



***Evaluating Natural  
Resource Management in  
the context of smallholder  
agricultural development:  
IFAD's experience***

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# Purpose of the presentation

- Share the journey of institutional thinking of the International Fund for Agricultural Development (IFAD) on environment and natural resource management and Independent Office of Evaluation (IOE) on evaluating environment and natural resource management (henceforth referred to as ENRM)
- Deliberate on the methods and methodology that accompanied such evolution
- Learn from others on their experiences

# IFAD and significance of ENRM to its work

- IFAD, an IFI focussing on agricultural and rural development
- Environment and natural resource management play an intrinsic role in agriculture sector.
- Climate change has added to complexity of ENRM and the manner in which issues around it need to be addressed
- Evaluating ENRM has evolved accordingly

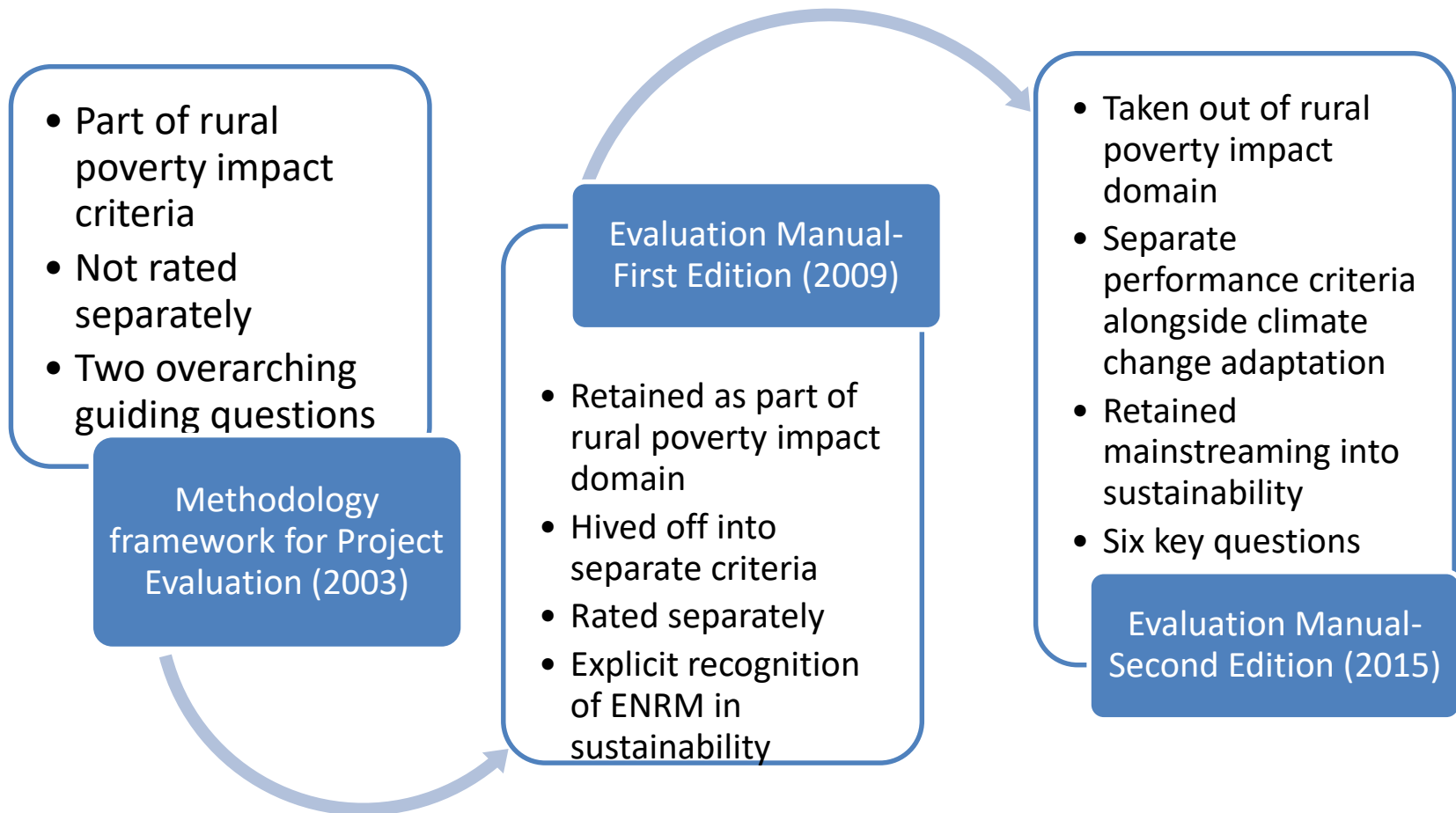
# Evolution of NRM in IFAD

	IFAD strategy 2007-10	IFAD strategy 2011-15	IFAD strategy 2016-25
<b>Objective</b>	<i>Poor rural men and women are able to sustainably and efficiently utilize and manage natural resources such as land and water</i>	<i>A strengthened natural resource and economic asset base for poor rural women and men that is more resilient to <b><u>climate change</u></b>, environmental degradation and market transformation</i>	<i>Strengthen the <b><u>environmental sustainability and climate resilience</u></b> of poor rural people's economic activities</i>
<b>Nature of recognition of ENRM</b>	Explicit focus on access to natural resources for productive activity. No mention of climate change in the objectives	Recognition in the context of climate change	Recognition in the context of climate change and resilience
<b>Thematic focus</b>	Not mentioned	Environment and climate change mentioned as thematic areas of focus	Environment and climate change mentioned as thematic areas of focus

# Changes in institutional setup

- Establishment of environment and climate division for mainstreaming
- Inclusion of indicators pertaining to ENRM in IFAD's results measurement framework
- Harmonization agreements between IOE and IFAD management signed mean that ENRM was also incorporated into the self-evaluation systems
- Regional climate and environment specialists appointed to mainstream ENRM and climate change into IFAD programming.

# Evolution of evaluation methodology on ENRM

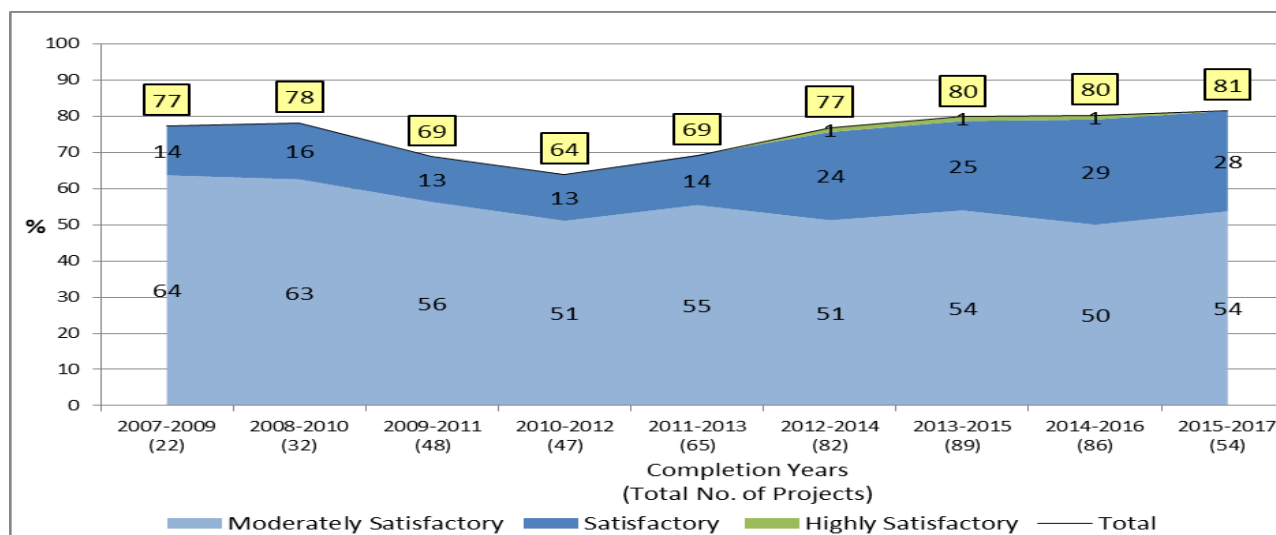


# Evaluation Questions

Methodology framework for Project Evaluation (2003)	Evaluation Manual-First Edition (2009)	Evaluation Manual-Second Edition (2015)
Change in status of the natural resources base	Change in status of the natural resources base	Extent of project's adoption of approaches/measures for <b>restoration</b> or sustainable management of natural resources
Change in exposure to environmental risks	Change in communities' access to natural resources	Extent to which project developed the capacity of community groups and institutions to <b>manage environmental risks</b>
	Change in the degree of environmental vulnerability	Contribution to reducing the environmental vulnerability of communities and building resilience
		Contribution to long-term environmental and social sustainability
		Following required environmental and social risk assessment procedures

# Accumulated knowledge on ENRM

- Body of evaluation knowledge and rating in ENRM to report on trends and performance at corporate level in the form of **Annual Report on Results and Impact (ARRI)**



- **2016: Evaluation Synthesis** of IFAD's support to Environment and Natural Resource Management. A synthetic analysis of accumulated evaluative evidence over the years on the topic.
- **2020(foreseen): Thematic evaluation** of IFAD's contribution to smallholder adaptation to climate change



# Methods for collection of ENRM data

- Historically, dependence on the self-evaluation data, mostly qualitative in nature.
  - Validation based on field visits: Interviews, group discussions, observations in the target communities. Proxy indicators when interacting with communities.
- In light of higher recognition in strategic framework and gradual mainstreaming of ENRM, IOE has experimented with **newer methods**.
- Remote Sensing presents a new way of assessing achievement on ENRM. Use of **Normalized Difference Vegetation Index (NDVI)**, as a quantitative measure for triangulation. **Scope for quick and simple triangulation.** Helpful for **site selection**.
- New impact evaluation on a community based natural resource management programme in Ethiopia will collect **statistically significant quantitative data** on specific ENRM related indicators. Likely to be access based indicators.

# Example of satellite imagery used



# Some constraints in using newer methods

- Limited expertise in-house on new methods available. Need to hire short-term specialist
- Transaction and opportunity costs of using GIS tools. Impact evaluations are highly expensive
- Lack of mainstreaming of technology into operational work. E.g. Sites not geotagged during implementation.
- May help you answer “What” question, it doesn’t help in answering the “Why” question.

# Conclusions

- IFAD and IOE's understanding have evolved. So has the nature of interventions.
- Move away from ENRM in a standalone manner to emphasis in the context of resilience and climate change
- This evolution calls for newer methods beyond usual qualitative methods.
- IOE has been experimenting with usage of newer methods such as GIS for low cost acquisition of quantitative data.



**Thank you for  
your attention**

Independent Office  
of Evaluation

 **IFAD**  
Investing in rural people