Federal Ministry of Education and Research (BMBF)

Announcement of

Regulations governing the funding of international collaborative projects under the National Bioeconomy Strategy

"Bioeconomy International 2024"

24 November 2023

1 Funding aim, purpose and legal basis

1.1 Aim of funding

The Federal Ministry of Education and Research (BMBF) intends to strengthen the implementation of the National Bioeconomy Strategy¹ with regard to its international outlook and context by funding collaborative R&D projects that involve foreign partners. The aim of the Federal Government's National Bioeconomy Strategy published in January 2020 is to support the transformation of the largely fossil resources-based economy into a sustainable bio-based economy that focuses on natural material cycles. In this context, research is regarded as the key to identifying and exploiting the potential of the bioeconomy. As described in the National Bioeconomy Strategy, the BMBF's corresponding research funding focuses on six building blocks of which the first, "Biological knowledge as the key to the bioeconomy", has particular relevance for these funding regulations (see 2 below).

The National Bioeconomy Strategy provides substantial support towards the use of various biotechnological processes in industry. Companies are already increasingly introducing sustainable processes and products in order to remain competitive. Implementing the bioeconomy should not, however, interfere with efforts to secure global nutrition. This is because, even today, competition for natural resources (land and water) and the use of agricultural products for different purposes (nutrition, recycling of materials in industrial production, energy) is increasing in many countries. In addition, there is increasing global demand for food and animal feed, timber and various types of agricultural products, which directly or indirectly affects global land use, the climate, biodiversity, and important ecosystem services.

The funding regulations make a contribution to Mission I – "Enabling competitive industry based on resource efficiency and the circular economy, and sustainable mobility", and Mission II – "Climate protection, climate adaptation, food security and the conservation of

¹ National Bioeconomy Strategy (bmel.de)

biodiversity", as well as to the third goal – "Intensifying European and international cooperation" of the Federal Government's Future Research and Innovation Strategy.

1.2 Funding purpose

Implementing the bioeconomy as a sustainable bio-based economy requires not only national and European initiatives, but also – in particular – international initiatives involving many ambitious activities and projects. Since the bioeconomy has to be considered at a global level, worldwide cooperation is needed to achieve the objectives set out for establishing the bioeconomy. This is the purpose of the Bioeconomy International funding activity. Funding will be provided for research and development projects in close cooperation with relevant foreign partners on core issues of the bioeconomy in order to strengthen international collaborations and to establish active, sustainable partnerships in the area of research, development and innovation. This may include projects of variable geometry.

The international project outlines submitted for selected projects accompany the BMBF's national activities in support of the bioeconomy and constitute an additional contribution towards achieving the funding policy objectives of the National Bioeconomy Strategy.

2 Object of funding

Funding will be provided for research, development and innovation projects (R&D&I projects) that are carried out by collaborations involving international partners from outside Europe that have been selected in a competitive procedure.

Funding will be provided for German partners in these international collaborations (see also section 3, Funding recipients). Applications involving Russian partners are not eligible for funding.

Funding is provided within the context of the National Bioeconomy Strategy of 15 January 2020 and its guidelines and strategic objectives. In terms of its implementation objectives, the Strategy defines distinct building blocks for research funding in order to achieve its strategic objectives.

The collaborative projects funded are expected to address research building block 6 – "Global research collaborations" and to relate to at least one of the five other building blocks for research funding mentioned in the strategy:

- 1) Biological knowledge as the key to the bioeconomy (microorganisms; algae, fungi, bacteria, plants; insects, etc.);
- 2) Converging technologies and cross-disciplinary collaboration (digitalization, artificial intelligence, nanotechnology, automation, miniaturization, etc.);
- 3) Limits and potential of the bioeconomy;
- 4) Transfer into application (value creation networks, etc.);
- 5) Bioeconomy and society (interactions, conflicting objectives, etc.);
- 6) Global research collaborations.

One of the focuses of the call are the topics of the "Biological knowledge as the key to the bioeconomy" building block. These topics include, among others:

- a) Activities aimed at understanding and modelling biological systems;
- b) Project outlines for researching and establishing novel production organisms for primary and industrial production;
- c) Research approaches for the development or further development of innovative biotechnological processes for bio-based production systems; and
- d) Research activities geared towards the sustainable production of biogenic resources.

Further information on topics eligible for funding can be obtained from the responsible project management organization (see 7.1).

International cooperation within the collaborative projects and the added value this generates for all countries in the implementation of the National Bioeconomy Strategy are the focus of the Bioeconomy International funding activity. With regard to the envisaged sharing of responsibilities, the partners' expertise and the utilization of the project results, cooperation must take place on an equal footing in terms of content and workload, thus allowing all countries involved to benefit in an equal and fair manner. Furthermore, the funding activity provides the opportunity to implement project ideas that were initiated as part of previous preparatory measures. More information on the National Bioeconomy Strategy is available online

at <a href="https://www.bmbf.de/bmbf/en/research/energy-and-economy/bioe

The Bioeconomy International 2024 funding activity consists solely of one module which can be applied to worldwide (all partner countries outside Europe are possible). In this round, there will be no bilateral module with the possibility of co-financing. The partners based in countries other than Germany must organize their own financing, and provide evidence of this in a so-called Financial Commitment. Funding cannot be provided for projects involving Russian partners.