



EFORWOOD
Sustainability Impact Assessment
of the Forestry - Wood Chain



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EFORWOOD

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1. Introduction

1.1 Objective of tool

The purpose of tool existence is to support decision makers in the sustainability management process. The tool should be constructed in a sequenced steps way that can be described as follows:

Outputs from a single previous step are inputs for a next single step of the tool after they have been processed under analysis.

1.2 User of tool

Ambition while creating the tool is that it will be used by industry, community and policy makers.

1.3 Limitation of tool

The tool is going to indicate problematic area within forest-based industries concerning preserving and securing sustainability as well as fields with possibility for improvements. Those areas and fields will be determined by and related to current pattern of customer behaviour as well as future expectations.

The tool by itself will not create guide-lines for achieving sustainability goals for the particular industry.

The tool is expected to be a *qualitative* tool in order to support quantitative ToSIA.

Marketing strategy might be an extraordinary and complementary part of the tool that can be used as guide-lines for further active steps by industry in achieving sustainability goals.

2 State of the art within the field of qualitative methodologies and their structures

2.1 Introduction

The *qualitative tool or method* is often related to the social investigation in comparison to quantitative research. The qualitative method varies from quantitative research in many terms. Quoting the Wikipedia – free encyclopedia:

- “First, sampling is typically not random but is purposive. That is, cases are chosen based on the way that they typify or do not typify certain characteristics or participate in a certain class.
- Secondly, the role of the researcher is key. Researchers must reflect on their role in the research process and make this clear in the analysis.
- Thirdly, data analysis differs considerably.”

There are a huge number of qualitative or semi-qualitative methods that are commonly used by researchers, policy makers, industry stakeholders and experts in

order to identify current conditions as well as future trends on markets. This is a way to generate information that can be later analyzed and used while strategic decisions must be taken.

2.2 Study carried out

Partners carried out literature studies in order to identify existing qualitative and semi-qualitative methods as well as tools. The goal of this study was to investigate if there is any tool or method which can be directly implemented as Qualitative ToSIA. Gathered results have been discussed from the ToSIA requirements perspective and evaluated.

Following methods have been scanned:

- Average Benefit Incidence Analysis
- Behavioral Analysis
- Marginal Incidence Analysis
- Behavioral Benefit Incidence Analysis
- Demand Analysis
- Supply Analysis
- Direct Impact analysis
- General Equilibrium Analysis including tools: Social Accounting Matrices, Input-Output Models and Computable general Equilibrium models
- Household models
- Monitoring and Evaluation
- Partial Equilibrium Analysis including Multi-market models, and reduced-form estimations
- Participatory Monitoring and Evaluation
- Scenario Analysis
- Social Capital Assessment Tool
- Social Impact Assessment
- Social Risk Assessment
- East of England Sustainability Toolkit
- Methods referring to social preferences such as: Dialogue Method, Policy Exercises, Mutual Learning Method, Delphi Method

All methods and tools mentioned above have different purposes and objectives of use. Results achieved using them vary much in their character and usability. During discussion regarding methods we raised questions concerning complexity of methods, ease of implementing, format of expected result, and adjustment requirements. We have also analyzed resources need. After discussion, decision has been taken that none of above mentioned methods on its own could be used to fully cover the needs and scope for a Qualitative ToSIA tool.

This conclusion created a consequence of developing own Qualitative ToSIA that might be a complementary tool for Quantitative ToSIA while developing sustainability strategies by forest based industries.

3 Methodology and structure for qualitative SIA process tool

3.1 Methodology

Qualitative SIA tool should be seen as a *process* built in a sequence way as follows:

1. Identify consumers/customers current behavior patterns, current demands and current expectations. This step is based on traditional qualitative method build on questionnaire and focus groups.
2. Evaluate result in relation to the entire sustainability spectrum in the matter of *importance for customers* and in the matter of *impact grade* on sustainability aspects. This step converts qualitative result in semi-quantitative result.
3. Create matrix-chart where “hot spots” can be recognized in four categories:
 - a) high impact and low importance
 - b) high impact and high importance
 - c) low impact and low importance
 - d) low impact and high importance
4. Analyze hot spots as **S**trengths and **W**eaknesses of particular company or sector. This analysis should be carried out in accordance to the principle: if hot spots are met by company, they are Strengths, if they are not met so they are Weaknesses. Since each of sustainability pillars is connected by its specific matrix with hot spots, so we can analyze S and W separately in relation to relevant pillar.
5. Using simplify MA method create 2nd matrix with future scenarios components and their configurations that will be used in scenario description.

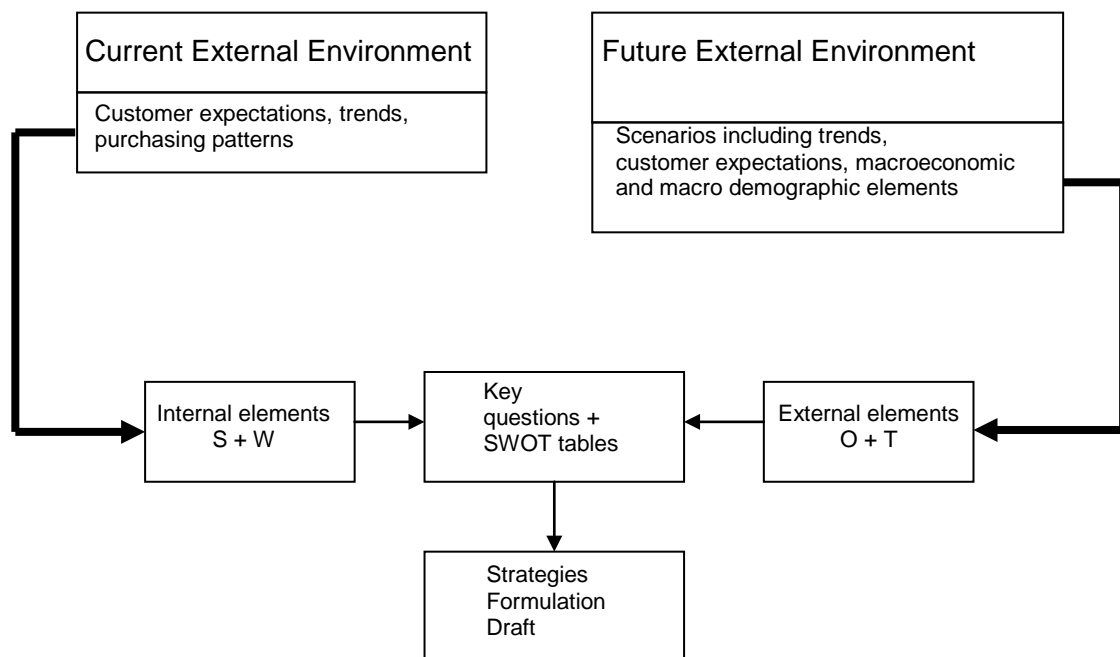
The simplicity of MA method is mostly focused on drastically limited number of Components and their Configurations. This limitation was necessary in order to enable manually running the tool. In addition, users of Qualitative ToSIA did not express request for very sophisticated and IT based tool. The third reason was related to an expected result of MA that should be of guidelines character enabling creating restricted number of scenarios.

6. Create scenarios, which should contain variables of customers/consumers future expectations, future behaviour and future demands, general and specific relevant components.
7. Analyze all configurations/components in Scenario Tables as future **O**pportunities and **T**hreats from the sustainability pillars perspective in respective scenario.

8. Create **SWOT** matrix for analysis in accordance with SWOT methodology principles concerning key objectives

9. Identify necessary changes that should be implemented within *current S* and *W* in order to enable meeting *future T* and taking advantages of *future O*. Necessary changes that should be implemented are underpins for innovation strategies of pro-active character.

Figure below presents schema of tool process model.



3.2 Structure

Qualitative ToSIA as a process tool should be constructed of sub-tools that are used in sequences along the process steps. Each of sub-tools is adjusted for related step as follows:

For step 1 – questionnaire and focus groups. See D 5.2.3

For step 2 – evaluation table. See D 5.2.4

For step 3 – excel calculation tool. See D 5.2.4

For step 4 – Strengths and Weaknesses extracted. See PD 5.3.2

For step 5 – Streamlined MA table with components and their configurations. See D5.3.1

For step 6 – scenario description. See PD 5.3.2

For step 7 – evaluation tables of O and T in Scenarios. See PD 5.3.2

For step 8 – SWOT focus questions and related matrix. See PD 5.3.2

For step 9 – Strategies of pro-active character. See PD 5.3.2

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