

Tool 2-4

Participatory scoring of rangeland condition

November 2018

Tool 2-4 Participatory scoring of rangeland condition

Objective

The rangeland management institution develops a system for periodic assessment of rangeland condition using participatory scoring

Anticipated output

Regular and repeated assessments of rangeland condition documented in the rangeland management institution's records

Participants in this activity

- Knowledgeable community members representing different stakeholder groups in the rangeland unit (to do the scoring)
- Members of the rangeland management institution (to keep records and analyze the scoring)

When to use this tool

This tool relates primarily to step eight of the participatory rangeland management (PRM) process—participatory monitoring and evaluation—but can also be useful at step three for carrying out the rangeland resource assessment. (See Tool G-2 for a description of the stages and steps in PRM.)

Introduction

Monitoring rangeland condition and evaluating the effectiveness of management are important aspects of strengthening the Second Leg of rangeland management and will ultimately determine the success of the PRM process. Communities need to develop their own monitoring and evaluation (M&E) systems as part of taking up or strengthening their rangeland management roles. One relatively simple and inexpensive method is the use of participatory scoring. With this method, focus groups made up of different stakeholders within the community will assess rangeland condition based on the knowledge that they have. This approach becomes most useful when it is repeated at regular intervals.

The scoring can be done for the rangeland unit as a whole; or different zones within the rangeland unit can be identified, and each scored separately. The facilitator of the focus group discussions should ensure that all participants are clear on the geographical area(s) being assessed. These participatory scoring exercises can be further triangulated through other monitoring methods. See, for example, Tools 2-2 and 2-3.

Steps

Step 1: Identify indicators, scoring criteria and the unit(s) for assessment

- Develop a list of indicators of rangeland condition/pasture quality with the rangeland management institution or with a focus group of local experts.
- Establish scoring criteria for each indicator (e.g. what will a score of 1/5 mean? What will a score of 2/5 mean? etc.). If criteria are not elaborated for every score, they should at least be elaborated for the lowest and highest scores.
- Phrase all indicators positively so that the higher score is always better (e.g. not 'invasive species' but 'freedom from invasive species'). See Table 2-4-1 for an example.
- If the indicators and criteria are developed by a group of local experts, share the list with the rangeland management institution for their approval.
- The rangeland management institution should decide if the assessment will be done for the rangeland unit as a whole, or if different areas within the rangeland unit will be identified for each to be assessed separately.

Indicator	Criteria for a					
	Score of I	Score of 2	Score of 3	Score of 4	Score of 5	
Freedom from bushes/invasive species	The rangeland is dominated by undesirable species.				Bush encroachment and invasive species are rare.	
Presence of most desirable species	The favoured forage species have completely disappeared from the rangeland.		The favoured forage species can be found but are not plentiful everywhere.		The favoured forage species are plentiful throughout the rangeland.	
Overall assessment of quantity of forage	Forage is insufficient to feed moderate herds even in good rainfall years.		Forage is sufficient in the rainy season but not in the dry season.		Forage is plentiful in most of the rangeland, except in drought years.	
Absence of bare ground	There are large areas of bare ground and most sections of the rangeland unit have significant bare areas.				Bare ground is rare across the rangeland.	

Table 2-4-1: Sample list of indicators and scoring criteria

Step 2: Identify and mobilize focus groups for the scoring based on stakeholder groupings within the rangeland unit

Different groups within the rangeland unit may have different priorities, perceptions and knowledge. Therefore, it
is preferable to have different groups carry out the rangeland condition assessment independently. For example,
in a community where there are cattle-keeping pastoralists and camel-keeping pastoralists, each group may have
different preferences for species of forage. Poorer people who have only small stock may have different preferences
than someone who is rich and has a very large herd. Different zones or villages within a rangeland unit may also
have different views.

- The rangeland management institution should have the final decision on what groupings to use.
- If the rangeland condition assessment is to be done for different areas within the rangeland unit, then it is important to be sure that the focus groups are knowledgeable about the area(s) being assessed. In some cases, it may be necessary to use different focus groups for different areas.
- Ideally, there should be three to four focus groups for each area being assessed.

Step 3: Hold the scoring focus groups

For each focus group:

- Explain the exercise.
- Explain the indicators chosen at step one and the scoring criteria for each.
- The group may add indicators to the list if they wish.
- If the rangeland management institution is using other observational methods of rangeland monitoring (see, for example, Tools 2-2 and 2-3). The focus group can review the findings of that monitoring exercise.
- Have the group discuss and agree upon a score for each indicator from 1 to 5 based on the scoring criteria.
- Record reasons for the scores and other comments.
- Discuss perceptions of changes in rangeland condition generally. Discussions should try to capture what aspects of change can be attributed to specific interventions.
- Take detailed notes.

Worksheet 2-4-2 provides a template for recording scores.

Step 4: Consolidate the scores from the different focus groups

Create a table summarizing all the scores, calculating an average for each indicator (see example in Table 2-4-2 below).

Table 2-4-2: Sample consolidation of focus group scores

Indicators	FG 1:Women	FG 2: Men	FG3: Minoritytribe men	FG4: Elders	Average
Freedom from bushes/invasive species	<u>3</u>	<u>3</u>	2	<u>3</u>	<u>2.75</u>
	5	5	5	5	5
Presence of most desirable species	<u>2</u>	<u>2</u>	<u>3</u>	<u>2</u>	<u>2.25</u>
	5	5	5	5	5
Overall assessment of quantity of forage	<u>4</u>	<u>3</u>	<u>4</u>	<u>3</u>	<u>3.5</u>
	5	5	5	5	5
Absence of bare ground	<u>3</u>	<u>2</u>	<u>3</u>	<u>3</u>	<u>2.75</u>
	5	5	5	5	5
Overall score	<u>3.0</u>	<u>2.5</u>	<u>3.0</u>	<u>2.75</u>	<u>2.8</u>
	5	5	5	5	5

If separate scoring is done for different monitoring areas within the rangeland unit, create a table like this one for each monitoring area.

Step 5: Repeat the scoring at regular intervals, keep all the records of the scores and comments and summarize the consolidated scores from each interval as in Table 2-4-3.

Indicators	2010 Score	2014 Score	2018 Score	
Freedom from bushes/ invasive species	<u>2.75</u> 5	<u>2.4</u> 5	<u>3.0</u> 5	
Presence of most desirable species	<u>2.25</u> 5	<u>1.6</u> 5	<u>2.0</u> 5	
Overall assessment of quantity of forage	<u>3.5</u> 5	<u>3.0</u> 5	<u>3.4</u> 5	
Absence of bare ground	<u>2.75</u> 5	<u>3.0</u> 5	<u>3.2</u> 5	
Overall score	<u>2.8</u> 5	<u>2.5</u> 5	<u>2.9</u> 5	

Table 2-4-3: Example of long term record of periodic assessments

If separate scoring is done for different monitoring areas within the rangeland unit, create a table like this one for each monitoring area.

The first time the scoring is done, focus groups could also be asked to score some historical period based on their memory of conditions at that time. The ability to assess changes in rangeland condition over time (including comparing to a time before the current PRM process began) is where the real value of this approach lies.

Strengths and weaknesses of participatory scoring

Participatory scoring of rangeland condition is most effective when combined with other methods. See Tools 2-2 and 2-3, for another method of rangeland method based on direct observation.

Table 2-4-4: Strengths and weaknesses of participatory scoring

Strengths	Weaknesses
Can be done very quickly	Can be subjective
Requires little effort and material resources	Tends not to generate knew knowledge for community members as much as other approaches based on direct observation
Draws on existing knowledge of the community members	May not be accepted by outside stakeholders as valid

Participatory scoring of rangeland condition Worksheet 2-4-1

List of indicators and scoring criteria

Date: _____

	Criteria for a					
Indicator	Score of I	Score of 2	Score of 3	Score of 4	Score of 5	

Participatory scoring of rangeland condition

Worksheet 2-4-2 Scoring record

Date:

Name of territory being assessed/scored: _____

Focus group identity: ___

(What stakeholder category? Women, men, committee members, etc.)

Names of participants:

Indicator	Score/5	Explanation/comments

This document is part of the Participatory rangeland management toolkit for Kenya, an initiative led by the International Livestock Research Institute (ILRI). This tool was adapted from an earlier ILRI publication. Development of this tool benefited from financial assistance from the Restoration of degraded land for food security and poverty reduction in East Africa and the Sahel: taking successes in land restoration to scale project, led by the World Agroforestry Centre (ICRAF) with funding from the International Fund for Agricultural Development (IFAD) and the European Union; and from the United States Agency for International Development Feed the Future Kenya Accelerated Value Chain Development (AVCD) program.

Photo credit: ILRI

Citation: Robinson, L.W. 2018. Participatory scoring of rangeland condition. Tool 2-4 of the Participatory rangeland management toolkit for Kenya. Nairobi, Kenya: ILRI.



This publication is licensed for use under the Creative Commons Attribution 4.0 International Licence. To view this licence, visit https://creativecommons.org/licenses/by/4.0.



The project, Restoration of degraded land for food security and poverty reduction in East Africa and the Sahel: taking successes in land restoration to scale, is led by the World Agroforestry Centre (ICRAF) and funded by the International Fund for Agricultural Development (IFAD) with support from the European Union.



The main goal of the Kenya Accelerated Value Chain Development (AVCD) program under the Feed the Future initiative is to sustainably reduce poverty and hunger in the Feed the Future zones of influence in Kenya.



The International Livestock Research Institute (ILRI) works to improve food security and reduce poverty in developing countries through research for better and more sustainable use of livestock. ILRI is a CGIAR research centre. It works through a network of regional and country offices and projects in East, South and Southeast Asia, and Central, East, Southern and West Africa. ilri.org



CGIAR is a global agricultural research partnership for a food-secure future. Its research is carried out by 15 research centres in collaboration with hundreds of partner organizations. cgiar.org

Patron: Professor Peter C Doherty AC, FAA, FRS Animal scientist, Nobel Prize Laureate for Physiology or Medicine–1996

Box 30709, Nairobi 00100 Kenya Phone +254 20 422 3000 Fax +254 20 422 3001 Email ilri-kenya@cgiar.org ilri.org better lives through livestock

Box 5689, Addis Ababa, Ethiopia Phone +251 11 617 2000 Fax +251 11 667 6923 Email ilri-ethiopia@cgiar.org

ILRI is a CGIAR research centre