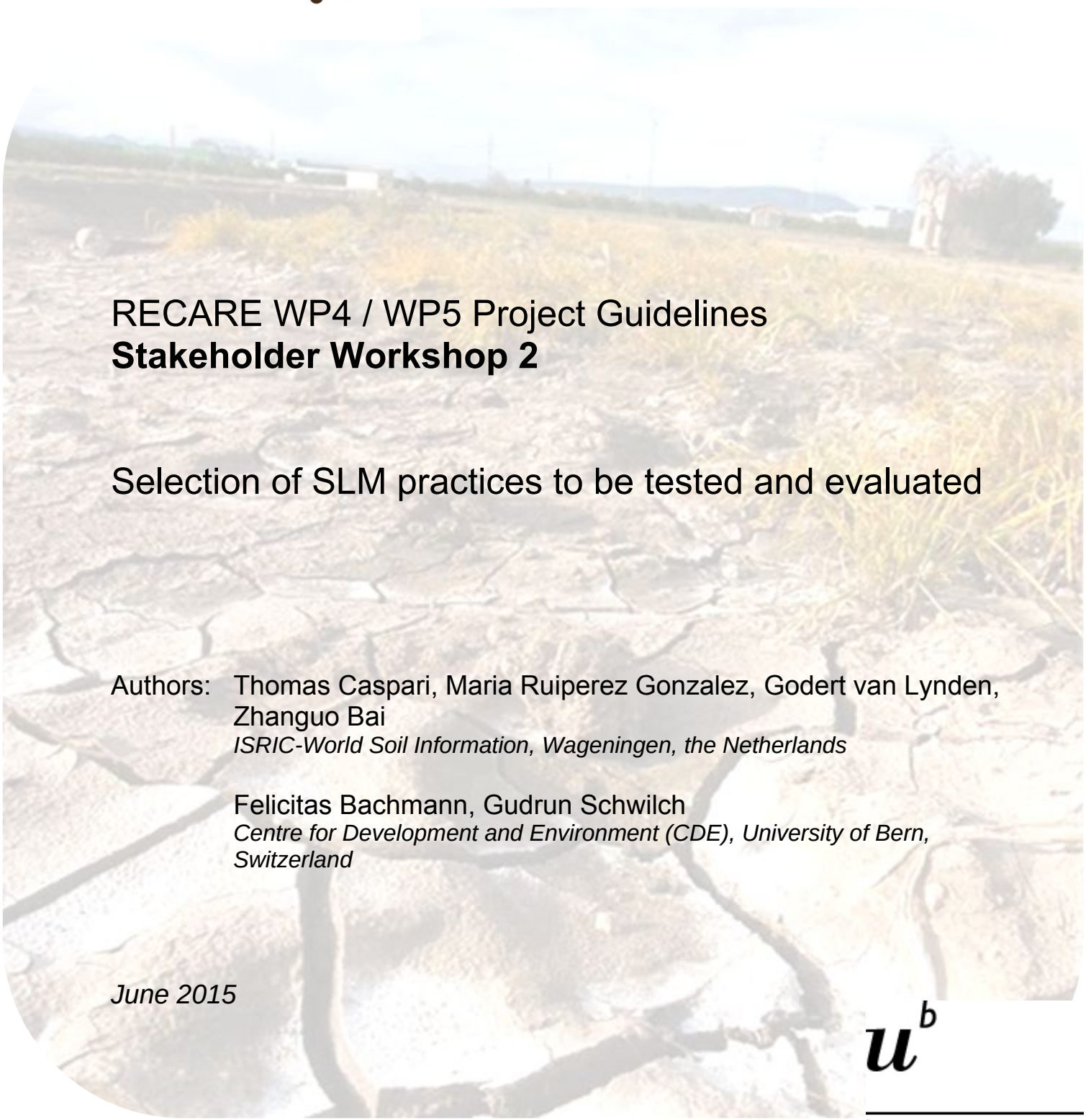
RECARE
Preventing and Remediating degradation of soils in Europe through Land Care



RECARE WP4 / WP5 Project Guidelines
Stakeholder Workshop 2

Selection of SLM practices to be tested and evaluated

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Foreword

The main purpose of this document is to facilitate the 2nd series of RECARE stakeholder workshops at the 17 case study sites. It directly relates to Task 5.4: “Selection of measures to be tested and evaluated in WP6 and WP7”.

This guideline is based on a methodology developed by the Centre for Development and Environment (CDE), University of Bern, Switzerland, as part of the EU FP6 project DESIRE (http://www.desire-project.eu).

The corresponding original DESIRE guideline is available at https://www.wocat.net/fileadmin/user_upload/documents/DESIRE/GuidelinesPart3Selection.pdf and has been modified in a collaboration between CDE and ISRIC-World Soil Information (Wageningen, the Netherlands) to suit the needs of the EU FP7 project RECARE (http://www.recare-project.eu).

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Introduction

Stakeholder involvement in RECARE

The integrated, trans-disciplinary approach of the RECARE project aims at initiating a process of co-production of knowledge and joint learning between relevant stakeholders from the local to the (sub-) national level. Thus, in each case study site a range of different stakeholders - from land users, civil society organisations, local authorities to industry and government representatives - will actively be engaged in the process.

Two major categories of stakeholders are being distinguished in RECARE:

1. **local stakeholders** (land users, representatives of local authorities, local NGOs, etc.) with site specific knowledge and experience who live in the specific rural environment (local participants); local stakeholders know best the characteristics of their land and the way to work it; and
2. **external stakeholders**, i.e. researchers, consultants etc. working in rural environments (external participants), with different degrees of professional expertise on soil-related issues, and able to suggest alternative techniques and evaluate their results. This means, the group is composed of researchers, project staff and representatives of the local community (land users, local authorities). All members of the group have experience in and knowledge about the specific rural environment.

The **WP4 Guidelines for Stakeholder platforms and learning processes** contain comprehensive information on relevant activities for stakeholder involvement/ interaction, and should be read prior to this document.

For a flowchart and indicative timeline of stakeholder involvement in RECARE, see Figure 1. We encourage you to make good use of the online RECARE stakeholder platforms at http://recare-hub.eu/stakeholder-platforms

Stakeholder Workshops

At the basis of the transdisciplinary approach of the RECARE project are a series of participatory stakeholder workshops to be carried out in all 17 case study areas. They are:

- Stakeholder workshop 1: Identification of current / potential Sustainable Land Management (SLM) practices
- Stakeholder workshop 2: Selection of SLM practices to be tested
- Stakeholder workshop 3: Valuation of ecosystem services
- Stakeholder workshop 4: Evaluation of SLM practices

The workshops are a cornerstone of stakeholder participation and aim at enabling transdisciplinary learning processes throughout the project, i.e. learning processes between scientific and non-scientific actors. Thus, the workshops provide opportunities to initiate, promote and deepen a mutual learning process between the researchers and a range of relevant stakeholders (e.g. land managers, food producers, developers, industry, regulators, advisory services, authorities, experts) that have some kind of interest in the topic of soil threats in the case study sites. Each of the stakeholders - from science, practice or policy making - has his/her own perspective and will contribute to the intended dialogue and process of knowledge

exchange and learning with his/her own expertise and experience (Schwilch et al., 2009[1]). Given that the knowledge contributed by scientific and non-scientific actors is valued equally in this process, and that local and scientific knowledge can be integrated to some extent, it is expected, that more sustainable solutions can be identified and implemented in regard to the prevailing soil threats in the case studies. Workshop participants are expected to engage in a dialogue by sharing their knowledge and experience in regard to the soil threats, and by contributing to a joint reflection, decision-making and evaluation process in regard to mitigation and remediation practices.

Stakeholder Workshop 2: Objectives

In each of the 17 study sites of the RECARE Project a stakeholder workshop on 'Selection of SLM practices to be tested and evaluated' will be conducted (Figure 1). The selection is based on a process of evaluating and scoring different Sustainable Land Management (SLM) practices which meet the specific conditions of a given local context.

The overall **aim is to select promising (existing and potential) practices for soil conservation to be test-implemented in the selected study site as part of RECARE WP6 and WP7.** Specific **objectives** of the workshops are:

1. To jointly select 1-2 SLM practices to be implemented / field-tested in the selected study site; and
2. To strengthen trust and collaboration among concerned stakeholders.

Contents

The **contents of the workshop** can be summarised as:

- Identification of SLM practices (from the WOCAT database) for the local context.
- Identification of relevant criteria to evaluate those practices, and creating a hierarchy among these criteria ("ranking")
- To assess for each SLM practice, to which extent it fulfils the different criteria identified ("scoring").
- Analysis and prioritizing of SLM practices. Decision on 1-2 practices to be test-implemented.
- Optional: Embedding the practices into the overall strategy.

Methodology

Like in Stakeholder Workshop 1, the methodology is **based on participatory principles**. The moderator guides the group through a series of consecutive steps that assist the stakeholders to voice and exchange their ideas on which SLM practices are most promising to be implemented at their site.

[1] Appraising and selecting conservation measures to mitigate desertification and land degradation based on stakeholder participation and global best practices. Land Degrad. Develop. 20: 308-326 (2009); http://dx.doi.org/10.1002/ldr.920

This **process is software-assisted**, i.e. Microsoft Excel is used to capture the decisions made during the various workshop elements, and to illustrate the results as the basis for negotiation and decision-making. Preference was given to Excel over the Facilitator software[2] used in the DESIRE project. This is because we think moderators as well as participants tend to be more familiar with the software, and it is more flexible as it allows for quick re-calculation of workshop steps as part of the iterative process.

Duration

The **suggested duration of a stakeholder workshop is 1 day**. This means that this task will be performed in 1 stakeholder group including both internal as well as external stakeholders. Experience shows that it is much easier to create a relaxed and trustful working atmosphere if the **workshop takes place in the community itself**, where local participants feel at home.

Reporting

The moderators and the research team of the study site share the responsibility for **documenting the workshop results** and writing a workshop report. They agree among themselves who is going to document which part. Please note that the results of Stakeholder Workshop 2 will provide an important input for WP6 and WP7. Therefore a good documentation is important. A summary report has to be written in English and submitted to WP5 (Godert van Lynden, godert.vanlynden@wur.nl). A format for the English summary report is provided in Annex 4.

As a moderator, be aware that **moderating stakeholder workshop 2 is a responsible task**, as the decision that will be taken in the course of the workshop:

- directly concerns the reality of stakeholders living in the study site;
- is an important decision for the further course of the RECARE project.

Requirements for moderators

As a moderator of the 2nd RECARE stakeholder workshop you should meet the following requirements:

- to be familiar with moderation techniques and participatory methods; this includes familiarity with the contents of this guideline;
- to have expert knowledge on the prevention, remediation and restoration measures actually and potentially applied in your case study site area;
- to have good knowledge of the study site and be familiar with local conditions (socio-cultural, bio-physical, land use, land degradation and conservation, etc.);
- to have a trustful relationship with involved stakeholder groups;
- to have communication skills and speak the local language of the study site;
- to have didactical skills; and
- to have conflict management skills.

[2] http://facilitator.sourceforge.net/

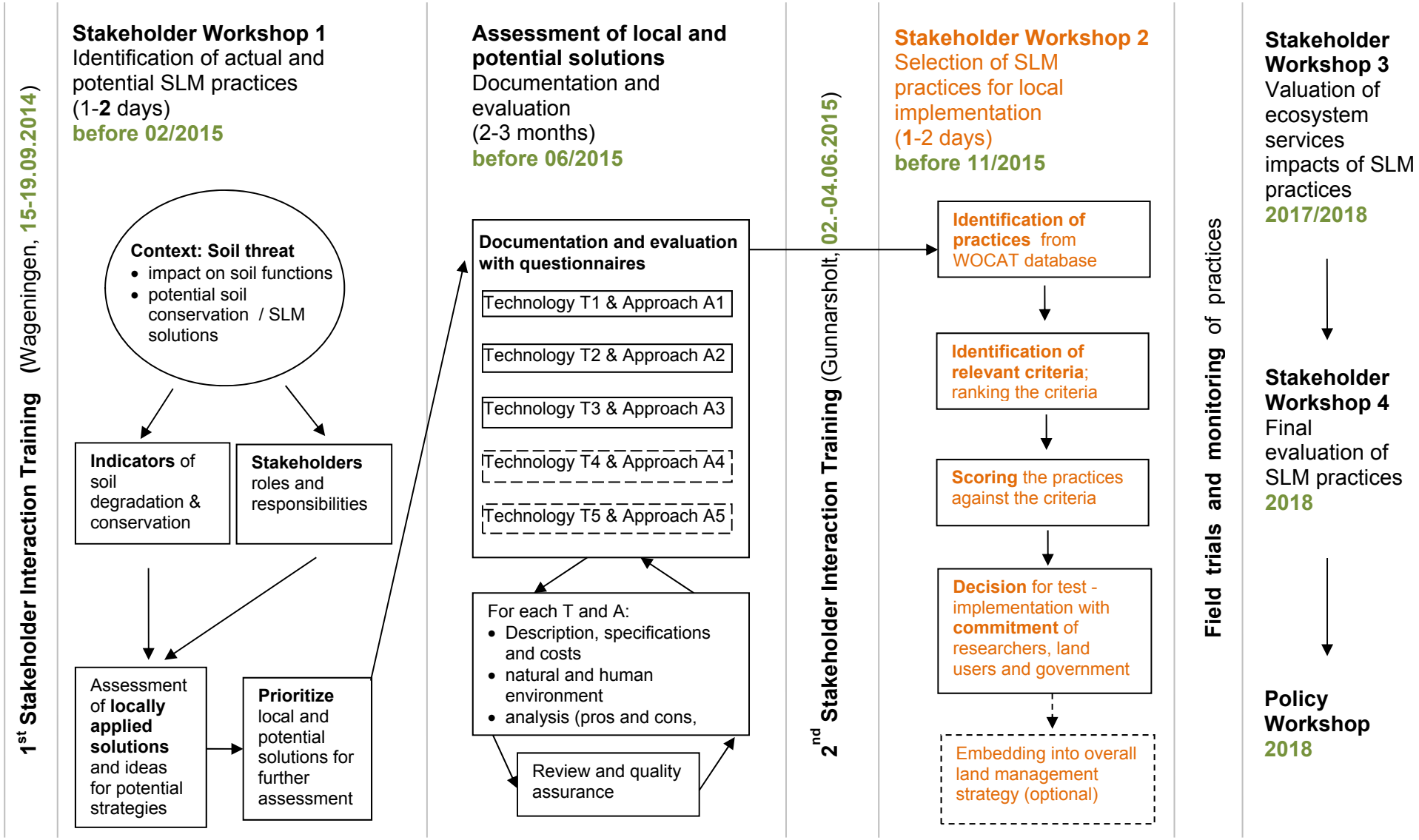


Figure 1: Overview scheme of stakeholder involvement in the RECARE project (orange: contents of this guideline)

About this guideline

The present guideline is a working instrument for use in moderating the second RECARE stakeholder workshop. It is designed to support the case study site moderators in guiding the processes of mutual reflection and exchange by workshop participants. At the same time it is a baseline document to be used in the training of moderators.

The guideline suggests a basic structure for the workshops and a series of consecutive steps that will help to reach the workshop objectives as described above. It mainly deals with the technical steps that have to be performed to reach a group decision, rather than looking into content-specific issues.

In comparison to the first RECARE Guideline, the **methodology applied is less flexible** and there is less room for moderators to spontaneously apply changes in the process. However, confident moderators are encouraged to adjust the methodology to their particular needs and to include their experience as part of the workshop documentation.

The 2nd stakeholder workshop addresses **the same target groups as the 1st workshop**:

- local stakeholders (land users, representatives of local authorities, local NGOs etc.); and
- external stakeholders, i.e. researchers and development professionals (from NGOs, GOs etc.) working in rural environments, with various degrees of professional expertise on environmental and development issues.

The group is ideally composed of around approx. 20 stakeholders in total, plus the moderator(s). Backgrounds and interests of workshop participants should be as diverse as possible to ensure that they reflect the various facets of sustainable land management decisions to be taken.

The 2nd workshop builds on the analysis and discussions made in stakeholder workshop 1. Thus, **it is important that the same stakeholders participate in the 1st and the 2nd workshop**!

Schedule for a 1-day workshop

Preparations for Stakeholder Workshop 1 (to be made by the moderators):

- Methodological preparations
- Preparation of the workshop venue — 2-3 days

Program component		Duration (minutes)
Introduction to the workshop		30
Step 1:	Review of SLM objective(s)	30
Step 2:	Identification of SLM practices (technologies)	60
Step 3:	Criteria for evaluation, and their hierarchy (“ranking”)	60
Step 4:	Assessing the SLM practices against the criteria (“scoring”)	90
Step 5:	Data analysis and visualisation of results	60
Step 6:	Prioritisation of SLM practices – negotiation and decision making	60
Evaluation and closure of the workshop		30

Total: 420 min = 7h 00’

Next Step:
Implementation (WP6 and WP7)

Preparatory work

As a moderator, you need to be prepared for facilitating the stakeholder workshop(s). Besides organisational preparations it is important that you take enough time to get familiar with the workshop guidelines prepared by WP5, with the local context, and think about how you are going to address the topical issues of the workshop.

Please note: Before the workshop, all local SLM practices have to be documented and evaluated with the WOCAT technology and approach questionnaires and entered into the WOCAT database, i.e. Task 5.3 ("Detailed description of promising practices identified") has to be completed!

A suggested **3-4 days should be spent for preparation of the workshop**. This time may be insufficient in case you need to translate workshop materials, and it does also not include the efforts required to invite your participants. Plan for more time if you are unsure, and secure the support of some of your case study site team before as well as during the workshop.

Methodological preparations for the workshop (2-3 days).

Read the workshop guidelines very carefully, and try to imagine the workshop procedure step by step. Think about how each step is related to the objectives of the workshop, and about the expected results of each step. Think about material that might help you to introduce a step, or to explain or illustrate specific aspects. Stakeholder Workshop 2 (SW2) is a follow-up to the first one (SW1) and will build on discussions and results held at that time. Therefore some of the visualisations (e.g. field visit findings, overall strategy, stakeholder analysis) from SW1 will be used as a starting point for SW2.

- **Reuse** the following **results from Stakeholder Workshop 1** (if available): Posters with field visit findings (Exercise 2), information on potential barriers (Exercise 4), outline of an overall strategy (Exercise 6), and stakeholders' influence and motivation for SLM (Exercise 1).
- **Prepare a poster depicting the workshop programme and objectives** (for use in Introduction)
- **Make yourself familiar with the WOCAT database, and the RECARE MS Excel spreadsheet** provided for use in Stakeholder Workshop 2.
- **Develop ideas and write down key words** on how you are going to introduce the different steps and explain the role and use of the WOCAT database and the Excel spreadsheet to stakeholders.
- **Anticipate the main objective** (for use in Step 1)[3]: Recall and review the discussions you had in WS1, and the objective(s) defined in the Exercise on an overall strategy for your case study site). What came up as the most relevant soil threat, and the most important objective

[3] This is a delicate aspect of the methodology, as you are asked to anticipate possible outcomes of stakeholder discussions in Step 1. But we expect that this anticipation is possible as the discussion in Step 1 is a follow-up of the work made and discussions led in SW1. Please be aware that it could happen that the stakeholders will focus on another than the anticipated objective. In this case it will be necessary to make a new search in the database and print the resulting SLM practices during the workshop itself.

at the site? This most important objective is now the basis for the whole assessment and decision-making process in Stakeholder Workshop 2. Enter this objective into the MS Excel template.It is possible to elaborate on more than 1 objective during the workshop. e.g. when your main concern is soil sealing, but you want to address soil pollution, too. In this case make sure you use two separate MS Excel templates.

- **Identify SLM practices** (for use in Step 2): For your objective(s), a number of SLM or soil conservation practices need to be identified and listed. Relevant practices have to be searched and retrieved from the WOCAT database, where your locally applied solutions should be documented already. Each practice consists of a technology and - where available - of an approach describing the ways and means of the implementation of the technology. Make sure all practices selected really match your objective!

  Please note: You are free to select practices from outside your study area, and combining elements of several practices is also possible (see next step below).

  Decide on the number of SLM practices to be taken into consideration for evaluation during the workshop. Make sure that the different practices are clearly distinguishable. We recommend selecting between 3 and 8 practices (per objective). Enter the practices chosen into the MS Excel template. Be aware that participants might reject some of those, and/or want to add additional ones. In any case, do **send information on these practices (e.g. the 4-page WOCAT summary) to workshop participants some time before the event.**

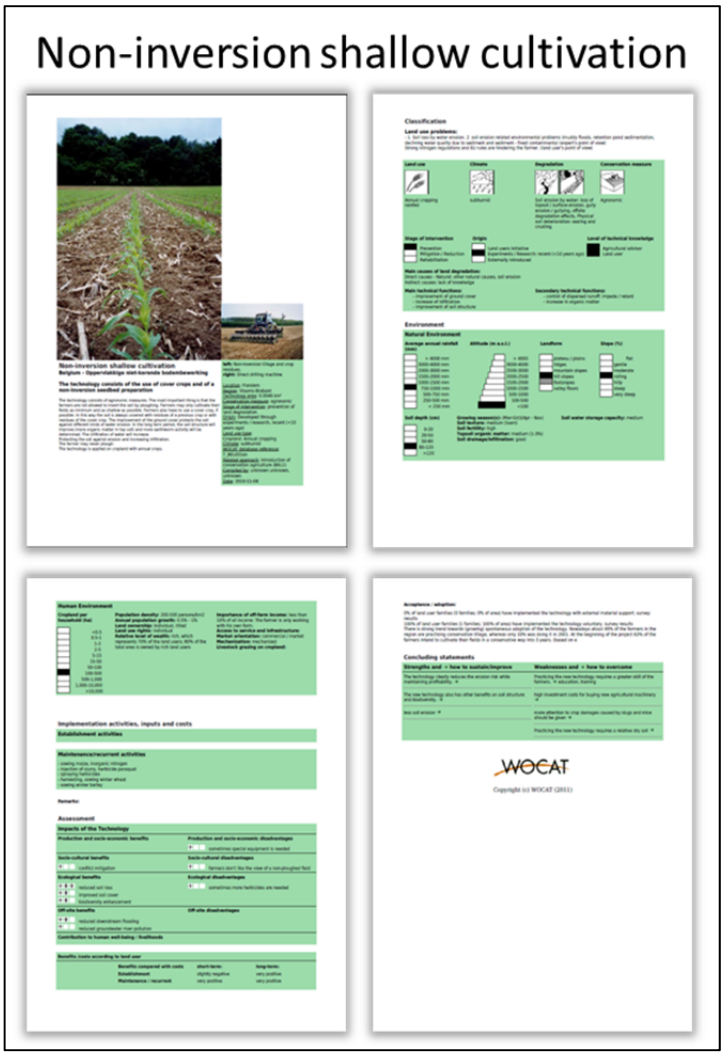
- **Prepare posters and Post-its illustrating locally applied and potential practices** (for use in Steps 2-4; based on a search in the WOCAT database):

  Before the workshop starts, you need to prepare the following **for each of the SLM practices** identified in Stakeholder Workshop 1:

  - 1 poster (A1 or A2) depicting comprehensive information about the technology. This can simply be the printout on A3 sheets of the technology summary from the WOCAT database (see Figure 2). Most importantly, the “Assessment” section about the impacts of the respective technology should be present. During the workshop, the posters will be present on a wall in the workshop room, so stakeholders can refer to them at any moment in time; and
  - Multiple Post-its (ideally 5x5 cm) containing the name of the technology (see Figure 2). The amount of Post-its required relates to the amount of criteria selected in Step 3, i.e. in case of 8 criteria, 8 Post-its per technology are required.

  Please note: You are free to combine technologies with each other, add or remove single elements from existing technologies, etc. But please be aware that technologies taken from the WOCAT database have to be assessed and reflected. Mostly, they cannot be transferred 1:1 from one context to another. Please write down all adaptations which have to be made to a certain technology and include this information in the posters and Post-its. Also, in case you select WOCAT technologies from outside your case study area, translation into your local language may be necessary!

  After retrieval of technologies from the database it is worthwhile to think about any possible solutions that have been mentioned in SW1 (e.g. new ideas), but which are not represented in the sample. If so, try to include such solutions, especially those which you might have specified using the proposed description format. **Produce your own posters and Post-its for these SLM practices as well.**



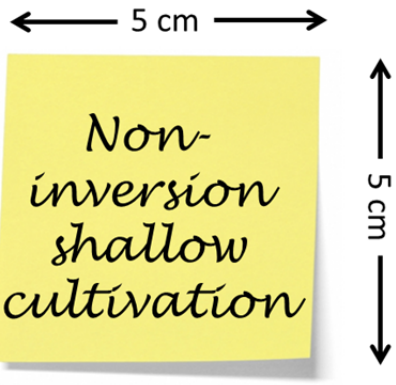


Figure 2: Example WOCAT poster (format A1 or A2), and Post-it (for use in scoring tool)

- **Prepare a catalogue of criteria to evaluate the practices against** (for use in Steps 3-4): you can use the catalogue in Appendix 1, or think of those criteria that appear most relevant in your local context. For the identification of possible criteria the following question may help: How can we recognise if a technology is good for us or not?

  Please note: Sufficient relevant criteria for each of the 3 categories of sustainability (Economic, Ecological, Socio-cultural) have to be selected. In the workshop, a plenary session will be used to explore criteria for each category, with the maximum restricted to 5 criteria per category (15 in total).

- **Prepare "scoring ladders"** (for use in Step 4): This is a tool that your stakeholders will be using to evaluate in how far a practice fulfils the criteria selected (see Figure 3 for an example). Each line of the table should be high enough to fit the Post-its with the SLM practice names that you have prepared. You will need 1 scoring ladder per criterion selected (= maximum of 15).

  Please note: You may want to use the template that is available from the RECARE website (Iceland training folder).

Criterion:	*Decreased wind velocity*
Score	**SLM practices**
Very good (5)	Shelterbelts
Good (4)	Strip cropping
Acceptable (3)	
Bad (2)	Minimum tillage; Reduction of field width
Very bad (1)	Synthetic stabilisers

Figure 3: Example of a scoring tool to be used in Stakeholder Workshop 2

- **Translate** the form in Annex 3 (gendered approaches) into local language!

Preparation of the workshop venue and working materials (2 hours)

Make the necessary preparations in the workshop venue (either the evening before the workshop or in the morning).

- Install a laptop, beamer, and a colour printer, and check whether the light can be dimmed such that the projection is clear and readable;
- Check whether enough chairs and tables are available, also enough power outlets and extension cables, etc.
- Make sure that abundant working material is available such as whiteboard(s), paper sheets, tape, markers, (red dot) voting stickers, scissor, glue, pins, etc.

Please note: The workshop relies on all materials used and produced being visible to all stakeholders all of the time. **Make sure that the room you are using has enough wall space** to hang the posters, or – if this is not the case – bring sufficient poster boards.

Introduction to the workshop

Objectives

- To inform participants on the objectives and programme of the workshop
- To prepare the ground for a good working atmosphere

Duration

	Minutes
1. Welcome participants	5
2. Introduction to RECARE Stakeholder Workshop 2	10
3. Workshop objectives and programme	10
4. “Rules of the game” and intended working spirit	5
Total	**30**

Preparations and material required

- Brief presentation on where SH2 is as part of the RECARE program (e.g. show Figure 1).
- Workshop programme and objectives (written on A1 sheets)
- Paper sheets, markers, tape

Methodology

Plenary session

Procedure

1. The moderator welcomes participants, introduces himself/herself and asks participants to briefly introduce themselves (do not spend too much time on this as the majority of participants is expected to be the same as in Stakeholder Workshop 1).
2. Briefly recall the RECARE project and its objectives. Explain the purpose of the 2nd stakeholder workshop within the whole programme.
3. Present the workshop programme and the objectives.
4. For a good working atmosphere, recall the ‘rules of the game’ (e.g. rules of communication, commitment to attend, etc.).

Expected results

- The participants are clear about objectives, the procedure and programme of the workshop.
- Agreement upon ‘rules of the game’

Step 1: Review of SLM objective(s)

Objectives

- To recall and refresh main discussions and results from Stakeholder Workshop 1 (SW1).
- To decide on which objectives to focus on for the selection of SLM practices that will be test-implemented.

Duration

	Minutes
1. Recall main results from SW1	10
2. Plenary discussion	15
3. Agree on most relevant objective(s)	5
Total	**30**

Material(s) required

- Posters / visualisations from SW1 (if available)
- RECARE MS Excel template

Methodology

Plenary session

Procedure

Refer to the posters with the main results from SW1 (if available).

1. **Plenary**: With the help of the posters the moderator recalls the main findings and results from the various SW1 exercises. Make clear, that all the following steps, i.e. the search for practices, their evaluation and finally the selection of practices for implementation depend on the objective identified.
2. **Plenary**: Initiate a discussion to review the objective(s) identified in SW1. The objective(s) will guide the selection of practices to be implemented in the study site. Thus, it is important that the objective is relevant for the local context, and in the perception of the various stakeholders. The following questions may guide the discussion:
   - From your point of view is this/are these the most important objective(s) to reach in the local context? Why?
   - Are there any important soil threats which have been overlooked so far, and which would need to be considered when deciding on practices to be implemented?
   - What may be the effects of potentially changing framework conditions such as EU-policies, EU-subsidies, climate change etc. on the relevance of these objectives?
3. **Plenary**: The group needs to agree on 1 objective (or 2 at the most), which will be used as the basis for the selection of practices to be test-implemented in the study site. **Make sure the objective is precise** enough, e.g. “improve soil organic matter level” rather than “improve soil quality”. Please note: For each objective you select, you need to go through the whole assessment process. So, if possible, agree on 1 objective.
4. The moderator enters the agreed objective(s) into the MS Excel template. In case more than one objective is selected make sure you use two separate MS Excel templates and initiate 2 parallel workshops!

Expected results

- Participants are up to date and can follow-up the discussions from SW1.
- 1-2 agreed SLM objectives for the case study site, as a basis for the search of practices for implementation.

Step 2: Identification of SLM practices

Preparations to be made before the workshop

This 2nd step requires **preparations** to be made by the moderator before the workshop! The WOCAT database needs to be searched for SLM practices, and respective posters and Post-its to be prepared & printed for all relevant SLM practices, based on the objectives defined in WS1.
As the discussion in Step 1 may lead to new or additional objectives, it may be necessary to search for additional technologies in the database, and to create respective posters and Post-its during the workshop.

Objectives

- To identify with the help of the WOCAT database a range of SLM practices (technologies and approaches) that fit the selected objectives.
- To visualise the potential practices.

Duration

	Minutes
Introduction	5
Presentation of SLM practices from the WOCAT database	30
Plenary discussion	20
Selection of practices to be assessed	5
Total	**60**

Preparations and material required

- Posters that document and illustrate the SLM practices selected from the WOCAT database, or any additional technologies identified but not yet described in detail (1 poster per SLM practice).
- Post-its (5x5cm) containing the name of the practices. You will need 1 set of Post-its per criterion identified in Step 3 of the workshop.
- Paper, markers, tape, “voting” stickers (5 per participant)
- RECARE MS Excel template

Methodology

Plenary session

Procedure

1. **Introduction**: The moderator explains the preparatory work done by him/her and the study site team. He/she briefly explains what the WOCAT database is, and how it was used after SW1 to document locally applied technologies/approaches. Make sure that the purpose and the use of the database is transparent and well understood by the participants in order to avoid suspicion and mistrust.
2. **Presentation of SLM practices**: Start from the objective at your field study site and shortly explain each SLM practice. Use the technology posters that you have placed along the walls of the room. Take enough time for each of them and make sure that everybody fully understands them, including their benefits in the economic/socio-cultural/ecological categories.
   In the case of practices for which you have identified necessary adaptations during your preparatory work, explain which adaptations you consider necessary in the local context, and why. Present these practices including the adaptations (not as the ”pure” database version).

3. **Plenary:** Allow time for questions and discussion. Although it is expected that the brainstorming on possible practices was already completed during SW1, it is possible that participants may want to add or discuss relevant technologies and/or approaches that are not yet on the list. In this case it is possible to go back to the database, search again, and add new practices. Please be aware that if these additional practices are accepted by the group, you will need to print or write additional posters and Post-its "on-the-fly".

   The following questions may guide the discussion:

   - Are any very important SLM practices missing?
   - Is the practice viable for the local context, generally speaking?
   - Are certain adaptations necessary to fit the local context?
   - Can several elements of various practices be combined?
   - Is the implementation and maintenance of the practice(s) realistic given the budget available?

4. **Selection of practices to be assessed**

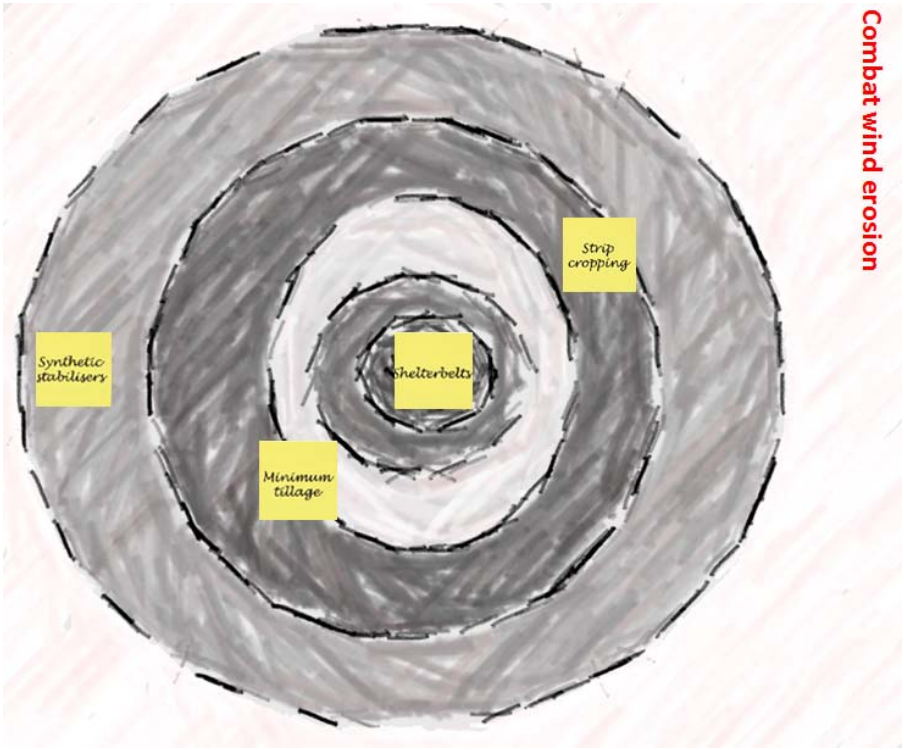
   Ask the participants to agree on 4 to 7 SLM practices which are important to reach the target objective, seem feasible and appear interesting enough for the context of your study site to be more thoroughly assessed in the course of this workshop.

   Try to find a consensus. If no consensus can be found, you can think of some techniques to force a fast decision, such as e.g.:

   - Use a check table in which you quick-evaluate all SLM practices against parameters such as context (is the practice viable in the local context?), budget (is the practice realistic given our budget?), or innovation (is the practice already successfully implemented at the study site or not?).

SLM Practice	context	budget	innovation
Shelterbelts	☑	☑	☑
Synthetic stabilisers	☑	☑	☒
Reduction of field width	☑	☑	☑
Strip cropping	☑	☑	☑
Minimum tillage	☒	☑	☑

   - Give each participant 5 "voting" stickers to mark his/her preferences. Make sure that nobody feels pressurised by others into voting for certain practices. Those SLM practice(s) with the highest number of votes will be assessed.
   - Draw a 'dart board' and write the target objective on the top. The group then allocates the different SLM practices across the board such that the practices nearer to the centre are evaluated as the more relevant practice to reach the target objective. You will pick those 7 practices that are nearest to the centre.



Please note: If there is less than 7 actual and potential practices on the table, this step should nevertheless be performed. This is because you may want to exclude practices that appear economically not viable.

Please note: 1-2 out of these practices will finally (at the end of the whole process) be selected to be test-implemented in the study site. **In case the current selection contains practices which are already well known and successfully applied in your study site we recommend to not consider them for further assessment, as it will not be interesting to select them for test-implementation!**

5. The moderator enters the agreed practice(s) into the MS Excel template.

Expected results

The participants agree on 4-7 SLM practices to be evaluated with the help of the following steps.

Step 3: Criteria for evaluation, and their hierarchy ("ranking")

Objective

- To identify and agree on a set of criteria relevant for the local context, along which the different SLM practices can be evaluated.
- To assign a hierarchy to the criteria identified ("ranking")

Duration

	Minutes
1. Introduction, definition of "criteria"	15
2. Plenary: Selection of criteria	30
3. Group work: ranking of criteria	15
Total	**60**

Preparations and material required

- Checklist of possible criteria (Annex 1)
- Flipchart (or large paper sheets)
- Post-its (1 per criterion) in 3 different colours
- Small red dot "voting" stickers (5 per participant)
- RECARE MS Excel template

Methodology

Group work: brainstorming, selection
Plenary: discussion and final selection

Procedure

1. **Introduction**: the moderator explains the process to identify the criteria for evaluating the SLM practices. He/she gives a brief overview on the purpose and procedure of each of the following steps:
   - Identification of relevant criteria; this is done to evaluate the practices in view of the study site (SLM) objective. The moderator should include an introduction to and explanation of the 3 categories (economic, socio-cultural, ecological) used (see below).
   - Assigning a hierarchy to the criteria identified ("ranking")

   The three dimensions of sustainability: To be feasible, practices must fit into the specific bio-physical, economic and socio-cultural context of the respective study site. A practice can only be considered sustainable if its evaluation is (more or less) positive concerning all three dimensions of sustainability: economic, ecological, and socio-cultural. That is, it has to pay off for the farmers implementing it, has to have positive impacts on the land (including soil, water, vegetation, fauna), and has to be acceptable by local actors, i.e. it has to fit into the socio-cultural context and practices.
2. **Definition of criteria:** Briefly introduce the use of the term 'criteria' by illustrating it with an example from daily life, such as 'how do you decide on renting a flat: it needs to have 3 rooms, be cheap, be located near your working place, etc.' The practice (flat) meeting these criteria (size, low cost, location) best, will be selected.

   For the identification of possible criteria the following questions may help: **How can we recognise if the practices selected in Step 2 are good for us or not**? Which benefits do we expect from them?

Criteria for sustainable practices: **for each of the three dimensions of sustainability, at least 2 criteria have to be defined** that are relevant for your specific context. This yields a minimum of 6 criteria, but you can use as many as appear relevant and appropriate. The more criteria are valued positively, the more appropriate that practice will be.

As a moderator, make sure that

- all criteria are formulated following the rule **"the more, the better**", i.e. expressing a direction using words such as e.g. "increased/decreased", "lower/higher", "less/more", etc.; and
- all criteria are **precise, and understood by everyone** in the group. For example, if biodiversity is mentioned, make sure if it refers to above- and/or belowground (soil) biodiversity; reject too generic criteria such as "decrease degradation" or get clarity what is actually meant.

Please consider using the economic "Low costs" criterion by default. Experience from previous projects has shown that this is vital and budget restrictions should be considered at all times.

3. **Plenary: Selection of criteria.** Let the stakeholders come up with criteria on their own, so they are forced to think what to their opinion the practice has to fulfil. Write all criteria mentioned on a flipchart. You can always opt to give examples of the criteria as listed in Appendix 1 to help the stakeholders complement their own list. But: Make sure that all criteria selected are relevant for the local context.

   Distribute the post-its and explain the 3 different colours matching the 3 categories. Motivate participants to write their criteria on them, and bring them to you. **Group the post-its by category** (economic/ecological/socio-cultural), and within the categories make sure that you remove duplicate ones (Figure 4). In case you are unsure if 2 suggestions are indeed duplicates or not, discuss this with participants.

Figure 4: Arranging criteria per category, and discussing potential duplicates with participants.

4. **Ranking the criteria**
   After selecting the criteria to be applied, the next step is creating a hierarchy of importance among them ("ranking"). This is because you may have received more than the targeted 15 criteria, and not all participants might be happy the same way with the criteria voiced. Ranking gives them a chance to point out what is important to them.

   Provide each participant with 5 **red dot "voting"** stickers and ask them to place them on those criteria (Post-its) that they consider most important from their point of view. **They have to put at least 1 sticker per category**, and can then accumulate their votes if they want (Figure 5).

Figure 5: Participants have voted for the criteria that they want to have included. The ranking can now be performed.

After the voting, remove those criteria that ended up with 0 votes. Make sure that you select **at least the top 2 for each category.** In addition, you can decide on a 'cut-off' value (e.g. 4 votes) above which criteria are included. But make sure that there are **not more than 5 criteria per category** in the end.

5. The moderator
   - places the results on one of the walls of the room;
   - writes the names of agreed SLM practices (Step 2) on 5x5cm Post-its (you may ask a colleague or participants to help); 1 set of practices is needed per criterion identified;
   - writes the names of the criteria into the 'scoring tools' (see Figure 3 on page 13). You may also want to 'recycle' the Post-its from this exercise for this purpose (Figure 6); and
   - enters the agreed criteria into the MS Excel template, taking care that they show in the order of greatest to lowest importance (votes).

Figure 6: Example of filled-in scoring tools, with criteria Post-its 'recylced' in the top field of the form.

Expected results

- The participants have a common understanding of the use of criteria.
- Relevant criteria for the evaluation of the SLM practice are identified.
- Criteria are ranked in order of importance.

Step 4: Assessing the SLM practices against the criteria ("scoring")

Objective

- To assess for each practice, to which extent it fulfils the different criteria identified in Step 3.

Duration

	Minutes
1. Introduction	5
2. Group work: Scoring	45
3. Plenary	40
Total	**90**

Preparation and material required

- Posters of SLM practices (should be on the wall!)
- Post-its of SLM practices (1 set of Post-its per criterion identified in Step 3)
- List of criteria identified (should be on the wall!)
- Several copies of the scoring tool ("ladder", see Figure 3); the amount corresponds to the number of criteria identified in Step 3
- RECARE MS Excel template

Methodology

Group work: scoring SLM practices against criteria

Procedure

1. **Introduction**: The moderator explains the purpose and process of scoring. All SLM practices selected in Step 2 will be evaluated against the criteria chosen in Step 3. The question being asked is: **"How good do you think is a particular SLM practice towards achieving the selected criterion?"** The range of possible answers if from "very bad" (score of 1) to "very good" (score of 5).

   The moderator splits the participants into 3 groups. Participants who are experts (or most interested in) economic aspects will start to work on the economic criteria identified. A second group is formed of socio-economic experts, and a third one gathers ecological experts. The groups are seated separately around 1-2 tables each.

2. **Group work**: Place the following on the work group tables:

   - the 'scoring tools' with economic criteria on the table of the 'economic experts group'; the 'scoring tools' with socio-cultural criteria on the table of the 'socio-economic experts group', and the 'scoring tools' with ecological criteria on the table of the 'ecological experts group'.
   - Post-its of all the practices selected in Step 2 (1 set per scoring tool)

   Scoring process in each of the groups (approx. 15 mins):
   For scoring the practices, the groups can rely on their own experience where applicable, on the information provided on technology descriptions (posters on the walls!), or search more information in the WOCAT database.

   1. Let group members discuss which of the SLM practices is considered the 'best' towards achieving the selected criterion.

Once agreement has been reached, they have to think about its score (1 to 5) concerning the selected criterion, and stick the Post-it of the 'best' practice on the respective field. If a choice between 2 neighbouring scores (e.g. "Acceptable" and "Good") cannot be reached, the average score (e.g. 3.5) can be taken. In case no agreement can be reached at all, voting has to be performed in the consecutive Plenary (see below).

2. The same is done with the 'worst' practice.
3. The group discusses and scores the remaining practices.
4. The group repeats this procedure for all other criteria until all of the scoring tools in their category have been filled.

Please note: It can be worthwhile documenting why participants chose for the particular score(s).

Exchange between groups on decisions made ("carousel") (approx. 30 mins):
1 member of each expert group remains on his/her table as a rapporteur. Groups then swap tables, with the rapporteur explaining to the other group the decisions made. This group can then have their say, and scores might get adjusted as a consequence. You can suggest that adjustments should not exceed 1 scoring unit (e.g. from 3 to 4). Where an adjustment is made, place the Post-it with the respective practice into the new row, and add an upward- or downward facing arrow and the change increment ("+1" or "-1"), Figure 7.

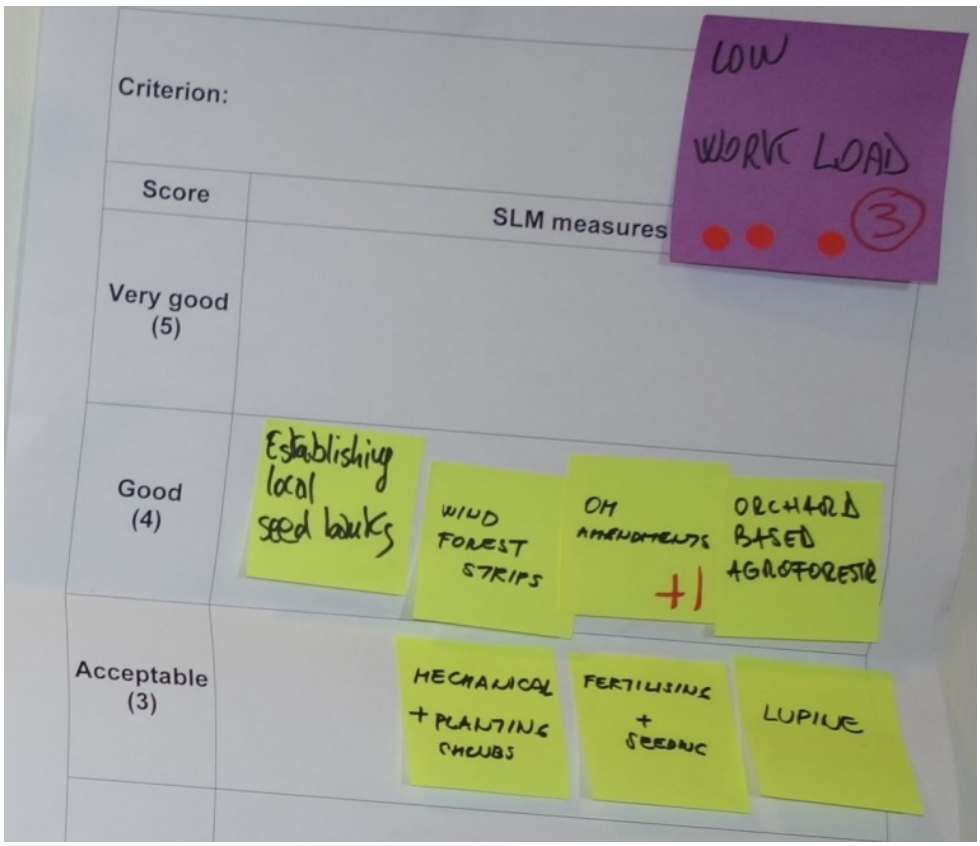


Figure 7: Workshop example, in which SLM practice "OM amendments" has been shifted from score "Acceptable" to "Good" in view of lower workloads.

After approx. 15 mins, the groups change again, so that all participants will have the chance to understand and influence the scoring for all criteria.

Please note: According to the context you are working in, it might be necessary to moderate the discussions and assessments made by the working groups. If this is the case, ask e.g. one of the study site team to support the group by moderating discussions. **But**: Make sure that the researcher fully understands his/her role of moderating, i.e. he/she is not supposed to influence the discussion by forcing his/her own opinion. It is not his/her assessment that is wanted, but the local stakeholders'.

3. **Plenary**: The moderator arranges all scoring tools in the middle of the room (or along the front wall) in the order of criterion hierarchy. The rapporteurs of each category explain to the group the decisions made. The group should get the chance to discuss at least those scores that have been adjusted during the carousel. If in such a discussion no agreement can be reached, a voting procedure can be applied. Each person has 1 vote and the score which receives the highest number of votes is selected.

   As the moderator, make sure you transfer all the scores into the MS Excel template. To save time, this can be done 'on-the-fly' while the rapporteurs present and explain their scoring results.

   Attach all scoring tools to one of the walls of the room so that all stakeholders can re-view the results any time.

Expected results

- All SLM practices are assessed against all criteria.

Step 5: Data analysis and visualisation of results

Objectives

- Calculating the 'performance' of practices based on ranking and scoring (Steps 2 to 4).
- Visualisation of the relative merits of the different practices as a basis for discussion.
- Interpretation of results.

Duration

	Minutes
1. Data analysis & visualisation of results (using MS Excel)	10
2. Interpretation & reflection of results	50
Total	**60**

Preparations and material required

- Laptop & beamer (projector)
- RECARE MS Excel Template
- for manual calculation procedure only: A0 paper sheet with chart: 0 to 1 along abscissa (x), and the practices listed along the ordinate (y); Markers (different colours)

Methodology

Plenary session

Procedure

1. **Data analysis & visualisation**: The analysis and visualisation of workshop results can be done by using the RECARE MS Excel template, or entirely by hand. Whatever way you choose, the results of the data analyses will be the same as they rely on the exact same mathematical algorithms.

   <u>Process using RECARE MS Excel template</u>

   The easiest way to analyse and visualise the workshop results is to use the RECARE MS Excel template provided. This not only applies the required mathematical algorithm to the data, but also produces graphs which give a visual representation of the relative merits of each SLM practice:

   - Go to the "RawData" tab of the spreadsheet; make sure that the objective and all SLM practices, criteria, and scores have been entered;
   - Click on the RECARE logo at the bottom. This will copy all input to the "Data_Analysis&Visualisation" tab and start the calculation;
   - Switch to the "Data_Analysis&Visualisation" tab;
   - Upon scrolling down you will find a "Scoring results per SLM practice" section; this is visualising the scoring results performed in Step 4 (Figure 8).
     Please note: this is *without* taking the ranking of criteria into account, so if time is short you may not want to discuss these graphs in detail.

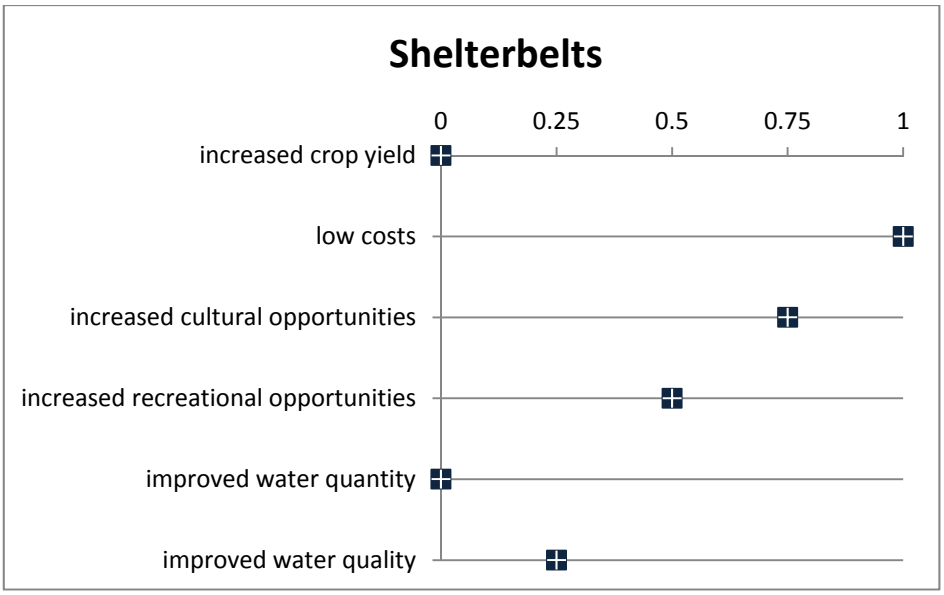


Figure 8: Example graph (wind erosion) illustrating how a practice (shelterbelts) scored against the various criteria selected.

Generally for all graphs, The further to the right in the graph, the better the result.

- You may also want to look into how your stakeholders evaluated each practice's performance towards one particular criterion. In the "Overall results per criterion" section you will find 1 graph per criterion identified in the process (see Figure 9 as an example).

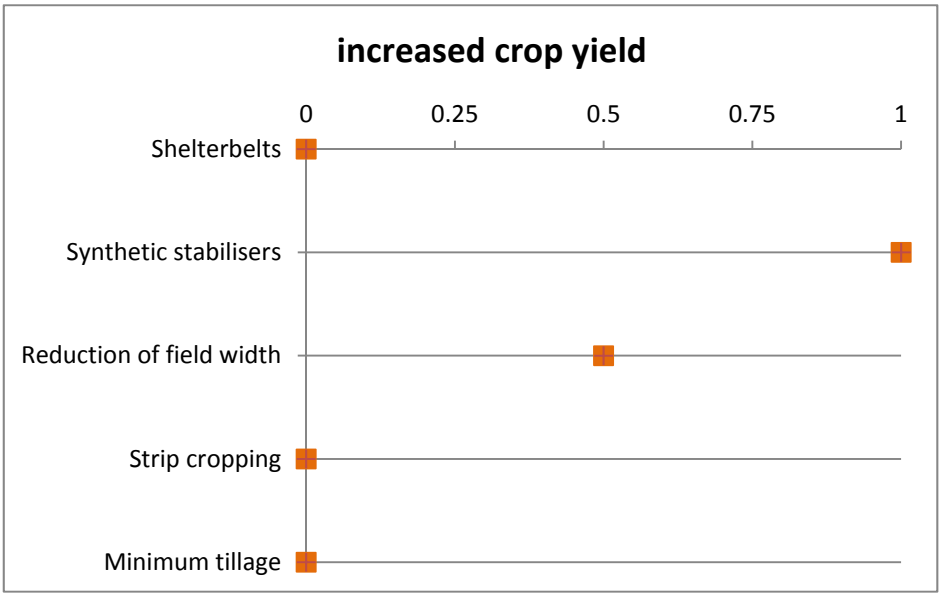


Figure 9: Example graph (wind erosion) showing the performance of SLM practices selected against the criterion of increased crop yield.

- Towards the bottom of the spreadsheet you will find the "Overall results for all SLM practices in all categories" graph. This is a comprehensive bar chart showing the combined performance of each SLM practice on a scale from 0 (very poor) to 1 (very good). It allows for direct comparison of the practices and is the main outcome of the workshop. See Figure 10 as an example.

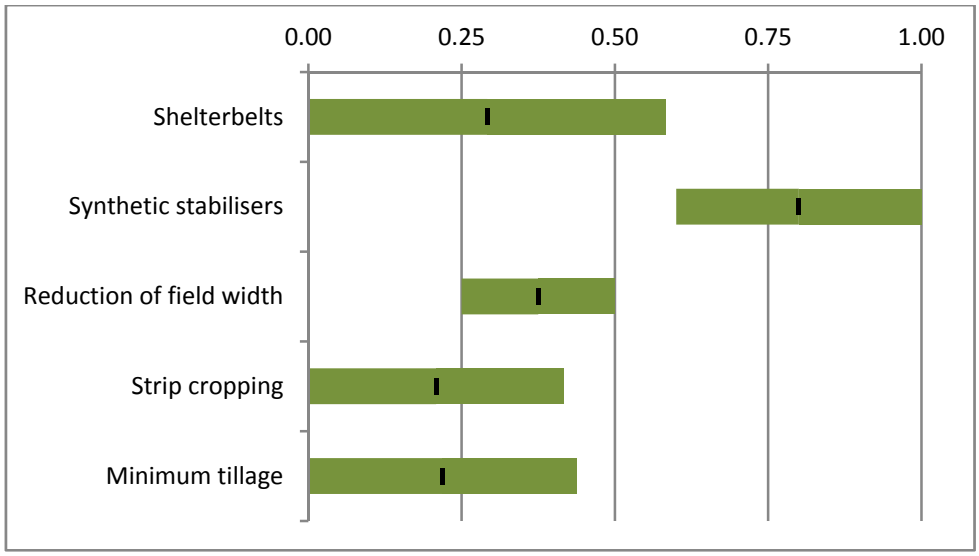


Figure 10: Example graph, showing performance of all SLM practices across all 3 categories. Vertical black lines within green bars indicate mean values. In this example the practice "Synthetic stabiliser" performs best.

- Last but not least you can also analyse how the SLM practices performed in each of the 3 categories - economic vs. socio-cultural vs. ecological. It is very likely that you will find practices that perform well ecologically, but not economically, or vice versa. See Figure 11 for an example.

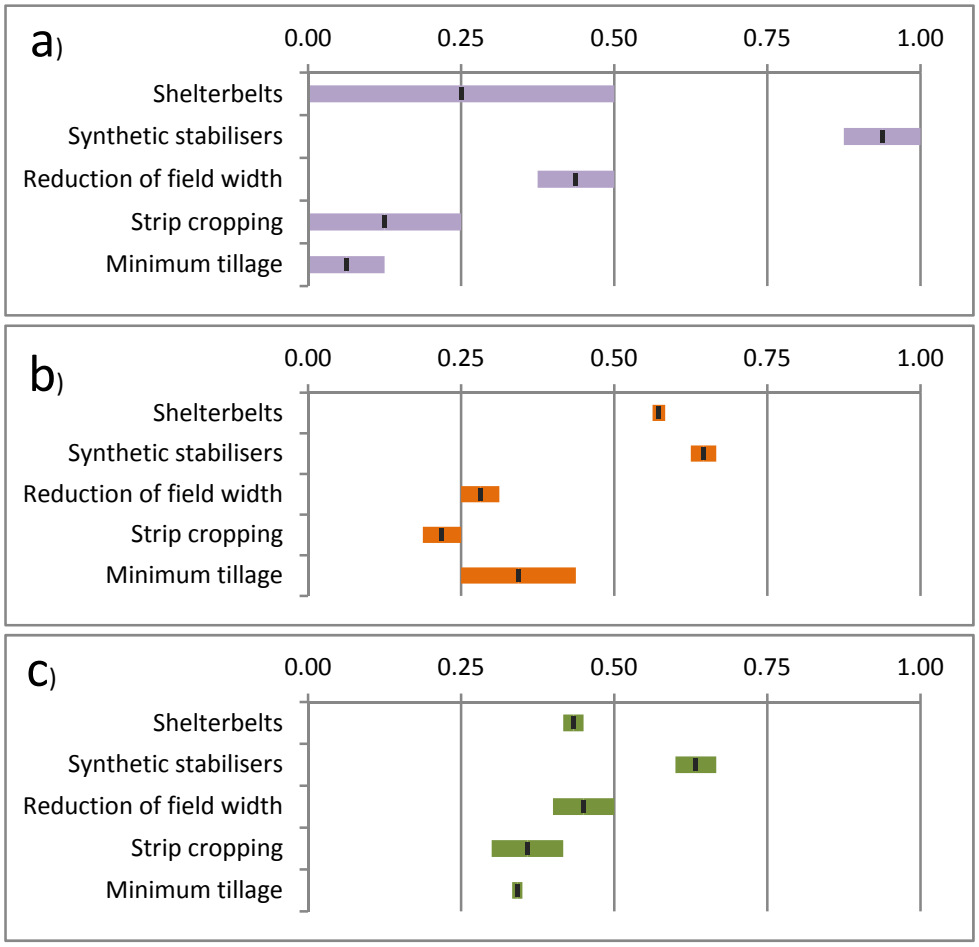


Figure 11: Example graphs (wind erosion) for performance of SLM practices in separate categories: a) economic, b) socio-cultural, c) ecological.

Manual process

To keep the calculation process absolutely transparent, you may want to do the calculation step by hand (in the plenary). This will take longer than in MS Excel, so if you are under time pressure, do not choose this option.

- Normalise the scoring results (Step 4) to the range from 0 to 1, using a linear function (score of 1 → 0; 2 → 0.25; 3 → 0.5; 4 → 0.75; 5 → 1)
- Calculate the minimum and maximum value for the first practice by applying the mathematical algorithm developed by Yakowitz & Weltz (1998)[4] that is also used by the Facilitator software.
- Plot the minimum and maximum value on an A0 paper sheet with values of 0 to 1 along the abscissa (x), and the practices listed along the ordinate (y)
- Repeat for all practices

For a detailed calculation example, see Annex 5.

2. **Interpretation of results**: The moderator provides some general remarks on the interpretation of the final results chart:
   - Each practice is represented by a bar showing the range of overall scores for that practice (integrating criteria for all 3 categories).
   - The further to the right in the graph, the better (promising) the practice. Please translate the overall results (numeric values from 0 to 1) for participants, e.g. 0 = very poor; 0.25 = poor; 0.5 = acceptable; 0.75 = good; 1 = very good.
   - The smaller the bar, the clearer the valuation through the participants, i.e. the lower the variability of valuations.
   - A practice is clearly better than another if there is no overlap between the bars.

   Reflecting the results: Once you are running the analysis and looking at the results, you will start to get a feeling for whether you have included all the important factors. Does the analysis produce the sort of results that people who are really familiar with the situation would expect, or that appeal to them? If not, what is missing? Are there criteria that should have been included but were missed out? Are there problems with the hierarchy or the rankings? Do you need to collect additional information to refine the scores? Have additional practices emerged which need to be added and assessed?

   The process is iterative – the first runs provide useful information on how to refine your matrix to come up with a decision that people involved with have confidence. You might expect to have to revisit practices, criteria and their ranking, and/or scores several times before feeling confident that you really have chosen the best practice(s).

[4] Yakowitz, D.S. and M. Weltz, An algorithm for computing multiple attribute additive value practicement ranges under a hierarchy of the criteria: application to farm or rangeland management decisions, in Multicriteria Analysis of Land-Use Management, E. Beinat and P. Nijkamp, eds., Kluwer Academic Publishers, Boston, pp. 163-177, 1998; http://dx.doi.org/10.1007/978-94-015-9058-7_10

The RECARE MS Excel template allows you to easily adapt any of the above and re-run the complete analysis. Just switch to the “Raw data” tab and adjust the values as required. Re-analyse the data by clicking on the RECARE logo at the bottom.

The major problem is that you will probably not have time during the stakeholder workshop to go back to previous steps and redo them! So try not to rush through the steps but do them carefully, or otherwise, extend the duration of the stakeholder workshop.

Expected results

- The relative merits of different practices become clear, and participants get aware of the pros and cons depending on the view of different stakeholders.
- Participants understand which practices are most promising in the local context.

Step 6: Prioritising of SLM practices – negotiation & decision-making

Objectives

- To find a final agreement on which practice(s) should be selected for test-implementation at the study site.

Duration

	Minutes
1. Introduction	10
2. Plenary: Selection of practice(s) for test-implementation	50
3. Group work: Support to the implementation process (optional)	30
Total (without optional component)	**60**

Preparations and material required

- RECARE MS Excel template
- Cards & Pens

Methodology Plenary session

Procedure

1. **Introduction**: The moderator explains that the group now has to select one (or at the most two) SLM practice(s) that will be test-implemented at their study site. The application of the SW2 steps are a decision support mechanism that allows to take an informed decision rather than an accidental one. **But still, Decision Support Systems are meant to support decision making and not to make decisions on their own!**

   In case you have used the MS Excel template, show the 3 graphs illustrating the performance of all practices in the economic, ecological, and socio-cultural category (bottommost 3 graphs in the template; see Figure 11 as an example). Next, progress to the graph integrating the score of each SLM practices over all 3 categories (see Figure 10 as an example). This provides the synoptic view, Refer to the interpretation performed in Step 5, and point out which of the **practices score well in all three categories**. They are supposed to be the best practices.

   Maybe there is already a clear favourite because one of the practices absolutely scores best. In this case the selection will be easy and just has to be confirmed by the group. Also, you may have a larger case study site where several – maybe even more than 2 – practices might be considered for implementation in parallel, thus addressing the specific challenges in various parts of the site at the same time.

   Where several practices have comparable scores, or result bars are overlapping to a large extent, a selection has to be made **weighing pros and cons of the different practices**. The negotiation of these practices is the aim of this plenary discussion. Also explain that before a technology will be implemented in the field, a more detailed assessment of necessary adaptations to make it fit to local conditions will be necessary and will be made by the study site researchers in collaboration with local and external stakeholders.

2. **Plenary discussion:** Try to find a consensus among the participants concerning which SLM practice shall be test-implemented in the next step of the RECARE project.

   To reach this consensus the finally best practice(s) need to be negotiated among the stakeholder groups. For example, **if two practices generally score well**, but one scores better ecologically, and the other better economically, the stakeholders have to negotiate which aspect is more important to them.

   Sometimes the group has two fractions, the conservationists and the developers. The conservationists are most concerned about ecological criteria and the developers over economic criteria, which will show in their different ranking of the criteria. The discussion about this divergence can promote collaboration and the recognition of each other's contribution to the solution. **It is very important to moderate this negotiation process well**!

   It will be important that the test-implementation is broadly accepted and supported, and that local stakeholders really have an interest in it. Therefore, make sure that everybody can speak out his / her concerns and **give local stakeholders enough space to reason**.

   The whole selection and decision process is iterative, i.e. the discussion during Step 6 may conclude that it would be necessary to revise criteria, practices, scores and rankings before everybody will agree with the decision. If time allows going back to the previous steps, such **an iterative procedure is recommended**.

   If no consensus can be found, let participants vote (openly or secretly, according to your context). Each person has 1 vote and the SLM practice which receives the highest number of votes is selected. However, a selection by voting bears a higher risk that the result will not be accepted by some people, and therefore should be avoided if possible.

3. **Group work (optional):** In order to get a certain commitment of participants to support the test-implementation process, people reflect on what type of support they could contribute.

   Form groups of people belonging to the same stakeholder group. Each group takes 10 minutes to reflect on how it is willing to support the test-implementation of the agreed upon option(s). Write on cards. Each group then presents what its contribution will be.

   Example:

Stakeholder group	Willing to support test-implementation by…
Large-scale farmer	• To put a test-plot at disposal • To provide necessary machinery • To provide labour force and inputs to implement the technology • To attend meetings and assist in evaluations • To help development adaptations to local context
Small-scale farmer	• To put a test-plot at disposal • To provide labour force for technology implementation • To attend meetings and assist in evaluations • To collaborate in the identification process for necessary adaptations

Advisory service	• To provide technical assistance • To collaborate with land users and researchers • To incorporate test results into future advice and dissemination
Ministry of Agriculture	• To follow-up the implementation process • To support the implementation by providing free tools and inputs to the small-scale farmers
Local administration	• To co-organize and support evaluation meetings
Researcher	• To make external know-how available • To organize evaluation meetings together with the advisory service and the local administration

Expected results
- 1 to 2 practice(s) are selected for test-implementation.
- Participants specify how they are going to support the implementation process and commit themselves.

Evaluation and closure of the workshop

Objectives

- Evaluate contents, methodology, and results of the workshop.

Duration

	Minutes
1. Evaluation	20
2. Closure of the workshop	10
Total	**30**

Preparations and material required

- Sufficient (translated) copies of RECARE 'WP4 Evaluation form stakeholder workshops 1-4' (Annex 2)
- Sufficient (translated) copies of 'Questions about gendered approaches for RECARE Case Study (CS) stakeholders' form (Annex 3)

Methodology Feedback form, Plenary session

Procedure

1. Distribute the evaluation forms about stakeholder interaction (Annex 2) and gendered approaches (Annex 3) and let the workshop participants fill them in.
2. **Plenary**: If there is enough time left, initiate a plenary discussion. Use open questions such as:
   - Which are your hopes and concerns regarding the selected practice(s)?
   - How did you like the way of learning and working (methodology) in the workshop?
   - Which suggestions do you have to improve the organisation of the workshop?
3. **Closure of the workshop**: Start by giving a brief outlook on the next steps of RECARE activities at the study site. Inform on the continuation of the local level process in the context of the RECARE project. E.g. elaborate on forms of participatory monitoring, if applicable.
4. Officially close the workshop and thank all participants for their valuable collaboration.

Expected results

- A feedback from workshop participants: what they liked / disliked, what they found useful / useless, necessary improvements, etc.
- Participants are aware of the continuation of the initiated process within RECARE

Annexes

Overview:

Annex 1: Checklist for possible criteria

Below is a list of criteria for use in Step 3 of the workshop. They are taken from the “Evaluation” section of the WOCAT database that looks into which impacts a certain technology has, economically, socio-culturally, and environmentally.

To be useful, a criterion should:

- **be relevant for the local context!** The below criteria are rather general, and would have to be translated to your local context.
- **distinguish between your practices**. For example, if all practices cost the same, there is no point having cost as a criteria.
- **be possible to be assessed in a consistent manner**. If no one can think of a way to assess a criterion it should not be used. For example, while it sounds nice to include "maximise happiness" as a criterion, it cannot be assessed in a way acceptable to everyone.
- **be important to at least one person included in the process**. To build consensus, it is better not to use voting. If something is important to one person and it is ignored then that person will not share ownership of the process.

Category: economic

- low costs (consider using this by default)
- increased crop yield
- increased fodder production
- increased fodder quality
- increased animal production
- improved animal health
- increased wood production
- decreased risk of production failure
- increased drinking / household water availability / quality
- increased water availability / quality for livestock
- increased irrigation water availability / quality
- increased off-site water availability (groundwater, springs)
- decreased demand for irrigation water
- decreased expenses for inputs
- increased farm income
- increased diversification of income sources
- increased land availability: decreased loss of land (decreased production area) or increased production area (new land under cultivation / use)
- decreased workload / labour constraints

- eased / hindered farm operations
- increased product diversification
- economic (in)equity
- improved suitability for local socio-economic conditions (e.g. cropping system, market orientation, etc.)

Category: socio-cultural

- increased cultural opportunities (e.g. spiritual, aesthetic, others)
- increased recreational opportunities
- improved community institution strengthening
- improved national institution strengthening
- improved soil conservation / erosion knowledge
- less socio-cultural conflicts / conflict mitigation
- improved food security / self-sufficiency (reduced dependence on ext. support)
- improved (human) health
- improved suitability for small holders / large-scale land users
- gender (in)equity
- suitability for local socio-cultural conditions
- less damage on neighbours' fields
- less damage on public / private infrastructure

Category: ecological

- improved water quantity
- improved water quality
- improved water harvesting / collection of surface runoff
- increased soil moisture
- increase evaporation
- decreased surface runoff
- improved excess water drainage
- decreased waterlogging
- heightened groundwater table/aquifer
- improved resilience towards adverse events (drought, floods, storms, …)
- decreased downstream flooding
- decreased off-site stream / river flow
- decreased downstream siltation /sediment yields
- decreased off-site groundwater / river pollution

- decreased off-site buffering / filtering capacity (by soil, vegetation, wetlands)
- decreased wind velocity
- decreased wind transported sediments (off-site)
- improved soil cover
- increased biomass / above ground C
- improved nutrient cycling / recharge
- increased soil organic matter / improved C sequestration
- decreased emission of carbon and greenhouse gases
- decreased soil loss
- decreased soil crusting / sealing
- decreased soil compaction
- decreased salinity
- decreased fire risk
- increased animal diversity
- increased plant diversity (incl. crop diversity)
- decrease in invasive alien species
- increase in beneficial species (predators, earthworms, pollinators)
- biological pest / disease control
- increase in habitat diversity / fragmentation
- decreased competition (water, sunlight, nutrients)
- improved suitability for local ecological conditions: slope, soil, climate, etc.

Annex 2: RECARE WP4 Evaluation form: stakeholder workshops 1-4

To be filled in by all participants of the Stakeholder Workshop

Personal information:

Sex: male ☐ female ☐ **Age**: …….years **Name** (voluntary):……

Stakeholder category:

Land user / farmer	☐	Local administration	☐	Private sector (e.g. industry, retailer)
Civil society organization	☐	Subnational administration	☐	Research institute
Advisory service	☐	National administration	☐	Policymaker

Other ☐ please specify:

……

Please indicate how much you agree with the following statements *(tick the respective box)*	1 = I strongly agree 2 = I agree 3 = I mildly agree			4 = I mildly disagree 5 = I disagree 6 = I strongly disagree		
In <u>this</u> workshop:	**1**	**2**	**3**	**4**	**5**	**6**
1. All stakeholders whose cooperation is needed to deal with threats to soil were represented in the workshop.						
2. I acquired a lot of new knowledge about soil threats and ways of solving them.						
3. I learned a lot from the knowledge and experience of other stakeholders.						
4. Other stakeholders learned a lot from my knowledge and experience.						
5. All participants were taken seriously, regardless of stakeholder category.						
6. There were enough opportunities for informal exchange with other participants.						
7. I obtained a new or better understanding of other stakeholders' positions.						
8. I discovered I shared common interests in regard to land management with stakeholders from categories I had not expected to share common interests with.						
9. I felt that exchange and interaction between different stakeholders took place in an atmosphere of trust.						
10. I felt that the other stakeholders fully understood my position and concerns.						
11. The different stakeholders stuck to their long-held views and positions.						
12. The insights from the workshop made me rethink and change my own position.						
13. I felt that certain people (stakeholder groups or individuals) dominated the discussions.						
14. What I learned in the workshop is very useful for my own work.						

Comments (use additional sheet, if needed):

……

……

Please send the completed form to felicitas.bachmann@cde.unibe.ch

Annex 3: Questions about gendered approaches for RECARE Case Study (CS) stakeholders

To be filled in by all participants of the Stakeholder Workshop

Case study site…….. Are you a **man / women / ?** (Please circle)

RECARE stakeholder		Yes*	No*
1. Are you	a. a land **user**/farmer?		
	b. a land **owner**?		
2. Do you	c. do the farm/household **administration**?		
	d. make **decisions** about the land use?		
	e. base your decisions on long term **sustainable** land use?		
3. Do you think	f. the land will improve in **value** with the actual land use?		
	g. there are typical **roles** for men and women in land use? Examples……....(men) …….……(women) roles		
	h. your role would **change** with a different land use?		
4. Would you	i. change the land use for **soil** improvement?		
	j. **invest** in more sustainable land management?		
Further remarks			

* Please put an X in the boxes with the answers of your choice.
Thank you!

Please send the completed form to info@corepage.org

Annex 4: Report template for Stakeholder Workshop 2

RECARE
Preventing and Remediating degradation of soils in Europe through Land Care

Workshop Report - English summary

Stakeholder workshop 2
"Selection of practices to be tested and evaluated"

Results and conclusions from the stakeholder workshop

Name of the study site:

Main soil threat at the study site:

Date of workshop:

Author(s):

I General information

A) Workshop

Workshop venue:
Workshop moderator(s):

List of workshop participants:

Mr. / Ms.	First name, name	Stakeholder category and institution (e.g. land user, researcher, NGO, GO)	Local or external participant? (L / E)

Comments:
(e.g. stakeholder categories that were not represented in the workshop; stakeholder categories invited to the workshop but who did not participate; participants who partially attended, etc.)

.....
.....
.....
.....

B) Background

Please provide background information on the context in which the workshop was conducted (area covered, no. of inhabitants, predominant types of land use, main types of land degradation, constraining factors for soil and water conservation, etc.)

II Results and conclusions from single steps

Please provide the following results from the single steps:

Step 1 → Objective(s) you worked on:
Which objective?

Step 2 → Selected SLM practices and necessary adaptations:
Which practices did you work with?
Necessary adaptations to fit the local context?

Step 3 → Criteria for evaluation:
Which criteria did you work with? And which hierarchy was chosen by participants?
You may copy the table from the Excel template here.

Criterion	Category	Number of votes (Importance)
increased crop yield	*economic*	*8*
increased fodder production	*economic*	*7*
...	...	...

Step 4 → Scoring of SLM practices made by different groups:

- Please copy the scoring result (matrix) from your Excel template here.
- Did major differences between groups occur?

Step 5 → Analysis and visualisation of results:
Final graph, plus graphs of each of the three categories (if applicable)

Step 6 → Prioritisation of practices:
Which SLM practice(s) (technologies) has been selected for test implementation? And why?

Please provide a brief description of the context in which it will be implemented:

- **On which land use type will the SLM practice be applied?** Land use type(s): ……..
- **If land use will change due to the implementation of the practice, indicate land use type before and after:**
  Original land use (before implementation):
  .....
  Future (final) land use (after implementation)(if relevant):
  .....
- **Land users who will apply the practice**
  tick one option per line
  Individual/household □ groups / community □ cooperative □ employee (company, government) □
  Small scale land users □ medium scale land users □ large scale land users □
  Leaders / privileged □ common / average land users □ disadvantaged land users □
  Mainly women □ mainly men □ mixed □

Embedding into overall strategy (optional)
Which conclusions have been drawn from the discussion? Which are the commitments made by the stakeholders?

III Evaluation of the workshop

Evaluation of contents and methodology of the workshop:

- By participants (local and external)
- By the moderator(s)

IV Other information

Difficulties encountered:

Changes made concerning the procedure as suggested in the workshop guidelines:

How was the interest and participation of the different stakeholder groups in the workshop?

Recommendations:

Comments:

Annex 5: Calculation example

Objective: Combat wind erosion

Practices selected:

- Shelterbelts
- Synthetic stabilisers
- Reduction of field width
- Strip cropping
- Minimum tillage

Criteria selected (minimum 2 in each category), and ranking

Criterion	Category	Rank (weight)
increased crop yield	economic	1
increased fodder production	economic	2
increased cultural opportunities (e.g. spiritual, aesthetic, others)	socio-cultural	3
increased recreational opportunities	socio-cultural	4
improved water quantity	ecological	5
improved water quality	ecological	6

Scoring results

	increased crop yield	increased fodder production	increased cultural opportunities	increased recreational opportunities	improved water quantity	improved water quality
Shelterbelts	1	5	4	3	2	2
Synthetic stabilisers	5	5	2	3	3	5
Reduction of field width	2	2	1	3	5	5
Strip cropping	3	3	2	1	4	5
Minimum tillage	1	2	3	2	1	2

Results normalised from 0 to 1:

	increased crop yield	increased fodder production	increased cultural opportunities	increased recreational opportunities	improved water quantity	improved water quality
Shelterbelts	**0**	**1**	**0.75**	**0.5**	**0.25**	**0.25**
Synthetic stabilisers	1	1	0.25	0.5	0.5	1
Reduction of field width	0.25	0.25	0	0.5	1	1
Strip cropping	0.5	0.5	0.25	0	0.75	1
Minimum tillage	0	0.25	0.5	0.25	0	0.25

Calculating the results range for all practices

The criteria table above shows a total "importance" ordering on criteria *c*, e.g. *c*0 > *c*1 > *c*2 > *c*3. The intent of the algorithm used here is to assign weights *w* to these criteria such that *w*0 > *w*1 > *w*2 > *w*3. This algorithm achieves this by producing a sequence of estimations *v* of the value of the criterion by considering only c0; only c0 and c1; only c0, c1, and c2; and all criteria. The more important criteria receive extra weight by virtue of being considered in more values of *v*.

When considering n criteria, each criteria is weighted 1/n. To find the minimum value of *v*, we need to find the minimum combination of the minimum values of the child criteria. The values for *v*min then are:

1. *vmin0 = cmin0*
2. *vmin1= cmin0 / 2 + cmin1 / 2*
3. *vmin2= cmin0 / 3 + cmin1 / 3 + cmin2 / 3*
4. *vmin3 = cmin0 / 4 + cmin1 / 4 + cmin2 / 4 + cmin3 / 4*
5. *etc.*

The minimum of the range for a practice is than determined as:
min{vmin0, vmin1, vmin2, vmin3, ...}, and the maximum as
max{vmax0, vmax1, vmax2, vmax3, ...}.

Vector for Shelterbelts:
{*v*min0, *v*min1, *v*min2, *v*min3, *v*min4, *v*min5, vmin6}
{**0**, (**0**/2 + **1**/2), (**0**/3 + **1**/3 + **0.75**/3), (**0**/4 + **1**/4 + **0.75**/4 + **0.5**/4), (**0**/5 + **1**/5 + **0.75**/5 + **0.5**/5 + **0.25**/5)+ (**0**/6 + **1**/6 + **0.75**/6 + **0.5**/6 + **0.25**/6 + **0.25**/6)}, or:
{**0**, 0.5, **0.583**, 0.563, 0.5, 0.458}
→ minimum value in this vector is: 0
→ maximum value in this vector is: 0.583
→ the resulting bar for shelterbelts stretches from 0 to 0.583

Vector for Synthetic stabilisers: {**1**, **1**, 0.75, 0.69, **0.65**, 0.71}
→ minimum value in this vector is: 1
→ maximum value in this vector is: 0.65

Vector for Reduction of field width: {0.25, 0.25, **0.17**, 0.25, 0.40, **0.50**}
→ minimum value in this vector is: 0.17
→ maximum value in this vector is: 0.50

Vector for Strip cropping: {**0.5**, **0.5**, 0.42, **0.31**, 0.40, **0.50**}
→ minimum value in this vector is: 0.31
→ maximum value in this vector is: 0.50

Vector for Minimum tillage: {**0**, 0.13, **0.25**, **0.25**, 0.20, 0.21}
→ minimum value in this vector is: 0
→ maximum value in this vector is: 0.25

Resulting plot for discussion of results and decision-making