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Factsheet 3

EXTENDED outcome evaluation 2020-2024



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This factsheet describes the main themes and the procedure for the EXTENDED outcome evaluation for the Programme Agreement period 2020–2024: the effects of restoration measures in small watercourses are to be investigated using six of the ten indicator sets from the STANDARD outcome evaluation.

3.1 Main themes and indicators

In parallel with and supplementing the STANDARD outcome evaluation, the EXTENDED outcome evaluation makes it possible to answer specific questions relating to restoration practice (Factsheet 1). Between 2020 and 2024, the EXTENDED outcome evaluation will focus on two themes which were identified by the FOEN and Eawag over a number of workshops from 2016 to 2018 involving the three advisory groups participating in the development of the framework and other stakeholders (Box 3.1; Factsheet 7) – improving understanding of the effects of restoration measures in small watercourses and the development of effects over time, considering indicators used in the STANDARD outcome evaluation. A sufficiently large sample of suitable small watercourse restoration projects already implemented is to be investigated (“after” survey). Six indicator sets from the STANDARD outcome evaluation, for which sampling can be carried out on small watercourses, will be determined: Habitat diversity (Set 1), Temperature (Set 4), Macrophytes (Set 5), Macroinvertebrates (Set 6), Fish (Set 7) and Riparian vegetation (Set 8). The results from the restored reaches will be compared with control reaches.

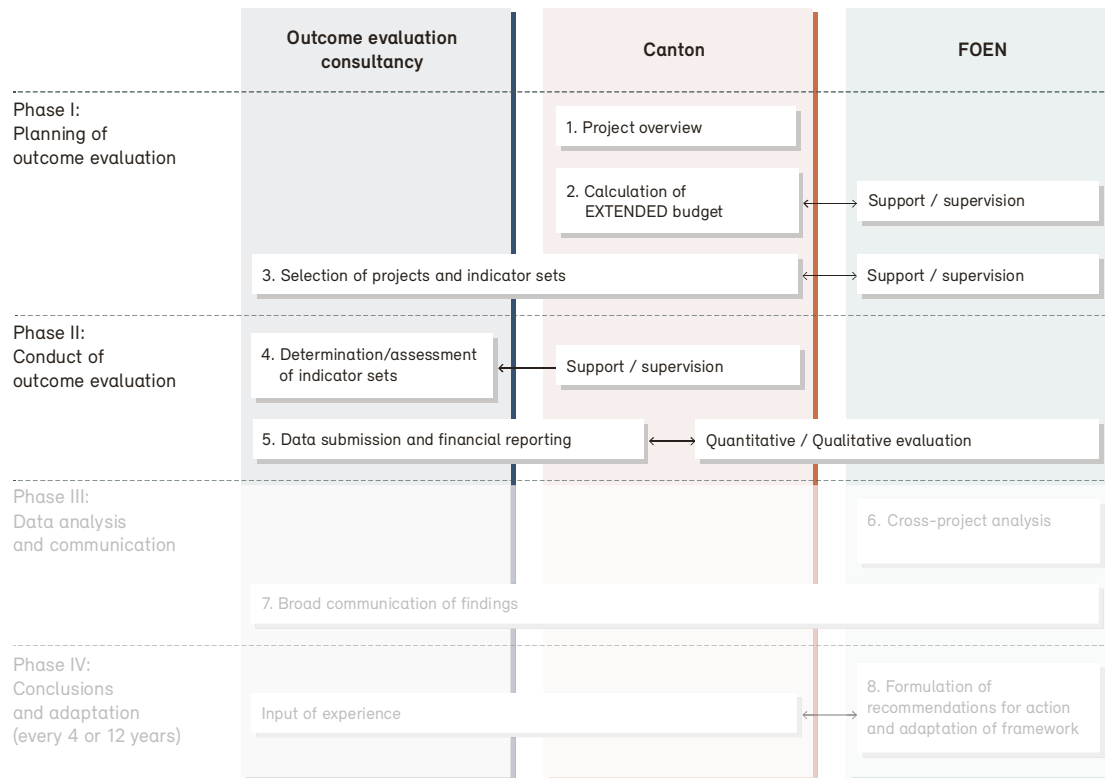
Box 3.1: The two main themes of the EXTENDED outcome evaluation 2020–2024

<p>1. Improving understanding of the effects of restoration measures in small watercourses</p> <p>Small streams make up a large proportion of Switzerland’s river network and are highly diverse in terms of morphology and biology. They are under considerable pressure from human activities, and while they are often chosen for restoration projects, they are rarely subject to comprehensive outcome evaluation. The EXTENDED outcome evaluation will investigate to what extent observed effects depend on factors such as restored length, shading, fragmentation or project age.</p>	<p>2. Looking to the future of STANDARD</p> <p>The EXTENDED outcome evaluation involving small watercourses is also to be used to learn as much as possible for the STANDARD outcome evaluation. This is to be achieved, firstly, by the use and detailed analysis of the same indicators. Secondly, the inclusion of older projects, completed some years ago, will provide a “time-lapse” view of how effects develop over time.</p>
<p>1) Improving understanding of the effects of restoration measures in small watercourses</p> <p>Small watercourses:</p> <ul style="list-style-type: none"> • make up a large proportion of the network • are highly diverse • are under considerable pressure • are often chosen for restoration projects • are rarely subject to outcome evaluation 	<p>2) Looking to the future of STANDARD</p> <ul style="list-style-type: none"> • Inclusion of older projects (e.g. dating back 4–12 years) • After-only comparison (incl. control reach) • Consideration of all indicator sets for small projects, plus Temperature • Extended analysis of the indicators used

3.2 Procedure and organisation

Like the STANDARD outcome evaluation, the EXTENDED outcome evaluation also involves two phases and five steps (Fig. 3.1), the timing of which is linked to the Programme Agreement (PA) negotiations. Different entities are responsible: the cantons and the contracted consultancies are responsible for the planning and execution of the project-specific outcome evaluations (Phases I and II, or Steps 1–5). The FOEN has primary responsibility for cross-project data analysis and communication, and for modifications to the overall framework (Factsheet 4). The five steps are described in detail in the following sections and in other factsheets. Background information and conceptual foundations are presented in Factsheet 7.

Figure 3.1: The five steps of the EXTENDED outcome evaluation. The higher-level steps 6–8 are explained in Factsheet 4.



Phase I: Planning of the EXTENDED outcome evaluation 2020–2024

Step 1: Project overview

The FOEN sent the two main themes and the requirements for suitable projects to the cantons prior to the PA negotiations for 2020–2024, including information as to which indicators are to be determined.

Step 2: Calculation of the EXTENDED budget / Step 3: Selection of projects

During the PA negotiations, the FOEN discussed with the cantons whether there were suitable projects within the canton and for how many of the projects the canton was prepared to conduct an EXTENDED outcome evaluation. Possible project names were recorded in the minutes and corresponding funding (based on rough cost estimates) was reserved under the appropriate performance indicator.

Phase II: Conduct of the EXTENDED outcome evaluation 2020–2024

Step 4: Determination and assessment of indicator sets

The EXTENDED outcome evaluation is to be conducted on a sufficiently large sample of small watercourse restoration projects. The reaches are to have been restored 4–12 years earlier, which corresponds to the timing of the two “after” surveys from STANDARD (Factsheet 2). For each restored reach, a control reach is sought. With regard to structure and type of watercourse, this should have characteristics comparable to those of the restored reach prior to restoration, and it should ideally be situated in the same catchment as the restored reach.

In the restored and control reaches, all the indicator sets from the STANDARD outcome evaluation which are suitable for small watercourses are to be determined – i.e. Habitat diversity (Set 1), Temperature (Set 4), Macrophytes (Set 5; if present), Macroinvertebrates (Set 6), Fish (Set 7; if present) and Riparian vegetation (Set 8). Surveys are to be conducted at the appropriate times (Factsheet 8). The project-specific analysis and assessment of the indicator sets is to be carried out by the project managers in accordance with the requirements for the STANDARD outcome evaluation.

Step 5: Data submission and financial reporting

After quality control by the canton, the data is forwarded to the FOEN (wiko_revit@bafu.admin.ch). The relevant procedure is described in Factsheets 5 and 6.

3.3 EXTENDED outcome evaluation from 2025

Sufficiently in advance of the next PA period, the FOEN will discuss possible future questions with the cantons and researchers. These will be addressed on the basis of suitable projects already implemented or planned. The procedure is the same as that described above for the PA period 2020–2024.

List of modifications

Relevant changes are marked in **green**.

Date (mm/yy)	Version	Change	Responsibility
4/2020	1.02	Correction of spelling errors, minor terminological modifications	Eawag