

Guidelines and Supplementary Instructions

Digitisation and Indexing



Disclaimer: The English translation of this document is provided for informational purposes. In the event of a discrepancy between the English and the German versions, the German text takes precedence.

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I Programme Information

1 Objectives and Scope of Funding

1.1 Background

As part of its Scientific Library Services and Information Systems Programme, the DFG funds projects at research institutions and in particular service and information centres in Germany. The aim is to set up nationwide efficient research information systems.

1.2 Objectives

The objective of the programme is to digitise and/or index holdings and collections that are of nationwide importance for research (handwritten and print tradition, non-textual object collections including audio and/or visual media, as well as genuine digital data (“born digital”) such as digital works of art, digital literary remains (e-mail correspondence etc.), image datasets (e.g. three-dimensional micro-CT data)).¹

1.3 Scope of funding

The programme includes the following complementary components, which may be applied for individually or in combination:

Funding may be used for the digitisation or indexing of relevant collections, whereby established standards for indexing and/or digitisation, guidelines and data formats such as the DFG Practical Guidelines on Digitisation or the LIDO exchange format must be applied.

With regard to materials for which digitisation and/or indexing standards are yet to be established, the programme aims to promote the development and/or application of quality criteria. Under the programme, this form of process-based development of quality criteria should be understood as the development of technical formats that enable optimum interoperability of the resulting data and metadata, and that are widely used with a broad standardising effect. Central to the process of creating uniform quality criteria are not only the technical aspects,

¹ In the case of proposals relating exclusively to the indexing of collections, the proposal must show that the holding to be indexed is permanently kept in its current structure at a publicly funded institution in Germany, where it is freely and permanently accessible and usable. If the digitisation and/or indexing of genuine digital objects (e.g. film material) is planned, it must be demonstrated that digital access to the objects is permanently ensured.

but also coordination processes and agreement on the widest possible application, nationally and internationally, of the technical formats developed. Within this context, projects aiming at the technical expansion of material and/or subject-specific (international) portals are also eligible for funding. This funding option always exists for efforts to expand portals to supplementary object types.

Proposals regarding the application of newer methods for digitisation and indexing, e.g. by optical character recognition (OCR) or optical layout recognition (OLR), automatic image recognition, named-entity recognition or 3D digitisation, can also be submitted under this funding programme. Such proposals must specify the contexts in which the methods to be applied have already been tested. Funded projects are expected to develop concrete recommendations for the future application of these methods. With this funding option, the programme complements the DFG's e-Research Technologies Programme² with a narrow focus on digitisation and indexing. While the Digitisation and Indexing Programme covers the application of newer methods, project proposals that are geared towards the development, implementation and consolidation of such technologies will continue to be funded under the e-Research Technologies Programme.³

Furthermore, projects at the interface between research and scientific information infrastructure are eligible for funding. "Bridge projects" are defined as projects which involve not only extensive research work as such but are also dedicated to the development and provision of scientific information and/or information infrastructures. These are handled in a joint procedure under the DFG's Research Grants Programme and Digitisation and Indexing Programme.⁴

2 Proposals

2.1 Eligibility

Members of non-profit research information infrastructure facilities in Germany such as libraries, archives, museums, research collections, research data centres or computing and information centres are generally eligible to submit proposals. Researchers in Germany or those

² For funding objectives and requirements in the e-Research Technologies programme, see www.dfg.de/formulare/12_19

³ If you have any questions regarding the correct assignment of your planned project to one of the programmes in question, please inquire with the responsible contact persons at the DFG Head Office.

⁴ Further information on bridge projects can be found at: www.dfg.de/en/research_funding/programmes/infrastructure/lis/funding_opportunities/bridge_projects

working at a German research institution abroad who have completed their academic training (generally by obtaining a doctorate) are also eligible to apply.

As a rule you are not eligible to submit a proposal if you work at an institution that is not non-profit or one that does not allow immediate publication of research findings in a generally accessible form.

Funding provided in the area of scientific library services and information systems is intended to achieve improvements to nationwide information infrastructures, and its results benefit research as a whole. Therefore, institutes and member organisations of the Max Planck Society, the Fraunhofer-Gesellschaft, the Helmholtz Association, the Leibniz Association, and publicly funded research institutions associated with these organisations, and German sections of international information infrastructure institutions are also eligible to apply.

2.2 Proposal requirements and funding conditions

When the aim of DFG project funding is to set up a longer-term national structure, it is expected that the proposal is submitted and supported by or in conjunction with an institution that is able to maintain the project findings and ensure their sustainability. Funding by the DFG requires that the user-friendliness and accessibility of project results will be maintained and further developed as necessary by the applicant institution(s) even after the project expires.

2.2.1 Project requirements

- The holdings selected for digitisation and/or indexing must be relevant to research beyond individual research projects. Particularly suitable are holdings that stand out as a special segment within the overall holdings of a research information centre due to the shared topic or common form of the works or objects they contain. In this context, the integrity of the collection, the rarity or singularity of the holdings as a whole or in part should be considered, as well as their provenance. Projects aiming to virtually consolidate holdings across sections and collections are very much encouraged. In addition, holdings are suitable for digitisation and/or indexing if their digital cataloguing and/or digital availability is expected to strongly stimulate and strengthen research in Germany.
- In the case of proposals relating exclusively to the indexing of holdings, the proposal must show that the holding to be indexed is permanently kept in its current structure at a publicly funded institution in Germany where it is permanently and freely accessible

and usable.⁵ Moreover, justification is required as to why digitisation of the holdings is currently not intended (e.g. due to legal restrictions).

- For proposals involving digitalisation or digitalisation in combination with indexing measures, permanent retention and accessibility of the digitalised material at the applying institution is a funding condition.
- If you are planning to include materials in your project that are not located at the applicant institution, the proposal must include a legally binding declaration stating that and how these materials will be made available to the applicant institution for indexing and/or digitisation as part of the project.
- Any necessary rights clearance must be obtained before the proposal is submitted.
- Proposed projects may not substitute the defined responsibilities and funding arrangements of the applicant institutions. Projects must therefore go beyond the core responsibilities of an institution and be of a limited timeframe and topical scope. Not eligible for funding are projects that primarily serve to promote culture, convey or preserve cultural heritage, or have similar purposes, as well as commercially oriented projects.
- Projects must apply material-specific digitisation and indexing standards. These must be addressed in the proposals. This applies in particular if new quality criteria or guidelines are to be developed.
- If the proposed project aims to help create and/or further develop quality criteria, applicants should examine prior to the proposal whether existing standards and corresponding metadata formats can be reused or adapted.
- In justified cases, digitisation is also possible without the availability of detailed indexing data. In order to create a solid basis for digitisation without prior indexing in this context, basic data must be created for such analogue and digital source objects. The basic data record functions as a minimum catalogue, and is mandatory to establish eligibility for funding digitisation in the absence of detailed indexing data. The measures planned for enabling findability, accessibility and reuse of the data must be described in the proposal. It is still expected that the specific values for the elements described in the basic data record should be adapted to the relevant research environment in accordance with subject-area standards. Pertinent details should be submitted as an attachment to the proposal.

www.dfg.de/formulare/12_155

⁵ Exceptions to this rule are holdings at public institutions in Israel, which can likewise be indexed in accordance with the DFG's guidelines for funding collaborative German-Israeli projects.

- Project results should primarily be published in digital form, taking into account the possibility of linking project results across different types of materials, too.
- In order to ensure optimum reusability of the project results, all proposals for the digitisation of printed texts are expected to at least consider providing the full texts. If full-text indexing is not planned, this should be justified in the proposal.

2.2.2 Project results

To ensure the optimal long-term usability of project results, the generated data (metadata, digital copies and full texts) must meet the FAIR criteria (Findable, Accessible, Interoperable and Reusable).

- If digitised objects are already in the public domain, they must be identified as such and not be subject to licences (e.g. by applying the Public Domain Mark). If this is not possible, they should be offered under the most open licence possible (e.g. Creative Commons Licences CC0, CC BY or CC BY SA) and, in the case of protected material, be marked with standardised, automated, machine-readable rights notices.
- Restrictions to open access may be justified, for example due to data privacy, copyright or archive law, but must not affect more than five percent of the total material to be digitised and must be accompanied by a plan showing the schedule and technology for making it available.⁶
- If new formats for digitisation and/or indexing are developed or applied in the project, the application results must be comprehensively documented, freely reusable, and made known to the relevant research community. Recommendations for future applications should also be formulated. This will ensure the broadest possible reuse.
- If the project develops software, the source codes generated must be published. Project results must be provided as open source at a suitable location (e.g. GitHub). This includes comprehensive documentation and licensing.

2.2.3 Financial contributions

- For projects aimed at digitising and/or indexing collections and holdings, the applicant institution must contribute one-third of the total project-specific costs.⁷

⁶ The processing of non-open-access material is not eligible for DFG funding.

⁷ Total project-specific costs = requested funding + applicant's pledged contribution. Costs incurred prior to submitting the proposal cannot be considered as the applicant's contribution.

- In the case of projects that focus mainly on developments for and reuse by specific communities and in which the applicant institution's holdings are no more than examples – such as projects for the development of new formats for digitisation and/or indexing, projects for networking and knowledge sharing, projects for establishing or expanding material-specific portals, projects for applying relatively new digitisation and/or indexing methods – DFG funding is contingent on an appropriate financial contribution by the applicant institution.

Costs involving the storage of data for the duration of the project will be recognised as applicant contributions. Accompanying conservation measures can only be recognised as applicant contributions if applicants can justify that such measures are essential to carrying out the project and do not substitute basic responsibilities. DFG funding is not available for these items.

Activities carried out before the start of the project cannot be recognised as applicant contributions.

Expenses for transporting and insuring objects to be processed in cooperation projects can be recognised as an applicant contribution in well-founded cases. DFG funding is not available for these items.

Retroconversion work can be recognised as an applicant contribution if its project-specific necessity is convincingly demonstrated.

2.3 Proposal structure

Proposals for projects in the area of scientific library services and information systems must be structured in accordance with the relevant proposal preparation instructions.

www.dfg.de/formulare/12_01

Please base your proposal on the outline in this template. Specific explanatory comments regarding this programme can be found in the supplementary guidelines under V.

Proposals submitted by larger consortia within a community should be submitted in English.

2.4 Deadline

Proposals can be submitted at any time.

3 Duration

Initial funding can be approved for up to three years. The total funding period should not exceed six years.

II Proposal Modules

Under this funding programme, you may submit one or more of the following modules. For more details, please see the respective guidelines for each module.

1 Basic Module

Use the basic module to request funding for direct project costs, project-specific staff, and materials necessary to carry out the project.

www.dfg.de/formulare/52_01

2 Project-Specific Workshops

If you would like to conduct workshops as part of your project, you may request funding to help you do so. Please note that this module cannot be submitted separately but only in conjunction with the proposed project. This module can be used to request funding for any activities aiming to involve research users, particularly within projects for developing new formats for digitisation and/or indexing, establishing and/or expanding material-specific portals, or applying newer methods for digitisation and indexing.

www.dfg.de/formulare/52_06

The hosting of **round-table talks** may also be funded for the purpose of strategic planning, nationwide collaborations in the sense of self-organisation processes and networking measures for communities, as well as the further development of funding arrangements. Please contact the responsible DFG programme contact if you have any questions.

III Obligations

In submitting the proposal to the DFG, you

1. agree to adhere to the **principles of good research practice**.⁸

The principles of good research practice include, among others, maintaining professional standards, maintaining strict honesty with regard to one's own contributions and those of third parties, documenting results and rigorously questioning all findings.

2. recognise the **Rules of Procedure for Dealing with Scientific Misconduct** (Verfahren-sordnung zum Umgang mit wissenschaftlichem Fehlverhalten – VerfOwF)⁹ as legally binding.

Scientific misconduct is defined as the intentional and grossly negligent statement of falsehoods in a scientific context, the violation of intellectual property rights or impeding another person's research work. The circumstances of each case will be considered on an individual basis. In cases where scientific misconduct has been established, the DFG may impose one or more of the following sanctions in accordance with its Rules of Procedure, depending on the nature and severity of the scientific misconduct:

- issuing a written reprimand to those involved;
- exclusion from the right to apply for DFG funds for a period of one to eight years, depending on the severity of the scientific misconduct;
- revoking funding decisions (full or partial termination of the grant contract, demanding repayment of funds spent);
- demanding that those concerned either retract the discredited publications or correct the falsified data (in particular by publishing an erratum), or appropriately indicate the DFG's retraction of funding in the discredited publications;
- exclusion from serving as a reviewer for a period of one to eight years, depending on the severity of the scientific misconduct;

⁸ The principles of good research practice can be found in detail in the DFG [Code of Conduct - Guidelines for Safeguarding Good Research Practice](#) and the [Funding Guidelines: General Terms and Conditions of DFG Grants](#) (DFG form 2.00).

⁹ [DFG Rules of Procedure for Dealing with Scientific Misconduct](#), DFG form 80.01

- exclusion from membership in DFG bodies and committees for a period of one to eight years, depending on the severity of the scientific misconduct; denying voting rights and eligibility in elections for DFG bodies and committees for a period of one to eight years, depending on the severity of the scientific misconduct.

By accepting funding, the recipient agrees to:

3. use the grant exclusively and in a targeted manner to realise the funded project. The use and accounting of funds must conform to the relevant regulations of the DFG.
4. submit progress reports on the research according to the dates specified in the award letter and to present financial accounts to the DFG detailing the use of funds.

The DFG expects that the findings of the projects it funds be made available to the public.

IV Data Protection

Please note the DFG's Data Protection Notice for Research Funding, which you can access at www.dfg.de/privacy_policy. If appropriate, please share this information with individuals whose data is processed by the DFG due to the fact that they are involved in your project.

www.dfg.de/privacy_policy

V Supplementary Instructions

Please base your proposal on the "Proposal Preparation Instructions for Project Proposals in the Area of Scientific Library Services and Information Systems" (LIS)

www.dfg.de/formulare/12_01

In addition, refer to the information in these supplementary instructions on submitting proposals under the Digitisation and Indexing Programme. The section titles below are based on the titles in the proposal preparation instructions. Proposals must be submitted via elan:

elan.dfg.de

Part B: Project Description

1.1 State of the art and preliminary work:

- Proposals must convincingly demonstrate that the resulting data are relevant and necessary for research, beyond the scope of individual research projects (environment and needs analysis). Detailed application examples and use scenarios should support the needs analysis.
- Detailed explanations should be given as to which guidelines and standards are used for digitisation and/or indexing.
- If the proposed project aims to contribute to the development and establishment of quality criteria, it must be demonstrated whether and in what form existing standards and corresponding metadata formats can be reused or adapted.

2.3 Work programme and proposed research methods

- The method chosen for digitisation and/or indexing must be justified in detail. Especially if high costs are involved, such as in the case of 3D digitisation, the added value of the results for research must be convincingly demonstrated.
- Information accessibility must be aligned with the – continuously and dynamically changing – requirements of research users (such as adequate usability, freedom from barriers, responsiveness and machine readability). It is mandatory to involve research users when determining usage and to apply established methods to ensure a high degree of user-friendliness. Descriptions of usage scenarios must be included in every proposal.
- If there are no suitable systems for the nationwide cataloguing of the data generated in the project (e.g. for certain types of objects), it must be explained how optimum findability and reusability by users will be ensured.
- If new formats for digitisation and/or indexing are developed or applied in the project, the reusability of these formats and the quality criteria that may emerge must be supported by appropriate measures. Such measures should be aimed in particular at involving the communities that will use the formats in the future. Both data users and data providers should be taken into consideration.
- If the basic data record is used, the specific values for the elements should be adapted to the relevant research environment in accordance with subject-area standards. Pertinent details should be submitted as an attachment to the proposal.
- Project management is fundamental to successful digitisation and indexing projects. This applies also and especially to projects focused on the development of new formats for digitisation and/or indexing, the development or expansion of material-specific portals, and

the application of newer methods for digitisation and indexing. To ensure efficient and result-oriented project implementation and to minimise the risk of failure due to organisational shortcomings, the plans for project management must be described both in detail and plausibly in the proposal.

Part C: Appendices

Additional information and data sheets

If the proposal is submitted by members of a research information infrastructure facility, the applicant must enclose a declaration from the facility's director stating that:

- the long-term accessibility of the texts and/or items to be digitalised and/or indexed is ensured;
- the financial contribution required within the scope of the programme will be made;
- the results of the project will be supported once DFG funding has expired.

www.dfg.de/formulare/12_141

Please include the Indexing and Digitisation Data Sheet with your proposal. The data sheet can be downloaded at:

www.dfg.de/formulare/12_152

VI Information

For further information, please contact:

- Formal and organisational queries
Sophia Allef (e-mail: Sophia.Allef@dfg.de, Tel. +49 228 885-2863)
Verena Kraft-Tigges (e-mail: Verena.Kraft-Tigges@dfg.de, Tel. +49 228 885-2344)
- Queries on proposal submission
Dr. Julia Crispin (e-mail: Julia.Crispin@dfg.de, Tel. 0228/885-2260)
Ulrike Hintze (e-mail: Ulrike.Hintze@dfg.de, Tel. 0228/885-2399)

A detailed overview of contact details, responsibilities and funding opportunities in the DFG's Scientific Library Services and Information Systems programme is available for download from the DFG website at

www.dfg.de/lis-ansprechpersonen