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Avoimen tieteen koordinaatio

Self-evaluation tool for culture of open scholarship services

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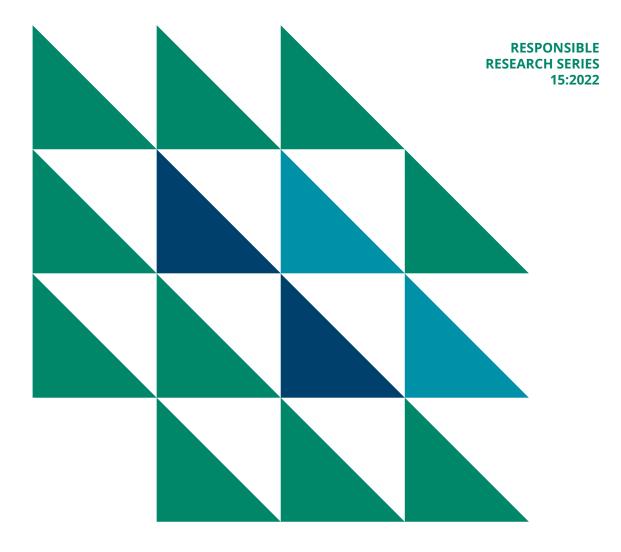
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SELF-EVALUATION TOOL FOR CULTURE OF OPEN SCHOLARSHIP SERVICES

RESPONSIBLE RESEARCH SERIES

Responsible Research Series publishes declarations, policies, studies, recommendations and other documents relating to the openness, responsibility and accessibility of science and research. Publications also cover science communication and science-society interactions. The publication series is not a scientific peer-reviewed publication. The series is published by the Committee for Public Information (TJNK) and the Federation of Finnish Learned Societies (TSV).

Self-evaluation tool for culture of open scholarship services

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1. INTRODUCTION

A self-evaluation tool for services has been developed to support the Policy for Open Scholarship, which takes into account the recommendations of all previous national policies on open science. The purpose of the tool is to assist research organisations in the self-evaluation and development of services and making them available. The organisation may produce the services alone, in cooperation with other organisations or utilise services at the national and international level. Measures promoting the openness of evaluation, learning, research data and publishing, which are also included in the Policy for Open Scholarship currently being prepared, are made concrete with minimum and ideal criteria. These criteria facilitate different target levels for different types of research organisations at different starting levels. The measures and criteria of the self-evaluation tool are also used in the national monitoring model for open science. The tool is intended for the self-assessment of organisations and the development of services, while the monitoring model makes it possible to assess the maturity level of the entire open science field.

2. SELF-EVALUATION TOOL FOR SERVICES

2.1 CULTURE OF OPEN SCHOLARSHIP

The organisation has designated and scheduled the coordination, implementation and monitoring of open science services and support for the interaction of researchers with different actors in society.

Minimum level:

- 1. The organisation has signed the Declaration for Open Science and Research
- 2. The organisation is committed to the national recommendation for the evaluation of a researcher

Optimal level:

- 3. The organisation has an open science policy and an action plan with responsible parties and schedules
- 4. The organisation engages in regular monitoring of the culture of open scholarship which takes into account the national open science monitoring model

2.2 EVALUATION

The organisation has at its disposal practices, criteria and a knowledge base for documenting diverse outputs and merits that promote open science and its culture as part of the assessment and merit of Finnish research organisations and their personnel.

A. RESPONSIBLE EVALUATION

The organisation ensures that the evaluation of research and researchers follows responsible and transparent practices in accordance with the Recommendation for the responsible evaluation of a researcher.

Minimum level:

- 1. The organisation complies with international and national legislation (e.g.)
 - A. Administrative Procedure Act
 - B. Non-Discrimination Act
 - C. Act on Equality between Women and Men
 - D. Act on the Protection of Privacy in Working Life
 - E. Medical Research Act
 - F. Data Protection Act
 - G. the European Union's General Data Protection Regulation (GDPR)

- H. Act on Information Management in Public Administration
- 2. The organisation is committed to the guidelines on research ethics (TENK RCR)
- 3. The organisation is committed to complying with the Recommendation for the responsible evaluation of a researcher
- 4. The organisation complies with the <u>User guide for the</u> Publication Forum classification
- 5. The organisation has defined what what will be valued in the evaluation (strategy, visions, policies)

Optimal level:

- 6. The organisation utilises other national and international guidelines for responsible evaluation (e.g.)
 - A. The Declaration on Research Assessment (DORA)
 - B. Leiden Manifesto for Research Metrics
 - C. The Hong Kong Principles
- 7. The organisation utilises national and international practices for good evaluation (e.g.)
 - A. National database of good practices (under development)
 - B. DORA, EUA, SPARC Europe case-sudies
 - C. INORMS SCOPE

B. INCENTIVES

The organisation ensures that evaluation of research and researchers takes into account research output in different formats and languages (e.g. publications, data, software), merits and impact as well as activities to promote open science.

Minimum level:

1. In preparing the evaluations, the organisation notes the diversity of outputs, activities and impact as well as activities to promote open science.

- 2. The organisation has prepared guidelines for open science evaluation criteria on how diverse outputs, activities and impact as well as activities to promote open science will be taken into account in evaluations.
- The organisation has developed a comprehensive open science career assessment matrix (using international or national models, cf. <u>Open Science Career Assessment</u> <u>Matrix – OS-CAM</u>; <u>NOR-CAM</u>), which accurately defines the criteria for different evaluation processes as provided in the instructions in section 2, e.g.

- A. Quality handbook, etc.
- B. Evaluation of research
- C. Internal financing model
- D. Performance bonuses
- E. Recruitment
- F. Career path
- G. Personal performance
- H. Remuneration scheme
- I. University lectureship
- J. Degrees
- K. Research and travel grants
- 4. The organisation has created a system of awards and/or recognitions that motivate and encourage staff to promote a culture of open scholarship and, for example, takes into account activities to promote the openness of interaction, education, data and publications.

C. KNOWLEDGE BASE

In order to support evaluation, the organisation facilitates and ensures the production of a knowledge base, which enables comprehensive and comparable documentation of research outputs, merits and impact in different forms.

Minimum level:

- 1. The organisation enables versatile reporting and collection of information, for example through a research information system or a comparable system
- 2. The organisation obliges, assists and encourages researchers to report and produce information
- 3. The organisation assesses and ensures the comprehensiveness, reliability and timeliness of the knowledge base
- 4. The organisation uses a versatile knowledge base for the evaluation of research and researchers
- 5. Data collected and produced by the organisation is defined and integrated into national infrastructures
 - A. VIRTA Publication Information Service (in Finnish)
 - B. National Research Information Hub / Researcher data (in Finnish)

- 6. The data model used for internal data collection enables the most extensive possible reporting of the merits of open science and thus a versatile evaluation and monitoring (e.g.)
 - A. TENK CV template
 - B. <u>National recommendation for the</u> responsible evaluation of a researcher
 - C. Open Science Career Assessment Matrix (OS-CAM)

- Information collected and produced by the organisation is openly available and complies with the <u>FAIR principles</u> (see Science Europe <u>Position Statement on Research</u> Information Systems)
- 8. The information collected and produced by the organisation is compatible with national and international infrastructures (e.g.)
 - A. Metax, etc.
 - B. ORCID
 - C. EOSC, OpenAIRE

D. SUPPORT FOR QUALITATIVE EVALUATION

The organisation enables the production and utilisation of qualitative information, such as narrative descriptions and case descriptions of quality and research impact, in evaluations.

Minimum level:

- 1. The organisation uses the <u>TENK template for CV's</u> to support the evaluation
- The organisation enables and utilises the narrative descriptions and case descriptions of quality and impact in the evaluation of a study and a researcher (e.g. The Royal Society: <u>Résumé for Researchers</u>; <u>ACUMEN-portfolio model</u>).

Optimal level:

- 3. The organisation has structured and instructed models for narrative and case descriptions
- 4. The organisation enables the production and collection of narratives and case descriptions, for example by utilising a research information system or a system comparable to it.
- 5. Narrative and case descriptions collected and produced by the organisation are openly available in accordance with the FAIR principles
- 6. Narrative and case descriptions collected and produced by the organisation are integrated in a coordinated manner with international and national infrastructures (e.g. possible national Portfolio portal, see <u>National recommendation for the responsible evaluation of a researcher</u>, Implementation Plan, section 3)

E. TRANSPARENCY AND MONITORING

The organisation ensures that the evaluation situation is conducted in an open and transparent manner and that the implementation of responsible evaluation is monitored.

Minimum level:

1. The organisation has a responsible evaluation policy that comprehensively takes into account different evaluation processes from the organisational level to the individual level

- 2. The organisation coordinates, monitors, assesses and develops compliance with the responsible evaluation policy in the planning and implementation of all evaluations
- 3. The organisation has appointed a responsible party whom a researcher can contact should there be shortcomings in the responsibility of the evaluation.

Optimal level:

- 4. The organisation describes and communicates the criteria and guidelines for all evaluations transparently and in accordance with the FAIR principles (e.g.).
 - A. Quality handbook, etc.
 - B. Evaluation of research
 - C. Internal financing model
 - D. Performance bonuses
 - E. Recruitment
 - F. Career path
 - G. Personal performance
 - H. Remuneration scheme
 - I. University lectureship
 - J. Degrees
 - K. Research and travel grants
- 5. The organisation highlights the impacts of a responsible and open evaluation culture
- 6. The organisation disseminates information on its good practices for the use of other organisations and makes use of the good practices of others

F. LOCAL SUPPORT

The organisation ensures that all parties of the evaluation have adequate guidance, guidelines and resources for responsible evaluation.

Minimum level:

- 1. Organisations have appointed a responsible party for the evaluation process and resources for the planning and implementation of responsible research and researcher evaluations.
- 2. Organisations have training in responsible evaluation and the use of publication metrics for evaluators from both its own personnel and external sources.

- 3. The organisation ensures that each evaluation process has experts in the discipline carrying out qualitative and multifaceted evaluations and that the evaluators have sufficient time for the evaluation.
- 4. The organisation makes use of and allocates resources to expertise at libraries and/or other bibliometrics experts for producing and interpreting publication metrics.

5. The organisation uses a checklist based on the National Recommendation for Responsible Researcher Evaluation to prepare a responsible evaluation and monitor its implementation (checklist for responsible evaluation, see Appendix 1).

2.3 EDUCATION

The organisation promotes the culture of open education by providing up-to-date services to ensure that all persons providing education have equal opportunities to organise open education and to prepare and publish open educational resources regardless of organisation, field of education or career stage.

A. COMPETENCE REQUIREMENTS FOR OPEN EDUCATION

Higher education institutions in cooperation with open science and research coordination ensure that the persons providing education have the opportunity to acquire the competence to utilise and create open educational resources in accordance with the national competence requirements for open education.

Minimum level:

- 1. The higher education institution recommends that persons providing education acquire the competence to utilise open educational resources in accordance with the national competence requirements for open education.
- 2. Some of the persons organising teaching at the higher education institution have completed the competence for the preparation of open learning materials (10%) and the majority the competence for using open learning materials (> 50%).

Optimal level:

- 3. The majority of those organising teaching at the higher education institution have completed the competence for preparation of open educational resources (> 50%).
- 4. Some of those organising teaching at the higher education institution have completed the competence of an influencer in open education (5%).

B. COPYRIGHT, LICENCES AND AGREEMENTS

The higher education institution requires respect for copyright in the organisation of open education and in the preparation and production of open educational materials and provides support for open licensing of educational materials.

Minimum level:

1. The higher education institution has access to and use of national recommendation for copyright and licencing of open educational resources.

In addition, at the ideal level:

- 2. The higher education institution has prepared its own recommendation to provide more detail than the national recommendation.
- 3. For example, the higher education institution has contractual templates for agreements concerning the rights and responsibilities of works with several authors.
- 4. The higher education institution provides training on the copyright and licensing issues related to learning and educational resources.
- 5. The higher education institution has appointed persons to provide support in copyright and licensing issues related to learning and educational materials.
- 6. The total number of openly licensed educational resources produced by persons associated with the higher education institution is increasing.

C. RESOURCE FINDABILITY

The higher education institution recommends that the authors of open educational resources make the metadata of the educational resources available in the <u>Library of Open Educational</u> Resources as comprehensively as possible.

Minimum level:

- 1. The total amount of metadata imported into the library by persons associated with the higher education institution is increasing.
- 2. The higher education institution participates in national cooperation to develop the Library of Open Educational Resources.

Optimal level:

- 3. The higher education institution recommends that the authors of open educational resources submit the educational resources they have authored to the Library of Open Educational Resources.
- 4. The total amount of education resources imported into the library by persons associated with the higher education institution is increasing.

D. RESOURCE ACCESSIBILITY

The higher education institution ensures that the provided open education and open educational resources comply with the national accessibility criteria.

Minimum level:

1. The open educational resources produced by persons associated with the higher education institution meets the accessibility criteria.

2. The higher education institution provides training on accessibility.

Optimal level:

- 3. The higher education institution recommends that the metadata of open educational resources include information on the accessibility of the materials.
- 4. The higher education institution appoints personnel to provide support in accessibility issues related to open educational resources.

E. COMMUNICATION

The higher education institution ensures that their communication channels feature communication related to open education.

Minimum level:

1. National open learning communication materials can be found in the higher education institution's communication channels.

Optimal level:

- 2. The higher education institution implements its own largescale communication related to open learning in different communication channels.
- 3. The higher education institution has self-produced open learning communication materials.

F. E-EDUCATION TOOLS

The higher education institution ensures that persons providing education have access to e-education tools that enable making the education open and support for using them.

Minimum level:

- 1. The higher education institution uses online teaching tools that allow teaching to be more open.
- 2. The higher education institution has instructions for the online teaching tools it uses.

- 3. The higher education institution regularly charts the needs related to online education of personnel in charge of teaching and of students, for example by means of user satisfaction surveys.
- 4. The higher education institution acquires online teaching tools that meet its needs.
- 5. The higher education institution has appointed persons who support the use of online teaching tools.

G. QUALITY CRITERIA AND EDITORIAL SUPPORT

The higher education institution provides support for developing the quality of open education and open educational resources. The higher education institution recommends that teachers act as mentors and peer reviewers to each other in quality issues related to open education and educational materials.

Minimum level:

1. The higher education institution has access to and use of national quality criteria for open educational resources.

Optimal level:

- 2. The higher education institution provides training on quality issues related to open learning and educational resources.
- 3. The higher education institution offers instructions for evaluating the quality of open educational resources.
- The higher education institution has appointed personnel to provide support in quality issues related to open learning and educational resources.

H. USE OF OPEN EDUCATION MATERIALS IN TEACHING

The higher education institution encourages education providers to use open education materials in teaching.

2.4 RESEARCH DATA

The organisation promotes the openness of research data. The services ensure that all researchers have at least equal access to research metadata and, where possible, to all research data for reuse, regardless of organisation, field, funding base or career stage. The data should be in accordance with the FAIR principles and, as stated in the Declaration For Open Science and Research 2020–2025, "as open as possible, as closed as necessary". The terms and conditions for data use must be clearly stated and readable. The organisation promotes the use of both its own and the existing national and international research data services.

For definitions of research data and metadata, see the <u>Policy</u> <u>component on open access to research data</u>. The openness of research methods and measures to promote it will be addressed in a separate policy to be published later.

Section a gives a general description of data lifecycle management services. The services will then be specified in measures B–I. The services can be produced in an individual organisation or in national or international cooperation.

A. SERVICES FOR DATA LIFECYCLE MANAGEMENT

Services are available for research organisation staff and students at all stages of the data lifecycle.

Minimum level:

1. Basic level data management training, support and other services are available for research organisation personnel and students at all stages of the data lifecycle.

Optimal level:

- Support, training and other services at different stages of the data lifecycle can be provided by many different parties, but they are easy to find, available in one place and continuous service activities.
- 3. Advanced data management support is available for:
 - A. data management planning,
 - B. collection of new data and finding existing data,
 - C. management of the intellectual property rights of data,
 - D. management of the data protection of data,
 - E. secure storage and transfer of data between research partners during research,
 - F. technical data management needs, such as data cleaning, conversion, analysis, programming, statistical expertise, visualisation, documentation, production of metadata, use of databases and other data management software and applications,
 - G. screening, evaluation and digital preservation of data,
 - H. data sharing and reuse.

B. LOCAL SUPPORT FOR DATA MANAGEMENT

The organisation provides local support that complements generic data management services for all stages of the data lifecycle and enables researchers and support service experts to specialise as research field, method or data type specific local support.

Minimum level:

- 1. The organisation has appointed and allocated resources for a person or persons to support data management at all stages of the data lifecycle,
- 2. Researchers and research support service personnel from different research levels will be offered the opportunity to specialise as part-time, volunteer, local support for researchers.

- 3. The organisation has data experts or a unit that is responsible for data management support,
- 4. Specialisation in part-time or full-time data support for researchers is supported by a merit model,
- 5. A career path has been created for specialising in data management for researchers.

C. TRAINING

Data management training is available in the organisation. Staff and students are encouraged to participate in the training.

Minimum level:

- 1. The organisation ensures that training in the basics of data management is available for everyone,
- 2. Basic skills in data management have been integrated into the degree programmes of degree students and doctoral candidates,
- 3. The organisation has incentives for training.

Optimal level:

- 4. Advanced, multiprofessional training in data management can be easily found and is available for different levels and fields of research and/or data types for each stage of the data lifecycle, such as
 - A. data management planning,
 - B. collection and production of new data,
 - C. discovery and reuse of existing data,
 - D. intellectual property and ownership issues,
 - E. management of data protection issues,
 - F. data processing and analysis,
 - G. visualisation and presentation of data,
 - H. data interoperability, quality assurance and documentation;
 - I. adding metadata and descriptions to data,
 - J. data storage,
 - K. digital data storage and
 - L. data sharing.

D. DATA MANAGEMENT PLANS

The organisation requires and supports research, development and innovation projects to create and maintain a data management plan throughout the data lifecycle.

Minimum level:

- 1. Research projects are required to draw up a data management plan,
- 2. The organisation supports, advises and trains researchers and students in drawing up data management plans.

Optimal level (a joint development project at national level):

- 3. The data management plan is easily updated and machine-readable,
- 4. The updated and machine-readable data management plan enables the appointment of roles in data management, the mapping of resource needs, the calculation of costs and the procurement or production of services for the project.

E. SERVICES FOR INTELLECTUAL PROPERTY RIGHTS AND AGREEMENTS

The organisation has built a researcher-driven process (link in Finnish) to take the intellectual property, contract and permit issues of research data into account in research projects.

Minimum level:

1. The organisation has an intellectual property and agreement process in which the ownership and access rights of data created in research projects, the management of sensitive data and division of responsibilities are agreed upon.

Optimal level:

- 2. The organisation ensures that the agreements, permits and access rights concerning data in research projects are appropriately described in the data management plan and the researcher is aware of the risks associated with them,
- The organisation has a certificate or agreement template, and when the researcher or organisation approves this, they undertake to use third party restricted availability data as described in the certificate or agreement template.

F. SERVICES FOR DATA PROTECTION AND INFORMATION SECURITY

In order to ensure data protection, the organisation has arranged support services, training and secure data collection, processing and storage infrastructure services for research projects.

Minimum level:

1. Research projects are offered support for data protection management, basic training and a secure data lifecycle infrastructure.

Optimal level:

 For those whose research or research support service includes continuous and large-scale collection, processing and/or curation of data subject to data protection, an advanced support service and additional training will be provided.

G. PERSISTENT IDENTIFIERS

The organisation assists researchers in obtaining <u>ORCiD</u> researcher identifiers and persistent identifiers of (meta)data.

Minimum level:

- 1. The organisation assists the researcher in the creation of the ORCID researcher identifier,
- 2. The organisation assists the researcher in obtaining a persistent identifier for (meta)data published in an open repository.

Optimal level:

- 3. If the organisation has a research information system, researchers are offered an easy way to acquire and link their published research outputs to the ORCiD researcher identifier,
- 4. The organisation has integrated a persistent identifier in its data catalogue for the easy linking of research data metadata.

H. PUBLICATION OF DATA

The organisation accumulates and maintains comprehensive and open metadata for research data, which may also be linked to research methods, publications and infrastructures, if the nature of the data makes this possible.

Minimum level:

- 1. The organisation has instructions that all research projects publish the metadata of the data at the latest in connection with the publication of the study primarily in their own data catalogue or in the Finnish Etsin data catalogue,
- 2. When referring to data, instructions are given to follow the reference instructions provided by the publication platform. For example, publisher regulations may also affect the way in which the reference is made.
- 3. The author of the data is agreed upon well in advance of the publication of the data (see section E).

- 4. The organisation has its own or shared data catalogue where all research projects produce administrative, structural and descriptive metadata, which are transferred from the catalogue to national and international portals,
- 5. The metadata maintained in the catalogue will be assigned a persistent identifier, if necessary, to enable reference to the data. External services recommended by the organisation must also provide a persistent identifier for the metadata.
- 6. To the extent that ownership, access rights and the nature of the data allow for it, actual research data (raw data, processed data and/or analysed data) are published with a persistent identifier either in the organisation's own data archive or in a general or sector-specific archive outside the organisation,
- 7. The organisation has an agreement template, and when the researcher or organisation approves this, they undertake to use non-open data as described in the agreement template.

I. DIGITAL PRESERVATION

The organisation ensures the possible digital preservation of research data by outlining the storage periods and locations of various data (immediately destroyed, retained for 5–15 years due to verification of research, retained for at least 25 years, permanently retained) and by providing advice and technical support in cooperation with other organisations if necessary.

Minimum level:

- 1. The organisation has instructions on minimum data storage periods and locations,
- 2. The organisation takes care of exporting valuable data to the digital preservation service.

Optimal level:

3. The organisation has a process by which data requiring digital preservation can be identified and exported to one or more national or international digital preservation services (frozen data).

2.5 PUBLICATIONS

The organisation promotes the culture of open access publishing by providing up-to-date services to ensure that all researchers/ experts have equal opportunities to openly publish the results of their research and development work regardless of organisation, field of research, funding base or career stage.

A. MONITORING THE COSTS OF OPENNESS

The organisation has an idea of the costs of openness and an understanding of how the open publication of the organisation is structured.

Minimum level:

- 1. Are the publication fees monitored?
- 2. If yes, can the following be determined about the publication fees?
 - A. paying organisation
 - B. year of payment
 - C. sum of the fee in euros (incl. whether this contains a FinElib discount)
 - D. publication DOI identifier
 - E. OA status: Hybrid or full OA magazine?
- 3. Other costs of open publishing, such as staff costs and maintenance costs of publication archives, are identified.

- 4. The above information is automatically obtained from the organisation's information systems.
- 5. Publication fee information is exported to VIRTA data collection.

- 6. The publication fee information is exported to the OpenAPC service.
- 7. The organisation has tools for monitoring the impact of openness.
- 8. The organisation has centralised funding for APC payments at the department/unit/faculty/organisation level (e.g. fund).

B. LOCAL SUPPORT FOR OPEN ACCESS PUBLICATION

The organisation creates open publication support services for researchers/experts either alone or in cooperation with other organisations.

Minimum level:

- 1. The organisation has open publication support services for researchers/experts.
- 2. Researchers/experts receive support for parallel storage.
- 3. The support has been implemented centrally (e.g. role email, service portal, ticket system).
- 4. The organisation collects customer feedback on open publishing services, and local support is developed based on this feedback.

Optimal level:

- 5. The parallel storage process is part of the publication data collection.
- 6. The organisation has experts familiar with open publication.
- 7. The organisation has a personnel resource for open publishing services that is dimensioned for its size.
- 8. Open publishing support services are based on the organisation's strategy.

C. OPEN ACCESS REPOSITORY

The organisation maintains a publication archive and/or a research data system, either alone or together with other organisations.

<u>Recommendations on Open Publication Technology (in Finnish)</u> include basic and optimal level recommendations for publication archives maintained by organisations.

D. PERSISTENT IDENTIFIERS

The organisation ensures the use of persistent identifiers.

Minimum level:

- 1. The share of ORCID identifiers in the organisation.
- 2. Share of publications with identifiers in the organisation.

Optimal level:

3. The DOI process is automated.

4. The organisation has integrations related to identifiers between different information systems (e.g. research information system, HR systems, etc.).

E. DIGITAL PRESERVATION

As a rule, the organisation's open publications are permanently available. Digital preservation and availability are taken into account in the design of the organisation's infrastructures, services and publication processes from the outset. Publications and their descriptive information are produced in standard technical formats. Suitable national and international services/service providers are used to guarantee digital preservation and availability.

NSDA digital preservation levels: <u>https://www.digitalpreserva-</u> tion.fi/specifications/ndsalevels (in Finnish)

Necessary specifications for the introduction of the national DP service: https://digitalpreservation.fi/specifications

F. PRODUCTION OF PUBLICATIONS

The organisation's own production of publications is supported, and it has sufficient advice and appropriately dimensioned publication services in relation to its publication volume. Publication production is open and licensed under open licences.

Minimum level:

- 1. Share of licensed own publications in the organisation.
- Services for doctoral candidates (at universities)
 Services related to permission to republish
- articles (doctoral dissertations)
- 4. Organisation of DOI/URN distribution
- 5. ISSN numbers
- 6. Copyright support
- 7. Support and training related to the selection of a publication channel

Optimal level:

- 8. Share of CC BY licensed own publications in the organisation.
- 9. Layout/web design support
- 10. Technical support for pdf/epub conversions
- 11. Technical support for various online publishing platforms
- 12. Support for setting up publication series
- 13. Publication archive, which also serves as the primary publication platform for publications
- 14. Customer feedback is collected on support for publication production in a manner that is suitable for the organisation, and the feedback is utilised.

G. USE OF OPEN PUBLICATIONS

The organisation uses open publications in teaching, research, expert work and studies. These are actively communicated to researchers, experts and teachers.

Minimum level:

- 1. Information about open publications and how to find them is communicated in the organisation.
- 2. Search engines and services focused on open materials are marketed.
- 3. Data experts are involved in the preparation of curricula in organisations providing teaching.

Optimal level:

- 4. Communication has been targeted to different fields of science and teaching.
- 5. The organisation is able to provide help and support for teachers, researchers and experts in finding and utilising open publications.
- 6. The organisation has indicators for measuring the use of open publications.

H. NEW FORMS, PRACTICES AND PLATFORMS FOR OPEN ACCESS PUBLISHING

The organisation monitors the development of open publication practices and formats as well as publication platforms nationally and internationally and, where possible, participates in their development.

Minimum level:

1. Publication methods, platforms and practices are communicated on and discussed with researchers and experts.

Optimal level:

- 2. The development of open publication methods and platforms will be monitored and taken part in.
- 3. The organisation supports the development of platforms or infrastructures by e.g.

I. OPEN THESES

Organisations have policies and guidelines for the open publication of theses and a platform for their publication.

Minimum level:

1. The share of open theses of all the organisation's theses.

Optimal level:

2. The share of licensed theses of open theses.

APPENDIX 1: CHECKLIST FOR RESPONSIBLE EVALUATION

The checklist for responsible evaluation is based on the national recommendation for responsible evaluation of researchers.

1. BUILDING THE EVALUATION PROCESS

- a. Has the organisation defined what to value in the evaluation (own strategy, visions, policies)?
- b. Are the objectives and criteria of the evaluation openly available to all parties?
- c. Are the objectives and criteria formulated so that they are appropriate for both the persons being assessed and the research community?
- d. Are the evaluation criteria and their possible emphasises clearly explained to the persons being evaluated?
- e. Have the selected criteria been consistently followed throughout the evaluation process?
- f. Have the phases and conclusions of the researcher evaluation and their justifications been documented?
- g. Have the evaluators been given clear instructions for submitting the material used for the evaluation (e.g. TENK CV)?
- h. Have the materials used in the evaluation been compiled so that they cover the issues to be assessed as comprehensively as possible and that fair comparisons can be made based on them?
- i. Do the subjects of the evaluation know what the material covers and that they have the right to check information concerning themself?
- j. Have the restrictions imposed by the materials and methods used been taken into account?
- k. When selecting the evaluators, has it been ensured that there is no conflict of interest between them and the researcher?
- I. Has the group of evaluators been selected so that it is sufficiently diverse?
- m. Do the evaluators understand that their own assumptions and opinions affect the evaluation?
- n. Have the guidelines for the evaluation been made known to the evaluators well in advance of the start of the evaluation?

o. Has it been ensured during the selection of criteria, methods, evaluation materials and experts that the selection is not discriminatory from the perspective of gender equality or non-discrimination?

2. EVALUATION OF RESEARCH

- a. How is scientific quality defined?
- b. Has the evaluation of scientific quality been carried out primarily by reading with the scientific content of the study?
- c. Have research outputs of different formats and languages been taken into account extensively in the evaluation?
- d. If research metrics are utilised in the overall evaluation, is it relevant to the scientific field of the researcher being assessed?
- e. Have the known constraints of the data used been disclosed?
- f. Have the data, analysis methods and results used to produce the publication metrics been as open and transparent as possible?
- g. Is it possible for the subject of the evaluation to check the data used as the basis for the analysis and the results of the analysis?
- h. Have differences in disciplines and multidisciplinary aspects been taken into account in the use of publication metrics?
- i. Have the publication metrics indicators used in the evaluation been selected so that they can meet the objectives of the evaluation?
- j. Have the results been reported with the accuracy of the indicator values relevant to the subject, methodology and data of the evaluation?
- k. Have non-applicable indicators been excluded from reporting?
- I. Have the opinions clearly indicated the weight of quantitative indicators in relation to both each other and content aspects in the overall evaluation?
- m. Have the researcher's activities to promote open access to research results been taken into account as part of the evaluation?
- n. Has the implementation of the ethical principles of research at all stages of the study been taken into account in the evaluation?

3. DIVERSITY OF A RESEARCHER'S TASKS

- a. Have the teaching and guidance tasks and the competence and merits accumulated in these been taken into account in the evaluation as an essential part of the researcher's work?
- b. Have the different opportunities for teaching and guidance tasks of researchers been taken into account in the evaluation?
- c. Has societal interaction as part of the researcher's duties been taken into account in the evaluation?
- d. When assessing societal impact and interaction, has their meaning been determined?
- e. Has it been determined on the basis of which data societal impact and interaction have been examined in the evaluation?
- f. Has it been determined how societal impact and interaction are emphasised in relation to the scientific quality of the researcher's research work and other tasks?
- g. Have the researcher's activities in research and other organisations been taken into account in the evaluation?
- h. Has the evaluation examined the researcher's input in different tasks and how significant the contribution has been in relation to the researcher's own work and the activities of the research community?
- i. Has the researcher been evaluated as a representative of their specific field of research in relation to the objectives of the evaluation?

4. THE RESEARCHER AS AN INVOLVED PARTY IN THE EVALUATION

- a. Has the researcher's self-evaluation been included in the evaluation by giving them the opportunity to present an idea of the objectives, significance and impact of their work?
- b. Has the evaluation been planned in a manner that allows the researcher to also benefit from it?
- c. Does the work done for the evaluation and/or the given feedback help the researcher to develop their work?

APPENDIX 2: AUTHORS

The recommendation was drafted by the <u>Working Group on</u> <u>Services Promoting an Open FAIR Culture</u> (PAFTE) put together by the Expert Panel on Culture of Open Scholarship, whose members included:

Ala-Mantila, Minna	CSC
Hilska-Heinänen, Katja	FINNISH ENVIRONMENT INSTITUTE
Jauhiainen, llmari	FEDERATION OF FINNISH LEARNED SOCIETIES
Juppo, Virpi	UNIVERSITY OF VAASA
Kiviluoto, Johanna	LAPPEENRANTA-LAHTI UNIVERSITY OF TECHNOLOGY
Koivula, Hanna	CSC
Kärki, Jussi	SATAKUNTA UNIVERSITY OF APPLIED SCIENCES
Laakso, Kati	AALTO UNIVERSITY; GEOLOGICAL SURVEY OF FINLAND
Lehtivuori, Heli	UNIVERSITY OF TAMPERE
Niemi, Laura	UNIVERSITY OF TURKU
Nokkala, Tiina	TURKU UNIVERSITY OF APPLIED SCIENCES
Nordling, Josefine	CSC
Olsbo, Pekka	UNIVERSITY OF OULU
Puuska, Hanna-Mari	CSC
Päällysaho, Seliina	SEINÄJOKI UNIVERSITY OF APPLIED SCIENCES
Pölönen, Janne	FEDERATION OF FINNISH LEARNED SOCIETIES
Pylvänäinen, Elina	FEDERATION OF FINNISH LEARNED SOCIETIES
Rantasaari, Jukka	UNIVERSITY OF TURKU – CHAIR
Salminen, Nina-Mari	NATURAL RESOURCES INSTITUTE FINLAND
Vuorinen, Marjut	FINNISH INSTITUTE FOR HEALTH AND WELFARE
Ylönen, Irene	UNIVERSITY OF JYVÄSKYLÄ



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