Financing sustainable, resilient and inclusive solutions to attain SDG 15



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SDG 15 Condensed

- 15.1 Ensure fulfilment of obligations under international agreements
- 15.2 Sustainable management of forests
- 15.3 Land degradation-neutral world
- 15.4 <u>Mountain ecosystems</u>
- 15.5 Halt the loss of biodiversity
- 15.6 Utilization of genetic resources
- 15.7 End poaching and trafficking of protected species
- 15.8 Prevent and reduce the impact of invasive alien species
- 15.9 Integrate ecosystem and biodiversity <u>values</u> into <u>national and local</u> planning
- 15.a Mobilize <u>financial resources</u> to support <u>ecosystems</u>
- 15.b Mobilize <u>financial resources</u> for sustainable <u>forest management</u> and provide incentives to developing countries
- 15.c Support to combat poaching and trafficking of protected species

What are the main technology and innovation solutions and gaps for attaining SDG 15 (terrestrial ecosystems)?

What are the primary <u>obstacles</u> to technology <u>adoption</u> and scaling up?

Messages from literature review

T&I SOLUTIONS and GAPS

- 1) There are many gaps as it regards <u>scientific and economic assessments</u> and these are <u>primary targets for funding</u>.
- 2) "Green" vs. "gray" infrastructure (requires systematic evaluation and takes more time).
- 3) Current and near-term <u>limits in remote sensing</u> monitoring technologies imply the need for in-situ measurements that incur considerably higher costs.
- 4) A promising solution to this gap could be:
 - (1) a wider use of (incentives-based) <u>citizen science</u> that has yet to be explored;
 - (2) <u>data fusion</u> employing multiple sources e.g. satellite and LiDAR, however these are not yet operationalized.

Messages from literature review

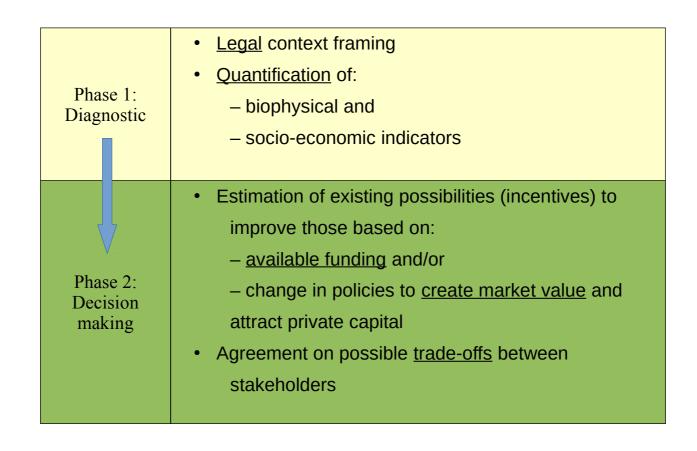
OBSTACLES TO TECHNOLOGY ADOPTION

- 1) <u>Legally binding</u> agreements at the international level are needed to open possibilities for <u>private finance</u>.
- 2) Quantification commonly accepted biophysical and socio-economic <u>indicators</u> are needed.
- 3) The lack of <u>market incentives</u>, <u>insecure land tenure</u> and <u>resource use rights</u> is a major prohibiting factor across many SDTs of the SDG 15.
- 4) In addition to a stronger law enforcement, <u>improving socio-economic</u> situation is a key to many SDTs.
- 5) <u>Long-term</u> strategy, commitments, planning, and <u>funding</u> are a key in the context of the SDG 15.

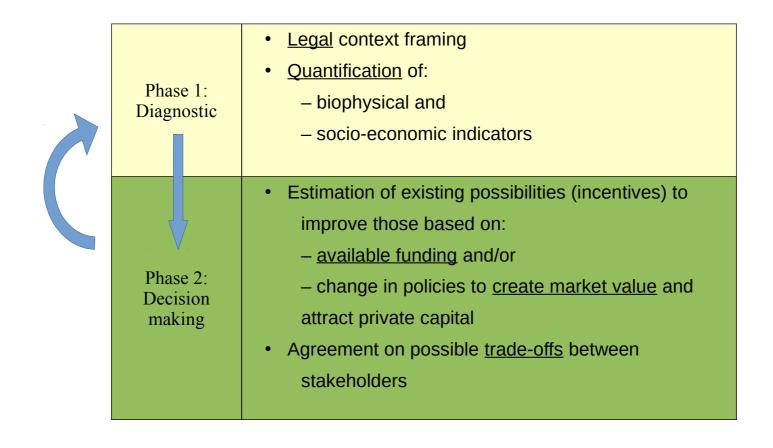
What are the best approaches for <u>addressing</u> <u>financing shortfalls</u> and challenges at different levels (global, national and sub-national)?

Do <u>STI roadmaps</u> hold potential?

- 1) Emergence of a global carbon market could foster valuing ecosystems via REDD and create financial inflow to support actions under SDG 15.
- 2) Approaches based on <u>optionality and benefit sharing mechanism</u> could amplify its positive effect even further.
- 3) Roadmap example implementation at a case/project/higher level:



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Basic Market infrastructure

- Earth observations
- Methods and Models of ES & B
- Standards to price and internalize ES & B value
- Certification & CoC systems
- Env. & social stress testing methodologies
- Capacity building
- Public Grants
- Philantrophic Grants
- Public investment
- PPP standards

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Experimentation & Innovation

- Get (financial) policy portfolios right (learn from controlled experiments)
- Mechanism design for ES payments
- SD Finance innovation labs
- New technologies for systemic change
- Learning networks and platforms
- International public finance IFAD, GEF...
- SD start-up finance
- SD Tech funds
- Network building grant

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Aggregation and Market scaling

- Implementation and refinement of policies
- Aggregate and bundle farm, landscape, jurisdictional scale projects into bankable products
- ES payments and markets
- Infrastructure
- Awareness raising
- M&E
- Public Investments & Subsidies
- Traditional private capital
- Green bonds
- Financial Green financial instruments

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Experimentation & Basic Market Aggregation and Market Innovation infrastructure scaling Get (financial) policy Earth observations Implementation and portfolios right (learn Methods and Models refinement of policies from controlled Aggregate and bundle Standards to price farm, landscape, Mechanism design for ES and internalize ES & B jurisdictional scale projects into bankable SD Finance innovation Certification & CoC products labs ES payments and markets systems New technologies for Env. & social stress Infrastructure systemic change testing methodologies Awareness raising Learning networks and Capacity building M&F platforms International public finance **Public Investments & Subsidies Public Grants** IFAD, GEF... Traditional private capital Philantrophic Grants SD start-up finance SD Tech funds Public investment Financial Green financial PPP standards

What is most important recommendation for the way forward?

- "<u>Foreign</u> direct <u>investment</u> is concentrated in a few sectors in many developing countries and often <u>bypasses countries most in need</u>, and international <u>capital flows</u> are often <u>short-term</u> oriented."
- "We will develop policies and, where appropriate, strengthen regulatory frameworks to better align <u>private sector incentives</u> with public goals, including incentivizing the private sector <u>to adopt sustainable practices</u>, and foster <u>long-term</u> quality investment."
- "We will continue to promote and <u>create enabling</u> domestic and <u>international conditions for</u> inclusive and sustainable <u>private sector investment,..."</u>

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- * long-term
- * private sector
- * creating enabling international conditions

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Anwer:

International ES Market

- * Quantify ES Value
- * Define ES Targets
- * Create FS Market



Thank you!