

18th Call for proposals for interdisciplinary Seed Fund Projects – thematic call: Collaborating in Living Labs

Background

The **Exploratory Research Space @ RWTH Aachen (ERS)** is the central instrument of RWTH to foster interdisciplinary research and to develop emerging fields with the potential to shape the University's research profile. ERS comprises activities which give a leeway for creativity to both senior and junior researchers and which foster interdisciplinary exchange and discussion. One activity is the funding of **Seed Fund Projects**. The typical duration of a Seed Fund Project is 6 to 12 months.

1. Description of the research field

Living Labs¹ have emerged as a prominent and popular platform for sustainable inter- and transdisciplinary² research and development. Numerous projects, initiatives and infrastructures have sprung up at and around RWTH Aachen University that stimulate collaboration and engage in open experimentation with stakeholders from policy, industry and society. The **Living Labs Incubator (LLI)** has been established to foster exchange between existing Living Lab activities and to develop methods, metrics and strategies for successful inter- and transdisciplinary research and development. Thereby, the LLI seeks to effectively strengthen the local, regional and international innovation ecosystem of which the RWTH Aachen University forms an integral part. By facilitating peer-learning, offering conceptual tools and methodological support, and reflecting on political and epistemic dimensions, the LLI provides a unique knowledge infrastructure for Living Lab research. More information about Living Labs and Living Lab research at RWTH can be found in the “additional information” document attached to this Call.

2. Aim and thematic focus

The proposed projects should primarily aim at the identification, development and exploration of new approaches, methodologies and methods for inter- or transdisciplinary research in Living Labs. The call is open for applications addressing topics related to the research fields of HumTec and the LLI. Non-exhaustively, these include:

- (i) Knowledge transfer in inter- and transdisciplinary research settings,
- (ii) Institutional framework and governance conditions,
- (iii) New conceptualisations of Living Labs and
- (iv) Research data management in Living Labs.

¹ A Living Lab is a (research) facility characterized by a participatory and context-sensitive research approach embedded in real-world settings and geared towards addressing grand societal challenges in a sustainable way.

² In our understanding transdisciplinarity is an integrative research approach that combines scientific and practical knowledge to solve societal challenges.

Further information about the preferred research topics is included in the “additional information” document.

The activities should be original, creative and can be of high risk. They must not already be addressed by national or international public funding programs.

Projects can also be submitted as **International Research Space@RWTH Aachen (IRS)** proposals. This entails additional funding for collaboration with international partners, who are expected to contribute to the project through matching funds (except in case of capacity building proposals). IRS proposals should elaborate the specific added value of the international cooperation.

3. Selection and evaluation criteria:

The projects will be selected and evaluated by an evaluation group. The selection process may involve external experts.

The selection criteria for submitted proposals will be

- Originality (new, creative, explorative),
- Transdisciplinarity and ideally also interdisciplinarity of the research topic and approach (participation of stakeholders from policy, industry and/or society, participation of researchers from different faculties and disciplines with strongly differing research topics),
- Subsidiarity (funding through other sources is not yet possible),
- Team structure (senior and/or high-potential young researchers),
- Potential impact on the research strategy and structure of RWTH Aachen University,
- Adequateness of research approach,
- Adequateness of research data management plan.

Specifically for IRS:

- Coherent implementation of internationalization in line with [RWTH internationalization strategy](#),
- Adequate matching funds from the partner (except for projects on capacity building),
- Added scientific value of the international cooperation.

Major evaluation criteria after project completion will be the quality of obtained research results and the future perspectives of the research topic as described in a final report, which has to be provided 18 months after project closure:

- A promising proposal for a follow-up project (to be) submitted for third-party funding (DFG, BMBF, EU, ...),
- Publications in peer reviewed journals, books or monographs
- Granted patents or promising patent applications.

4. Funding

The budget for a Seed Fund Project is provided by the Excellence Strategy of the German Federal and State Governments and makes allowances to the allocation model aiming for 30% share of females. The total budget for all new Seed Fund projects is at most 200.000 €.

Funding can only be provided for members of RWTH Aachen University.

Eligible costs are: Staff expenses including student assistants, travel and subsistence costs, support for workshops and conferences, consumables and equipment.

5. General conditions

Research Partners: typically 2-3 researchers, ideally from different faculties and disciplines.

We encourage the participation of young scientists (junior professor, group leader, research fellow, etc.) who are scientifically independent and are leading a research group.

The researchers should not be part of the same institute.

Joint Proposals with partners from Forschungszentrum Jülich (FZJ) are welcome. The research topics and the expertise of the FZJ partners must be different from those of the RWTH partners and they have to complement each other. The expenses of the partners from FZJ will not be covered by ERS funding.

Each research team (professor with his/her group) can participate in a maximum of 3 Seed Fund Project Proposals.

Progress evaluation: final report

6. Proposal structure and content

Length of proposal: 10 pages **max.**, type size: Arial 11, line spacing: 1.5

- Project partners and principal investigators
- Summary
- Current State-of-the-Art
- Relevant preliminary work of the applicants
- Goals and approach (methodology)
- Working plan, including tasks, responsibilities and strategies for collaboration
- Financial plan
- Expected short, medium and long-term impact (targeted third-party funding, implementation of new scientific infrastructure, new significantly visible, interdisciplinary competences, action plan to achieve these strategic goals)
- Strategies for participation, communication and outreach
- Research data management plan
- References



Language: English or German

Please note: Proposals that do not comply with the formal criteria will be excluded from the reviewing process.

- 7. Deadline for submission: July 26, 2022**
- 8. Project start: between November 2022 and January 2023**
- 9. Project duration: 6 to 12 months**
- 10. Please apply at: <http://portal.ers.rwth-aachen.de>
Call: Seed Fund 2022 – Collaborating in Living Labs**

For additional information on the selection process, please refer to our website:
<http://www.rwth-aachen.de/ers>

Contact:

Dr.-Ing. Vera Eckers
Exploratory Research Space
RWTH Aachen
Wüllnerstr. 5b, 52062 Aachen

Tel. 0241-80-90492

E-mail: ers@ers.rwth-aachen.de

or

Filiz Yurdusever
Exploratory Research Space
RWTH Aachen
Templergraben 59, 52062 Aachen

Tel. 0241-80-20728

E-mail: ers@ers.rwth-aachen.de

Additional Information pertaining to the 18th Call for proposals for interdisciplinary Seed Fund Projects – Collaborating in Living Labs

In case of questions regarding the application process, please enquire with the ERS-Team (ers@ers.rwth-aachen.de).

In case of questions regarding the thematic focus or possible collaborative approaches of proposals, please enquire with the Living Labs Incubator (LLI@humtec.rwth-aachen.de).

Background

This document accompanying the Call for Proposals “Collaborating in Living Labs” provides further information about Living Labs and the thematic focus of the Call.

1. Living Labs

With the emergence of mission-oriented, responsible and integrated inter- and transdisciplinary research and innovation as salient themes in research policy and practice to address grand societal challenges, the Living Lab inspires as a notion, a setting and a methodology encouraging participatory approaches to transformative innovation. Drawing on early conceptualizations of Living Labs in Human-Computer-Interaction research that aimed to better contextualize technological R&D processes, and building on integrated inter- and transdisciplinary approaches to research and the co-creation of knowledge, Living Labs can be succinctly characterized as:

- a participatory and context-sensitive research approach
- embedded in real-world settings and
- geared towards addressing grand societal challenges in a sustainable way.

The European Network of Living Labs defines Living Labs as “real-life test and experimentation environments that foster co-creation and open innovation among the main actors of the Quadruple Helix Model, namely: citizens, government, industry and academia”. While this broad definition captures the essence of Living Labs, different manifestations, institutional set-ups and actor constellations can be found in practice – not least because Living Lab concepts and methods inspire a range of activities with different purposes. Some Living Labs are primarily concerned with the application of technological innovations in specific contexts and with iterative loops of development and testing for technological optimization and safety. Other Living Labs engage citizens as users in the roll-out of infrastructural innovations, for example of renewable energy technologies or alternative mobility concepts, to gauge interest, acceptance and everyday compatibility. These types of initiatives most closely resemble the regulatory sandbox approach to Living Labs pursued by the Federal Ministry for Economic Affairs and Climate Action as well as the Ministry for Economy, Innovation, Digitalization and Energy of North-Rhine Westphalia. A third group of Living Labs involves citizens and other relevant stakeholders in purposefully planned processes of co-design, co-

creation and co-evaluation (see Figure 1) to tackle complex problems of global or regional relevance in local settings. However, in view of exuberant expectations with regard to the co-creation of sustainable solutions in and through Living Labs, crucial questions remain with respect to the transferability, scalability and generalizability of the knowledge created in such unique settings, under specific conditions and in collaboration with a particular group of actors.

2. Thematic focus and possible research topics

The broad thematic focus of the Call invites project proposals addressing a range of research topics. These include but are not limited to the following.

Knowledge transfer in inter- and transdisciplinary research settings

- better understanding or the creation and testing of new forms of citizen or user participation,
- citizens' perspectives and experiences in Living Labs (emotions, perceptions, etc.),
- indicators or metrics assessing knowledge transfer in inter- and transdisciplinary settings,
- evaluation (metrics) of the quality of the knowledge and the process of knowledge creation in Living Lab settings,
- research approaches and methodologies addressing the transferability, scalability or generalisation of Living Lab findings and results,

Institutional framework and governance conditions

- innovative approaches to the institutionalisation of Living Labs in university research or teaching,
- strategies to address administrative hurdles or burdens for inter- and transdisciplinary research,
- new models of participatory governance for Living Labs,
- guidelines for establishing new Living Labs in accordance with institutional and administrative framework conditions at the RWTH Aachen University,
- new conceptualizations of Living Labs as a basis for third-party funding,
- new coalitions with the transdisciplinary community of the RWTH Aachen University,

Research data management in Living Labs

- strategies and standards for the cross-modal sharing of research data between different stakeholders,
- ethics guidelines regarding participant involvement and consent,
- ethical and data management aspects of "Citizen Data" and its usage in transdisciplinary settings,

- research on data privacy in Living Labs.

Annex

The following figure explains the inner working of a Living Lab. It shows the co-design of the problem definition and generation of ideas in a transdisciplinary team, the flow of knowledge from its co-production generated by real-world intervention and lastly the co-evaluation and circular usage of results in science and practice.

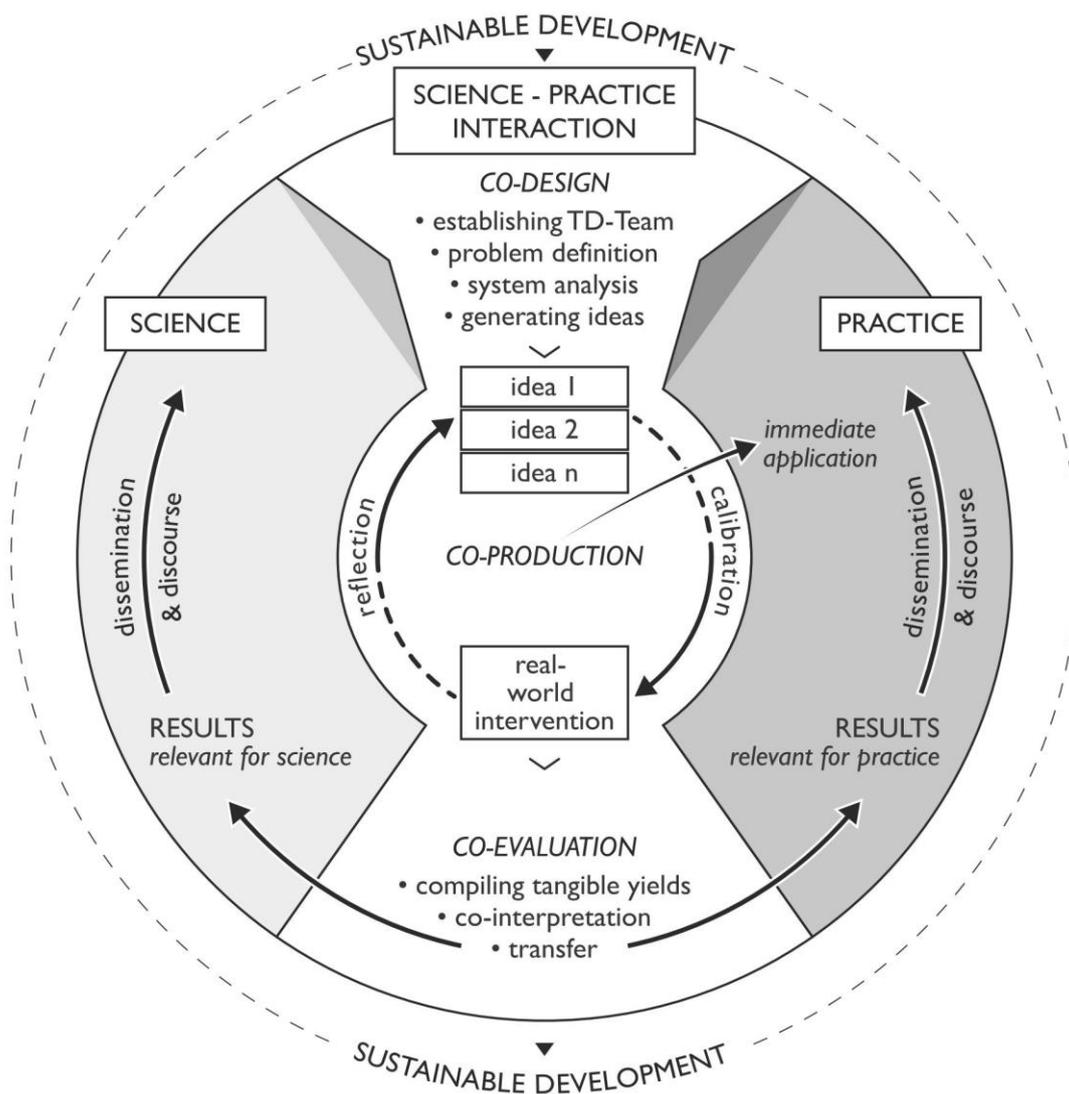


Figure 1: Cyclical concept for Wuppertal's Real-World Laboratories (Wanner et al. 2018)



Publication bibliography

Wanner, Matthias; Hilger, Annaliesa; Westerkowski, Janina; Rose, Michael; Stelzer, Franziska; Schöpke, Niko (2018): Towards a Cyclical Concept of Real-World Laboratories. In *disP - The Planning Review* 54 (2), pp. 94–114. DOI: 10.1080/02513625.2018.1487651.