

Minimum Water Runoff

German Delegation

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Introduction

- The new Water Resources Act of the Federal Republic regulates in Chapter 2, Section 2, § 33, the minimum water flow.
- It says "the impounding a surface water or the removal or diversion of water from a surface water is only allowed to receive if the runoff is required for the water body and other related waters to the goals of § 6, paragraph 1 and to comply with § § 27-31 (minimum flow). “

Introduction

- The revision of § 33 of the German Water Resources Act takes into account the importance of the minimum flow for the ecological functioning of a water body.
- With the minimum water flow is handled differently in the individual federal states.
- Besides establishing the Water Management Act of the Federal Republic, there is still no help, which is generally valid and accepted.

Methodology

- The methods used in practice are often based on statistical parameters hydro-graphic-type, simple procedures or habitat simulation models.
- In the formulas and limits mainly the following parameters are considered: the average middle-and low-flow (eg, MNQ, $1 / 3$ MNQ), minimum depths (eg in dependence of the riverine zone or biocoenotic region), average flow rate, below outflows (percentile, duration curve).

Problems and obstacles

- Minimum flows are extremely complex water-economic variables.
- You need both aquatic typical factors and external factors into account.
- The determination of the minimum required outflow through a universally applicable formula alone is not possible.

Thank you for your attention!