# PLANNING-ORIENTATED SUSTAINABILITY ASSESSMENT (POSAF)

POSAF was developed in 2013 and facilitates communication and reflection between planners, and stakeholders and users, in order to establish consensus on water-related problems. The key steps are participative definition of alternatives, technical feasibility study, participative criteria development, and analysis of trade-offs. The concept underlying the framework is the need to redefine sustainability for each planning scenario. The tool produces weighted criteria that reflect stakeholder inputs. The current version of the framework has been informed by preliminary results from its partial implementation in five countries. It has only been fully applied once, in Mexico, where it was used to inform the choice of wastewater technology. The cost of the framework application is unknown.

## GENERAL DESCRIPTION

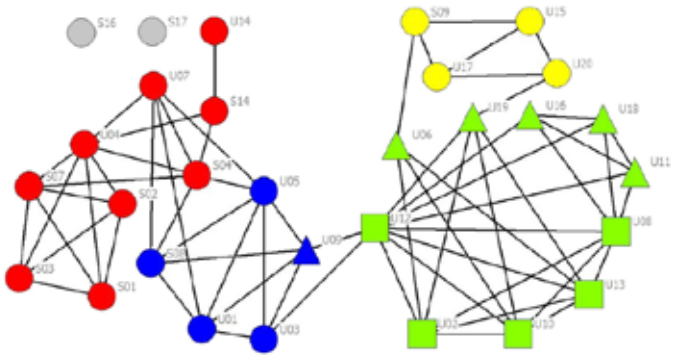
**Target**: WASH planners.

**Objective**: To make stakeholder participation in sustainability assessments more consequential in order to facilitate sustainable technological choices.

**Areas**: Environment, cost and benefits, user issues, institutional issues.

**Indicators**: Environment, cost and benefits, user issues, institutional issues; the number of indicators is variable, depending on the context.

**Methodology**: Participatory processes are used to analyse different planning scenarios. Following a technical feasibility study further participatory assessment is used to analyse trade-offs of the different scenarios and create quantitative criteria and weighting used for assessing future plans.



**Outputs**: Weighted criteria are produced through the process. In addition a visualisation of the relationships between each stakeholder is created through a complex statistical process. In the graphic shown, the nodes represent respondents, the colours represent their responses grouped through a qualitative process. The node shapes and lines reflect statistical relationships between the individual responses for each user.

**Tool format and language**: PDF; English.

**Citation**: Starkl, M., Brunner, N. Lopez, E., Martinez-Ruiz, J. (2013). "A planning-oriented sustainability assessment framework for peri-urban water management in developing countries." Water Research 47(1).

## IMPACT AND FINDINGS

PSOAF has been partially implemented in five countries (i.e. Argentina, China, India, Indonesia, and Nepal). Full scale application has only occurred in Mexico. It has only been applied on the communal scale and has involved only a few case studies. It needs still to be tested in different sectors, for different levels of government.

| Strengths | Limitations |
|---|---|
| Participative process including local stakeholders<br><br>Flexible framework able to draw on a variety of methods to adapt to context | Implementation requires adaptation of the framework to the local context (e.g. selection of adequate indicators)<br><br>Process requires trained specialists to facilitate groups for data collection and conduct analysis<br><br>Guidelines explaining process are very unclear and target an academic audience |