the Mayor of Funchal.

This sustained engagement also led to structural impact at the educational level with the creation of the new Master's in Digital Skills for Health at NOVA, ensuring that future professionals can build upon and expand the legacy of this initiative. The model has become a recognised reference benchmark across Europe and Asia, with ongoing pilot replications demonstrating its scalability and relevance.

The initiative was implemented through several major EU-funded research projects coordinated or coled by NOVA researchers at UNINOVA/CTS. These include projects that supported older adults with chronic diseases through personalised digital tools (SmartBEAR), delivered telemedicine and intensive care platforms during the COVID-19 crisis (ICU4Covid), developed interoperable electronic health records for citizens across Europe (Smart4Health), advanced telerehabilitation solutions using intelligent decisionsupport (TeleRehaB), monitored public health threats through environmental analytics (WasteWater Sentinel), enhanced digital trust in educational and professional credentials using blockchain technologies (QualiChain), and the International Master's Program Empowering Healthcare through Digital Technology (DS4Health).

These results demonstrate not only depth and scale, but a clear trajectory from research to sustained, measurable, and system-wide societal impact. The model also aligns with key Sustainable Development Goals (SDGs), including advancing good health and wellbeing through prevention and resilience (SDG 3 - Targets 3.4 and 3.d), promoting digital skills and lifelong learning (SDG

"This is truly a unique setting in all of Europe. The level of innovation, accessibility and direct engagement with citizens and visitors is remarkable."

Bernd Manfred GAWLIK, European Commission, DG Joint **Research Centre** 

4 - Targets 4.4 and 4.7), improving environmental health via wastewater monitoring (SDG 6 - Target 6.3), fostering innovation and research capacity (\$DG 9 - Target 9.5), and enabling strategic, cross-sectoral collaboration (SDG 17 - Targets 17.6 and 17.17).

NOVA's role was central throughout as a scientific driver, trusted HEI and European partner and institutional innovator. The initiative exemplifies how academic research can deliver systemic change beyond publications or patents by influencing policy, transforming lives and setting global benchmarks.

This is more than a case study. It is a model of how research excellence, when anchored in real-world needs and deployed with humility, conviction and ambition, can create ripple effects well beyond its origin. As the European Commission stated in its letter, this is a best practice in societal impact. A testament to the pivotal role of UNINOVA/CTS in advancing applied research, and a confirmation of NOVA's leadership in shaping the future of health, science and innovation.





Award-winning narrative 2025

## Tuna Odyssey: the story of a fishing village and the resource that sustains it

Principal Researcher: Brigida Baptista

Academic Unit: NOVA FCSH

Main Scientific Area: **Humanities** 

Types of Impact: Social Impact

SDGs:

11, 13 and 14

SDGs Targets: T11.4, T13.3 and T14.a

- > CHAM-NOVA FCSH research on the heritage of tuna fishing in the Algarve.
- > Combines oral history and archival research to recover local memories.
- > Created the Barril Tuna Route and Tuna Odyssey  $^{\circledR}.$
- > Strengthened community identity and heritage awareness.
- > Recognised with regional awards and part of Portugal's Industrial Tourism Network.

From Brígida Baptista's family dinner table to her work as an archaeologist and doctoral student, narratives about tuna and fishing have always been present. This personal motivation has led her academic career back to its point of origin: a fishing village in the Algarve. Brígida has been working at CHAM since 2021 and is currently a member of its Environment, Interactions and Globalisation Research Group, as well as a researcher on the ERC Synergy Grant 4-OCEANS. Her PhD thesis, supervised by Associate Professor Cristina Brito, is a historical narrative that combines early modern history with marine environmental history.

Since 2014, Brígida has been retracing the history of tuna fishing in Santa Luzia, initially through oral history and more recently through historical research. The beach of Barril and its former tuna trap — where her family lived and fished for almost a century — was her original object of study. From it, she developed the Barril Tuna Route in 2014 and, more recently, the Tuna Odyssey®. Collecting and preserving these narratives is crucial to understanding the human side of fishing — its social, cultural and economic dimensions — as well as the environmental side: the tuna as a natural resource, its ecology, and the impacts of continued extraction.

By revealing this local history at national and international levels, the project contributes to the creation of new knowledge and the recovery of invisible memories kept within the community. It has helped shift perceptions among local government and heritage management bodies, and has brought the community together to share knowledge and find new ways to protect and enhance both tangible and intangible heritage.

A range of public activities has been developed, bringing together different sectors and generations. This creation of a shared sense of belonging and identity has been particularly meaningful. Santa Luzia, widely known as the "Octopus Capital" due to its national importance in octopus fishing, has once again revisited its tuna-fishing history — a history in which former fishermen, both living and remembered, remain central.

The Barril tuna trap operated from at least 1841 until 1966. The new findings from the 16th to 18th centuries along the Algarve coast presented in this doctoral research add valuable content

for interpretive signage, publications, guided walks, informal conversations, and scientific communication. Through this project, it has become clear that this region offers much more than "sun and beach." It is fundamentally a place of lived experiences and memories which, despite mass tourism, remain grounded in a long-standing relationship between people and the tuna that pass along the coast each year.

Brígida's work in this community has been widely recognised. In 2024, she received the Santa Luzia Parish Council's Medal of Merit (Silver Degree), and the Lais de Guia Association received the Municipal Medal of Merit (Silver Degree) from Tavira Town Council. She was also named an Honorary Member of the Tuna Confraternity. In terms of media visibility, the project has been featured in regional newspapers — Barlavento, Correio do Sul, Algarve Informativo, Postal do Algarve — as well as on local radio stations Rádio Gilão and Horizonte, and on the social media of Santa Luzia Parish Council and Tavira Town Hall. The team has been invited to integrate the Bluefin Tuna Route into Portugal's Industrial Tourism Network — a process that is currently underway.

Brígida intends to continue her research in the field, further integrating the scientific components of environmental history, material and intangible cultural heritage, and science communication. This topic has emerged organically throughout her personal and professional life. It is a story of people and animals — of tuna and those who interact(ed) with them. It continues to grow from tales heard, forgotten, and remembered in family gatherings. She moves between spaces — family, local community, academic circles — where each person contributes their own experience, which together form a coherent narrative.

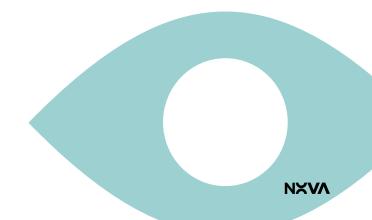
By sharing this local history nationally and internationally, the project contributes to the creation of knowledge, the recovery of memories, and the fostering of a sense of kinship. Knowing and belonging are the most powerful drivers of change and action — in this case, the safeguarding of a shared heritage embedded in natural ecosystems and animals, built heritage, and the intangible traditions of living by and from the sea.





"The project has contributed to a change in the perception of local government and heritage management bodies, but also of the community itself, which has come together to share knowledge and build new ways of protecting and enhancing the tangible and intangible heritage."

Brígida Baptista



Honourable mention 2025

## Health Literacy: A question of Health that Matters

Principal Researcher:
Ana Rita Pedro

Academic Unit: NOVA ENSP

Main Scientific Area: Social Impact

Types of Impact:
Impact on Public Policies and
Academic Impact

SDGs:

SDGs Targets:

4.6

- > Saúde que Conta promotes health literacy in Portugal, influencing citizens, professionals, and policies.
- > Launched national studies and supported the National Health Literacy Strategy (2016).
- > Produces research, tools, and outreach (books, podcasts) to improve public health and decision-making.

Launched in 2011 under the motto "health literacy promotes more active and participatory citizens", Saúde que Conta, currently in its ninth phase, is a long-term scientific project that has led to meaningful and measurable changes in national policy, public health planning, and citizen empowerment. It brought together researchers from fields such as medicine, education, journalism, sociology, and psychology, along with key stakeholders from government institutions and civil society, to investigate and promote health literacy in Portugal.

The project's first major contribution was laying the foundation for the first national study on health literacy in Portugal. Through the Think Tank Capacitação do Cidadão em Saúde, it revealed two critical findings: that higher levels of health literacy are associated with better population health outcomes, and that investing in health literacy leads to a more effective use of health services and lower healthcare costs. Building on this evidence, the second phase examined shared decision-making in healthcare, demonstrating how communication between patients and professionals must improve to enable patients to participate meaningfully in decisions about their health.

One of the project's most influential impacts came in its third phase, when it led the application of the European Health Literacy Survey in Portugal. This study revealed that 61% of the population had problematic or inadequate health literacy, particularly within the healthcare domain. These findings helped support the development of the National Health Literacy Strategy in 2016, this strategic plan marked a major national-level policy outcome rooted in the project's research.

Saúde que Conta has continued to expand its reach in subsequent phases. In 2018, two digital books - "Decidir em conjunto sobre a nossa Saúde" and "Doentes em Segurança" - were launched to translate findings into accessible tools for the general public. In 2019, the study "Health Literacy in Chronic Illness," developed with the partnership of Ordem Portuguesa dos Farmacêuticos, showed that individuals with chronic diseases and low health literacy have higher rates of emergency service use and poorer adherence to treatments. The seventh phase addressed health literacy among higher education students, finding that 44% had an inadequate or problematic health literacy level, with disparities tied to socioeconomic background. This evidence has highlighted the need for equityfocused approaches within the academic sector.

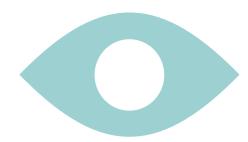
In 2023, the project investigated the health literacy and quality of life of informal carers in Portugal, concluding that 58.6% of caregivers had an inadequate or problematic level of health literacy, which was directly correlated with reduced quality of life and increased caregiver burden. This work underscored the broader societal implications of health literacy beyond clinical settings. The current phase of the project focuses on obesity, exploring obesity awareness, health literacy levels and public attitudes toward the condition. It also launched the podcast "Lado B da Literacia", available on Spotify and Apple Podcasts, which brings in-depth conversations on complex and often overlooked health literacy themes - such as artificial intelligence, genomic literacy, and One Health - to a broader audience. With 12 episodes and 34 expert contributors, the podcast exemplifies how the project bridges academic research and public engagement.

The research conducted within the Saúde que Conta project has had a significant impact on academia, healthcare, and both social and public policy. Over 11,000 people have participated in its various research phases, more than 50 individuals have requested to use the Portuguese version of the European Health Literacy Survey (HLS-EU-PT), and the project's findings have contributed to numerous postgraduate theses. Scientific publications and participation in both national and international conferences have further demonstrated the project's wide-reaching influence. Its impact is also reflected in strategic partnerships with institutions such as Plataforma de Saúde em Diálogo, Direção-Geral da Saúde, and the Rede Académica de Literacia em Saúde, among others. The foundational data and expert insights produced by Saúde que Conta were critical in identifying needs, guiding solutions, and mobilising institutional support. This groundwork has enabled changes like national policy development, public resource creation, and raising awareness among citizens, health professionals, educators, and decision-makers about the importance of health literacy.



Ultimately, the project's most significant contribution has been embedding health literacy as a public health priority in Portugal, influencing both practice and policy. Its sustained commitment to research, dissemination, and collaboration ensures that its impact continues to grow, as the project has influenced policies, improved practices and benefited communities and individuals.





"Saúde que Conta" aims to investigate health literacy in order to develop strategies that enable citizens to acquire the knowledge and skills necessary to make informed decisions for themselves and their communities. Its main objectives are to contribute to public debate and raise awareness about the importance of health literacy, as well as to assess health literacy levels and implement strategies that can effectively empower citizens."

Ana Rita Pedro

## Honourable mention 2025

# Making the Invisible Visible: Transforming Public, Clinical, and Policy Understandings of the Embryo In Vitro

Principal Researcher: Catarina Delaunay

Academic Unit: NOVA FCSH

Main Scientific Area: Social Sciences

Types of Impact:
Impact on Public Policies
and Academic Impact

SDGs:

3, 4, 5, 10 and 16

SDGs Targets: T3.7; T3.8; T4.3; T4.4; T5.1; T5.6; T10.2; T10.3; T16.6 and T16.7

- > ETHICHO explored experiences with assisted reproduction, giving voice to diverse users.
- > Promoted emotional support, public understanding, and inclusive Assisted Reproductive Technologies policies.
- > Combined research, outreach, and training to improve health communication and practice.

The ETHICHO project – Ethico-ontological choreographies: Forms of objectification and evaluation of the human embryo in vitro in the context of **Assisted Reproductive Technologies** (ART) and Scientific Research, coordinated by Catarina Delaunay and funded by the *Fundação para a Ciência e Tecnologia* (FCT), has generated significant societal, professional, and academic impacts. The project combined cutting-edge empirical research with a strong commitment to public engagement, knowledge transfer, and capacity building.

According to the OECD, one in seven couples experiences infertility, a figure on the rise as parenthood is increasingly postponed. In Portugal, ART is accessed by infertile couples, single women, and same-sex female couples. However, these procedures have low success rates and can be emotionally taxing, contributing to distress, isolation, and decision-making fatigue.

ETHICHO addressed a gap in public debate by offering a platform for 74 ART beneficiaries to process complex emotional experiences through research interviews conducted with empathy and care. One participant wrote, "I'm very grateful to you for being part of my healing process." Others expressed appreciation orally. By amplifying the narratives of underrepresented groups — infertile patients, LGBTQI+ individuals, single mothers — the project promoted social inclusion and contributed to greater equity in how ART users are represented in public discourse and policy.

ETHICHO translated scientific findings into accessible formats for broader engagement. These included a podcast series — Embriões — exploring the social worlds of embryos using research insights in plain language. Episodes are available on Spotify and Google Podcasts. The project was also featured in the national science outreach program "90 Segundos de Ciência" (episode 1096), further broadening its reach.

Social media (Facebook, Instagram, Twitter) and the project's website were used to share updates and disseminate findings. Facebook proved crucial in reaching ART beneficiaries, especially through private groups on infertility and parenthood. This ensured a continuous and dialogical flow of information between researchers and participants.



The project contributed to evidence-based health policy by fostering knowledge exchange between stakeholders. The final seminar, "The (bio)medicalisation of the life cycle: being born, growing up and dying", included health professionals among speakers and attendees, enabling co-validation of findings and the formulation of action-oriented recommendations. ETHICHO's results have been published in interdisciplinary international journals (e.g., Reproductive Biomedicine & Society Online; Patient Education and Counseling), informing best practices in embryo-related communication and decision-making support.

The principal investigator is also preparing a bestpractices handbook for health professionals and a policy brief to promote more inclusive ART policies, aligned with the UN 2030 Agenda for Sustainable Development.

ETHICHO made original contributions to Sociology of Health, Medical Anthropology, and Science & Technology Studies. A flagship article developed the concept of "emotional choreographies" to describe how ART users relate to embryos over time. The paper was well-received internationally, drew 7,665 views, 89 likes, and 20 shares within 48 hours on Twitter, and prompted an invitation from Prof. Alicia Walker to contribute to the Council on Contemporary Families blog.

"Research can make the invisible visible when it gives legitimacy to lived experiences that institutions often overlook. Listening with care is not ancillary to science; it is the condition for producing knowledge that truly serves people's lives and informs fairer policies. By opening dialogue between patients, professionals, and policymakers, research becomes a public act that helps reshape social discourse around what counts as life, as well as conceptions of care and justice."

From Knowledge to Impact:
Research Shaping the Future

Another paper reinterpreted Weberian theory to understand embryologists' decision-making, receiving acclaim from Prof. Thomas Kemple (University of British Columbia), who described it as "an illuminating use of Weber's ideal types of social action [...] very much in the spirit of his methodological framework."

The project also addressed research ethics through a paper on methodological dilemmas in researching vulnerable populations, which led to two high-profile invitations: one from Prof. Pranee Liamputtong to contribute to the Handbook of Sensitive Research in the Social Sciences (Elgar, 2025), and another to record a case study for Sage Research Methods.

ETHICHO contributed to student training and research capacity by offering two internships, two research initiation grants (under "Verão com Ciência 2021"), and a curricular unit involving tasks such as transcription, coding, and interview analysis. Four students were mentored in academic writing and data analysis. The project was presented and discussed in 11 undergraduate, master's, and PhD courses across institutions (e.g., NOVA FCSH, ICS-UL, UBI, FEUC), fostering dialogue between research and teaching.

Three early-career researchers — a PhD student, a postdoctoral researcher, and a postdoctoral fellow — were employed by the project and are now active in national and European initiatives, illustrating ETHICHO's contribution to human capital development.

ETHICHO exemplifies how high-quality sociological research can inform health communication, improve public understanding, and promote inclusive policymaking. Its multidimensional impact spans emotional support for ART users, public engagement, academic innovation, policy influence, and capacity building—demonstrating a strong return on public research investment



Catarina Delaunay

## Nature's Comeback: **Rethinking Land** Abandonment through Ecological Recovery and Climate Action

Principal Researcher: Henrique Cerqueira

Academic Unit: **NOVA FCSH** 

Main Scientific Areas: **Natural Sciences: Social Sciences** 

Types of Impact: **Environmental Impact** 

4, 11, 12, 13, 15 and 17

SDGs Targets: T4.7, T11.4, T11.a, T12.2, T12.8, T13.1, T13.3, T15.1, T15.3 T15.5, T17.16 and T17.17

- > Research monitors how Mediterranean semiarid lands recover naturally after agricultural abandonment.
- > Combines fieldwork, drones, satellite imagery, soil analysis, and data modeling to track vegetation and carbon.
- > Developed tools, online courses, and a spin-off (CarBio-Solo) to help farmers and landowners manage and benefit from recovering ecosystems.
- > Shows abandoned land can restore biodiversity, improve carbon storage, and support diverse landscapes that support better livelihoods and are more adapted to a changing climate.

Across rural Europe, land abandonment is often viewed as a problem, one associated with the decline of agriculture, loss of livelihoods, and the fading of cultural landscapes. But in southeastern Portugal, a different story is unfolding. This narrative centres not on decline, but on quiet, persistent recovery: a process in which nature returns, unprompted, to places once degraded by overuse.

Since 2019, a research line led at NOVA FCSH in collaboration with Professors Maria José Roxo and Adolfo Calvo-Cases has focused on understanding what happens after agricultural land is abandoned in semi-arid Mediterranean ecosystems. In the bushlands and drylands of Baixo Alentejo, where fragile soils and intense land use once combined to accelerate erosion and degradation, the end of farming often marks the beginning of ecological restoration.

At the heart of this work is a rare experimental site: the Centro Experimental de Erosão de Vale Formoso, where 17 long-term erosion monitoring plots were left untouched after 2008. Originally established to study soil losses under different land uses and management practices, the site accidentally became a living lab for post-abandonment ecological dynamics. What emerged was a compelling pattern: natural vegetation returning, soil organic carbon increasing, and ecological functions gradually being restored, without human intervention.

To document this process, the research combined fieldwork, remote sensing, drone-based vegetation monitoring, and soil laboratory analysis. This allowed for the spatial modelling of changes in carbon stocks and vegetation cover. Field visits and interviews with local actors further grounded the work in real landscapes and lived experience.

The findings are both scientifically and socially significant. They provide measurable evidence that poor, degraded lands can recover regulating and supporting ecosystem services, such as carbon sequestration, water retention, and biodiversity conservation. In a region marked by climate vulnerability and demographic decline, this recovery is a form of resilience.

From these insights, a broad ecosystem of impact has grown. The research supported two Erasmus+ projects (CarboNostrum and MedSEVa) that translated academic findings into practical tools for landowners, farmers, and educators.

CarboNostrum developed a multilingual b-learning course in five countries (Portugal, Spain, Italy, Greece, Turkey), with(over 50 participants in the first edition, and 800 enrolled in the online course page, as well as a handbook for smallholder farmers adapting to climate change (with over 700 reads), and overall dissemination materials reaching over 25 000 people. MedSEVa is now working to value Mediterranean shrublands and promote sustainable uses of native plant species for food, cosmetics, and ecosystem restoration.

The work also led to the creation of CarBio-Solo, a university-affiliated spin-off dedicated to developing carbon baselines and ecosystem service assessments for recovering landscapes. CarBio-Solo offers landowners and cooperatives the ability to measure and monetize ecosystem services on marginal lands, helping unlock new economic opportunities while supporting ecological regeneration.

The work has also been shared with diverse audiences. from international scientific communities to local and regional stakeholders. Presentations at geomorphology and remote sensing conferences helped test and refine the research in dialogue with peers. Recognition at events like the European Association of Remote Sensing Laboratories Symposium reflected not just the technical contribution, but the relevance of the work to ongoing conversations around land use, climate, and ecological monitoring.

Beyond academia and entrepreneurship, the project is trying to influence how abandonment is perceived by local institutions. In workshops with municipalities and regional stakeholders, the research has been used to inform restoration priorities and climate adaptation planning. Where once abandonment was seen as synonymous with degradation, it may now be considered a potential entry point for ecological and economic renewal.

"Territorial decisions must be made differently: through adaptive planning, grounded in rigorous diagnosis of different geographic realities. In poor and degraded lands, already vulnerable to climate change and desertification, such knowledge guides restoration, protects livelihoods, and helps us maintain a more integrated organisation of landscapes, where human activity and ecosystems coexist in balance."

Maria José Roxo

Visually, the impact is tangible. Time-series imagery and canopy height models show landscapes greening year by year. Shrublands and native species are reclaiming old fields and erosion scars. Students, farmers, and policymakers have walked the same abandoned plots where recovery was once difficult to

This is not a story of reversing abandonment or reoccupying lost territories, but about seeing 'abandoned' land differently: recognizing its ecological potential, its climate value, and its place in a more socially and culturally resilient future. In a world challenged by climate uncertainty and rural change, this research offers a hopeful message: that even in places of loss, recovery is possible.

By linking field-based observation with satellite data, participatory engagement, and applied tools, this work connects scientific insight with real-world action. It shows that ecological knowledge, if made visible, accessible, and relevant, can reshape how land is valued, how decisions are made, and how global challenges can be addressed with local action in the field.

Nature's comeback is not just a biological process. It is a narrative of resilience, adaptation, and regeneration, one that starts with letting the land breathe again.



Honourable mention 2025

## Conducting Constitutional Reform in a United Kingdom Overseas Territory

Principal Researcher:
Julian Jeremy Sarkin

Academic Unit:
NOVA School of Law

Main Scientific Area: Law, Social Sciences; Humanities

Types of Impact:
Impact on Public Policies

SDGs:

1, 2, 5, 6, 8, 9, 10 and 16

SDGs Targets: 1.1, 1.3, 1.5; 5.1; 5.2; 5.3; 5.4; 5.5; 5.6; 6.1; 6.2; 6.3; 6.4; 6.5; 6.5; 6.6; 8.1; 8.2; 8.3; 9.1; 9.2; 9.3; 9.4; 9.5; 10.1; 10.2; 10.3;

16.3; 16.4; 16.5; 16.6 and 16.7

- > Reviewed and reformed St Helena's political governance system, a UK Overseas Territory.
- > Conducted broad consultations with government, councillors, and the public across the Island.
- > Developed and implemented a new Ministerial System with a Chief Minister, approved by referendum and UK authorities.
- > Achieved a more democratic, transparent, and accountable governance model, bringing decision-making closer to citizens.

St Helena Island, a UK Overseas Territory, undertook a historic reform of its political governance system following an in-depth review led by Dr Jeremy Julian Sarkin. In 2019 and 2020, Sarkin visited the Island several times to facilitate public debate and collect ideas on whether the existing committee-based system of governance should be reformed.

Through extensive consultation, he met with a wide range of stakeholders, including the Governor, the Executive and Legislative Committees, individual councillors, civil servants, and members of the public. Numerous public meetings were held across the Island to ensure that the population could directly participate in discussions about the future of their governance system.

Two reports were produced as a result of this work, both of which were accepted. The reports comprehensively reviewed St Helena's political governance process, assessing the drivers, enablers, and challenges of the system then in place, and analysing the roles of its various actors. The committee system was identified as the main weakness, and the rationale for change was clearly outlined, drawing on best practices from other UK Overseas Territories.

The **first report** explored how public support for a new governance model could be built and how more candidates could be encouraged to run for political office. It presented a range of options and recommendations for improving the political system, most notably the proposal to transition from a local committee system to a ministerial system of governance led by a Chief Minister.

The **second report** provided an in-depth review of how St Helena's governance system functioned at the time and proposed a roadmap for implementing reform. It found strong support across the Island for change, though accompanied by understandable concerns about the nature and feasibility of that change. The report identified a clear choice: either attempt to improve the existing committee system or move towards a ministerial system–potentially through a hybrid model. It ultimately recommended adopting a full ministerial system, outlining how such a system could be operationalized and what its structure might look like.

Specifically, it proposed a new constitutional framework with a Chief Minister, four other

Ministers, and five civil service directorates. It also included recommendations for enhancing openness, transparency, and accountability, and for increasing the direct participation of Islanders in governance by devolving additional powers to St Helena. The report further examined the roles of key institutions, including the Public Accounts Committee, and recommended the establishment of a new Public Service Commission, along with reforms to auditing and oversight mechanisms.

The roadmap for constitutional change was also detailed, comprising two parts—one to be pursued on the Island and another in the United Kingdom. The report emphasized the importance of demonstrating popular support for reform to secure approval in the UK.

This process culminated in a **referendum**, in which the people of St Helena voted in favour of moving to a ministerial system. The Constitution was subsequently amended, approved by the UK Government, and endorsed by the UK Privy Council. The final step in the

process was the laying of the Order in Council before the UK Parliament in London.

Reflecting on this transformation, then **St Helena Governor Dr Phillip Rushbrook** stated in an official press release:

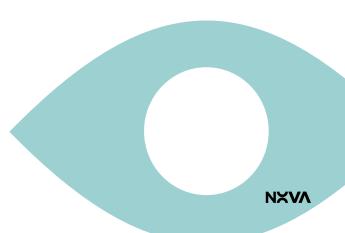
"Dr Sarkin identified the public wanted clearer individual responsibility for making political decisions, greater political accountability for delivering services and reforms, and a governance system that progressed its business more swiftly. The change to a Ministerial system provides the opportunity for the next elected government to achieve all three."

Following these constitutional changes, elections were held on St Helena, and Ministers and Councillors were elected under the new framework. The Chief Minister now plays a central role in the governance of the Island. The new system has brought governance closer to the people, strengthened democracy, and enabled faster and more decisive decision-making in St Helena.



"Your contributions ... were essential in achieving this historic opportunity for St Helena to develop a new and responsive form of government. To your credit, you have become part of the history of St Helena."

Dr Phillip Rushbrook, St Helena Governor



Honourable mention 2025

## ImproVITA – Extending the shelf life of food products to decrease food waste

Principal Researcher: **Liane Meneses** 

Academic Unit: NOVA SST/FCT

Main Scientific Areas:
Engineering and Technology
Sciences

Types of Impact: Environmental Impact

SDGs: 2, 8, 9, 12 and 13

SDGs Targets: T2.1; T2.4, T8.2, T9.5, T12.3 and T13.2

- > ImproVITA is a natural preservative that extends the shelf life of fresh fruits and vegetables.
- > Developed at LAQV-REQUIMTE, NOVA FCT through ERC-funded research.
- > Tested with Driscoll's, BFruit, and Florette, reducing food waste.
- > Patent pending and award-winning, recognised for innovation and impact.

World hunger is rising and yet the developed world is wasting 1/3 of the food produced. The food waste increases throughout the value chain, from producers to end consumers, with 35% of the waste being produced by the end-users. Currently, it is estimated that fruit waste represents about 27% of the total food waste of the UE. ImproVITA was developed with the aim to obtain an improved and more sustainable food preservative, with anti-microbial properties, allowing the extension of the shelf life of fresh cut fruits beyond the currently available solutions. Increasing fruit's shelf life, leads to waste reduction, which will have direct economic impact, but will also have high environmental impact since food waste contributes to 8-10% of global GHG emissions.

The initial work was developed under the ERC Consolidator Grant Des Solve (ERC-2016-CoG 725034) under the scope of the PhD research project of Liane Meneses (10.54499/SFRH/ BD/148510/2019). Acknowledging the potential of the formulation from the first results obtained in the lab, in 2020, the team participated in the entrepreneurship program Born from Knowledge, promoted by ANI. Under the scope of this program, the researchers got feedback from the food industry that validated the need for such a product and the potential of their idea. During this period, the stability of ascorbic acid was validated at the laboratorial scale in multiple NADES and optimised ImproVITA, the formulation that was later tested for the preservation of different samples. From the first contacts with the industry, a partnership was established with Campotec, who tested ImproVITA in the preservation of fresh cut apples slices and Rocha Center for testing in

In 2023, ImproVITA was awarded an ERC Proof of Concept Grant (ERC-PoC-ImproVITA-101138403). Since the beginning of the PoC project, the team took this project even further. The formulation was presented to national and international companies of fresh and ready-to-eat products, and all of them have confirmed the potential of the formulation. The team partnered with Driscoll's Portugal and BFruit, two companies specialized in the production of berries. Berries are the most sensitive type of fruits, with a short shelf life of only 8 days, when stored in the ideal conditions. Both companies have demonstrated the interest in the extension

of shelf life of their products and have been testing the solution in the field. The pilot studies show that using ImproVITA allows to extend the shelf life of berries by 2 days. Although an extension of shelf life by 2 days doesn't seem much, it actually is. Since most of the berry's production is exported to central and north Europe, the extra time allows the fruits to reach these markets in better conditions. This directly impacts the consumer's perception of the brand and the quality of the product they buy. On a different context, in collaboration with Florette, ImproVITA was also tested in the preservation of leaves (lettuce, spinach, etc) who state the need for a preservative to increase the shelf life of salads and bagged leaves. At this moment the team is pursuing these studies and applying for further funding with their partners.

The resources provided allowed the researchers to gather results over 6 years which led to the patent application "Food preservative eutectic composition, methods, and uses thereof" (2024) and recently, to the publication of the manuscript "Incorporating Ascorbic Acid into Natural Deep Eutectic Systems: A Study on Antioxidant Preservation" in ACS Food Science and Technology (DOI 10.1021/acsfoodscitech.5c00067). The high impact of this research has also been

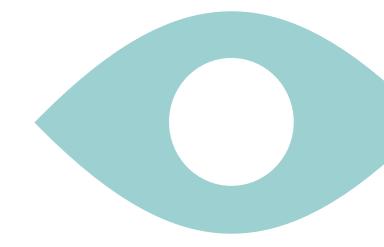
spread through social communication, having been shown on RTP (https://shorturl.at/szRkp), Público (https://shorturl.at/XLLFv), Agência Lusa (https://shorturl.at/FgKgq) among others. Moreover, in 2023, ImproVITA won the 10th Edition of the Crédito Agrícola Entrepreneurship and Innovation Award, in the "Food Safety and Nutrition" category, which further validates the novelty and relevance of ImproVITA.

By addressing food waste reduction, food safety, innovation, and environmental sustainability, ImproVITA contributes to several Sustainable Development Goals (SDGs). Specifically, the project supports SDG 2 - Zero Hunger (T2.1) by improving the availability of fresh, nutritious food through reduced post-harvest losses; SDG 8 - Decent Work and Economic Growth (T8.2) by fostering innovation and enhancing productivity in the agri-food sector; SDG 9 - Industry, Innovation and Infrastructure (T9.5) through its promotion of applied scientific research and technological development; SDG 12 -Responsible Consumption and Production (T12.3) by reducing food waste along the supply chain; and SDG 13 - Climate Action (T13.2) by contributing to the reduction of GHG emissions.



"ImproVITA is an innovative product that can reduce food waste on the consumer side by increasing the shelf life of ready to eat fruits and vegetables."

Alexandre Paiva



# NOVA Talks: Building bridges between research and society through dialogue

At the heart of our commitment to research excellence lies the belief that communicating science is essential. Led by the Communication Office, the NOVA Talks podcast offers a space where science intersects with society, and researchers share the knowledge that is shaping the future.

The challenge was presented to us by the strategic platform NOVA Health: "What if we created a podcast, bringing together the various themes in this field and speaking with experts from the different schools of the University?" In a world increasingly shaped by the growing relevance of podcasts - now one of the most popular and accessible digital communication platforms - it was almost impossible to say no. In just a few years, podcasts have become part of the daily routine of millions of people – whether to learn something new, stay informed during the commute to work, or simply relax with engaging stories. Their accessibility - available anytime, anywhere, often even offline - and the ability to explore a wide range of topics have made them a powerful tool for dissemination.

And so, in the summer of 2024, we launched NOVA Saúde (Health) Talks,

which since then has addressed, on the last Thursday of each month, topics as varied as antimicrobial resistance, family health units, social prescribing, and medical humanities. The response to the format was so positive that, in March 2025, we decided to expand the model – creating NOVA Talks Sala de Imprensa (Press Room) , which allowed us to reflect on many other strategic themes for the university and aligned with current affairs: sustainability, democracy, cities... NOVA's presence at the Expo in Osaka also gave us the opportunity to discuss the centuries-old relationship between Portugal and Japan; the recent elections set the stage for a debate on the power of algorithms in shaping the information we receive.

In the meantime, another piece of good news: in April 2025, at the 3rd edition of the ADN Awards Gala – Acting Differently at NOVA, an initiative that aims to recognise, value and promote innovative practices developed within the institution – the NOVA Talks podcast was awarded Best University Project in the field of communication. This distinction acknowledged our commitment to open science, public engagement, and the transformative potential of knowledge when shared beyond the laboratory and the classroom.

At a time when trust in science is more important than ever, initiatives like the NOVA Talks podcast show how communication plays a vital role in building bridges between disciplines, between researchers and citizens, and ultimately, between knowledge and action.



## Encontro Ciência 2025: NOVA University Lisbon at the Heart of Science, Innovation and Society

As co-organizer of the 14th edition of *Encontro Ciência*, NOVA University Lisbon played a central role in bringing together the national scientific community from 9 to 11 July at the Nova School of Business and Economics (Nova SBE) campus in Carcavelos. The event was organized in collaboration with the *Fundação para a Ciência e a Tecnologia* (FCT, I.P.) and *Agência Ciência Viva*, and had the institutional support of the Ministry of Education, Science and Innovation.

Under the theme "Science, Innovation and Society," Encontro Ciência 2025 invited participants to reflect on the transformative role of research in shaping a sustainable and inclusive future. Over three days, the event brought together 1,503 participants in a vibrant programme that fostered debate, collaboration, and discovery.

In total, 61 sessions were held—including five plenary sessions, 54 parallel sessions, and the official opening and closing sessions—providing a rich space for dialogue on the scientific, social, and economic impact of research in Portugal. The event featured 288 speakers and 431 researchers presenting e-posters, showcasing the depth and diversity of the national research ecosystem.

Adding to the dynamic atmosphere, 30 pitches from *Clubes Ciência Viva* were delivered by 77 secondary school students from across the country, while 32 exhibitors presented their projects at the Science, Technology and Innovation Exhibition (CT&I)—including CoLABs, Technology and Innovation Centres, and start-ups supported by the European Innovation Council (EIC).

In an increasingly interconnected world facing global challenges, *Encontro Ciência 2025* reaffirmed the importance of bridging scientific discovery with innovation and societal application. The discussions throughout the event highlighted how collaboration among scientists, policymakers, and citizens is essential to transform knowledge into social progress.

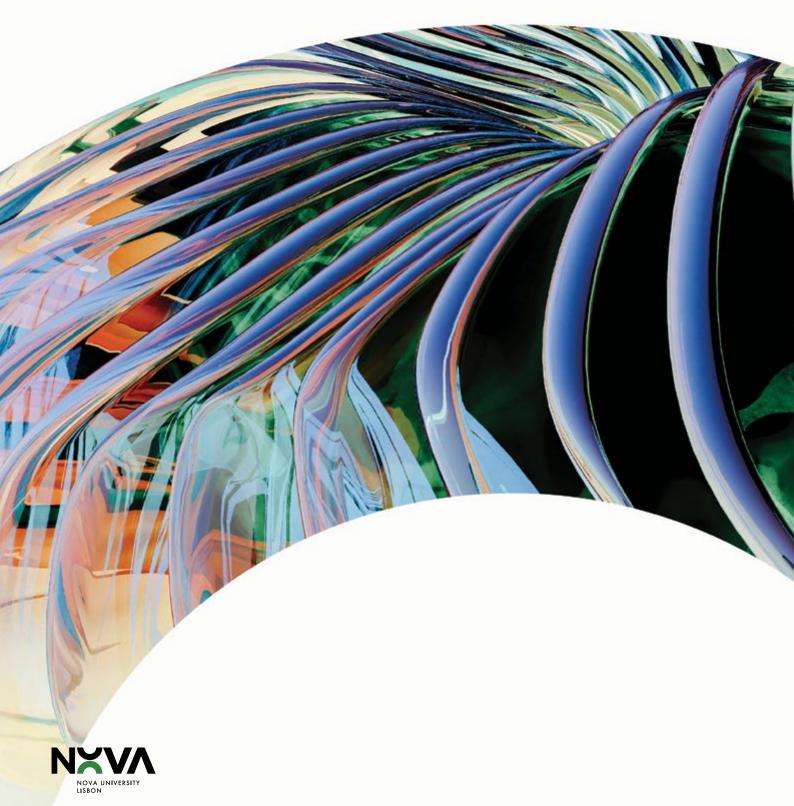
The scientific and intellectual curatorship of this edition was led by two renowned figures: **Pedro Pita Barros**, Full Professor at Nova SBE and leading expert in health economics and public policy, and **Vera Aldeias**, researcher and coordinator at the University of Algarve, recognized for her interdisciplinary work in archaeology and Earth sciences.

Through debates, presentations, and networking opportunities, *Encontro Ciência 2025* once again positioned Portugal at the forefront of global scientific dialogue—an achievement that reflects NOVA University Lisbon's unwavering mission: to advance science that matters, for people and for society.



Knowledge to Impact: Research Shaping the Future



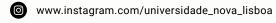




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