University of Twente

Research Evaluation Protocol

September 2021

Policy Statement

The University of Twente is committed to conducting and upholding high quality research. Therefore, the UT has research quality management processes in place and undertakes periodic assessments to continuously improve its research and impact. This protocol sets out the procedure and instructions for the quality assurance of research at the University of Twente, in accordance with and supplementing the national Strategy Evaluation Protocol (SEP) 2021-2027.

1. General approach research quality management

Main objectives of research evaluations

In the Netherlands, the boards of the universities, KNAW and NWO are responsible for the quality of the research at their institution. The periodic evaluation of research plays a key role in the quality assurance cycle. For the organisation of this evaluation, the University of Twente adheres to the Strategy Evaluation Protocol 2021-2027. As specified in this protocol, the main goal of this evaluation is to evaluate a research unit in light of its own aims and strategy. Every evaluation looks ahead (plans and strategies) and back (developments and results), with a focus on strategy, learning and improvement.

The three main criteria for evaluation are: research quality, societal relevance, and viability. Within the UT, strategies to realise societal impact are of special importance, and should reflect the Shaping2030 strategy, as well as the UT research strategy and the faculty research strategy. Research quality is a prerequisite for generating scientific and societal relevance. Four specific additional aspects are evaluated: open science, PhD policy and training, academic culture, and Human Resource policy. These four aspects should not be evaluated separately, but incorporated into the evaluation of the three main evaluation criteria.

In the evaluation the research unit reflects on its accomplishments and its strategy for the future. This includes a description of the position of the unit in its international field and by anticipating relevant developments in its environment. Therefore, in every evaluation a requirement is the use of a benchmark analysis which may be the partners in case of a joint (national) evaluation, or a chosen reference-unit or a set of reference units in a stand-alone evaluation. Such comparisons contribute to learning and improvement of the strategy of the unit. In the case of a stand-alone/UT-only evaluation, a benchmark, including an international work visit, with a comparable institution of similar size is required. If the unit that will be assessed aims to be a global player, global benchmarking is preferred. The benchmark should include at least a comparative evaluation of strategy and strategy execution processes. Quantitative comparisons are also possible and can be useful, also for the choice of the benchmark.

These research evaluations help to monitor and improve the quality of the research conducted by the research unit. Additionally, they provide accountability towards government and society. The boards of the universities may use the outcomes of the research evaluations for quality assurance purposes and institutional strategy development.

Research evaluation as an ongoing process
A major goal of the Strategy Evaluation Protocol is to stimulate a continuous dialogue within the university about quality, relevance and viability as part of an ongoing quality assurance cycle. All UT research is assessed at least once every six years, according to the national Strategic Evaluation Protocol (SEP). In specific cases, such as a significant change in the aims or strategy of a unit, or at the explicit request of the Faculty Board or Executive Board, a mid-term (three year) evaluation may be conducted.

Every faculty plans the evaluation of all of its research in one or more evaluations. The Executive Board is responsible for the overall scheduling in close consultation with the faculties. The aims and strategy of the research unit, which are fundamental to the evaluation procedure, are related to the faculty's multi-annual plan / research strategy. This is, in turn, related to the general (Shaping 2030) and research strategy of the University of Twente.

All research evaluations are an integral part of the university's quality assurance cycle, i.e., are discussed as part of the Planning & Evaluation cycle during regular annual meetings between the Executive Board and the Boards of the Faculties. The annual cycle is supported with a report of performance indicators. The report contains a set of standard indicators, and a tailored set of indicators to match the discipline(s) and strategy of the research unit (see also below). At important moments, for instance to prepare an evaluation or to evaluate the results of an evaluation, separate quality assurance meetings between the Executive Board and the faculty boards can take place. Together, the Planning & Evaluation cycle and the meetings between the Executive Board and Faculty Boards allow for a good dialogue about follow-up actions after an evaluation, and for the preparation of future evaluations.

2.   Research unit and evaluation procedure

Definition of the research unit

The Executive Board, in close consultation with the faculties determines the research units which will be evaluated. As the unit to be assessed has to bear primary responsibility for its own strategy and its execution, the unit should be a faculty or part of a faculty. If the unit is a part of a faculty, it can be either a disciplinary or a multi-disciplinary unit within a faculty. When a faculty is assessed as a whole, it is possible to distinguish a limited number (max. 3) of disciplinary programmes or thematic lines to be able to differentiate within the faculty.

In the governance structure of the University of Twente, research institutes and cross-faculty research themes are not independent governance units. Therefore, they cannot be evaluated according to the SEP. Their research should be included in the faculty-based research unit evaluations. The faculty-based evaluations will assess the embedding of the faculty in the research institutes and the cross-faculty research themes. The self-evaluation has to provide the information to conduct the assessment. In the future, separate additional evaluations of research institutes or

UT-wide research themes can be considered, according to a to-be-determined protocol that is not related to SEP and may use other criteria that relate better to the purpose and added value of institutes and themes.

Organisation of research evaluations
A faculty or discipline can be assessed in a broader (e.g., national) evaluation context, or 'stand-alone'. Wherever desirable, the evaluation is organised jointly as a nation-wide evaluation of a research field. Whether external evaluations are organised locally or nationally must be decided well in advance, since this partly depends on the outcome of national consultation. Given the higher complexity of interuniversity evaluations, which have to be aligned with both the SEP and participating universities' protocols, it is highly desirable that the choice of either local or national evaluation is known at least 2 years prior to the external evaluation. In case of a national evaluation, a common set of agreements (sometimes referred to as 'discipline protocol') is needed to prepare the evaluation.

All costs of SEP evaluations will be covered by the faculty. In the event of national or joint evaluations, the faculty will ensure that the costs are reasonably shared between the universities.

The EB will be advised on the matter of research evaluations by the University committee on research (UC-Oz) and may include SEP evaluations and topics such as: research quality, rankings, or large domain related plans such as the sector plans. The UC-Oz, or a platform associated with the UC-OZ, can be consulted, for example, about the planning, the units to be assessed, the plans for specific evaluations, the members of the evaluation committee, the self-evaluation, the evaluation report, the administrative response to the report, the follow up, and about quality assurance procedures in general.

Contents of the self-evaluation including narratives, case studies and indicators
Suggestions for the contents of the self-evaluation can be found in SEP Appendix D. The self-evaluation should include one or more case studies to highlight what it considers to be its most distinctive and societally relevant accomplishment(s). They will be made publicly available after the evaluation. The research unit addresses accomplishments and strategies on the four aspects that are also important for SEP and the UT: open science, PhD policy and training, academic culture and Human Resources policy. Each of the four specific aspects should be described separately followed by how these aspects are connected to research quality, societal relevance and viability. It is advisable to not only refer to institutional policies, but to describe the way they have been implemented for the research unit. If 'underlying research programmes' within a research unit are evaluated, the self-evaluation will include information about the underlying programmes (disciplines or themes within the faculty).

There are a few additional items specific to the UT. Research units are advised to include their embedding in the UT and links with other bodies, in particular TGS and the research institutes in their self-evaluation. They may also include their regional and (inter)national embedding in, for instance, 4TU and ECIU. Research units are advised to combine their identified Strengths, Weaknesses, Opportunities, and Threats (SWOT) in a confrontation matrix as input for the development of strategy. For instance: how can strengths be used to cash in on opportunities, and to mitigate threats. The SWOT analysis in the self-evaluation is also based on the benchmark with another institute.

The achievements in the past six-year period are documented in the shape of a narrative argument, wherever possible supported with qualitative and quantitative factual evidence. Research units are advised to include in the self-evaluation (a) tailored and (b) standard/basic factual evidence. Evidence should ideally be collected on an annual basis and used in the annual dialogues between the Executive Board and the faculties (see above).

a - Tailored metrics to support the narrative
UT policy aims at the fair and balanced use of tailored metrics to support the narratives provided in the text of the self-evaluation and case studies. These tailored metrics relate to SEP table E1: Categories of evidence for research quality and relevance to society. In the case of a national or joint evaluation, different universities can use different metrics, tailored to their own strategies. However, where they use the same metrics, they should use a common and clear definition. It is advisable to register data on the chosen metrics well in advance in databases such as the research information system. The use of bibliometrics to analyse and compare citation-impact (for research quality) and societal impact (for relevance to society), where useful to support the narrative, can be fair and not in opposition to norms such as the DORA declaration, especially if article-based and normalised metrics are used.

b - Standard/basic factual evidence as background information
Next to the tailored metrics, self-evaluation reports preferably also include comparable basic data (the SEP-tables on input, funding and products) based on standard definitions. This evidence can be regarded as background information. In the case of a national or joint evaluation, common definitions should be used. The UT research support services and the UT information systems can be useful in producing the tables. Although productivity, i.e., outputs per unit of input, is no longer a separate evaluation criterion, the quality of research units varying in size cannot be compared fairly without taking into account the productivity of a unit. Although not explicitly included in the SEP formats, research units are advised to include summary tables of outputs to support members of evaluation committees in making sense of the scope of the activities of the unit.

Appendices:

A.   Schedule/planning of UT research evaluations 2021-2030
B.   Overview of tasks and responsibilities in research evaluation processes
C.   Strategy Evaluation Protocol 2021-2027