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**STRATEGIC COUNTRY CLUSTER EVALUATION
OF THE LEAST DEVELOPED COUNTRIES**

(Prepared by the Independent Evaluation Office of the GEF)

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ABBREVIATIONS

AfDB	African Development Bank
APR	Annual Performance Report
CEO	Chief Executive Officer
CI	Conservation International
FAO	Food and Agriculture Organization
GDP	Gross Domestic Product
GEB	Global Environmental Benefit
GEF	Global Environment Facility
IEO	Independent Evaluation Office
IFAD	International Fund for Agricultural Development
IUCN	International Union for Conservation of Nature
LDC	least developed country
LDCF	Least Developed Countries Fund
M&E	Monitoring and Evaluation
SCCE	Strategic Country Cluster Evaluation
SCCF	Special Climate Change Fund
SIDS	small island developing states
SSA	Sub Saharan Africa
STAP	Scientific and Technical Advisory Panel of the GEF
UNDP	United Nations Development Programme
UNEP	United Nations Environment Programme
UNIDO	United Nations Industrial Development Organization
WWF	World Wildlife Fund

EXECUTIVE SUMMARY

Background, Purpose, Objectives, Scope, and Methods

1. LDCs face severe environmental challenges exacerbated by climate change. The most common challenges are deforestation and land degradation, biodiversity loss, and threats to freshwater and marine environments. Water-related challenges—including water quality, threats to marine resources, coastal and coral reef degradation, and threats to inland water resources—are also important. LDCs that are SIDS face further problems related to sea level rise, waste management, and increased effects of natural disasters. About a quarter of the population in LDCs live on severely degraded land. Most of these residents are trying to feed their families by cultivating land that produces far less than it once did. All these environmental issues are exacerbated by climate change.
2. For more than 25 years, the GEF has provided support to address LDCs' diverse environmental challenges on issues such as adaptation to climate change, unsustainable practices in the agriculture sector, land use change and habitat restoration, overexploitation of marine fisheries, as well as the environmentally sound management and disposal of many persistent organic pollutants (POPs) and chemicals. To date, the GEF has invested \$4.68 billion accompanied by \$25.81 billion in cofinancing through 1,435 national and regional projects in LDCs. Seventy-seven percent of this funding came from the GEF Trust Fund, with the Least Developed Countries Fund (LDCF) contributing 20 percent of total funding.
3. Given the GEF's priority in addressing environmental constraints in LDCs through increased allocations, the Independent Evaluation Office (IEO) conducted an in-depth review of the LDC portfolio of projects through a strategic country cluster evaluation (SCCE) approach, based on the countries' common LDC status. The overarching objectives of the evaluation were to (1) provide a deeper understanding of the determinants of the sustainability of the outcomes of GEF support in the LDCs, and (2) assess the relevance and performance of the GEF support toward LDCs' main environmental challenges from the countries' perspective. This evaluation assessed the relevance, performance, and sustainability of GEF interventions based on a desk review of the GEF project portfolio in 47 LDCs from GEF-4 to GEF-6, and on 12 in-depth country case studies. Countries for a case study were selected based on the aggregate and geospatial analysis of the portfolio under review. The evaluation looked closely at the determinants of sustainability by focusing on projects completed between 2007 and 2014. This approach allowed for enough time after completion to evaluate sustainability of outcomes. The evaluation questions were answered through a mixed-methods approach using both quantitative and qualitative analytical tools.

Main Findings and Conclusions

4. **GEF support to LDCs has increased consistently since the pilot phase.** The GEF has long recognized the unique challenges faced by LDCs and has regularly increased its support to LDCs

since the pilot phase to more than \$1.2 billion in GEF-5 and GEF-6. Just over 60 percent of the funding comes from the GEF Trust Fund, and 37 percent from the LDCF.

5. **GEF interventions are relevant to national environmental challenges facing LDCs.** The main interventions of GEF support are well aligned and highly relevant to national environmental priorities facing LDCs. Most of GEF support to LDCs has focused on climate change adaptation to address the effects of a changing climate that exacerbates most environmental challenges in LDCs. Multifocal area interventions—most commonly a combination of biodiversity, land degradation, and climate change including adaptation—have grown to support LDCs to contend with tackle environmental challenges through integrated programming. Review of project documentation in the portfolio and interviews with government officials in case study countries strongly confirmed that GEF interventions are well aligned with governments’ environmental priorities in LDCs. Government officials in countries visited highlighted that the GEF is an important source of funding that fits into their planning.

6. **The relevance of GEF support has not been affected by the GEF shift toward integrated programming.** Since GEF-4, the GEF has been moving toward more integrated programming through multifocal projects and programmatic approaches. Although investment in programs initially increased in GEF-4 and substantially decreased by GEF-6, there has been a shift from single focal area to multifocal interventions and an increase in the size of programs and their respective child projects in LDCs.

7. **The expansion of GEF Agencies has led to more options in terms of access for most LDCs.** The number of GEF Agencies supporting LDCs has increased from 8 during GEF-4 to 12 during GEF-6. For LDCs that are also SIDS, the original three GEF Agencies continued to account for 82 percent of financing in GEF-6, showing that the benefits of expansion are still to be realized. However, no clear trend emerges when looking at GEF Agencies’ comparative advantages in terms of specialized technical knowledge. Countries select GEF Agencies based on several aspects of comparative advantage including their technical area of specialization, their history of engagement with the Agency and the physical presence of the Agency in the country.

8. **The performance of LDC projects is lower than for the overall GEF portfolio.** Analysis of the most recent APR available data from the 2019 cohort shows that completed projects in LDCs are rated lower than the overall GEF portfolio on all performance indicators. Focusing on the ratings of outcomes and the likelihood of their sustainability, 72 percent of projects were rated as having satisfactory outcomes, which is significantly lower than the rating of 80 percent in the overall GEF portfolio. Regarding sustainability of outcomes, 46 percent of LDC projects were rated in the likely range, compared to 63 percent of projects in the overall GEF portfolio. On these dimensions, LDC projects are also rated lower than projects in the Africa and Asia regions, where most LDCs are located. However, projects in LDCs completed more recently have higher ratings than those completed between 2007 and 2014.

9. **Climate change adaptation projects performed better than other focal area projects in LDCs.** Seventy-nine percent of climate change adaptation projects were rated in the satisfactory range for outcomes, and 58 percent were rated as having outcomes likely to be sustained; this was the highest of all focal area projects. The performance of climate change adaptation projects is comparable to the overall GEF portfolio on outcomes and slightly lower than the 63 percent on sustainability. Most of the funding for climate change adaptation interventions is from the LDCF, with small amounts from the SCCF and the GEF Trust Fund Strategic Priority for Adaptation.
10. **Demonstrating sustainability takes time.** This evaluation found that most projects tend to maintain or show higher observed sustainability of outcomes at postcompletion than at the time of the terminal evaluation. This confirms similar findings of the APR 2017 and the recently completed SIDS SCCE. These improvements in sustainability are mainly attributed to the quality of project design as well as to positive changes in the context taking place postcompletion.
11. **Financial sustainability is a challenge in most LDCs.** Of the four dimensions of sustainability financial sustainability is rated the lowest in LDCs. By region, financial sustainability varies widely, with 54 percent of LDC projects rated as likely in terms of financial sustainability in Africa compared to 84 percent in Asia; the range reflects the heterogeneity among LDCs. Limited postcompletion financing is a key context-related hindering factor in most of the country case studies conducted by the three SCCEs. This finding points to the importance of elaborating financial arrangements in the project design that can continue after project completion to deliver benefits over time.
12. **Profitable income-generating activities play a vital role in the sustainability of outcomes in LDCs.** The review of terminal evaluations and postcompletion site visits by country case studies found that many GEF interventions include income-generating activities to link local community benefits to improved environmental management. This approach has been found to lead to tangible outcomes in LDCs, but it is not guaranteed to be a success. Community livelihood interventions in LDCs are more likely to succeed if the proposed activity truly is an alternative livelihood, is well designed, has a positive environmental-socioeconomic nexus, and meets the needs of beneficiaries. Interventions are more likely to be sustainable if they are market oriented and are integrated in development plans and budget.
13. **The inclusion of gender considerations in GEF interventions has increased in LDCs.** The evaluation found a progressive increase in the number of projects completing gender analysis, including gender mainstreaming plans, and incorporating gender in results framework from GEF-4 to GEF-6. Gender considerations in LDCs are taken into account during project implementation even when not addressed at the design stage. Taking gender into consideration is also important for the sustainability of outcomes, as well as for gender equality and women's empowerment.

14. **Climate resilience is addressed in climate change adaptation projects, but rarely in other focal area projects.** Promoting climate resilience is a key aspect in LDCs as demonstrated by the large number of adaptation interventions and the considerable amount of LDCF/SCCF funding in LDCs. While all climate change adaptation projects financed by the LDCF/SCCF and the GEF Trust Fund Strategic Priority for Adaptation included resilience considerations, only 37 percent of nonclimate change adaptation projects showed some evidence of resilience considerations.

15. **Fragility has affected the timely delivery of GEF support as well as outcomes and sustainability of GEF support in LDCs.** Overall, outcome and sustainability ratings show lower ratings for projects implemented in fragile countries in LDCs and those that were not. As observed in country visits by the African Biomes and SIDS SCCEs in Comoros, Guinea, Guinea-Bissau, Kiribati, and Mali, country insecurity and the emergence of fragile situations can significantly delay implementation and outcomes.

Final Remarks

16. The LDC SCCE does not present final recommendations. In light of the current circumstances of the COVID-19 pandemic, which have limited the opportunity for discussion of the conclusions of evaluations, the findings and recommendations from this evaluation will be discussed with various stakeholders and included as part of the Seventh Comprehensive Evaluation of the GEF (OPS7).

1. INTRODUCTION

1.1 Evaluation Background, Purpose, Objectives, Scope, and Methods

1. The Global Environment Facility (GEF) was established to help address global environmental concerns related to biodiversity loss, climate change, land degradation, international waters, and chemical pollution. A priority of the GEF is supporting least developed countries (LDCs), which are characterized by high levels of poverty, serious environmental degradation, and low human and institutional capacities. As a group, LDCs are the most vulnerable countries the GEF supports.

2. For more than 25 years, the GEF has provided support to address LDCs' diverse environmental challenges on issues such as adaptation to climate change, unsustainable practices in the agriculture sector, land use change and habitat restoration, overexploitation of marine fisheries, as well as the environmentally sound management and disposal of many persistent organic pollutants (POPs) and chemicals. To date, the GEF has invested \$4.68 billion accompanied by \$25.81 billion in cofinancing in LDCs.¹ Seventy-seven percent of this funding came from the GEF Trust Fund, with the Least Developed Countries Fund (LDCF) contributing 20 percent of total funding; less than 1 percent came from the Special Climate Change Fund (SCCF).

3. A main conclusion of the Comprehensive Evaluation of the GEF (OPS6) was that although the GEF delivers overall good project performance, likely sustainability of outcomes remains the greatest challenge (GEF IEO 2017). To further explore issues of sustainability, the GEF IEO launched strategic country cluster evaluations (SCCEs) that focus on common themes across clusters of countries involving a critical mass of projects and experience with GEF programming. Given the GEF's priority in addressing environmental constraints in LDCs through increased allocations, the Independent Evaluation Office (IEO) conducted an in-depth review of the LDC portfolio of projects through a country cluster evaluation approach, based on the countries' common LDC status. The LDC SCCE covers 47 LDCs located in Africa, Asia, and Latin America and the Caribbean, based on the UN definition (annex 1). The sustainability analysis is based on the GEF's investment in LDCs since GEF-4: a total of \$3.18 billion. Most of this funding was from the GEF Trust Fund, while 37 percent was from the LDCF.

4. The LDC SCCE assessed the environmental outcomes of GEF interventions and the long-term sustainability of those outcomes. Specifically, the evaluation conducted an in-depth analysis of the project- and context-related factors contributing to or hindering outcome sustainability. A focus of the evaluation was on the nexus between national environment and socioeconomic development priorities as determinants of the observed sustainability in the

¹ Funding figures are as of December 30, 2019, and exclude unallocated parent program financing, funding for dropped and canceled projects, and Agency fees. They also do include project preparation grants.

countries five years postcompletion. The evaluation also assessed gender considerations, climate resilience, fragility, and the private sector as cross-cutting issues affecting GEF support.

5. The overarching objectives of the LDC SCCE were to (1) assess the relevance and performance of the GEF support toward LDCs' main environmental challenges from the countries' perspective, and (2) provide a deeper understanding of the determinants of the sustainability of the outcomes of GEF support in the LDCs. These objectives were translated into five key evaluation questions, three of which address the cross-cutting issues of gender, resilience, and fragility. A detailed description of the evaluation design is provided in the LDC SCCE approach paper (GEF IEO 2018a). The five key questions follow:

- (a) To what extent has GEF support been relevant to the main environmental challenges LDCs face, and are there any gaps?
- (b) What are the key factors influencing sustainability of outcomes in LDCs?
- (c) In what way, if any, does the environment and socioeconomic development–livelihoods nexus help explain the sustainability of outcomes in LDCs?
- (d) To what extent have gender and resilience been taken into consideration in GEF programming in LDCs?
- (e) To what extent has GEF support performed in fragile contexts in LDCs, and how have the results achieved by completed GEF projects and programs been affected in situations that have become fragile?

6. The evaluation was conducted using a mixed-methods approach encompassing both quantitative and qualitative sources of data, information, and analytical tools. The analysis involved an extensive desk study of project and program documents using a project review template and an aggregate portfolio review. The review template and a complete list of projects reviewed are available on the GEF IEO website.² The desk study aimed at identifying trends as well as cases of positive, negative, and no change. In addition, the evaluation conducted four country case studies in Bhutan, Cambodia, Mozambique, and Tanzania. These countries were selected based on the results of the aggregate desk study and portfolio trend analyses, following a rigorously structured selection process (GEF IEO 2019c) and used a standardized country study approach (GEF IEO 2019b). About six projects per country were reviewed in the four country case studies for a total of 25 projects, 12 of which were field verified. Projects reviewed in the four case study countries are listed in annex 2. Geospatial analysis was conducted for four of the projects verified during the case study visits. The

² All documents related to the LDC SCCE are available on the LDC SCCE page of the GEF IEO website: <https://www.gefio.org/evaluations/least-developed-countries-ldc-strategic-country-cluster-evaluation-scce>

purpose of field verifications was to identify and understand the determinants of the observed positive or negative change of outcomes postcompletion.

7. For most evaluation components, the LDC SCCE covered the period from GEF-4 (starting in 2006) to GEF-6. This cohort comprises 833 national and regional interventions. The sustainability analysis focused on national and regional interventions completed between 2007 and 2014. This approach provided enough time after completion to allow observation of long-term sustainability of project outcomes. This sustainability cohort is composed of 173 interventions, of which 123 were analyzed using a detailed project review template. Triangulation of the qualitative as well as quantitative data and information collected was conducted at the completion of the data analysis and gathering phase to determine trends and to identify the main findings, lessons, and conclusions.

8. The portfolio of the LDC SCCE included enabling activities, full- and medium-size projects, as well as programs in the 47 LDCs. Global initiatives and those regional interventions that are set up as umbrella arrangements for administrative convenience, including the Small Grants Programme and the GEF Biosafety Program (GEF ID 3654), were excluded from the evaluation scope.³ The analysis covered all GEF focal areas, although it primarily centered on climate change adaptation and multifocal interventions composed of biodiversity, climate change adaptation and mitigation, and land degradation. Other areas covered were land degradation, international waters, climate change mitigation, and POPs and chemicals and waste.

9. In line with IEO practice, stakeholder engagement and quality assurance measures were established for this evaluation. A reference group, composed of representatives from the GEF Secretariat, the GEF Agencies, and the GEF Scientific and Technical Advisory Panel (STAP) provided feedback and comments on the approach paper (GEF IEO 2018a), the preliminary findings, and the draft evaluation report. The Director of the Evaluation Office of the United Nations Environment Programme (UNEP) served as an external peer reviewer.

10. The LDC SCCE encountered two limitations in the course of the evaluation: (1) the unreliability of the GEF Project Management Information System (PMIS) data on projects and programs, especially on status; and (2) the limited number of field visits conducted (only 4 of 47 countries were visited). The first limitation, common to several GEF IEO evaluations, was mitigated by cross-checking the PMIS portfolio information with GEF Agency management information systems before undertaking any analysis. To ensure that the evaluation used the most recent project and financial information, the PMIS data were further cross-referenced and updated with the new GEF portal data management system that has replaced the PMIS. The second limitation was addressed by conducting field missions to countries jointly with those conducted in parallel with SCCEs, as well as other evaluations conducted by the IEO, to increase field coverage. Notably, the LDC SCCE was conducted in parallel with two other SCCEs: one

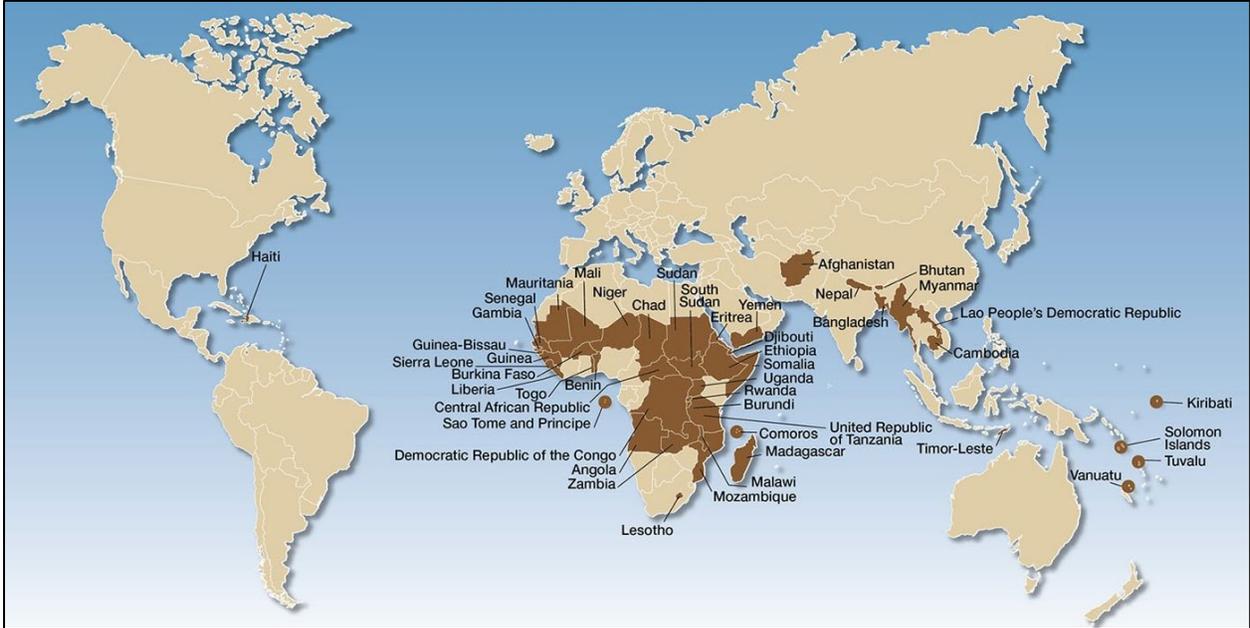
³ The excluded interventions account for \$522 million, or 15 percent of all financing to LDCs between GEF-4 and GEF-6.

covering two Sub-Saharan African biomes, the Sahel and the Sudan-Guinea savanna, and a second covering the other small island developing states (SIDS). The African Biomes SCCE is being submitted to the GEF Council at this June 2020 session; the SIDS SCCE was presented in December 2019. The three evaluations used a similar approach and methodology and were harmonized in terms of key questions, portfolio review, and country study approach. These SCCEs have each conducted country case studies in four LDCs—Guinea, Mali, Mauritania, and Uganda, and the SIDS Comoros, Guinea Bissau, Kiribati, and Vanuatu—that the LDC SCCE has drawn on for evaluative evidence. Hence, in total for all SCCEs, 72 projects in LDCs were reviewed, of which 36 were field verified (annex 1).

1.2 The LDC Context

11. LDCs are low-income countries confronting severe structural impediments to sustainable development. These countries have low levels of human assets and are highly vulnerable to economic and environmental shocks. The United Nations (UN) General Assembly created the LDC category in 1971. The number of countries classified as LDCs has increased over time from 25 to 47, with only 5 countries having graduated.⁴ Of the 47 countries on the list of LDCs, 9 are also SIDS. More than two-thirds of all LDCs are in Sub-Saharan Africa (33), while the remaining countries are in Asia and the Pacific (13), and Latin America and the Caribbean (1) (see Map 1 and annex 1).

Map 1: Map of the Least Developed Countries



Source: [United Nations conference of Trade and Development, 2020.](#)

⁴ The following countries have graduated: Botswana (1974), Capo Verde (2007), Maldives (2011), Samoa (2014), and Equatorial Guinea (2017) ([OECD 2016](#)).

12. The UN established criteria for LDC classification in 1991 that have been adjusted over time (UN DESA). Currently the UN uses three criteria to classify LDCs: low per capita gross national income (GNI),⁵ low level of socioeconomic development, and high structural vulnerability to exogenous economic and environmental shocks. LDCs represent the poorest and weakest segment of the international community, with a per capita GNI of \$1,025.⁶ Some 1 billion people live in LDCs; 36 percent of the population lives on less than \$1.90 per day (UN-OHRLLS 2019).

13. Most LDCs are characterized by a low level of socioeconomic development. They have weak human and institutional capacities, low and unequally distributed income, gender inequality, and scarce domestic financial resources. LDCs often suffer from governance crisis, political instability, and, in some cases, internal and external conflicts. Their largely agrarian economies are affected by a vicious cycle of low productivity and low investment.

14. LDCs rely on the export of a few primary commodities as a major source of earnings; this makes them highly vulnerable to external terms-of-trade shocks. Only a handful of LDCs has been able to diversify into the manufacturing sector, though with a limited range of products in labor-intensive industries, such as textiles and clothing.

15. The environmental shocks LDCs face include natural disasters, weather shocks that do not favor agriculture production, and permanent shocks caused by climate change. LDCs are least able to recover from climate stresses, and their economic growth is highly dependent on climate-sensitive sectors. Environmental shocks potentially affect economic activity, consumption, employment, the well-being of the population, and the natural resource base of economic and social development. Moreover, these shocks are exogenous from the perspective of LDCs—even though the frequency and magnitude of environmental shocks, such as climate change, are to some extent dependent on policy choices made at the international level (Committee for Development Policy 2018).

16. Despite their similarities, LDCs are a diverse group of countries, varying widely in their geography, history, and problems. They comprise a range of small to large countries; SIDS; landlocked countries; and countries suffering from fragility, conflict, and/or violence (FCV). Economically, LDCs growth performance varies widely. LDCs as a group are growing at an average annual rate of 4.6 percent; while some of the larger LDCs are experiencing a growth rate of 7 percent and a number of LDCs are experiencing a contraction (UNCTAD 2019).

LDCs and the UN System

17. The LDC category was recommended at the first UN Conference on Trade and Development in 1964, and a proposal was adopted at the second conference in 1968. The UN

⁵ GNI is equal to gross domestic product (GDP) less primary incomes payable to nonresident units plus primary incomes received from nonresident units.

⁶ This is a three-year average; see <https://www.un.org/development/desa/dpad/least-developed-country-category/lidc-criteria.html>

established the LDC category in 1971 with a view to attracting special international support for the most vulnerable and disadvantaged members of the UN system.

18. Since 1981, the UN system has held several conferences to generate international attention and action to reverse the continuing deterioration of the socioeconomic condition of LDCs. In 2011, the Fourth United Nations Conference on LDCs adopted the Istanbul Declaration and the Istanbul Programme of Action for the decade 2011–20. The program of action takes the form of a mutually agreed compact between LDCs and their development partners and contains eight priority areas of action, each supported by concrete deliverables and commitments. These priorities include productive capacity; agriculture, food security and rural development; trade; commodities; human and social development; multiple crises and other emerging challenges; mobilizing financial resources for development and capacity-building; and good governance at all levels. The action program emphasizes equity at all levels through empowering the poor and marginalized, and ensuring social justice; democracy; gender equality; and sustained, inclusive, and equitable economic growth and sustainable development.

19. LDCs have exclusive access to certain international support measures especially in the areas of development assistance and trade. A small number of trust funds from international organizations have been created for technical assistance specifically for LDCs. The GEF has put an emphasis on supporting LDCs with regard to the environment. To this end, the GEF manages the LDCF to address the special needs of the LDCs, which are especially vulnerable to the adverse impacts of climate change.

20. In line with the UN system of classification a country has access to special support until it graduates from LDC status. To be recommended for graduation, a country is required to meet thresholds for at least two of the three LDC criteria at two consecutive triennial reviews. In 2018, the Committee for Development Policy recommended Bhutan, São Tomé and Príncipe, and the Solomon Islands for graduation. The committee will consider Bangladesh, Lao PDR, and Myanmar for graduation in 2021.

Environmental Challenges

21. Today's LDCs are confronted with myriad environmental issues, of which the most common are deforestation and land degradation and biodiversity loss. Water-related challenges including water quality and quantity, threats to marine resources, and coastal and coral reef degradation are also important (Figure 1). LDCs that are SIDS further face problems related to climate change and sea level rise, waste management, and increased effects from natural disasters. Forests are critical to the development and welfare of LDCs, although rates of deforestation vary greatly across LDCs. For example, in Bhutan and the Democratic Republic of Congo, historical rates of deforestation are very low; in Lao PDR and Tanzania, deforestation is more than twice the global average (Parker et al. 2013). About a quarter of the population in LDCs lives on severely degraded land. Most of these residents are trying to feed their families by cultivating land that produces far less than it once did. Many LDCs are home to the world's

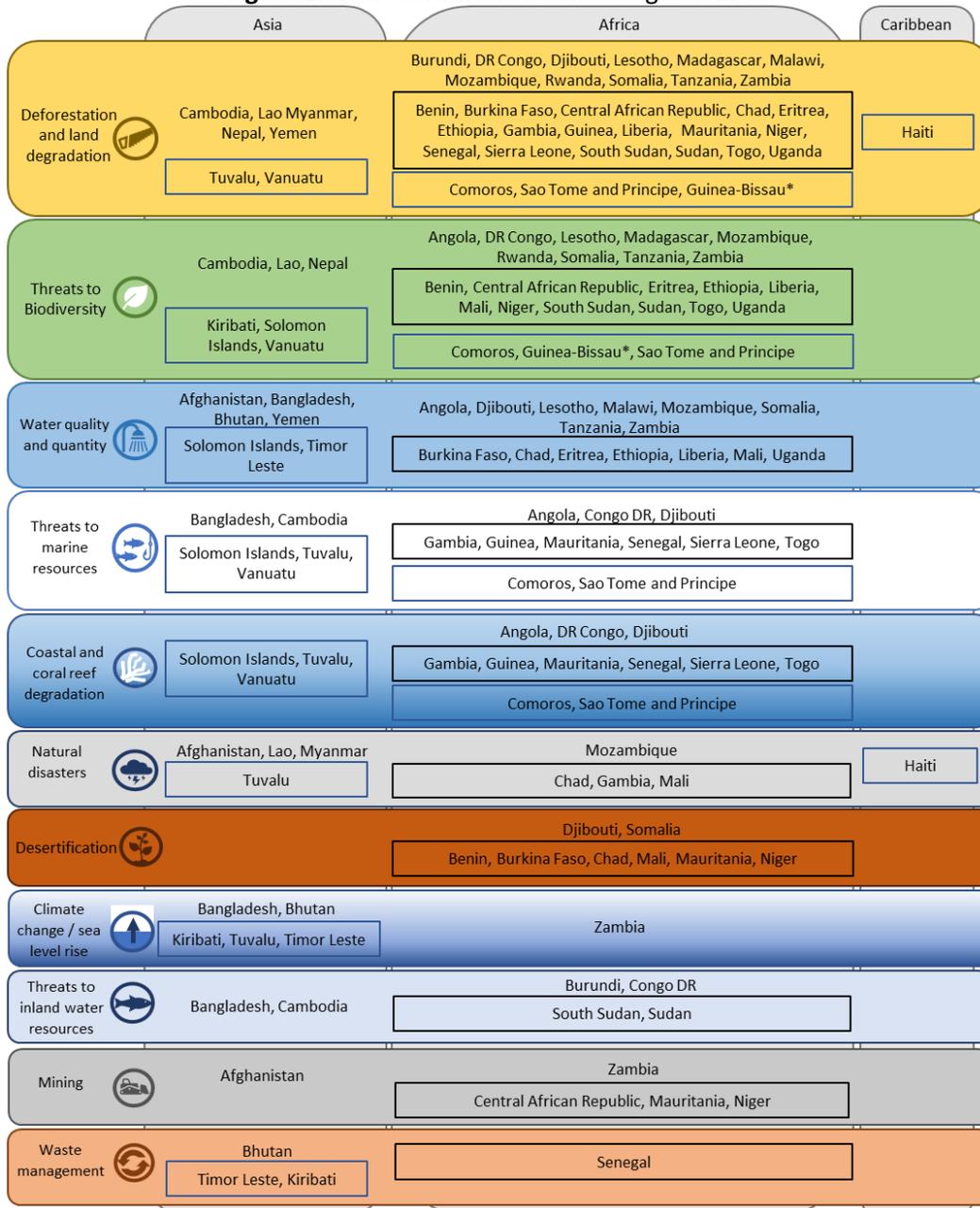
biodiversity hotspots, which are threatened by loss of habitat. All these environmental issues are exacerbated by climate change.

1.3 International Environmental Conventions

22. LDCs are parties to several international and regional environmental agreements. All LDCs have become parties to the main conventions—that is, the United Nations Framework Convention on Climate Change (with the exception of South Sudan), the Convention on Biological Diversity, and the United Nations Convention to Combat Desertification. Most LDCs are also party to the Stockholm Convention on Persistent Organic Pollutants (43 LDCs), the Rotterdam Convention on the Prior Informed Consent Procedure for Certain Hazardous Chemicals and Pesticides in International Trade (39 LDCs), and the Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal (42 LDCs). Only 28 LDCs have ratified the recently established Minamata Convention on Mercury.

23. Some LDCs have joined other regional environmental agreements, such as the Permanent Inter-State Committee for Drought Control in the Sahel; the Abidjan Convention for the Cooperation in the Protection, Management and Development of the Marine and Coastal Environment of the Atlantic Coast of the West, Central and Southern Africa Region; the Nairobi Convention of the Protection, Management and Development of the Marine and Coastal Environment of the Eastern African Region; and the South Pacific Tuna Treaty. A full overview of countries' ratification of international environmental agreements is provided in annex 3.

Figure 1: Main environmental challenges in LDCs



Sources: UN-OHRLLS, [Small Island Developing States in Numbers, – Climate Change Edition](#), 2015; UNEP, Pacific Islands Environmental Outlook, 1999; UNEP, Latin America and the Caribbean: Atlas of our Changing Environment, 2010; UNEP, Africa: Atlas of our Changing Environment, 2008; UNEP, Arab Region Atlas of our Changing Environment, 2013; World Bank, Maldives: Identifying opportunities and constraints to ending poverty and promoting shared prosperity, 2015; World Bank, Timor-Leste: Country Environmental Analysis, 2009; Vanuatu National Environment Policy and Implementation Plan 2016-2030; UNDP, Myanmar Annual Report, 2016; World Bank, Nepal Country Environmental Analysis, 2008; World Bank, Bangladesh-More and better jobs to accelerate shared growth and end extreme poverty, 2015; World Bank, Afghanistan- Systematic Country Diagnostic, 2016; World Bank, Kingdom of Bhutan – Green Growth Opportunities for Bhutan, 2014; World Bank, Lao People’s Democratic Republic- Systematic Country Diagnostic, 2017; World Bank, Cambodia Environment Monitor, 2008.

Notes: Countries in a blue box are covered by the SIDS SCCE. Countries in a black box are covered by the African biomes SCCE. Guinea-Bissau is covered by both SIDS SCCE and African Biomes SCCE; to avoid repetition in the figure Guinea-Bissau was only listed once under SIDS SCCE.

2. GEF ENGAGEMENT IN LEAST DEVELOPED COUNTRIES

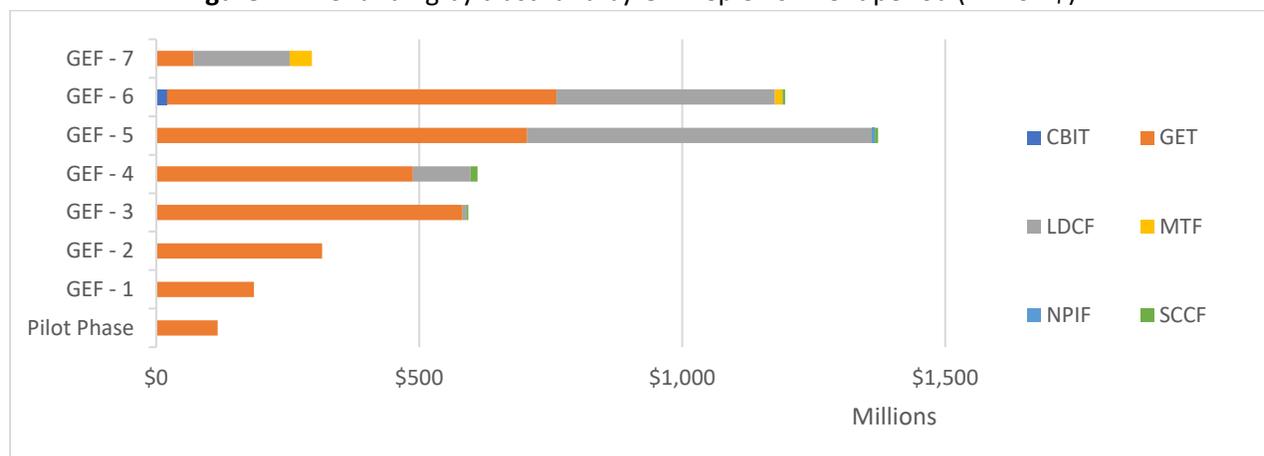
25. This chapter presents an overview of GEF support to LDCs and the composition of the LDC portfolio over the GEF replenishment periods. It also assesses the relevance of GEF support to the national environmental and sustainable development priorities of the countries.

2.1 Portfolio

Funding

26. **GEF support to LDCs increased continuously from its pilot phase, exceeding \$1.2 billion in GEF-5 and GEF-6.** Just over 60 percent of the funding comes from the GEF Trust Fund (Figure 2). This includes System for Transparent Allocation of Resources (STAR) allocations, a special window for SIDS and LDCs under the chemicals and waste focal area, regional funds available under the international waters focal area, resources via the Small Grants Programme, and support for fulfilling convention obligations. During the shortfall in GEF-6, an effort was made to ensure that LDCs were sufficiently funded and as a result, country allocations for LDCs and SIDS were unaffected (GEF IEO 2018b). In GEF-6 the share from the LDCF, which had grown substantially in GEF-5, decreased due to a decline in resources available through the fund. In GEF-7, programming is still ongoing but continued support to LDCs is strong and has reached \$295.8 million. Overall, since its pilot phase, the GEF has invested \$4.68 billion in grants accompanied by \$25.81 billion in cofinancing through 1,435 national and regional projects in LDCs. The 47 LDCs also participate in 83 global projects and 14 global programs totaling \$1.04 billion; among these is the Small Grants Programme, for which a total of \$99.6 million has been provided in GEF-4 and GEF-5.

Figure 2: LDC funding by trust fund by GEF replenishment period (million \$)

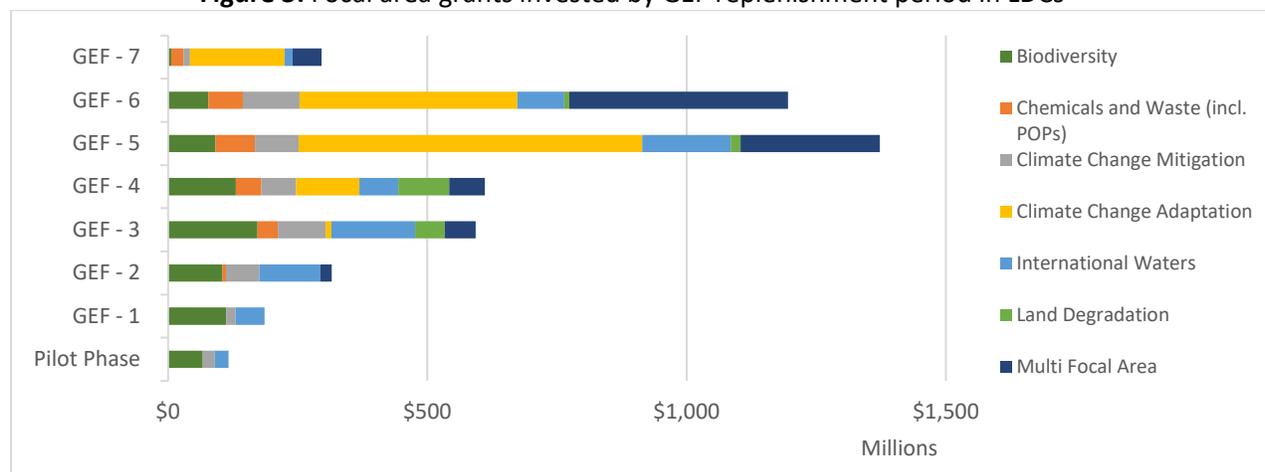


Note: Amounts do not include global interventions and unallocated parent program financing.

27. **The focus of focal area allocations in LDCs has shifted from biodiversity to climate change adaption.** In the pilot phase to GEF-3 biodiversity interventions were the largest share of the GEF portfolio followed by international waters (Figure 3). In GEF-4 the portfolio became

more diversified with biodiversity accounting for 21 percent of project financing, climate change adaptation accounting for 20 percent and land degradation 16 percent. Climate change adaptation interventions were by far the largest share of the GEF portfolio in GEF-5 and GEF-6, followed by multifocal area projects. Multifocal area projects amount to 19 percent of project financing. The most common combination of multifocal interventions in LDCs is biodiversity, land degradation, and climate change including adaptation, accounting for 31 percent of total multifocal area support to LDCs.

Figure 3: Focal area grants invested by GEF replenishment period in LDCs



Note: Amounts do not include global interventions and unallocated parent program financing.

28. Overall, between GEF-4 and GEF-6, the GEF has invested \$3.18 billion in grants accompanied by \$18.97 billion in cofinancing through 833 national and regional interventions in the form of enabling activities, and medium- and full-size projects in LDCs (Table 1). Regional interventions may include non-LDC countries. Twenty-one percent of these interventions are part of 21 programmatic approaches (i.e., projects designed to contribute to the overall program objective). GEF investments in LDCs were also made through 57 global interventions.

Table 1: GEF support by geographic scope and support modality

Intervention scope	Enabling activities		Medium-size projects		Full-size projects		Total	
	Million \$	No.	Million \$	No.	Million \$	No.	Million \$	No.
Country	30.6	120	146.9	132	2,243.0	437	2,420.4	689
Regional	12.3	12	36.1	32	792.7	100	841.1	144
Global	30.8	9	33.3	22	346.4	26	410.5	57
Total	73.7	141	216.3	186	3,382.1	563	3,672.0	890

Note: Totals include \$ 169.67 million unallocated financing remaining in parent programs.

Modality

29. **GEF support to LDCs was delivered predominantly through full-size projects, either as stand-alone initiatives or as part of a program.**⁷ Full-size projects have been by far the most used support modality in LDCs during the last three GEF replenishment periods. Child projects under programmatic approaches account for 21 percent of GEF financing in LDCs (Table 2). Most child projects are full-size interventions, augmenting the stand-alone full-size projects.

Table 2: GEF interventions by support modality

Modality	Number of projects	GEF funding Millions \$
Parent program	21	83.11*
Child project	183	688.97
Enabling activity	111	42.55
Full-size project	413	2,298.36
Medium-size project	126	148.54
Total	833**	3,261.52

Notes: *Total unallocated financing. **This total excludes the 21 parent programs.

30. **Investment in programs increased in GEF-4 but decreased by GEF-6.** The GEF formally introduced the program support modality during GEF-4, in June 2008. At that time, programs constituted approximately 49 percent of total programming in LDCs and 40 percent in LDCs that are also SIDS. Funding for programs decreased substantially afterwards, to 16 percent in GEF-5 and increased to 20 percent in GEF-6. In LDCs that are also SIDS the decrease was to 25 percent in GEF-5 and 9 percent in GEF-6. The shift from programs in LDCs observed between GEF-4 and GEF-6 occurred while the GEF moved progressively toward integrated programming (Table 3). Examples of programs in which LDCs have participated are the 2008 Strategic Investment Program for sustainable land management in Sub-Saharan Africa (GEF ID 2757), the 2011 Great Green Wall Initiative in the Sahel (GEF ID 4511), the LDC and SIDS Targeted Portfolio Approach for Capacity Development and Mainstreaming of Sustainable Land Management (GEF ID 2441), and—for a few SIDS—the 2013 Ridge to Reef in the Caribbean and Pacific (GEF ID 5395).

Table 3: Programmatic and nonprogrammatic support in LDCs by replenishment period

Replenishment period	Support through programs			Nonprogram support		Total*	
	Programs (n)	Child Projects (n)	(\$ million)	Standalone Projects (n)	(\$ million)	Projects (n)	(\$ million)*
GEF-4	7	98	298.28	118	316.04	216	614.32
GEF-5	10	55	218.08	292	1,170.80	347	1,388.88
GEF-6	4	30	255.72	240	1,002.60	270	1,258.33
Total	21	183	772.08	650	2,489.44	833	3,261.52

*Including unallocated parent program financing.

⁷ A program is a coherent set of interventions designed to attain specific global, regional, country, or sector objectives; it consists a variable number of child projects.

31. **Programs and their respective child projects are becoming larger in size, and there is a move from single focal area interventions toward multifocal interventions.** These trends show a change in the way programs are designed and implemented. The size of child projects increased from an average of \$3.0 million in GEF-4 to \$6.4 million in GEF-6. The introduction in GEF-6 of the Integrated Approach Pilots, in which several LDCs participate, contributed to this development. The STAR allocation committed by countries for participating in the Integrated Approach Pilots is matched with a one-to-one dollar incentive from focal area set-aside funding (GEF 2018).

32. **Projects under implementation represent 47 percent of GEF support in terms of funding and number of projects in LDCs.** The majority of these are projects approved in GEF-5. Most of the projects completed in the last three replenishment periods were approved in GEF-4, while most of GEF-6 interventions have been endorsed but have yet to start implementation (Table 4). A substantial number of GEF-6 interventions, 48 projects, are pending approval; 36 of these projects are financed by LDCF, totaling \$241.7 million.

Table 4: Project status by GEF replenishment period

Status	GEF-4		GEF-5		GEF-6		Total	
	Million \$	No.	Million \$	No.	Million \$	No.	Million \$	No.
Pending approval	-	1	20.72	6	303.20	48	323.92	55
PIF/PPG approval or clearance	-	0	0.98	1	3.32	3	4.29	4
Council approved	0.40	3	31.00	23	193.33	40	224.73	66
CEO approved/endorsed	3.50	1	183.33	27	453.48	102	640.31	130
Under Implementation	191.48	65	1,073.40	252	241.24	76	1,506.13	393
Completed/closed	415.27	146	62.77	38	1.00	1	479.03	185
Total	610.65	216	1,372.19	347	1,195.57	270	3,178.41	833

Notes: CEO=Chief Executive Officer. PIF=project identification form. PPG=project preparation grant. Total amounts exclude unallocated parent program financing.

Agencies

33. **The number of GEF Agencies providing support to LDCs increased from GEF-4 onwards.** OPS6 found that the expansion of the GEF partnership to 18 Agencies increased GEF relevance in countries by offering greater choice and focal area coverage. This finding also applies to LDCs. The number of GEF Agencies supporting LDCs has increased from 8 during GEF-4 to 12 during GEF-6. However, the United Nations Development Programme (UNDP), UNEP, and the World Bank—the three original GEF Agencies active since the pilot phase—have the largest share of GEF grants in LDCs. Between GEF-4 and GEF-6, these Agencies implemented 69 percent of projects, corresponding to 72 percent of GEF grants (Table 5), in LDCs.

Table 5: Share of GEF projects and grant amount by GEF Agency

Agency	GEF-4		GEF-5		GEF-6		Total	
	Million \$	No.	Million \$	No.	Million \$	No.	Million \$	No.
ADB	21.4	3	22.2	7	11.6	3	55.2	13
AfDB	7.5	2	132.5	22	79.0	14	219.0	38
BOAD	0	0	0	0	18.9	2	18.9	2
CI	0	0	1.0	1	28.6	9	29.6	10
FAO	35.0	7	141.1	33	113.7	22	289.9	62
GEFSEC*	0	0	1.0	25	0	0	1.0	25
IDB	3.6	1	0	0	1.8	1	5.5	2
IFAD	29.0	9	42.9	7	41.7	6	113.6	22
IUCN	0	0	6.6	1	37.5	10	44.1	11
UNDP	242.7	85	568.8	124	490.3	103	1,301.9	312
UNEP	104.2	53	202.1	57	177.9	60	484.2	170
UNIDO	23.0	16	48.4	42	28.6	20	99.9	78
World Bank	144.2	40	204.7	27	152.6	18	501.5	85
WWF-US	0	0	0.9	1	13.3	2	14.2	3
Total	610.6	216	1,372.2	347	1,195.6	270	3,178.4	833

Note: ADB=Asian Development Bank. AfDB=African Development Bank. BOAD=West African Development Bank.

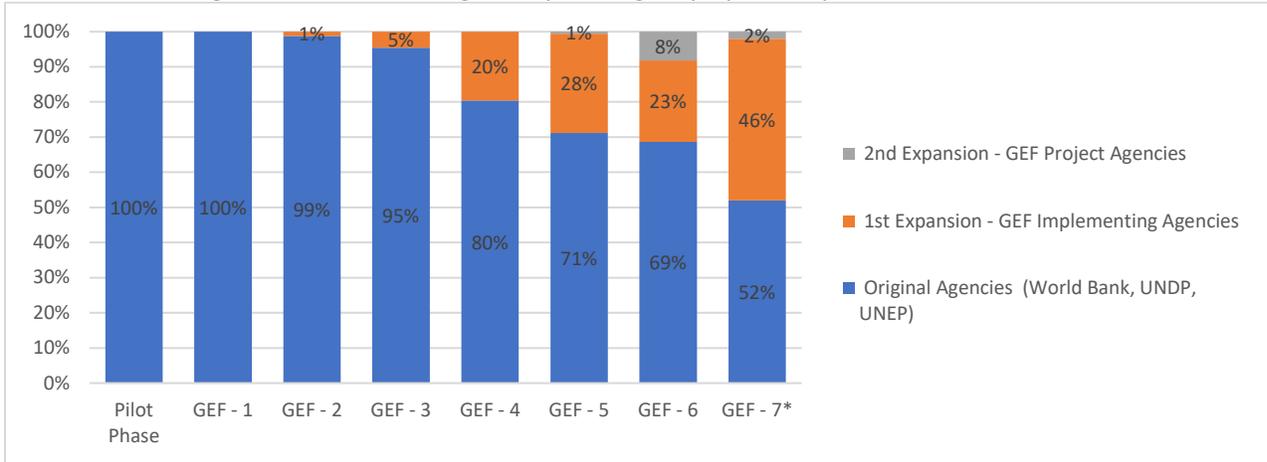
CI=Conservation International. FAO=Food and Agriculture Organization. IDB=Inter-American Development Bank.

IFAD=International Fund for Agricultural Development. IUCN=International Union for Conservation of Nature. UNIDO=United Nations Industrial Development Organization. WWF-US=World Wildlife Fund.

*The GEF Secretariat directly implemented the National Portfolio Formulation Exercises (NPFE) conducted in GEF-5.

34. The share of funding in LDCs of the three original Agencies diminished as new Agencies joined the GEF partnership from GEF-4 onwards, starting with the first expansion to seven more GEF Agencies. This trend continued with the second expansion from 10 to 18 accredited GEF Agencies in GEF-6 (Figure 4). LDCs that are SIDS followed a different trend. By GEF-6, the share of financing by the original GEF Agencies was still at 82 percent compared to 69 percent for all LDCs. The percentage of the second expansion of Agencies is similar in SIDS at 9 percent compared to 8 percent for all LDCs, showing that Agencies of the first expansion have not yet become active in these SIDS. Although GEF-7 is not yet fully programmed, there is a further diversification of GEF Agencies with the financing share of the original GEF Agencies falling to 52 percent. This could be partly explained by a more specific and diversified demand for technical services by recipient countries as well as by the GEF's strategic move from single focal area support toward multisectoral integrated programming through large impact programs.

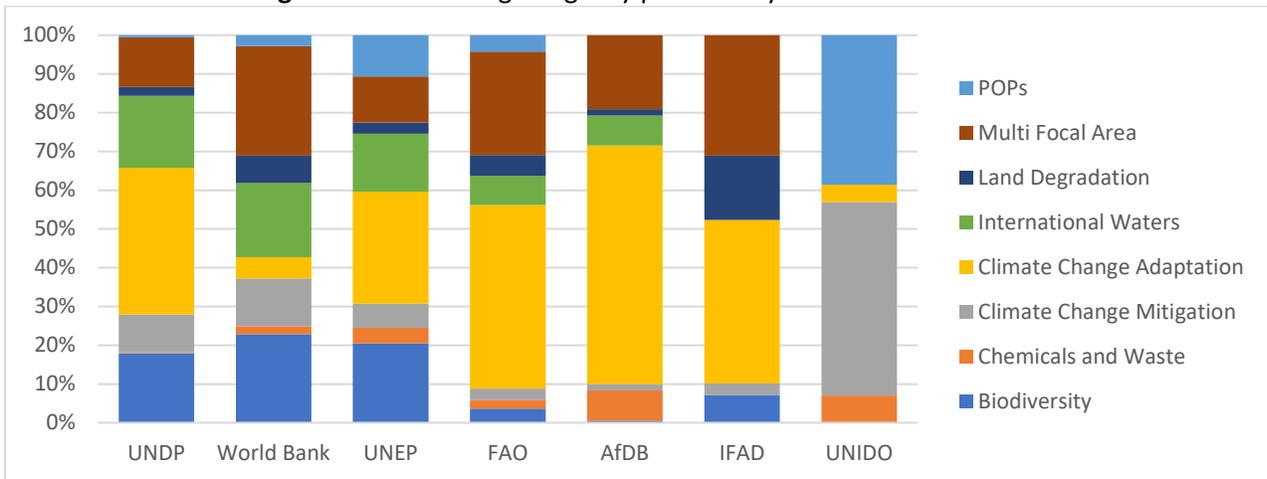
Figure 4: Share of GEF grant by GEF Agency by GEF replenishment in LDCs



Note: *GEF-7 is not yet fully programmed.

35. GEF Agencies active in LDCs are diversified across focal areas. Most GEF Agencies active in LDCs have a rather diversified portfolio in terms of focal area composition, with a higher share of climate change adaptation projects implemented by each Agency, except for the United Nations Industrial Development Organization (UNIDO) and the World Bank (Figure 5). Most GEF Agencies have a high percentage of multifocal projects, with the exception of UNIDO, which has a portfolio composed of POPs, chemicals and waste, and climate change mitigation projects, and does not have any multifocal interventions in its LDC portfolio.

Figure 5: GEF funding in Agency portfolio by focal area in LDCs



Note: The Inter-American Development Bank, International Union for Conservation of Nature, West African Development Bank, and World Wildlife Fund are omitted due to the low number of projects.

36. Countries select GEF Agencies based on several aspects of comparative advantage. From a detailed review of project documents, it clearly emerged that the comparative advantage of a GEF Agency includes (1) the history of engagement between the GEF Agency and the country in which the project is implemented; (2) the GEF Agency’s ability to bring in technical expertise, provide policy support, and strengthen national capacity; and (3) the

Agency's thematic and subject area knowledge through experience with similar projects implemented in the same country or region.

37. Interviews with national stakeholders conducted during country case studies confirmed the above finding. Government officials indicated that the expansion of the GEF Agencies has increased the relevance of GEF support to LDCs' national environmental priorities and has enabled them to work with a range of partners based on their comparative and competitive advantage. For example, Tanzania credits UNDP's technical expertise for the ability to establish the Uluguru and Amani Nature Forest Reserves under the Conservation and Management of Eastern Arc Mountain Forests project (GEF ID 1170). Several officials expressed an interest in working with the World Wildlife Fund based on its expertise in conservation and environmental socioeconomic issues. In a recent priority-setting exercise, the World Wildlife Fund has been selected as the GEF Agency for a project under GEF-7. Another example is Bhutan, where the government appreciates the opportunity to select among GEF Agencies based on comparative advantage, although Agencies physically present in Thimphu are often given preference. These include original GEF Agencies UNDP and the World Bank, as well as the World Wildlife Fund from the second expansion.

Focal Areas

38. **Climate change adaptation accounts for 37 percent of GEF funding to LDCs.** Climate change adaptation and multifocal support make up the majority of the GEF-4 to GEF-6 portfolio in terms of both number of projects and funding (Figure 6 and Figure 7). For LDCs that are SIDS, climate change adaptation accounts for 34 percent of GEF support, followed by international waters at 23 percent and multifocal projects at 22 percent. Funding for climate change adaptation comes almost exclusively from the LDCF (98 percent of total), along with the SCCF and the GEF Trust Fund Strategic Priority for Adaptation,⁸ while most of the funding for multifocal interventions originates from the GEF Trust Fund.

⁸ As a precursor to operationalizing the SCCF and the LDCF, the GEF was mandated to finance pilot projects that would demonstrate the practical and successful use of adaptation planning and assessment. To this end, the GEF established the Strategic Priority for Adaptation in 2003, dedicating \$50 million under its trust fund to finance pilot and demonstration projects aimed at helping countries reduce vulnerability and increase adaptive capacity to the adverse effects of climate change in any or a combination of the GEF focal areas.

Figure 6: Projects by focal area

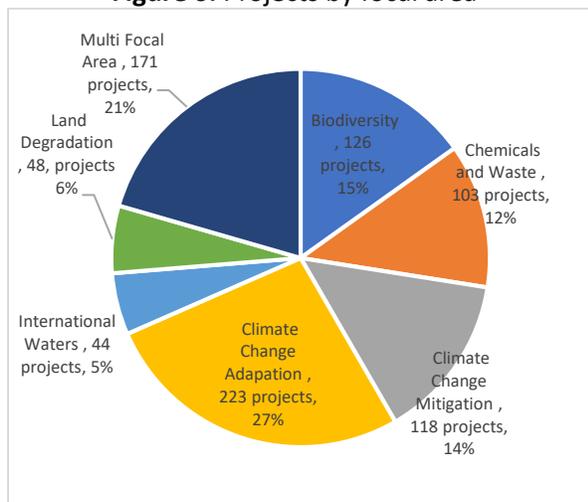
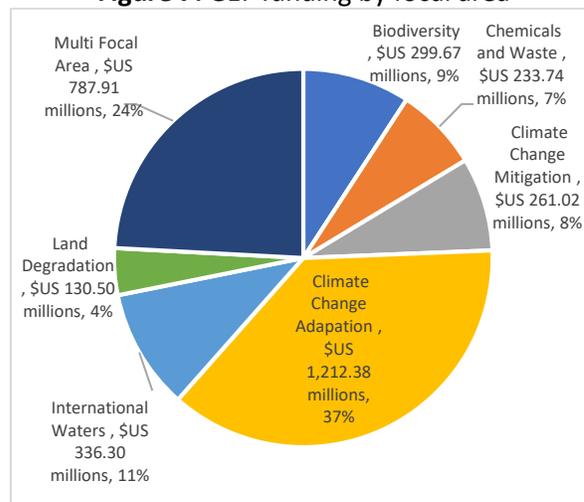
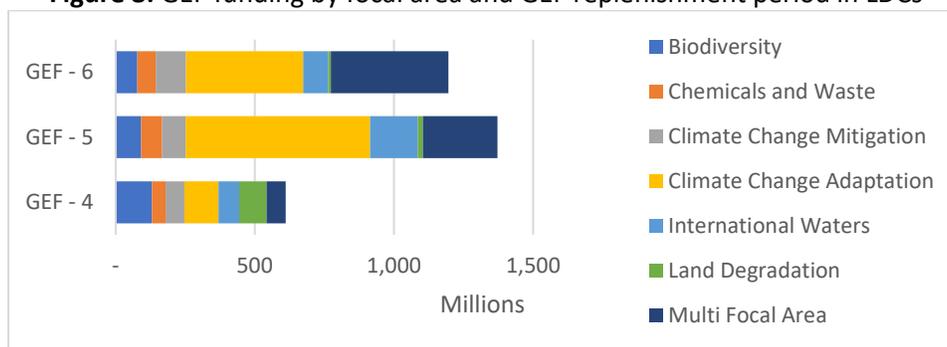


Figure 7: GEF funding by focal area



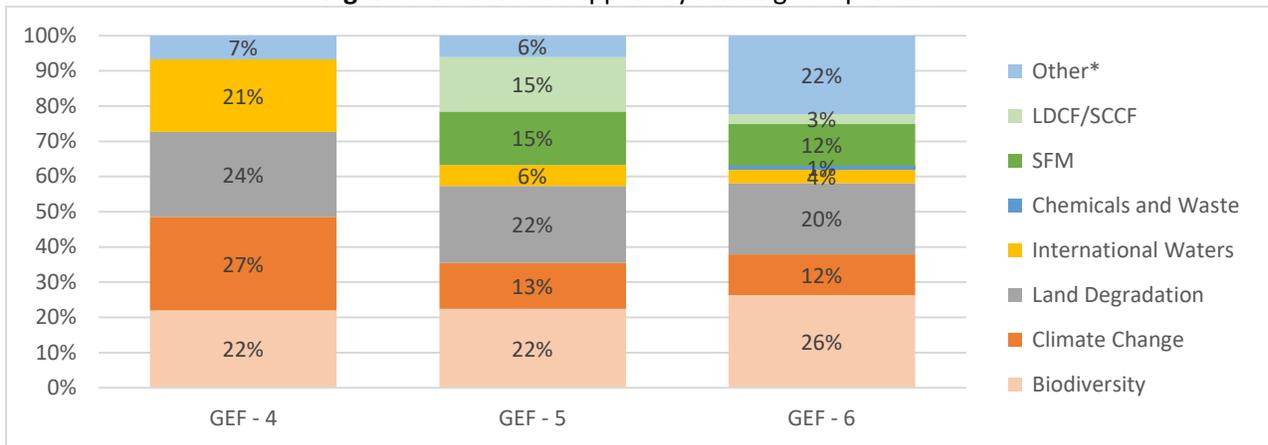
39. **The share of multifocal projects is increasing in LDCs.** The share of multifocal area projects increased from 11 percent in GEF-4 to 20 percent in GEF-5 and 35 percent in GEF-6 (Figure 8). This shift is in line with the GEF’s move toward integrated programming in the overall GEF portfolio. The percentage share for climate change adaption projects has also increased, while shares for land degradation and biodiversity have decreased.

Figure 8: GEF funding by focal area and GEF replenishment period in LDCs



40. The largest percentage of multifocal area projects address biodiversity, land degradation, and climate change during GEF-4 to GEF-6 (Figure 9). Land degradation accounts for at least 20 percent of the funding for multifocal interventions, although its share has been declining slightly since GEF-4. In GEF-5 and GEF-6, the share of sustainable forest management grants in multifocal area interventions has grown. In both GEF-5 and GEF-6, more than 20 percent of the funding for multifocal interventions in LDCs originated from sources other than single focal area allocations. Sources include funding for Integrated Approach Pilots, the LDCF, the SCCF, and funding for multifocal projects not specifically earmarked to any GEF focal area. Except during GEF-5, there is limited adaptation funding in the multifocal area projects. The limited amount during GEF-6 is mainly due to unpredictable funding from LDCF and SCCF. These Funds are replenished through voluntary contributions and pledges had declined, making it challenging to combine adaptation funding with GEF Trust Fund funding in multi-trust fund projects.

Figure 9: Multifocal support by funding component

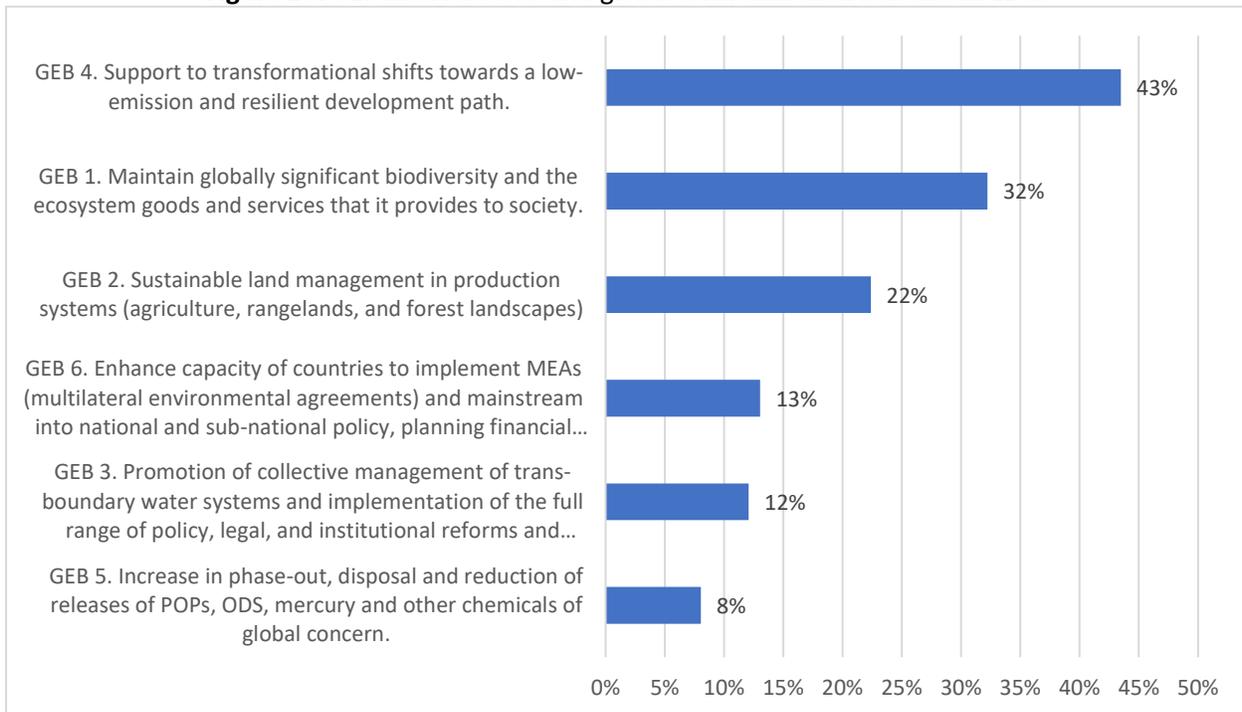


Note: *Includes the Integrated Approach Pilots and Capacity Development programs.

Source: GEF PMIS data provided by GEF Secretariat.

41. Within each focal area, the GEF must ensure support to achieve global environmental benefits. A desk review that examined the most important global environmental benefits in LDCs showed that the main intervention domains include support to transformation shifts toward low-emissions and resilient development paths (43 percent), maintaining globally significant biodiversity (32 percent), and sustainable land management (23 percent) (Figure 10). A review of the environmental domains in the project logical frameworks, results frameworks, and related monitoring tools shows that the most measured domains are deforestation, land degradation, and sustainable land management (27 percent); threats to terrestrial biodiversity (24 percent); climate change adaptation (19 percent); and climate change mitigation (18 percent).

Figure 10: GEF interventions and global environmental benefits in LDCs



Note: n = 621. Several projects address multiple areas of intervention.

2.2 Relevance to National Environmental Challenges

42. **GEF interventions are aligned with the respective government’s environmental priorities in LDCs.** Ninety-three percent of the GEF project documents reviewed describe the project’s relevance to the country’s specific priorities and considered these priorities in the design. In addition, 84 percent of projects include detailed reference to the specific environmental challenges in the country. These challenges are addressed in the project objectives and components. Relevance was also confirmed in country case studies. Government officials in countries visited highlighted that the GEF is an important source of funding that fits into their planning. In Bhutan for example, GEF support is aligned with the long-term development vision of Gross National Happiness and Bhutan 2020: A Vision for Peace, Prosperity and Happiness. Conservation of the environment is one of the nine domains of Gross National Happiness and is integrated into every policy and development plan. Stakeholders interviewed in Cambodia agreed that GEF support has generally been in line with government strategies and policies. GEF activities have contributed to the Cambodia Climate Change Strategic Plan 2014–2023, the Agricultural Strategic Development Plan 2014–2018, and the 2006 National Water Resources Policy. LDCF funding in Vanuatu and Kiribati—both of which countries are very vulnerable to sea level rise—is aligned with government policies and strategies for climate change adaptation and disaster risk reduction and has strengthened the respective national policy framework and strategies for resilience.

43. **GEF support addresses the main environmental challenges faced by LDCs.** Although not explicitly emerging as a direct environmental challenge for LDCs, climate change is addressed by 51 percent of the projects reviewed. In addition to being a major financing window in the GEF as well as in the environmental donor community, climate change acts as a major driver for land degradation, desertification, and water scarcity (Table 6). For 27 percent of the LDC projects reviewed, the respective results framework contains indicators on deforestation and land degradation, including sustainable land management. Indicators on threats to terrestrial biodiversity are included in 24 percent of the projects reviewed; and indicators on climate change and mitigation in 19 and 18 percent of projects, respectively. These findings confirm the strong alignment of GEF support to the main environmental challenges faced by LDCs.

Table 6: National projects addressing the main environmental challenges in LDCs

Country	Climate change	Deforestation, Land Degradation, Desertification	Threats to biodiversity	Threats to marine resources	Water quality and quantity	Coastal and coral reef degradation	Waste management	Threats to in-land water resources	Natural disasters	Air quality and air pollution	Mining
Africa	191	105	94	15	16	13	13	8	8	3	3
Angola	5	5	2			1			1		
Benin	6	3	2	1			1				
Burkina Faso	9	4	5				2	1			1
Burundi	4	4	2	1				1			
Cabo Verde			1	1							
Central African Republic	2	1	1		1		1	1			
Chad	4	4	2	1	1		1	1			1
Comoros	6	4	2	2	1	1				2	
Congo DR	6	1	3		1	1	1		1	1	
Djibouti	5	3		1	2				1		
Eritrea	1	2	1				2				1
Ethiopia	7	6	6				1				
Gambia	7	3	2	1		1					
Guinea	6	2	1	1		2					
Guinea-Bissau	2	3	4		1						
Lesotho	7	1									
Liberia	6	1	4			2					
Madagascar	4	4	6			1					
Malawi	7	4	5		1			1	1		
Mali	7	4	5								
Mauritania	3	8	2	1	2			1			
Mozambique	4	2	5	1			1		1		
Nepal	5	2	4				1				
Niger	5	5	3					1	1		

Country	Climate change	Deforestation, Land Degradation, Desertification	Threats to biodiversity	Threats to marine resources	Water quality and quantity	Coastal and coral reef degradation	Waste management	Threats to in-land water resources	Natural disasters	Air quality and air pollution	Mining
Rwanda	4	3	2								
Sao Tome and Principe	5		1								
Senegal	10	5	2	1		1	1				
Sierra Leone	5		1		2						
Solomon Islands	3	1	1		1						
Somalia	2										
South Sudan											
Sudan	8	1	1								
Tanzania	6	5	5	1							
Timor Leste	5				1	1					
Togo	2		1								
Tuvalu	5	1	1	1							
Uganda	7	7	4		1		1	1			
Vanuatu	5	2	2	1	1	2			2		
Yemen	1										
Zambia	5	4	5								
Asia and Pacific	48	23	30	8	4	5	3	5	4	2	2
Afghanistan	6	5	5		1			2	1		
Bangladesh	7	3	3	4		2	1	1		1	
Bhutan	6	4	6						1	1	
Cambodia	10	4	5		1			1			
Kiribati	6	2	3	2	2	2	1		1		
Lao PDR	9	2	5	1		1	1				1
Myanmar	4	3	3	1				1	1		1
Latin America and the Caribbean	7	4	2	1		1			1		
Haiti	7	4	2	1		1			1		
Total	246	132	126	24	20	19	16	13	13	5	5

Sources: PMIS data; UN-OHRLS, [Small Island Developing States in Numbers—Climate Change Edition](#), 2015; UNEP, Pacific Islands Environmental Outlook, 1999; UNEP, Latin America and the Caribbean: Atlas of our Changing Environment, 2010; UNEP, Africa: Atlas of our Changing Environment, 2008; UNEP, Arab Region Atlas of our Changing Environment, 2013; World Bank, Maldives: Identifying opportunities and constraints to ending poverty and promoting shared prosperity, 2015; World Bank, Timor-Leste: Country Environmental Analysis, 2009; Vanuatu National Environment Policy and Implementation Plan 2016-2030; UNDP, Myanmar Annual Report, 2016; World Bank, Nepal Country Environmental Analysis, 2008; World Bank, Bangladesh-More and better jobs to accelerate shared growth and end extreme poverty, 2015; World Bank, Afghanistan- Systematic Country Diagnostic, 2016; World Bank, Kingdom of Bhutan - Green Growth Opportunities for Bhutan, 2014; World Bank, Lao People's Democratic Republic- Systematic Country Diagnostic, 2017; World Bank, Cambodia Environment Monitor, 2008.

Note: Blue cells indicate that projects address the common underlying challenge of climate change; green cells indicate that projects address one main challenge in the country; yellow cells indicate that projects address a challenge that is not among the main ones for the country; red cells indicate that no projects address any of the main challenges for the country. Several projects address multiple challenges.

44. **GEF LDC interventions also consider socioeconomic priorities.** LDCs face socioeconomic vulnerabilities that exacerbate the environmental issues they confront. For example, environmental conservation is a cornerstone of Bhutan’s unique development approach and is integrated in all policies and development plans. Nevertheless, the current rapid pace of development and population growth puts chronic pressures on the natural environment causing land degradation and biodiversity loss. In Guinea, government-sponsored bauxite mining attracts a growing number of workers, increasing pressure on the scarce natural resources of the northern part of the country. Cognizant of beneficiaries’ livelihood needs in LDCs, project documents have begun to capture the socioeconomic dimension of GEF interventions. Thirty-three percent of the project results frameworks reviewed have indicators on alternative livelihoods and income generation and diversification. Eighteen percent of projects measured resilience in their logical framework, 14 percent measured gender equality and women’s empowerment, 12 percent measured food security, and another 8 percent gaged private sector engagement.

45. **In the areas of institutional development and governance, more than half the projects reviewed focus on policy frameworks and skills building.** GEF support can be classified into three main categories: knowledge and information, institutional capacity, and implementing strategies. These areas of GEF support interact, complement, and reinforce each other, collectively contributing to environmental stress reduction and improved environmental status (GEF IEO 2013a). GEF institutional support in LDCs mostly focused on helping countries develop their respective environmental policy, legal, and regulatory frameworks; building skills and capacities; and introducing innovative technologies and approaches (Table 7). All these are domains in which the GEF has traditionally invested most of its financing and technical expertise, demonstrating its comparative advantage and additionality. The majority of GEF interventions in LDCs included indicators in their results framework on capacity—both institutional and governance. Seventy-two percent of projects had indicators measuring capacity and skills development; and 70 percent had indicators measuring the development of plans, policies, laws, and regulations. Smaller percentages included indicators for knowledge management and awareness raising: 46 percent and 48 percent, respectively.

46. For example, the Coping with Drought and Climate Change project (GEF ID 3155) aimed to contribute to food security and capacity to adapt to climate change in agricultural and pastoral systems in a in southern Mozambique. This SCCF financed project introduced drought resilient crops and conservation agriculture, improved livestock production through upgraded enclosures and treatment, established disaster preparedness committees equipped with communication facilities and a meteorological station, as well as the necessary capacity development to interpret and transmit relevant information, developed community plans to cope with droughts together with improved access to land and water, and replication of successful approaches in other areas. Project interventions were in institutional capacity (policy, legal and regulatory frameworks), implementing strategies (technologies and approaches), and knowledge and information (skills-building and awareness-raising). The

results framework for the project included, among others, indicators on drought impact, food production and livestock, the number of people able to cope with drought, number of people using climate information to cope with climate change effects, targets of implementation of existing environmental policies on access to land and water, percentage of communities having disaster management committees in place, and local and central government awareness of international lesson related to successful drought coping strategies.

Table 7: Intervention typologies in LDCs

Intervention area	Typology	No.	Percent
Knowledge and information	Knowledge generation	229	37
	Information sharing and access	210	34
	Awareness-raising	139	22
	Skills-building	371	60
	Monitoring and evaluation	151	24
Institutional capacity	Policy, legal and regulatory frameworks	363	58
	Governance structures and arrangements	130	21
	Informal processes for trust building and conflict resolution	4	1
Implementing strategies	Technologies and approaches	350	56
	Implementing mechanisms and bodies	196	32
	Financial mechanisms for implementation and sustainability	96	15

Note: $n = 621$. Several projects address multiple areas of intervention.

47. The interventions of the Conservation and Management of the Eastern Arc Mountain Forests project (GEF ID 1170) in Tanzania also focused on institutional capacity, implementing strategies, and knowledge and information. The project sought to improve conservation through the development and implementation of an integrated conservation strategy for biodiversity and water supply. To measure progress towards the objective, the project identified numerous indicators for four overarching outputs: development of a conservation strategy, community-based conservation initiatives, institutional reforms and increased capacity, and the establishment of a conservation endowment fund. The results framework for the project included, among others, indicators for a number of district and forest management plans developed and implemented, planning handbooks and best practice notes produced and shared, workshops and trainings completed, institutional methods developed to increase local community participation, and a functioning endowment fund financing mechanism.

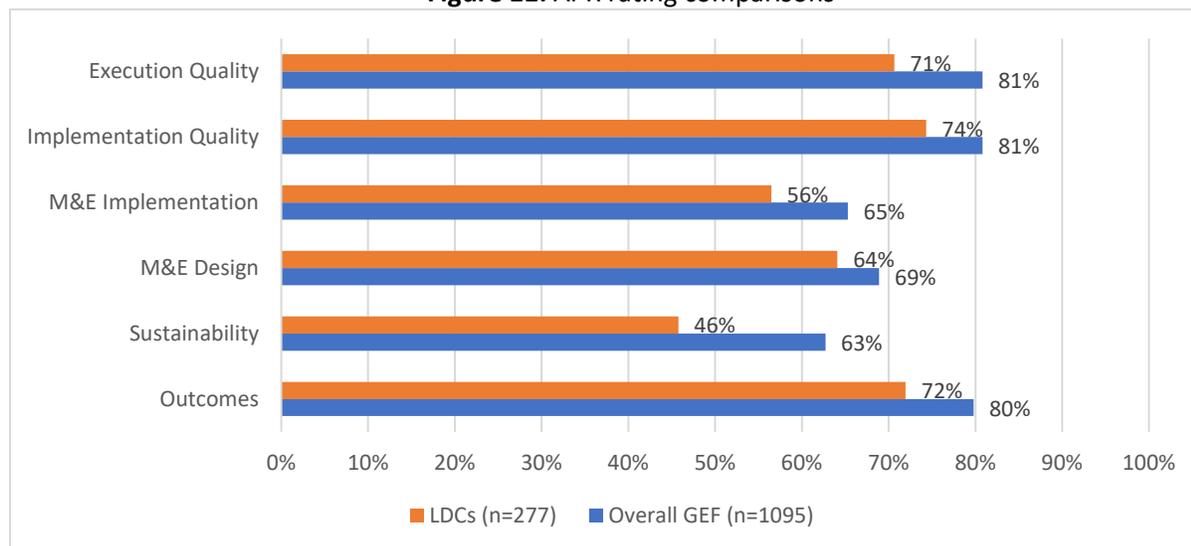
3. RESULTS AND SUSTAINABILITY

48. This chapter addresses the issue of environmental outcomes and their sustainability and focuses on the factors influencing performance and sustainability of outcomes in LDCs. Sustainability of outcomes is assessed in depth to understand the most prevalent contributing and hindering factors at play in LDCs. The chapter also explores the link between environment and socioeconomic development priorities and the trade-offs between the two in achieving project sustainability. Finally, the chapter assesses gender mainstreaming, climate resilience, fragility, and private sector engagement as cross-cutting issues affecting GEF support.

3.1 Performance

49. **The performance of projects in LDCs was rated lower than the overall GEF portfolio on all measured dimensions.** Analysis of terminal evaluation ratings from the most recent IEO Annual Performance Report (APR) 2019 database on the cohort analyzed, composed of projects completed between GEF-4 to GEF-6 (i.e., the relevance cohort) and projects completed between 2007 and 2014 (i.e., the sustainability cohort), shows that projects in LDCs significantly underperformed when compared with the overall GEF portfolio on all dimensions (Figure 11).

Figure 11: APR rating comparisons



50. Focusing on the two dimensions of interest to this evaluation—project outcomes and likelihood of sustainability—72 percent of projects were rated in the satisfactory range for outcomes; this is significantly lower than the rating of 80 percent of projects in the overall GEF portfolio and 83 percent of projects in the Asia region, but similar to the rating of and 73 percent of projects in the Africa region where most LDCs are located. For the likelihood of sustainability at closure, only 46 percent of projects in LDCs were rated in the likely range as having sustainable outcomes, which is lower than in Africa (50 percent of projects), Asia (69 percent), and the overall GEF portfolio (63 percent). It is useful to note here that satisfactory outcomes and their likely sustainability have been found to be statistically correlated ([GEF IEO](#)

2019a). The statistical test for proportionality for this evaluation indicates that the outcome and sustainability ratings for the two comparators—overall GEF and LDCs—differ in their proportions. The difference between the cohorts is statistically significant: the proportion of projects that are rated satisfactory for outcome and sustainability is higher in the overall GEF portfolio compared to the LDCs’ portfolio (p-value < 0.05).

51. These findings on sustainability confirm evaluative evidence collected by the IEO from 2008 to 2016 through country portfolio evaluations in LDCs and the LDCF program evaluation. In 2008, the IEO concluded that in Madagascar, despite 15 years of donor investment in the country’s environmental program totaling over \$400 million (of which the GEF invested \$36 million), financial and institutional sustainability remained a key weakness at the end of GEF-3. The Madagascar country portfolio evaluation recommended the government and donors diversify investment in the environmental sector to address threats to sustainability (GEF IEO 2008a). More recently, the seventh Annual Country Portfolio Evaluation Report reporting on GEF portfolios in Eritrea, Sierra Leone, and Tanzania concluded that the likelihood of sustainability is mixed (GEF IEO 2014a). Sustainability has been most successful when pursued through fostering of institutional and individual capacity development and promotion of livelihood activities through community-based approaches, such as those financed by the Small Grants Programme.

52. The LDCF provides a sizable portion of the GEF funding for LDCs (32 percent). The most recent program evaluation of the LDCF (GEF IEO 2016) confirmed that long-term sustainability of outcomes remains a challenge in LDCs. The main area of potential concern for the LDCF portfolio is the financial sustainability of project activities beyond the scope of project-related funding. Added to this is the need to integrate climate change adaptation into national policies and programs (institutional sustainability), and the need for country ownership to ensure sustainability (sociopolitical sustainability).

53. **Performance has improved in projects completed more recently.** Ratings in terminal evaluations of completed projects approved in GEF-4 and GEF-5 in LDCs were higher than those for projects completed between 2007 and 2014. This finding is consistent with recent IEO analyses, according to which projects in LDCs, Africa, SIDS, and FCVs are less apt to be rated in the likely range for outcome sustainability than other projects but have improved significantly from GEF-3 onward (GEF IEO 2019a).

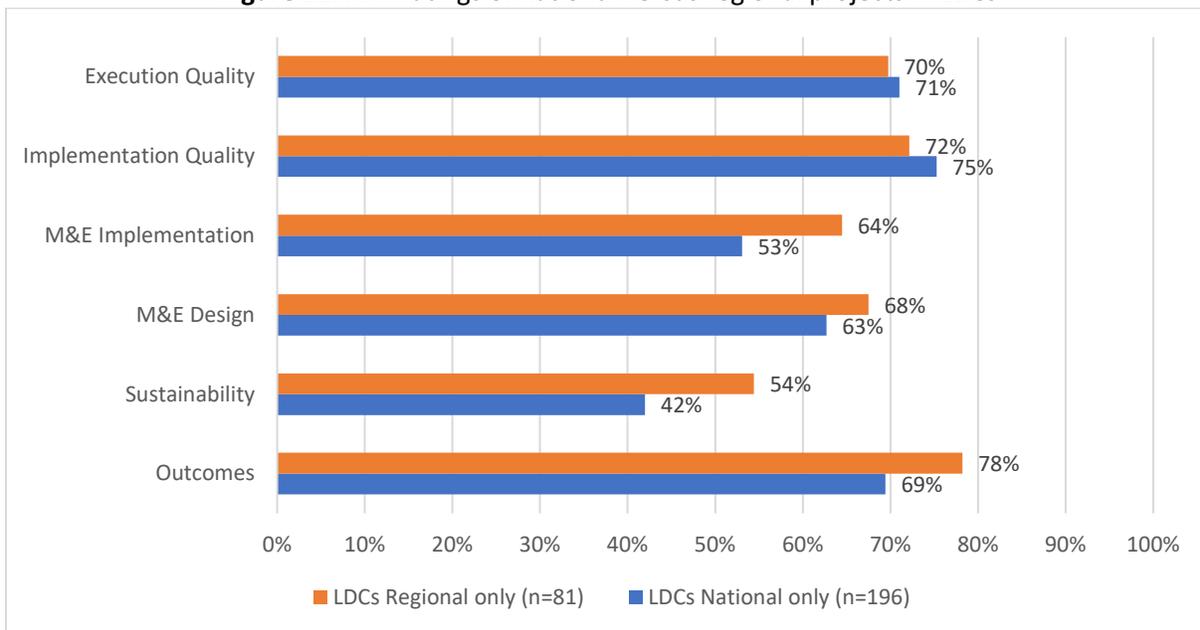
54. **Climate change adaptation projects in LDCs had the highest ratings, with 79 percent rated as having outcomes in the satisfactory range, and 58 percent as having outcomes likely to be sustained.** Multifocal projects also performed well on outcomes, with 76 percent of projects rated in the satisfactory range; but only 36 percent had positive sustainability ratings (Table 8). Outcome ratings for international waters projects were the lowest of all focal area projects, yet their sustainability ratings were highest: 67 percent of these projects were rated as having satisfactory outcomes and 58 percent were rated as having outcomes likely to be sustained.

Table 8: Outcome and sustainability rating by focal area in LDCs

Focal Area	Satisfactory Outcomes	Likely Sustainability	Total
Biodiversity	72%	41%	89
Climate Change Adaptation	79%	58%	39
Climate Change Mitigation	69%	47%	36
International Waters	67%	58%	31
Land Degradation	70%	42%	44
Multi Focal Area	76%	36%	26
POPs	73%	33%	12
Total	72%	46%	277

55. From an analysis of terminal evaluations of completed projects, the SIDS SCCE found that regional projects had better outcomes and sustainability ratings as compared with national projects (GEF IEO 2019d). A similar analysis in this evaluation found that more regional projects in LDCs are rated in the satisfactory range on outcomes, sustainability, and monitoring and evaluation design and implementation compared to national projects (Figure 12).

Figure 12: APR ratings of national versus regional projects in LDCs



56. In country case studies conducted by the African Biomes and SIDS SCCEs postcompletion sustainability of outcomes for 7 out of the 10 field-verified regional projects was assessed in the likely range. In four cases, the sustainability ratings went from negative at completion to positive at postcompletion (table 9). The African Biomes SCCE found that in LDCs, these rating improvements seem more attributable to the high relevance of the technologies introduced than to the fact that they were introduced by a regional project. For example, integrated pest and pollution management training in Mali provided by a regional POPs project (GEF ID 1420) introduced biological control agents that continued to provide economic and health benefits of

reduced pest control costs and reduced human poisoning, as well as environmental benefits in terms of increased biodiversity. In Mauritania, interventions to protect coastline vulnerable to climate change by the regional project Adaptation to Climate and Coastal Change in West Africa: Responding to Shoreline Change and Its Human Dimensions in West Africa through the Integrated Coastal Area Management project (GEF ID 2614) piloted a method of reconstituting the ecosystem and biodiversity of a part of the coastal dune which was still in place eight years after the end of the project protecting the capital city from ocean incursion.

57. The SIDS SCCE found that the activities of this same regional project (GEF ID 2614) in Guinea-Bissau have been replicated and scaled up at the national level through the LDCF project Strengthening the Resilience of Vulnerable Coastal Areas and Communities to Climate Change in Guinea Bissau (GEF ID 6988) (GEF IEO 2019d). The improved rating of a second regional project in Guinea-Bissau—Combating Living Resource Depletion and Coastal Area Degradation in the Guinea Current Large Marine Ecosystem (LME) through Ecosystem-Based Regional Actions (GEF ID 1188)—can partly be explained by the fact that the country went through a political crisis near the end of the project. The higher postcompletion rating is based on partner engagement toward development of proposed activities and replication projects; however, there is a risk that the process could be negatively affected without further funding.

3.2 Outcomes and Sustainability

58. GEF support is provided to activities that directly or indirectly contribute to the improvement of environmental status and/or address drivers of environmental degradation. The impact of GEF support may occur immediately as a result of project activities, but often takes years or even decades to emerge after the project is completed. By analyzing how GEF support contributes to progress toward impact, the IEO can assess the extent to which this support is likely to lead to impact and ultimately sustainability in the long term. Progress toward impact is assessed through the extent to which the broader adoption of GEF interventions and outcomes by governments and other stakeholders is taking place during implementation or at project end. Broader adoption pertains to the transformational processes by which the widespread implementation of interventions aids the achievement of global environmental benefits. This may occur in different ways, some of which have been found to be most prominent among GEF-supported initiatives: namely, mainstreaming, replication, scaling-up, sustaining, and market change (GEF IEO 2018c). This approach has been used by the IEO since 2013 to assess broader adoption of outcomes and progress toward impact of GEF interventions (GEF IEO 2013b).

Box 1: Mechanisms of broader adoption

Mainstreaming: When information, lessons, or specific aspects of a GEF initiative become part of a stakeholder's own initiatives, such as through laws, policies, regulations, or programs. This may occur through governments, through development organizations and other sectors, or both.

Replication: When a GEF-supported intervention is copied at a similar scale, often in other locations.

Scaling-up: When a GEF-supported intervention is implemented at a larger geographical scale, often expanded to include more political, administrative, economic, or ecological components. This allows concerns that cannot be resolved at lower scales to be addressed and promotes the spread of GEF contributions to areas contiguous to the original project site.

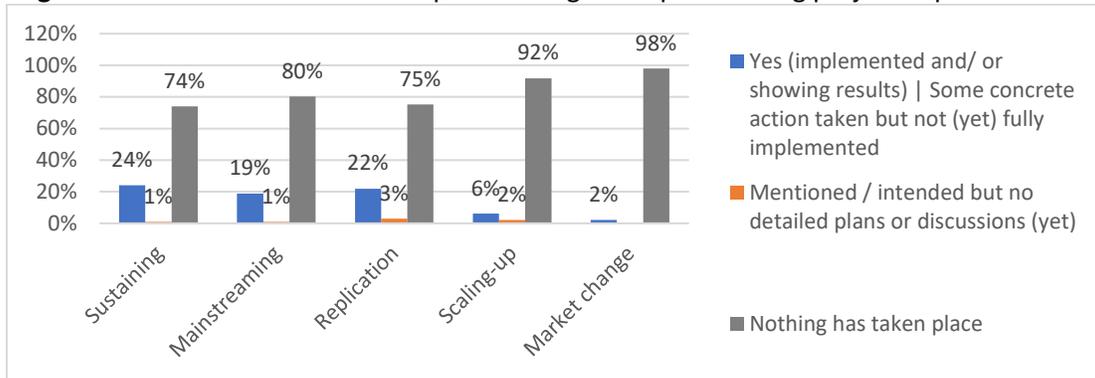
Sustaining: When a GEF-supported intervention or outcome is continued by the original beneficiaries without GEF support so they can continue to reap the benefits.

Market change: When a GEF-supported intervention influences an economic demand and supply shift to more environmentally friendly products and services.

59. In the APR 2017, the IEO conducted a desk review of postcompletion verification reports ($n = 53$). According to the analysis, outcomes of most GEF projects are sustained during the postcompletion period. In addition, a higher percentage of projects achieve environmental stress reduction and broader adoption at postcompletion. The review concluded that the key factors contributing to higher postcompletion outcomes are stakeholder buy-in, political support, availability of financial support for follow-up, and sustained efforts on the part of the national executing agency. A few projects regressed to a lower outcome level postcompletion because of a lack of financial support for follow-up, low political support, low institutional capacities, low stakeholder buy-in, and flaws in the project's theory of change. Importantly, catalytic processes of broader adoption such as mainstreaming, replication, and scaling-up, and/or sustaining project outcomes were observed in a higher percentage of projects postcompletion than at implementation completion (GEF IEO 2019a).

60. Overall, completed projects in LDCs showed lower broader adoption rates than those of the overall GEF portfolio analyzed as part of the APR 2017. Over 74 percent of projects reviewed in LDCs for sustainability found no actions were taking place during implementation to stimulate broader adoption of project outcomes postcompletion. When present, the most prevalent processes implemented for broader adoption were sustaining at 24 percent, replication at 22 percent, and mainstreaming at 19 percent—in terms of projects indicating that measures for broader adoption to occur have been fully or partially implemented while the projects were ongoing. This trend is comparable to the APR 2017 finding in which broader adoption of project outcomes occurred through sustaining and mainstreaming processes—49 and 40 percent respectively; however, projects in LDCs showed high levels of replication (Figure 13).

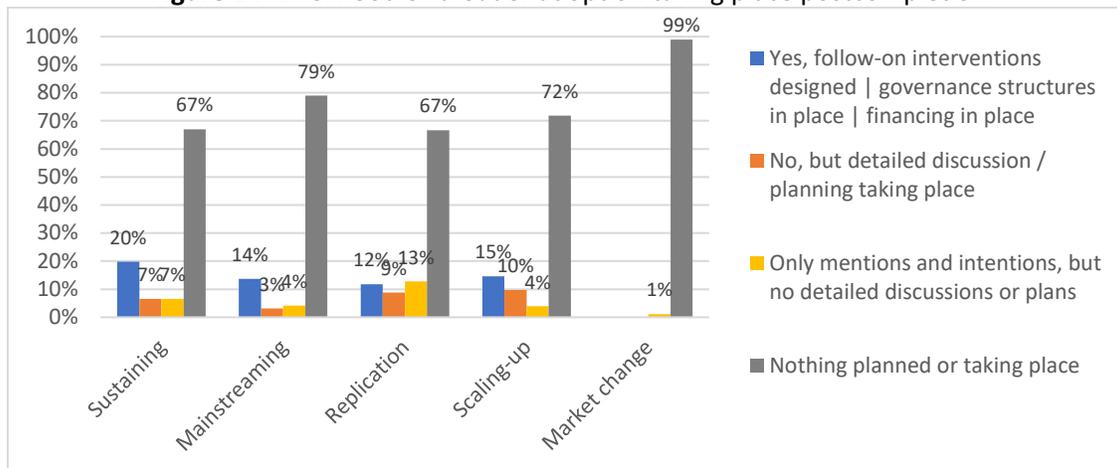
Figure 13: Evidence of broader adoption having taken place during project implementation



Note: Projects reviewed for sustainability ($n = 123$).

61. The likelihood of broader adoption taking place after project completion increases when it is planned for in the project design and implementation—such as in the detailed design of follow-up activities, or the establishment of governance structures or financing windows. In LDCs, such activities translate into concrete sustaining, mainstreaming, replication, and scaling-up initiatives being implemented in only 12 to 20 percent of the projects reviewed (Figure 14).

Figure 14: Likelihood of broader adoption taking place postcompletion



Note: Projects reviewed for sustainability ($n = 123$).

62. **Sustainability of outcomes is often achieved over time.** This finding confirms the APR 2017 conclusion as well as a similar conclusion from the SIDS SCCE (GEF IEO 2019d). Field visits to 36 completed projects in 12 LDCs by the three SCCEs found that 25 projects maintained or improved sustainability of outcomes postcompletion (Table 9). These improvements are mainly attributed to the quality of project design as well as to positive changes in the context taking place postcompletion.

Table 9: Postcompletion sustainability ratings for field-verified projects in country case studies

Country	GEF ID	TE Sustainability Rating	Observed Sustainability Rating post-completion
Least developed countries (LDCs)			
Bhutan	2358	Negative	Positive
	2550	Positive	Positive
	3052	Negative	Positive
	4976	Positive	Positive
Cambodia	1043	Negative	Positive
	3404	Positive	Positive
	3635	Positive	Negative
Mozambique	2003	Negative	Positive
	2889	Negative	Negative
	3155	Positive	Positive
Tanzania	1170	Negative	Positive
	2101	Negative	Negative
	2151	Positive	Positive
Sahel and Sudan-Guinea savanna biomes			
Guinea	1877	Negative	Positive
	1093 (reg.)	Positive	Positive
	1273	Positive	Positive
Mali	1253	Negative	Negative on infrastructure; positive for livelihoods
	1420 (reg.)	Negative	Positive
	1152	—	Positive
	3763	—	Negative
Mauritania	1258 (reg)	Positive	Positive
	2459	Negative	Positive
	2614 (reg)	Negative	Positive
	3379	Positive	Negative
Uganda	1830	Positive	Negative
	1175	Negative	Negative
	2140 (reg)	Negative	Negative
Small island developing states (SIDS)			
Comoros	1082 (reg)	Negative	Negative
	1247 (reg)	Positive	Positive
	2098 (reg)	Negative	Negative
	3363	Negative	Negative
Guinea-Bissau	1188 (reg)	Negative	Positive
	1221	Positive	Positive
	2614 (reg)	Negative	Positive
Kiribati	2543	Positive	Positive
Vanuatu	1682	Positive	Positive

Note: Positive sustainability includes Likely and Moderately Likely ratings; negative the Unlikely and Moderately Unlikely. Green-highlighted text indicates improved rating post-completion, red indicates the rating has worsened.

63. An example of improved postcompletion sustainability of outcomes is the Sustainable Land Management (SLM) project (GEF ID 2358) in Bhutan. The project's objective was to strengthen institutional and community capacity for anticipating and managing land degradation. Outcomes of the project included demonstration of effective application of land degradation prevention approaches; farmers trained in adopting SLM practices; and preparation and implementation of the 2007 Land Policy Act which incorporated SLM principles

in different programs and policies including the National Land Policy, the Forestry Policy, the National Adaptation Program of Action, and the National Biodiversity Action Plan. The country case study found that good project design and government support drove sustainability, and based the high sustainability rating on SLM principles being incorporated in the government's 12th five-year plan (2018–23) as well as in plans on poverty reduction and increased food security.

64. Both context- and project-related factors were at play in cases where sustainability has worsened. The project outcomes for Strengthening Sustainable Forest Management and the Development of Bioenergy Markets to Promote Environmental Sustainability and to Reduce Green House Gas Emissions in Cambodia (GEF ID 3635) were rated as less likely to be sustained postcompletion, a finding attributable to dwindling markets and the loss of forest protected areas. The project demonstrated income-generating activities arising from sustainable management practices in community forests and protected areas from the production of bioenergy efficient cook stoves and charcoal that reduce carbon dioxide emissions. Heavy encroachment on the protected forest has limited the supply and quality of wood for charcoal production, and the charcoal that is produced cannot compete in the market based on quality, price, and quantity. The production of cook stoves, made from locally available resources such as clay and rice husks, was not sustainable due to market and transportation constraints; production also declined because of better paid jobs in other markets such as the garment sector.

65. Outcomes from the Strategic Investment Program: Participatory Environmental Protection and Poverty Reduction in the Oases of Mauritania (GEF ID 3379) project were found to have lower sustainability due to the high costs and inappropriateness of the approaches and technologies introduced. The project aimed at improving the livelihoods of oases residents, farmers, and herders by (1) significantly reducing land degradation and enhancing land and water productivity through targeted on-the-ground investments, and (2) promoting environmentally friendly income-generating activities and energy-saving options. The water-lifting and irrigation systems introduced, including drip irrigation and motorized pumping systems, have not survived because they are either too complex, too costly to operate, or both.

3.3 Factors influencing Outcome Sustainability

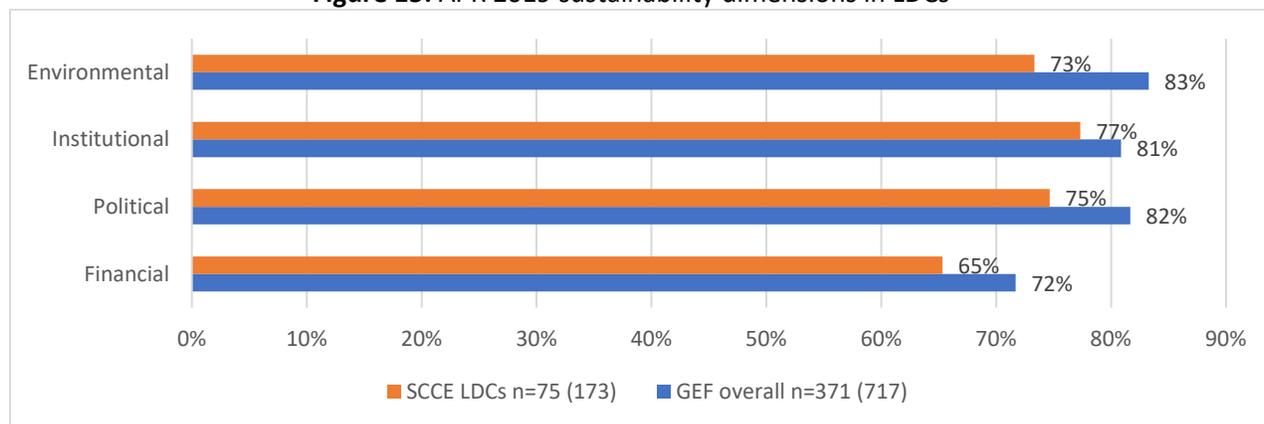
66. This section further explores factors that contribute to or hinder outcome sustainability. It starts with an analysis of available terminal evaluations assessed in the APR 2019 with ratings on four dimensions—financial, institutional, sociopolitical, and environmental—affecting the likelihood of project outcome sustainability. Findings are then compared with projects in LDCs that were completed between 2007 and 2014 and are part of the APR 2019. This is followed by a comparison using evidence from previous IEO analyses, the review of 123 terminal evaluations of projects in the sustainability cohort, and the country case studies.

67. Fifty-two percent of GEF projects with terminal evaluations from the APR 2019 cohort of projects completed between 2007 and 2014 (371 out of 717 projects) have information on all four dimensions of the likelihood of sustainability. A subset of projects in LDCs that were completed between 2007 and 2014 and are part of the APR 2019 (75 out of 173 projects). Regional subsets of these are completed projects in LDCs in Africa and Asia.

68. **Financial sustainability is rated lower than other dimensions of sustainability in LDCs.** In the overall GEF portfolio, more than 80 percent of projects were rated likely for sociopolitical, institutional, and environmental sustainability, compared to 72 percent for financial sustainability. The same trend is observed when looking at projects in LDCs that are part of the APR 2019: only 65 percent of these projects were rated likely for financial sustainability (Figure 15). The trend in Africa and Asia, where most LDCs are located, vary. In Africa, 57 percent of projects are rated as likely for financial sustainability; in Asia, 82 percent are so rated, higher than the GEF portfolio overall.

69. The likelihood of institutional sustainability emerged as the most prominent sustainability dimension in LDCs, with 77 percent of project so rated; this is slightly lower than for the overall GEF cohort. This positive rating suggests that the investment made by the GEF in building and supporting existing institutional structures and capacities in LDCs is paying off. Seventy-three percent of projects in LDCs were rated likely for environmental sustainability, and 75 percent were rated likely for political sustainability.

Figure 15: APR 2019 sustainability dimensions in LDCs



70. For completed projects in the APR 2019 database that are in the sustainability cohort (those completed between 2007 and 2014), 75 percent of projects in LDCs were rated likely for environmental and political sustainability, 77 percent were rated likely for institutional sustainability; and only 65 percent were rated likely for financial sustainability; all of these are lower percentages than for the overall GEF cohort. By region, financial sustainability varies widely, from 54 percent in LDCs in Africa to 84 percent in LDCs in Asia, the latter being higher than the overall GEF cohort. This range reflects the heterogeneity among LDCs. The statistical test for proportionality was conducted on the four sustainability dimensions—financial, institutional, sociopolitical, and environmental—for the two cohorts overall GEF and LDCs. The

results indicate that these four dimensions differ in proportionality across the cohorts by varying degrees; in order, financial (p-value = 0.88), political (p-value = 0.9338), environmental (p-value = 0.95), and institutional (p-value = 0.75).

71. The APR 2017 desk review postcompletion identified six main hindering factors of sustainability: (1) lack of financial support for maintenance of infrastructure or follow-up; (2) lack of sustained efforts from the executing agency; (3) inadequate political support, including limited progress on the adoption of legal and regulatory measures; (4) low institutional capacities of key agencies; (5) low levels of stakeholder buy-in; and (6) flaws in projects' theory of change. These factors were also found in LDCs in the review of the 123 terminal evaluations of projects in the sustainability cohort.

72. Analysis of the terminal evaluations of projects completed between 2007 and 2014 in the sustainability cohort identified "a strong buy-in and a strong sense of project ownership among key stakeholders" (37 percent) and "good project management or co-management" (28 percent) as the most prominent project-related factors positively affecting the likelihood of outcome sustainability. Other project-related contributing factors that emerged from the analysis include "timely and evidence-based adaptive management" (26 percent), "good engagement of key stakeholders/stakeholders involved at design and decision making" (24 percent), and "good coordination with/continuity of previous or current initiatives" and "extended implementation time" (22 percent). Not as prominent contributing factors were "good project design" (15 percent) and "highly relevant technology/approach" (13 percent). As to factors hindering sustainability in LDCs, "poor project design" is most prominent (35 percent), followed by "poor understanding of project management and financial rules and regulations" (26 percent), "insufficient time for implementation" (24 percent), and "poor project management" (21 percent).

73. The predominant context-related factor contributing to likelihood of outcome sustainability in LDC projects is "national government support" (35 percent); "links to previous/current related initiatives" was also frequently cited (18 percent). In 37 percent of the projects reviewed, no contextual factors were identified. The predominant context-related factor hindering sustainability of outcomes is "unfavorable political conditions/events" (26 percent), followed by "low institutional capacities" (20 percent) and "lack of national government support" (14 percent). Of all these factors, "lack of financial support" and "poor project design" were the most frequently observed in the countries and projects visited by this evaluation (Table 10).

Table 10: Factors hindering sustainability observed in country case studies

Factors Identified in APR 2017	Bhutan	Cambodia	Mozambique	Tanzania	Guinea	Mali	Mauritania	Uganda	Comoros	Guinea Bissau	Kiribati	Vanuatu
	LDC SCCE				African biomes SCCE			SIDS SCCE				
Flaws in the projects' theory of change/poor design	x	x	x	x	x	x	x	x	x	x	x	x
Lack of financial support	x	x	x	x	x	x	x		x			
Inadequate political support	x	x		x	x			x	x	x		x
No continuation from executing agency							x	x			x	
Low institutional capacities			x	x					x	x	x	x
Low stakeholder buy-in	x	x	x						x	x		

74. **A well-designed project design is key for sustainability.** Project design is one of the most prominent factors that, depending on its quality, could influence sustainability of outcomes either positively or negatively. Project design that promotes sustainability takes into due consideration a country's socioeconomic and political context as well as local conditions and knowledge. A well-designed project includes measures and activities that will support—in terms of both financial and institutional standpoints—continued delivery of outcomes beyond the life of the project. Site visits confirmed the importance of project design for long-term sustainability. Outcome sustainability of the Market Led Smallholder Development in the Zambezi Valley project (GEF ID 2889) in Mozambique was rated marginally unsustainable at completion and postcompletion mainly because the project design overstated existing implementation capacity. At the time of project design, implementation of the country's decentralization program and capacity development at the district level were still in their formative years. Many capacities relevant to project implementation—such as procurement, financial management, and monitoring and evaluation—were not adequately available at the district level. Therefore, the project relied heavily, and prematurely, on the country's decentralization framework, which was too recent a construct to be fully in place and operational to sustain a development project of this complexity.

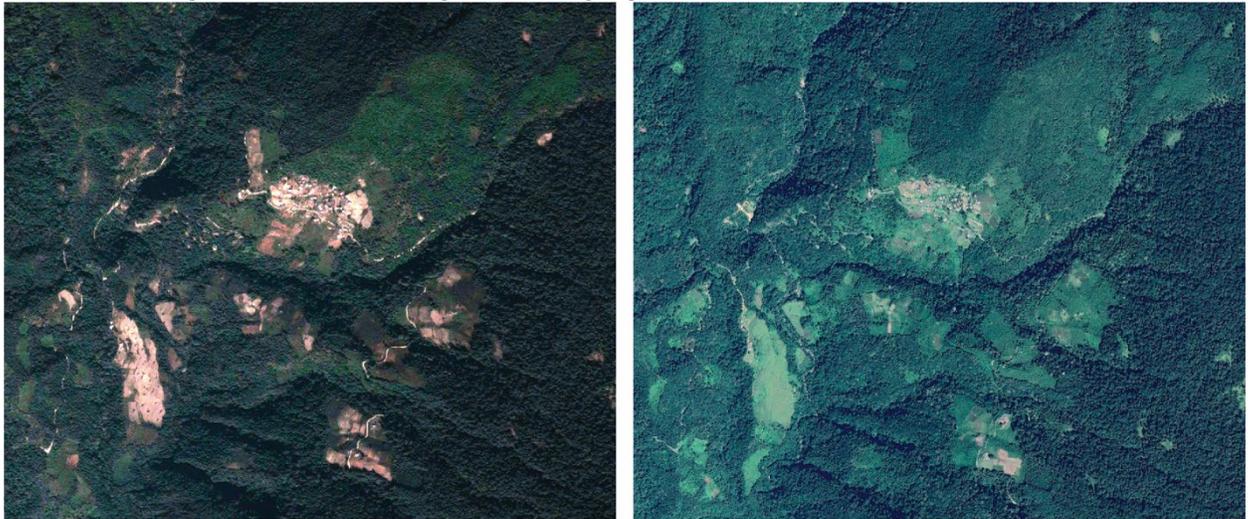
75. Another example of inadequate project design was observed in Tolo, Guinea. There, sustainability of positive environmental outcomes achieved around the source of the Bafing River, reforested with support from the Community-based Land Management (GEF ID 1877) project after relocating the farming communities to a nearby watershed, is threatened by insufficient groundwater. In this case, no technical feasibility study to assess water availability and its seasonal variation during the year, or other groundwater stock analyses, was conducted as part of the project design.

76. One project highlighted in table 9 for improved sustainability of outcomes at postcompletion is the SLM project (GEF ID 2358) in Bhutan. A key factor driving sustainability was good project design, including highly relevant objectives in line with government priorities and relevant activities to achieve the stated objectives. The project design was guided by a bottom-up approach with participatory planning that focused on community priorities, phased implementation allowing for adjustment throughout implementation based on learning from pilots, decentralization to strengthen the role of communities and local authorities, use of knowledge and information on farmer incentives, and an integrated multisectoral approach. Before the completion of the project, institutional, financial, technical, and policy arrangements were made for sustaining its outcomes.

77. SLM practices were piloted in three *geogs* (groups of villages), where farmers were trained in SLM techniques. The project sites were in areas of high incidence of land degradation, which are inhabited by the country's poorest and most vulnerable communities. The project resulted in an increase of farmers practicing SLM techniques, a reduction in sediment flows in selected watersheds, regeneration of degraded forest land, and improved grazing land in the pilot *geogs*. A postcompletion site visit to a pilot *geog* in Zhemgang noted continued practice of SLM techniques such as land terracing, hedgerows, fruit orchards, tree plantations, and irrigation systems. Income has increased from selling produce both in the district and in Gelephu on the border with India. Villagers interviewed confirmed that more land is under cultivation, and 60 percent of households continue using SLM techniques learned from the project. The remainder of the households discontinued using SLM due to shortages of water and losses caused by wildlife such as bears and wild boars. The government has provided some electric fencing, but it is not sufficient.

78. The continued practice of SLM techniques has also helped improve and retain soil and convert shifting land cultivation to sustainable land cover. This positive outcome is evidenced by satellite images of the project pilot area taken in 2010 and 2018, showing vegetation regeneration. Both forest and vegetation cover in pastures have increased since the onset of the project (Figure 16). The 2010 image clearly shows large areas of relatively bare ground, which are subsequently covered by vegetation in 2018. This trend occurred despite a decrease in overall precipitation.

Figure 16: Satellite images of Zhemgang, Bhutan—2012 and 2018



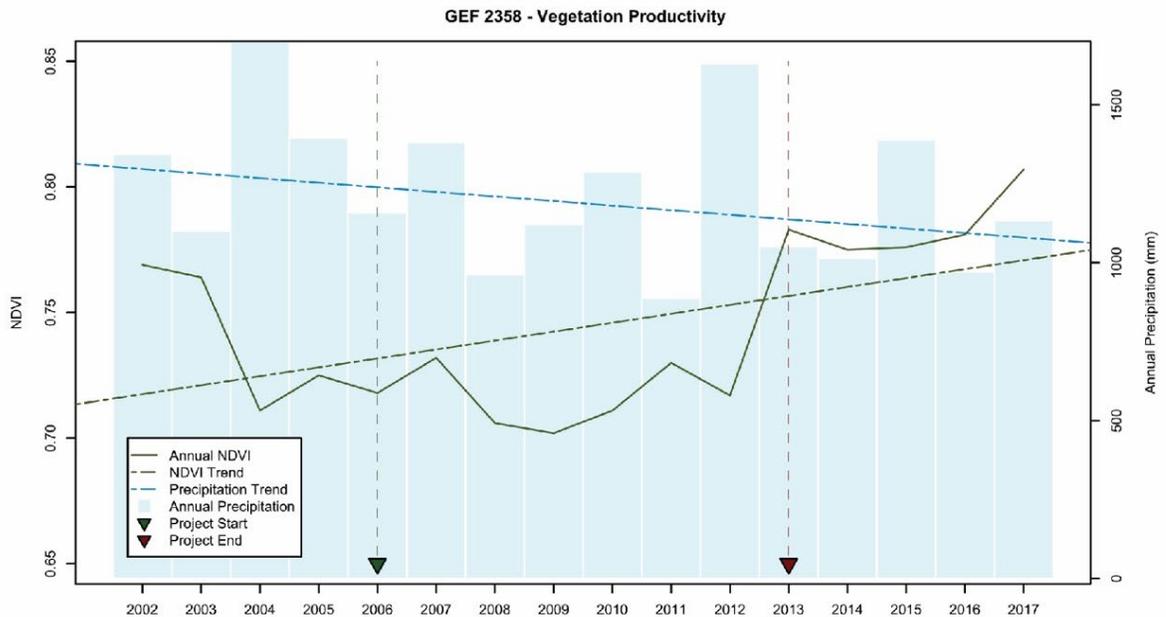
A. 2010 Image

B. 2018 Image

Note: Satellite images of a project area from 2010 (A) and 2018 (B), showing the landscape early in the project implementation phase and after the project completion. Satellite data show an increase in forest cover and ground cover, particularly across bare patches.

79. A quantitative analysis of satellite imagery using the annual mean normalized difference vegetation index (NDVI) from 2002 to 2017 shows a positive trend in vegetation regeneration across the area with noticeable changes toward the end of the project that continue beyond the project duration (Figure 17). These data provide evidence that the SLM techniques introduced by the project have contributed to positive environmental outcomes in the area. Interviews corroborate the results from the satellite data analysis.

Figure 17: Time series of vegetation productivity and rainfall—Zhemgang, Bhutan



Note: The vegetation trend (normalized difference vegetation index) (NDVI) and precipitation trend for the area shows a general increase in vegetation productivity despite decreasing level of precipitation.

80. **Many GEF interventions with positive outcomes include income-generating activities which link local community benefits to improved environmental management.** The review of terminal evaluations of the sustainability cohort projects and postcompletion site visits by country case studies found many instances of income-generating activities linked to climate-resilient agriculture; sustainable agriculture, livestock, and fishing practices; water resource management; and biodiversity conservation and ecotourism livelihoods. This approach has been found to lead to tangible outcomes in LDCs. Community livelihood interventions have been an effective tool for mainstreaming the environment in community systems to create awareness and empower communities to protect the environment and reduce poverty (UNDP IEO 2018).

81. There are many examples of both successes and failures in promoting alternative livelihoods. In Cambodia, the design of the Establishing Conservation Areas Landscape Management in the Northern Plains project (GEF ID 1043) integrated livelihoods into the strategy for environmental conservation. Local communities were supported in moving from subsistence rice farming to producing and marketing organic rice in Europe. Another successful example is the Facilitating and Strengthening the Conservation Initiatives of Traditional Landholders and their Communities to Achieve Biodiversity Conservation Objectives project (GEF ID 1682) in Vanuatu that is working with local communities to conserve terrestrial community-based protected areas. The income from ecotourism was achieved after the project was closed, based on project results.

82. In Cambodia, the Promoting Climate-Resilient Water Management and Agricultural Practices project (GEF ID 3404) financed by LDCF introduced new technologies, such as solar pumps, and adaptive agricultural practices that improved the livelihoods of farmers. The country case study found that there was a lack of funding, spare parts, and mechanics to repair malfunctioning equipment; also, community water user groups were not raising enough funds for maintenance. In contrast, in Mauritania, the SIP: Participatory Environmental Protection and Poverty Reduction in the Oases of Mauritania (GEF ID 3379) project introduced small-scale infrastructure investments including solar pumps that were within the financial reach of households in the oases. These have been maintained by the households, which have also invested in new structures after project closure.

83. **Risks and mitigation measures are important drivers of sustainability and were well documented in a majority of projects.** A comprehensive discussion about context-related factors of sustainability needs to consider that if risks are not accounted for at design and they occur during implementation, both outcomes and sustainability postcompletion may likely be hindered. Risks to be considered include socioeconomic and political ones as well as climate-related risks. The review of design documents of GEF 4 to GEF 6 projects in LDCs including projects completed between 2007 and 2014 ($n = 621$) indicates that 85 percent of projects included risk considerations, in compliance with GEF requirements. Further analysis of the types of risks mentioned in project documents shows that 53 percent of projects focused on risks related to capacity development, and 46 percent included mention of climatic risks. Thirty-

nine percent and 41 percent of project design documents also referred to institutional and implementation risks respectively, while 35 percent indicated political and resource risk, and 32 percent mentioned government-related risks.

84. Eighty percent of the projects reviewed elaborated risk mitigation measures in project design documents. For example, the Integrated Livestock and Crop Conservation Program (GEF ID 2550) in Bhutan identified gaps in capacity among farmers regarding the production and marketing of new agrobiodiversity products. These gaps would be addressed by a major capacity building component of the project where farmer training, validation of indigenous knowledge, and awareness raising would be key elements. In Mozambique, the Transfrontier Conservation Areas and Sustainable Tourism Development project (GEF ID 2003) provided policy reforms and incentives to attract private sector partners and investment. The project considered a low response level and a lack of private sector partnerships a risk. To mitigate the risk the project intended to have close consultations with the private sector during project preparation and implementation to identify the main obstacles from its perspective. The Institutional Strengthening and Resource Mobilization for Mainstreaming Integrated Land and Water Management Approaches into Development Programs in Africa (GEF ID 1325) focused on risks of low community engagement and stakeholder participation. In response, the project would be implemented in a decentralized community-driven development process to avoid being a top-down, government-led program, and thereby addressed community concerns and skepticism that the project would deliver its intended outcomes.

3.4 Synergies and Tradeoffs between Environmental and Developmental Objectives on Sustainability

85. **Little consideration is given at the project design stage to the influences that synergies and trade-offs between socioeconomic and environmental objectives have on prospects for sustainability.** The review of design documents of 123 projects completed between 2007 and 2014 showed that only 32 percent of projects (39 projects) contained some mention of trade-offs or synergies, or both. Eight of these projects also addressed trade-off-related mitigation. Of the 39 projects, only six focused on trade-offs and synergies between development and environment. Of the remaining 33 projects, 3 mentioned synergies, but there is a lack of detailed discussion on the identified synergies; 30 projects focused on project-level synergies such as those with other projects and programs, cost-effectiveness and financial synergies, or synergies among GEF focal areas. For example, the Biodiversity Conservation and Participatory Sustainable Management of Natural Resources in the Inner Niger Delta and its Transition Areas, Mopti Region in Mali (GEF ID 1152) aimed at the restoration, conservation, and sustainable management of local ecosystems and their biodiversity. The project sought to ensure synergy with other biodiversity conservation and land restoration initiatives undertaken by the GEF, the World Bank, and UNDP projects in the Niger River Delta.

86. An example of a project that addresses synergies between development and environment is the Enhancing Adaptive Capacity and Resilience to Climate Change in the Agriculture Sector in

Comoros (GEF ID 4974). This LDCF project seeks synergies between Comoros's development agenda and new technologies. It looks for mitigation and adaptation linkages by promoting adaptive technologies that are low carbon, such as solar water pumping; or by exploring synergies in the agriculture and forestry sectors. The Transfrontier Conservation Areas and Sustainable Tourism Development project (GEF ID 2003) in Mozambique also addressed trade-off-related mitigation. The project design drew from existing efforts in southern Africa in its aim to achieve synergy between biodiversity conservation and economic development through community-oriented, nature-based tourism and other types of sustainable use of biodiversity. The project's tourism development and conservation objectives were intended to be synergistic. Therefore, the project sought to plan and monitor closely to ensure the development was done in an environmentally sustainable manner that also contributed to local livelihoods and economic development. The project also supported the development of incentives and regulatory frameworks to support and favor responsible tourism and discourage exploitative tourism.

87. Findings from case studies stressed the importance of nexus thinking between environmental and socioeconomic priorities and objectives for higher sustainability. The nexus between the environment and socioeconomic development—a concept central to sustainable development—is often neglected in development interventions by both donors and developing countries alike. Major trade-offs exist between environmental, socioeconomic, and natural resource objectives; efforts to integrate socioeconomic development with environmental programming and sustainable resource use at the national and local levels depend in part on the interest of country governments. Case studies indicated that when sustainable alternative livelihoods are possible with a positive environment-socioeconomic nexus, the chances of sustainability of the environmental benefits of project interventions were much greater.

88. The outcomes of the Conservation and Management of the Eastern Arc Mountain Forests project (GEF ID 1170) in Tanzania contributed to urban water supplies through improved forest management and conservation by local communities, government authorities, and other stakeholders. The Ulugurus, part of the Eastern Arc Mountains, are the main source of water for Dar es Salaam and Morogoro. The project linked local community benefits to improved environmental management, providing support for local livelihoods such as tree nursery establishment and planting, beekeeping, improved cooking stoves and brick making, fishponds, and dairy goats, as well as to local saving and credit schemes. Such investments in local livelihoods helped generate support for environmental management.

89. The LDCF-financed Cambodia Promoting Climate-Resilient Water Management and Agricultural Practices project (GEF ID 3404) demonstrated resilient irrigation, freshwater management, and farming options. The project restored and built small-scale irrigation schemes, solar and windmill pumps, and community ponds; established seed purification groups and integrated farming system; provided access to finance through group revolving funds; provided capacity building to farmers and project staff; and shared lessons learned to

promote resilience of farmers and associated communities. This support has led to household labor savings from new domestic water sources and improved health benefits from waterborne diseases through using clean water, as well as enhanced community resilience to climate change. Furthermore, beneficiaries' livelihoods and income generation improved from the water supplied by solar and windmill pumps and home vegetable gardens.

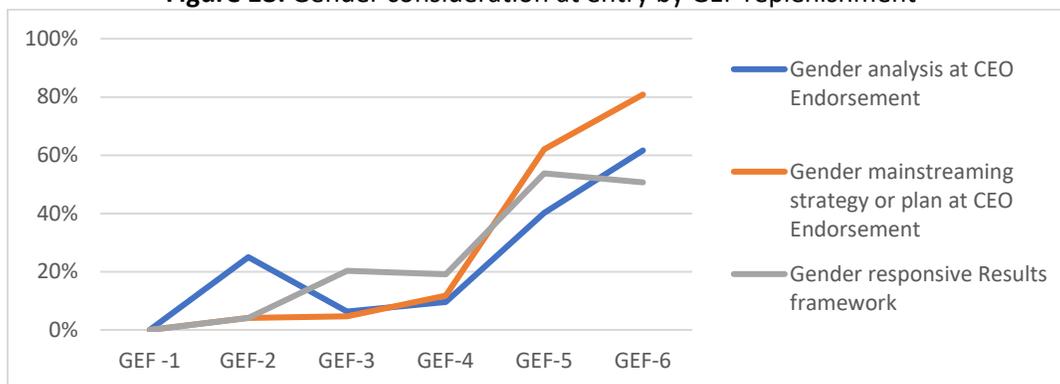
90. The Coastal and Biodiversity Management Project (GEF ID 1221) in Guinea-Bissau and a series of replication projects (including Small Grants Programme projects) focused on the water-energy-food nexus through water drilling and installation of wells and water pumps. The water is mainly used for drinking, but there is some community-based horticulture as well. The improved drinking water has positive impacts on human health and reduced the number of cases of diarrhea among children. Other microprojects using new technologies resulted in improved productivity and higher incomes in beneficiary communities.

3.5 Cross-cutting Issues

Gender

91. To assess the extent to which gender has been taken into consideration in GEF programming in LDCs, the evaluation completed a quality-at-entry review of design documents of both the relevance and the sustainability cohorts ($n = 621$). The assessment verified whether projects had (1) completed a gender analysis before Chief Executive Officer (CEO) endorsement; (2) developed a gender mainstreaming plan; and (3) incorporated a gender-responsive results framework, including gender-disaggregated indicators. The analysis shows a progressive increase in the number of projects undertaking a gender analysis at CEO endorsement; this has more than doubled from GEF-4 to GEF-6 (Figure 18). There is a similar trend in number projects having developed a gender mainstreaming plan and including a gender-responsive results framework. Interestingly, the analysis found that 41 percent of projects have a gender mainstreaming plan in place, even when 30 percent of the projects had not conducted a gender analysis at CEO endorsement.

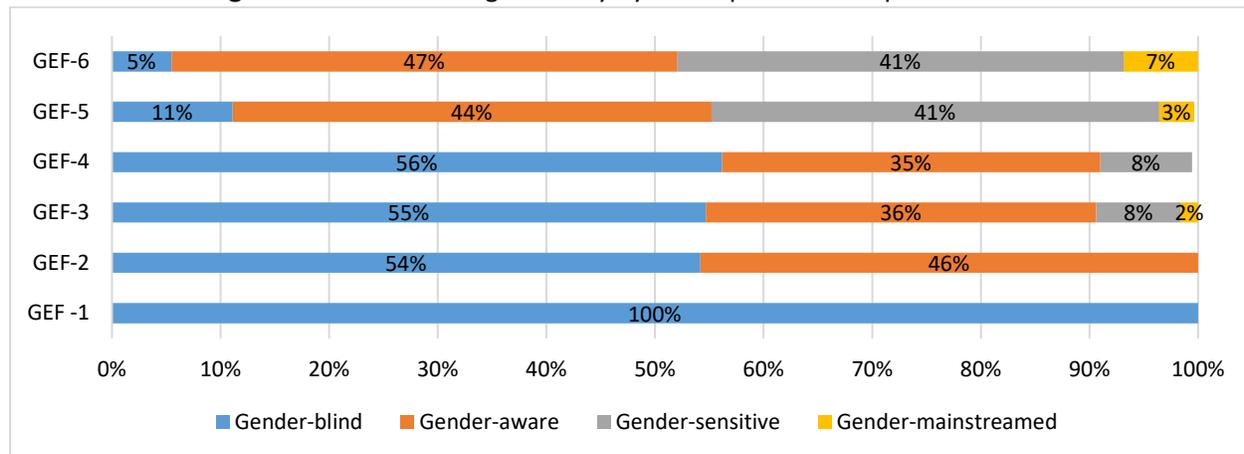
Figure 18: Gender consideration at entry by GEF replenishment



92. **Consideration of gender has improved over the replenishment periods in LDCs.** Projects were assessed at entry, and for completed projects with terminal evaluations at completion,

using a gender rating scale applied in recent IEO analyses (Annex 4) (GEF IEO 2018d). While over 50 percent of GEF-1 to GEF-4 projects were rated as gender blind, this percentage decreased to 11 percent in GEF-5 and to 5 percent in GEF-6 with the introduction of the GEF Gender Mainstreaming Policy in May 2011 (GEF 2012). The percentage of gender-sensitive projects increased substantially in GEF-5; this level was maintained in GEF-6 (Figure 19).

Figure 19: Gender ratings at entry by GEF replenishment period in LDCs



93. **Gender is increasingly being considered during project implementation even when not explicitly addressed at the design stage.** The GEF IEO’s gender mainstreaming evaluation (GEF IEO 2018d) found that gender ratings at completion for GEF-1 to GEF-4 projects have improved. The evaluation reported a decrease in the number of gender-blind projects and an increase in the number of gender-aware projects, with some increase in gender-sensitive projects. Similarly, gender considerations in LDCs are taken into account during project implementation even when not addressed at design; this is evident in the improved ratings of projects between entry and completion. Figure 20 and Figure 21 compare gender ratings at entry and completion based on projects with terminal evaluations ($n = 234$). This comparison shows that ratings shift toward gender aware and gender sensitive at completion.

Figure 20: Gender rating at entry in LDCs

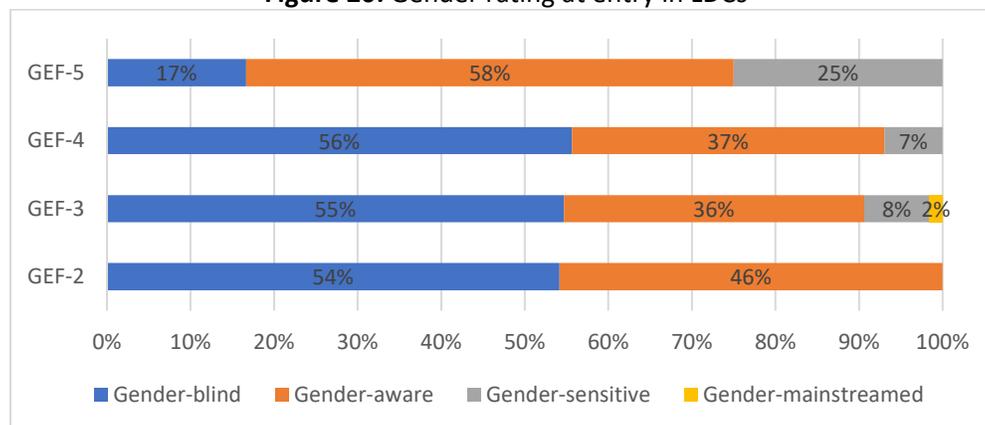
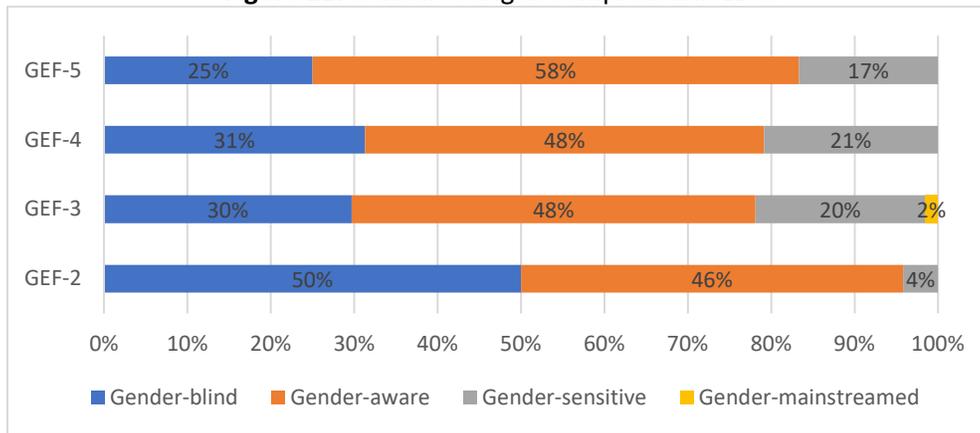


Figure 21: Gender rating at completion in LDCs



94. **Sixty-five percent of completed projects had evidence of women's inclusion and empowerment, which emerged during implementation.** Gender-disaggregated data in project documents tend to focus on the share of men and women as beneficiaries. No evidence of women being considered or consulted at design emerged from the project documentation reviewed.

95. **Case studies confirmed that, even when not designed with gender mainstreaming in mind, most projects were implemented in a gender-inclusive manner.** For example, the Coastal and Biodiversity Management (GEF ID 1221) project in Guinea-Bissau which strengthened the country's protected areas system and supported local community organization and community investment priorities was designed with no explicit gender focus. However, microprojects were designed to ensure women benefited in the choice of projects—such as smoked fish initiatives in which women had their own accounts with a microcredit facility, women-only horticulture ventures—and in terms of wells established within the community area. The country case study confirmed that the outcome of drinking water and improved local health had been achieved in nearly all communities where women's groups were in charge of water pumps and their maintenance.

96. Frequently, women's involvement has been in the promotion of improved and sustainable livelihoods such as in the Novel Forms of Livestock and Wildlife Integration Adjacent to Protected Areas of Tanzania project (GEF ID 2151). The project worked with pastoralists dependent on livestock, crops, and wild products for their livelihoods. It introduced and trained women's groups in beekeeping and supported establishment of a conservation business venture that engaged women in making handicrafts. From discussions with stakeholders during site visits, it was evident that these livelihoods are continuing—and are profitable. One women's group has constructed a building where bead jewelry and handicrafts are stored and has established a village community bank that provides loans, even to men's groups. Income-generating activities have also enabled the women's group to build a livestock pesticide plunge dip for tick control.

Resilience

97. Promoting climate resilience is a key aspect in LDCs as demonstrated by the large number of adaptation interventions and the considerable amount of LDCF/SCCF funding in LDCs. In the absence of an official GEF definition of resilience, this evaluation takes resilience to be the capacity of social, economic, and environmental systems to cope with a hazardous event, responding or reorganizing in ways that maintain their essential function, identity, and structure, while also maintaining the capacity for adaptation, learning, and transformation (Béné et al. 2012). Two resilience considerations have been examined in this evaluation. First, the analysis looked at how resilience is considered in the GEF portfolio in LDCs, whether in terms of (1) risk management, (2) as a cobenefit, or (3) integrated into a multiple benefits framework, as explained in Box 2 (GEF STAP 2014).

Box 2: Climate resilience in the GEF

In the context of the GEF, climate resilience may be considered at three levels:

Resilience as risk management: A first level of response emerges from pure risk management considerations: sustained delivery of future GEB's is at risk from climate change; therefore, projects ought to be screened for climate risks, and suitable risk management measures should be developed and adopted in project design and implementation. This would increase the resilience of the GEF portfolio to climate change. Such a de-risking approach is now being widely adopted by most multilateral and bilateral funding organizations, starting with the development and adoption of screening tools.

Resilience as a cobenefit: GEF focal area interventions offer the opportunity of enhancing resilience of human socio-economic systems to climate change; it is therefore worth seeking resilience cobenefits of GEF focal area interventions, or in some cases, use approaches practiced in other focal areas, specifically for enhancing the climate resilience of human systems. This is the underlying logic of ecosystem-based adaptation, where ecosystem restoration serves as a means for reducing the vulnerability of human socioeconomic systems.

Resilience integrated into a multiple benefits framework: It is increasingly important to develop frameworks and approaches that allow multiple objectives and multiple benefits to be achieved simultaneously across social and natural systems. In this framing, resilience is not seen as an add-on (additional risk to be managed) or a cobenefit, but rather as a system property that needs to be considered together with all the other system properties, and thus linked to the idea of sustainable development.

98. **Resilience is addressed in climate change adaptation projects mostly in the form of climate risk management and as a cobenefit.** Support to climate change adaptation through LDCF and SCCF aims to strengthen resilience and reduce vulnerability to the adverse impacts of climate change in GEF recipient countries. GEF Trust Fund support also integrates climate resilience in its interventions. While all climate change adaptation projects financed by LDCF/SCCF and the GEF Trust Fund Strategic Priority for Adaptation included resilience considerations, only 37 percent of nonclimate change adaptation projects showed some evidence of resilience considerations. Resilience considerations in the terminal evaluations of projects completed between 2007 and 2014 focused on risk management and resilience as a cobenefit. When considering the entire portfolio covered by this evaluation, spanning from GEF-4 to GEF-6, a move to resilience considerations being integrated into the respective project's multiple benefits framework is observed.

99. The second resilience consideration examined in this evaluation was the type of resilience system thinking used in projects. The analysis looked at the core components of the resilience concept in resilience-focused projects, identifying whether resilience was viewed (1) in a static system/engineering sense, (2) as incremental change, or (3) as transformational change. Types of resilience thinking are outlined in Box 3. In the 37 percent of nonclimate change adaptation projects that showed some evidence of resilience considerations identified in the first step of the analysis, the resilience thinking was in the form of incremental change or in a static system/engineering sense. None of these projects showed transformative change. Only two of all the projects reviewed showed resilience as transformative change. Both are LDCF-financed projects in GEF-5: Integrating Climate Resilience into Agricultural and Agropastoral Production Systems through Soil Fertility Management in Key Productive and Vulnerable Areas Using the Farmers Field School Approach (GEF ID 5432) in Angola, and Enhancing the Adaptation Capacities and Resilience to Climate Change in Rural Communities (GEF ID 5632) in Madagascar.

Box 3: Types of resilience system thinking

Resilience from a systems or engineering perspective (absorptive): This was the original, relatively narrow focus of resilience; the ability of a system to bounce back or return to equilibrium following disturbance, referred to by Holling (1973) as “engineering resilience.” This comes down to absorptive (coping) capacity, which Cutter et al. (2008, 663) define as “the ability of the community to absorb event impacts using predetermined coping responses.”

Resilience as incremental change (adaptive): adaptive resilience refers to the various adjustments (incremental changes) that people undergo in order to continue functioning without major qualitative changes in function or structural identity. These incremental adjustments and changes can take many forms (e.g. adopting new farming techniques, change in farming practices, diversifying livelihood bases, engaging in new social networks, etc.). These adaptations can be individual or collective, and they can take place at multi-level (intra-household, groups of individuals/households, community, etc.).

Resilience as transformational change (transformative): transformational changes often involve shifts in the nature of the system, the introduction of new state variables and possibly the loss of others, such as when a household adopts a new direction in making a living or when a region moves from an agrarian to a resource extraction economy. It can be a deliberate process, initiated by the people involved, or it can be forced on them by changing environmental or socioeconomic conditions. What the growing body of literature that discusses transformational changes highlights is that the main challenges associated with transformation are not of a technical or technological nature only. Instead, as pointed out by Pelling (2011), these shifts may include a combination of technological innovations, institutional reforms, behavioral shifts and cultural changes.

100. Almost all the country case studies found evidence of resilience thinking in projects implemented in the 12 countries. Bhutan’s mountainous terrain and variation in agroecological zones renders it vulnerable to the impacts of climate change and disasters. In three projects visited, resilience considerations were integrated as incremental change in risk management. The Sustainable Land Management project (GEF ID 2358) contributed to the reduction of land degradation and retention of soil in targeted areas and increase the resilience of the land and critical watersheds and communities dependent on the land to natural disasters and impacts of climate change. The Integrated Livestock and Crop Conservation Program (GEF ID 2550) increased on-farm diversity of crop and livestock, thereby increasing the resilience of its agricultural production systems. The LDCF-financed Addressing the Risk of Climate-induced

Disasters through Enhanced National and Local Capacity for Effective Actions project (GEF ID 4976) enhanced resilience and capacity and reduced the vulnerability of people, livelihoods, physical assets, and natural systems to the adverse effects of climate change. The initiative had a strong focus on economic infrastructure in the Pasaka Industrial Area in Phuentsholing, Bhutan's financial, industrial, and trading capital.

101. Tanzania has been experiencing the impacts of climate change, including frequent and prolonged droughts, severe floods, rising ocean temperatures, and sea level rise. Resilience thinking in its GEF projects is being integrated into multiple benefits frameworks either in an engineering sense or as incremental change. The Marine and Coastal Environment Management project (GEF ID 2101) addressed resilience of fish stocks. The project enhanced the capacity to monitor transboundary fish stocks in exclusive economic zones and strengthening the governance regime for commercial fishery and near-shore marine managed areas. Awareness was raised in coastal communities to recognize the importance of closed and open seasons for fishing in marine managed areas, and community members can easily report cases of illegal fishing practices in near-shore waters. Strategic Investment Program for Sustainable Land (SIP) project Reducing Land Degradation on the Highlands of Kilimanjaro (GEF ID 3391) has contributed positively to strengthening the resilience of communities to the impacts of climate change through capacity building, market support for alternative livelihood options, and a regulatory framework for SLM. There is evidence that the project has strengthened the resilience of both communities and ecosystems to the shocks and disturbances that may be caused by natural disasters, such as droughts and floods, and the anticipated impacts of climate change. The ongoing LDCF-financed project Developing Core Capacity to Address Adaptation to Climate Change in Productive Coastal Zones (GEF ID 4141) aims to address the vulnerability of the coastal zone in the face of sea level rise and erratic precipitation in four sites. The project is rehabilitating buffering ecosystems, such as mangroves, and key protective infrastructures to ensure their resilience and the continued protection of coastal assets, settlements, and community livelihoods.

102. In GEF projects in Uganda, where policies and institutions dealing with climate resilience are well developed, resilience thinking entails cobenefits and integration into multiple benefits frameworks as incremental change. Resilience featured prominently in the Integrated Landscape Management for Improved Livelihoods and Ecosystem Resilience in Mount Elgon (GEF ID 5718) project and the SIP: Enabling Environment for SLM to Overcome Land Degradation in the Cattle Corridor of Uganda (GEF ID 3393) project. In these projects, to reinforce landscape resilience, tree planting was integrated into the landscape to reduce wind speed and for increased water retention. The technologies promoted through these projects help keep more water and nutrients in the soil, and conservation agriculture increases maximum use of resources and productivity. The projects also have enhanced community resilience by organizing community members to undertake joint landscape management activities, while savings groups simultaneously seek to reduce land mortgaging for small loans.

103. Kiribati is an atoll and therefore especially vulnerable to sea level rise and natural disasters. The resilience thinking in the Kiribati Adaptation Program (GEF ID 2543) is resilience as incremental change integrated into the multiple benefits framework. The project, part of the GEF Trust Fund Strategic Priority for Adaptation, focused on climate resilience and disaster risk management in the design, including strengthening of local resilience. The program's next phase, Increasing Resilience to Climate Variability and Hazards (GEF ID 4068), continued this process, strengthening climate resilience based on the strategies and designs developed during earlier, with special focus on water resources. The project also supported the government in developing a new act on disaster risk management, replacing an outdated act from 1999.

104. Comoros is prone to hydrological natural disasters that often have severe impacts on the country's population and infrastructure. Two of the projects reviewed had resilience thinking in the project design as resilience as incremental change integrated into the multiple benefits framework. Both projects are financed by the LDCF. The Adapting Water Resource Management in Comoros to Increase Capacity to Cope with Climate Change project (GEF ID 3857) financed by LDCF built capacity in the National Agency for Civil Aviation and Meteorology for real-time monitoring of cyclones and climate modeling. The project also strengthened the power and utility company, supporting the replacement of existing water pipes. The ongoing LDCF project Enhancing Adaptive Capacity and Resilience to Climate Change in the Agriculture Sector in Comoros (GEF ID 4974) is building on these activities to improve the climate resilience of the agricultural sector by providing water for irrigation. The regional project (GEF ID 1247) achieved the outcome of improved local resilience through beach erosion control. Despite the contributions of these initiatives to strengthening the resilience of the country and local communities to climate change and natural disasters, the impact of such small projects is very limited compared with the needs.

Fragility

105. **Overall, the analysis of outcome and sustainability ratings showed lower ratings for projects implemented in fragile LDCs than those that were not.** Twenty-eight of the 47 LDCs are or have been a country affected by FCV in the last 10 years ([World Bank 2018](#)) (annex 5). The GEF has approved, implemented, and completed projects in all of these FCV countries. GEF support in FCV LDCs includes 38 completed projects, 31 of which were included in the APR 2019 terminal evaluation data set. Sixty-one percent of those projects were rated in the satisfactory range for outcomes; and 39 percent were rated likely for sustainability. This compares to the sustainability cohort of this evaluation of 173 national and regional interventions, where 71 percent of projects were rated in the satisfactory range for outcomes at the time and 44 percent for likely sustainability. When looking at the entire cohort covered by this evaluation (GEF-4 to GEF-6), projects reviewed indicate that, in the few cases in which implementation was interrupted because of the emergence of a fragile situation, the project continued when the situation returned to normal. This occurred for seven projects; one project in Myanmar is currently on hold. A possible explanation is that the GEF has been risk adverse, and most of the projects implemented in fragile countries are in nonfragile areas in those countries.

106. The African Biomes and SIDS SCCEs visited projects in five FCV LDCs—Guinea and Mali in the African Biomes, and the SIDS of Comoros, Guinea-Bissau, and Kiribati. The situation in Guinea directly affected timely delivery of GEF support. In 2008–10, there was an interruption of the Support Program for Village Communities World Bank project due to civil unrest following the president’s death; this forced the World Bank to suspend all operations in the country. The Community-based Land Management (GEF ID 1877) and the Coastal Marine and Biodiversity Management (GEF ID 1273) projects were stopped as well, because they were hosted and executed through the World Bank’s Support Program for Village Communities. Interviews with World Bank and government representatives indicated that this unforeseen interruption caused serious delays during implementation, but no other major consequences were discerned.

107. In Mali, the Biodiversity Conservation and Participatory Sustainable Management of Natural Resources in the Inner Niger Delta and Its Transition Areas, Mopti Region (GEF ID 1152) had delays in implementation of its agreement with the government’s funding arm for local development (Agence Nationale d’Investissement des Collectivités Territoriales), and the political crisis in the project area in 2012 and 2013 greatly penalized the financing of the microprojects. As a result, following the supervisory mission in April 2013, 22 contracts totaling CFAF 110 million (\$182,350) were canceled, but other activities continued, as reported in the project’s terminal evaluation. Other projects visited continued operations despite the fragile situation.

108. Guinea-Bissau has experienced a series of military coups, unrest, and violence since its independence from Portugal in 1974. The regional project Combating Living Resource Depletion and Coastal Area Degradation in the Guinea Current LME through Ecosystem-based Regional Actions (GEF ID 1188) highlighted in table 9 for improved sustainability of outcomes at postcompletion was implemented during times of political unrest. More than half of the program countries in the region experienced political crises during the implementation period or were recovering from conflict in the years prior to the program. Such problems also affected the national project in Guinea-Bissau, where the period 2009–10 was dominated by political conflicts with military involvement. The project closed just before the last official military coup in 2012. The country case study found the project accomplished substantial outcomes despite a difficult sociopolitical environment.

Private Sector

109. The engagement of the private sector was not initially included as a cross-cutting issue to be explored by this evaluation, but country case studies identified it as a potentially important element of GEF interventions affecting the sustainability of outcomes. Therefore, the private sector was added to the assessment of cross-cutting issues in GEF-supported projects during the conduct of the evaluation.

110. **The private sector had limited involvement in GEF projects in LDCs; when involved, it contributed to sustainability.** Fifty-two percent of the projects reviewed in this evaluation

showed evidence of some form of private sector engagement in LDCs. Projects engaged with the private sector either as a project stakeholder (29 percent), to get the sector on board from inception (18 percent), and to ask for input on project design (15 percent). However, only 16 percent of projects engaged with the private sector during the design stage to secure private sector cofinancing. Of these, the terminal evaluations of 87 projects (37 percent of all completed projects) reported evidence of private sector cofinancing, provided after project completion for five projects. In terms of private sector involvement during implementation, 24 percent of projects showed evidence of established public-private partnerships. Establishment of 13 percent of these partnerships was facilitated by existing country regulatory frameworks that enabled the private sector to address environmental issues. The low level of private sector engagement in LDCs is not surprising given that LDCs are typically characterized by a weak domestic private sector ([UNCTAD 2018](#)).

111. The Cambodia case study found that the most significant key driver for sustainability is private sector engagement through financing and market-oriented business. The Establishing Conservation Areas Landscape Management in the Northern Plains (GEF ID 1043) project engaged the private sector for ecotourism and markets for organic rice production; this involvement continued to be active at the time of the case study. The LDCF Adapting Water Resource Management in Comoros to Increase Capacity to Cope with Climate Change (GEF ID 3857) project had in-kind cofinancing from the private sector and had a private sector representative on the project steering committee, whose role was to validate activities and budget.

112. In Uganda, the private sector was included to help with project sustainability. Specifically, the Protected Areas Management and Sustainable Use (GEF ID 1830) project increased private sector investment in park facilities. The private sector was persuaded to develop infrastructure in the parks, such as hotels and camps in the reserve areas, thus generating income and employing local community members. This action enhanced the nexus between environmental conservation and increased income for the private sector, as well as for local government districts through the levy of hotel taxes. Two projects in Mozambique, the Transfrontier Conservation Areas and Sustainable Tourism Development Project (GEF ID 2003) and Sustainable Financing of the Protected Area System in Mozambique (GEF ID 3753), attracted private sector investors and tourists after project completion.

4. CONCLUSIONS

Overall Relevance to Country Environmental Priorities

113. **GEF support to LDCs has increased consistently since the pilot phase.** The GEF has long recognized the unique challenges faced by LDCs and has regularly increased its support to LDCs since the pilot phase to more than \$1.2 billion in GEF-5 and GEF-6. Just over 60 percent of the funding comes from the GEF Trust Fund, and 37 percent from the LDCF. During the shortfall in GEF-6, an effort was made to ensure that LDCs were sufficiently funded. During GEF-6, the share from the LDCF, which had grown substantially in GEF-5, decreased due to a decline in resources available through the fund. Amounts for GEF-7 show continued strong support to LDCs having reached \$295.8 million.

114. **GEF interventions are relevant to national environmental challenges facing LDCs.** The main interventions are well aligned and highly relevant to national environmental priorities facing LDCs. Most of GEF support to LDCs has focused on climate change adaptation to address the effects of a changing climate that exacerbates most environmental challenges in LDCs. Climate change adaptation accounts for 37 percent of all GEF financing in GEF-4 to GEF-6 in LDCs. Multifocal area interventions—most commonly a combination of biodiversity, land degradation, and climate change including adaptation—have grown to support LDCs to tackle environmental challenges through integrated programming. Review of project documentation in the portfolio and interviews with government officials in case study countries strongly confirmed that GEF interventions are well aligned with governments' environmental priorities in LDCs. Government officials in countries visited highlighted that the GEF is an important source of funding that fits into their planning. In the much-needed areas of institutional development and governance, more than half of the projects reviewed focus on skills building and policy frameworks, including indicators measuring capacity and skills development and the development of plans, policies, laws, and regulations.

Relevance of the Financial and Technical Support Offered by the GEF to LDCs

115. **The relevance of GEF support has not been affected by the GEF shift towards integrated programming.** Since GEF-4, the GEF has been moving toward more integrated programming through multifocal projects and programmatic approaches. Although investment in programs initially increased in GEF-4 and substantially decreased by GEF-6, there has been a shift from single focal area to multifocal interventions and an increase in the size of programs and their respective child projects in LDCs. This trend reflects the GEF's move toward integrated programming to achieve impact at scale and address the main drivers of environmental degradation.

116. **The expansion of GEF Agencies has led to more options for most LDCs.** The number of GEF Agencies supporting LDCs has increased from 8 during GEF-4 to 12 during GEF-6. The three original GEF Agencies active since the pilot phase—UNDP, UNEP, and the World Bank—

implemented 72 percent of GEF funding. For LDCs that are also SIDS, the original GEF Agencies continued to account for 82 percent of financing in GEF-6, showing that the benefits of expansion are still to be realized. Although not yet fully programmed, the share of the original GEF Agencies' financing has fallen to 52 percent for all LDCs in GEF-7. Most Agencies active in LDCs have a rather diversified portfolio in terms of focal area composition, with a higher share of climate change adaptation projects implemented by each Agency. Countries select GEF Agencies based on several aspects of comparative advantage including their technical area of specialization, their history of engagement with the Agency, and the physical presence of the Agency in the country.

Overall Performance and Sustainability

117. **The performance of LDC projects is lower than for the overall GEF portfolio.** Analysis of the most recent APR available data from the 2019 cohort shows that completed projects in LDCs are rated lower than the overall GEF portfolio on all performance indicators. Focusing on the ratings of outcomes and the likelihood of their sustainability, 72 percent of projects were rated as having satisfactory outcomes, which is significantly lower than the rating of 80 percent in the overall GEF portfolio. Regarding sustainability of outcomes, 46 percent of LDC projects were rated in the likely range, compared to 63 percent of projects in the overall GEF portfolio. On these dimensions, LDC projects are also rated lower than projects in the Africa and Asia regions, where most LDCs are located. This conclusion confirms previous findings from IEO performance analysis, country portfolio evaluations in LDCs, and the program evaluation of the LDCF. Additionally, projects in LDCs have tended to have lower ratings, more recently completed projects have higher ratings than those completed between 2007 and 2014.

118. **Climate change adaptation projects performed better than other focal area projects in LDCs.** Seventy-nine percent of climate change adaptation projects were rated in the satisfactory range for outcomes, and 58 percent were rated as having outcomes likely to be sustained; this was the highest of all focal area projects. The performance of climate change adaptation projects is comparable to the overall GEF portfolio on outcomes and slightly lower than the 63 percent on sustainability. Most of the funding for climate change adaptation interventions is from the LDCF, with small amounts from the SCCF and the GEF Trust Fund Strategic Priority for Adaptation. LDCF support accounts for 35 percent of funding during GEF-4 to GEF-6.

119. **Demonstrating sustainability takes time.** This evaluation found that most projects tend to maintain or show higher observed sustainability of outcomes at postcompletion than at the time of the terminal evaluation. This confirms similar findings of the APR 2017 and the recently completed SIDS SCCE. These improvements in sustainability are mainly attributed to the quality of project design as well as to positive changes in the context taking place postcompletion.

Factors of Sustainability

120. **Financial sustainability is a challenge in most LDCs.** Of the four dimensions of sustainability—financial, institutional, environmental, and political—financial sustainability is

rated the lowest in LDCs. Seventy-two percent of projects in the APR 2019 cohort of projects completed between 2007 and 2014 were rated likely for sustainability of outcomes in the overall GEF portfolio compared to 65 percent in LDCs. By region, financial sustainability varies widely, with 54 percent of LDC projects rated as likely in terms of financial sustainability in Africa compared to 84 percent in Asia; this latter is higher than the overall GEF cohort, and the range reflects the heterogeneity among LDCs. Limited postcompletion financing is a key context-related hindering factor in most of the country case studies conducted by the three SCCEs. This finding points to the importance of elaborating financial arrangements in the project design that can continue after project completion to deliver benefits over time.

121. Profitable income-generating activities play a vital role in the sustainability of outcomes in LDCs. The review of terminal evaluations and postcompletion site visits by country case studies found that many GEF interventions include income-generating activities to link local community benefits to improved environmental management. This approach has been found to lead to tangible outcomes in LDCs, but it is not guaranteed to be a success. Community livelihood interventions in LDCs are more likely to succeed if the proposed activity truly is an alternative livelihood, is well designed, has a positive environmental-socioeconomic nexus, and meets the needs of beneficiaries. Interventions are more likely to be sustainable if they are market oriented and are integrated in development plans and budget.

Gender

122. The inclusion of gender considerations in GEF interventions has increased in LDCs. The evaluation found a progressive increase in the number of projects completing gender analysis, including gender mainstreaming plans, and incorporating gender in results framework from GEF-4 to GEF-6. Consistent with similar findings from previous IEO evaluations, gender considerations in LDCs are taken into account during project implementation even when not addressed at the design stage—this is evident from the improved ratings of projects between entry and completion and from findings of country case studies. Taking gender into consideration is also important for the sustainability of outcomes, as well as for gender equality and women’s empowerment.

Resilience and Fragility

123. Climate resilience is addressed in climate change adaptation projects, but rarely in other focal area projects. Promoting climate resilience is a key aspect in LDCs as demonstrated by the large number of adaptation interventions and the considerable amount of LDCF/SCCF funding in LDCs. While all climate change adaptation projects financed by the LDCF/SCCF and the GEF Trust Fund Strategic Priority for Adaptation included resilience considerations, only 37 percent of nonclimate change adaptation projects showed some evidence of resilience considerations. Resilience considerations in these projects focused on risk management and resilience as a cobenefit. When considering the entire portfolio covered by this evaluation,

spanning from GEF-4 to GEF-6, a move to resilience considerations being integrated into the project's multiple benefits framework is observed.

124. **Fragility has affected the timely delivery of GEF support as well as outcomes and sustainability of GEF support in LDCs.** Overall, outcome and sustainability ratings show lower ratings for projects implemented in fragile countries in LDCs and those that were not. As observed in country visits by the African Biomes and SIDS SCCEs in Comoros, Guinea, Guinea-Bissau, Kiribati, and Mali, country insecurity and the emergence of fragile situations can significantly delay implementation and outcomes. However, activities such as alternative livelihood and income-generating activities that are financially viable and beneficiary relevant tend to continue—especially when these are located far from capital cities. The African Biomes SCCE found several examples in which the negative effects of suddenly emerged fragile situations tended to be felt less in rural areas, on activities with a clear and tangible financial viability, and a high correspondence with beneficiary need.

Final Remarks

125. The LDC SCCE does not present final recommendations. In light of the current circumstances of the COVID-19 pandemic, which have limited the opportunity for discussion of the conclusions of evaluations, the findings and recommendations from this evaluation will be discussed with various stakeholders and included as part of the Seventh Comprehensive Evaluation of the GEF (OPS7).

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ANNEX 1: LEAST DEVELOPED COUNTRIES BY REGION

LDCs	Year	LDCs	Year
Africa			
Angola	1994	Malawi	1971
Benin	1971	Mali	1971
Burkina Faso	1971	Mauritania	1986
Burundi	1971	Mozambique	1988
Central African Republic	1975	Niger	1971
Chad	1971	Rwanda	1971
Comoros*	1977	Sao Tome & Principe*	1982
Congo, Democratic Republic	1991	Senegal	2000
Djibouti	1982	Sierra Leone	1982
Eritrea	1994	Somalia	1971
Ethiopia	1971	South Sudan	2012
Gambia	1975	Sudan	1971
Guinea	1971	Tanzania	1971
Guinea-Bissau*	1981	Togo	1982
Lesotho	1971	Uganda	1971
Liberia	1990	Zambia	1991
Madagascar	1991		
Asia and Pacific			
Afghanistan	1971	Nepal	1971
Bangladesh	1975	Solomon Islands*	1991
Bhutan	1971	Timor Leste*	2003
Cambodia	1991	Tuvalu*	1986
Kiribati*	1986	Vanuatu*	1985
Lao PDR	1971	Yemen	1971
Myanmar	1987		
Latin America and the Caribbean			
Haiti*	1971		

Source: [UN-OHRLLS](#).

Note: *Small island developing state.

ANNEX 2: LIST OF COUNTRY CASE STUDIES AND PROJECTS VISITED

Country /ID	Agency	Focal Area	GEF Phase	Type	Title
Projects visited as part of the LDC SCCE					
BHUTAN					
2358	WB	LD	GEF-3	FSP	Sustainable Land Management
2550	UNDP	BD	GEF-4	MSP	Integrated Livestock and Crop Conservation Program
3052	UNDP	MFA	GEF-4	MSP	Enhancing Global Environmental Management in Bhutan's Local Governance System
3262	UNDP	LD	GEF-3	MSP	LDC/SIDS Portfolio Project: Building Capacity and Mainstreaming Sustainable Land Management in Bhutan
4579	WB	MFA	GEF-5	FSP	Sustainable Financing for Biodiversity Conservation and Natural Resources Management
4976	UNDP	CCA (LDCF)	GEF-5	FSP	Addressing the Risk of Climate-induced Disasters through Enhanced National and Local Capacity for Effective Actions
CAMBODIA					
1043	UNDP	BD	GEF-3	FSP	Establishing Conservation Areas Landscape Management (CALM) in the Northern Plains
1086	UNDP	BD	GEF-2	MSP	Developing an Integrated Protected Area System for the Cardamom Mountains
1684	ADB	MFA	GEF-3	MSP/Reg.	National Performance Assessment and Sub-regional Strategic Environment Framework in the Greater Mekong Sub-region (GMS)
3404	UNDP	CCA (LDCF)	GEF-4	FSP	Promoting Climate-Resilient Water Management and Agricultural Practices
3635	UNDP	MFA	GEF-4	FSP	SFM Strengthening Sustainable Forest Management and the Development of Bio - energy Markets to Promote Environmental Sustainability and to Reduce Green House Gas Emissions in Cambodia
4434	FAO	CCA (LDCF)	GEF-5	FSP	Strengthening the Adaptive Capacity and Resilience of Rural Communities Using Micro Watershed Approaches to Climate Change and Variability to Attain Sustainable Food Security
MOZAMBIQUE					
2003	WB	BD	GEF-3	FSP	Transfrontier Conservation Areas and Sustainable Tourism (TFCA) development Project
2889	WB	MFA	GEF-3	MSP	Zambezi Valley Market Led Smallholder Development
3155	UNDP	CCA (SCCF)	GEF-3	MSP	Coping with Drought and Climate Change
2052	UNEP	LD	GEF-3	MSP/Reg.	Sustainable Management of Inland Wetlands in Southern Africa: A Livelihoods and Ecosystem Approach
3753	UNDP	CC	GEF-4	FSP	Sustainable Financing of the Protected Area System in Mozambique
4276	UNDP	CCA (LDCF)	GEF-5	FSP	Adaptation in the Coastal Zones of Mozambique
TANZANIA					
1170	WB/ UNDP	BD	GEF-2	FSP	Conservation and Management of the Eastern Arc Mountain Forests
2052	UNEP	LD	GEF-3	MSP/Reg.	Sustainable Management of Inland Wetlands in Southern Africa: A Livelihoods and Ecosystem Approach
2101	WB	MFA	GEF-3	FSP	Marine and Coastal Environment Management Project (MACEMP)

Country /ID	Agency	Focal Area	GEF Phase	Type	Title
2151	WB	BD	GEF-3	MSP	Novel Forms of Livestock & Wildlife Integration Adjacent to Protected Areas in Africa
3391	UNDP	LD	GEF-4	FSP	SIP: Reducing Land Degradation on the Highlands of Kilimanjaro
3428	UNDP	BD	GEF-4	FSP	SFM Extending the Coastal Forests Protected Area Subsystem
4141	UNEP	CCA (LDCF)	GEF-4	FSP	Developing Core Capacity to Address Adaptation to Climate Change in Productive Coastal Zones
Projects visited as part of the Biomes SCCE					
GUINEA					
1093	WB/UNDP	IW	GEF-3	FSP/Reg.	Reversing Land and Water Degradation Trends in the Niger River Basin
1273	WB	BD	GEF-3	FSP	Coastal Marine and Biodiversity Management
1877	WB	LD	GEF-3	FSP	Community-based Land Management
3703	UNDP	CCA (LDCF)	GEF-4	FSP	Increased Resilience and Adaptation to Adverse Impacts of Climate Change in Guinea's Vulnerable Coastal Zones
4692	UNDP	CCA (LDCF)	GEF-5	FSP	Strengthening resilience of communities' livelihoods against climate changes in Gaoual, Koundara and Mali
MALI					
1152	IFAD	BD	GEF-3	FSP	BD Conservation and Participatory SM of Natural Resources in the Inner Niger Delta, Mopti Region
1253	WB	BD	GEF-2	FSP	Gourma Biodiversity Conservation
1420	UNEP	MFA	GEF-3	FSP/Reg.	Reducing Dependence on POPs and Other Agro-Chemicals in the Senegal and Niger River Basins through IPPM
3377	WB/UNDP	LD	GEF-4	FSP	Strategic Investment Plan - Fostering Agricultural Productivity in Mali
3763	UNDP	BD	GEF-4	FSP	SPWA-BD: Expansion and Strengthening of Mali's Protected Area System
3979	FAO	CCA (LDCF)	GEF-4	FSP	Integrating Climate Resilience into Agricultural Production for Food Security in Rural Areas
5270	WB	MFA	GEF-5	FSP	GGW- Natural Resources Management in a Changing Climate in Mali
MAURITANIA					
1258	UNEP	BD	GEF-3	FSP/Reg.	Enhancing Conservation of Network of Wetlands Required by Migratory Water Birds on African/Eurasian Flyways
2459	WB	LD	GEF-3	FSP	Community-based Watershed Management Project
2614	UNDP	CC	GEF-3	FSP/Reg.	Responding to Shoreline Change and Its Human Dimensions in West Africa through Integrated Coastal Area Management
3379	IFAD	LD	GEF-4	FSP	SIP: Participatory Environmental Protection and Poverty Reduction in the Oases of Mauritania
3893	IFAD	CCA (LDCF)	GEF-4	FSP	Support to the Adaptation of Vulnerable Agricultural Production Systems
UGANDA					

Country /ID	Agency	Focal Area	GEF Phase	Type	Title
1175	UNDP	BD	GEF-3	FSP	Conservation of Biodiversity in the Albertine Rift Forest Protected Areas
1830	WB	BD	GEF-1	FSP	1830 Protected Areas Management and Sustainable Use (PAMSU)
2140	UNEP	BD	GEF-3	FSP/Reg.	Removing Barriers to Invasive Plant Management in Africa
3393	UNDP	LD	GEF-4	FSP	SIP: Enabling Environment for SLM to Overcome Land Degradation in the Cattle Corridor of Uganda
4644	UNDP	MFA	GEF-5	FSP	Addressing Barriers to Adoption of Improved Charcoal Production Technologies and SLM
5718	UNDP	MFA	GEF-5	FSP	Integrated landscape management for improved livelihoods and ecosystem resilience in Mount Elgon
Projects visited as part of the SIDS SCCE					
COMOROS					
3363	IFAD	MFA	GEF-4	MSP	SIP: Integrated Ecological Planning and Sustainable Land Management in Coastal Ecosystems in the Comoros in the Three Island of (Grande Comore, Anjouan, and Moheli)
1082	World Bank	IW	GEF-3	FSP / Reg.	Southwest Indian Ocean Fisheries Project – SWIOFP
1247	UNEP	IW	GEF-3	FSP / Reg.	Addressing Land-based Activities in the Western Indian Ocean (WIO-LaB)
2098	World Bank	IW	GEF-3	FSP / Reg.	Western Indian Ocean Marine Highway Development and Coastal and Marine Contamination Prevention Project
3857	UNDP	CC (LDCF)	GEF-4	FSP	Adapting Water Resource Management in Comoros to Increase Capacity to Cope with Climate Change
4974	UNDP	CC (LDCF)	GEF-5	FSP	Enhancing Adaptive Capacity and Resilience to Climate Change in the Agriculture Sector in Comoros
GUINEA-BISSAU					
1221	World Bank	BD	GEF-3	FSP	Coastal and Biodiversity Management Project
3817	World Bank	BD	GEF-4	MSP	SPWA-BD: Guinea-Bissau Biodiversity Conservation Trust Fund
1188	UNDP	IW	GEF-3	FSP/ Reg.	Combating living resource depletion and coastal area degradation in the Guinea current LME through
2614	UNDP	CC	GEF-3	FSP/ Reg.	Adaptation to climate change – Responding to shoreline change and its human dimensions in West Africa through integrated coastal area management
3575	UNDP	BD	GEF-4	MSP	SPWA-BD Support for the consolidation of a protected area system in Guinea-Bissau forest belt
4019	UNDP	CC (LDCF)	GEF-4	FSP	Strengthening resilience and adaptive capacity to climate change in Guinea-Bissau agrarian and water sectors
5331	UNIDO	CC	GEF-5	MSP	Promoting investments in small and medium scale renewable energy technologies in the electricity sector

Country /ID	Agency	Focal Area	GEF Phase	Type	Title
5368	UNDP	BD	GEF-5	FSP	Strengthening the financial and operational framework of the national protected areas system in Guinea-Bissau
KIRIBATI					
2543	World Bank	CC	GEF-3	FSP	Kiribati Adaptation Program - Pilot Implementation Phase (KAP-II)
3897	UNEP	BD	GEF-4	MSP	PAS: Phoenix Islands Protected Area (PIPA)
4068	World Bank	CCA (LDCF)	GEF-4	FSP	Increasing Resilience to Climate Variability and Hazards
4282	World Bank	CC	GEF-4	MSP	PAS: Grid Connected Solar PV Central Station Project
5130	UNDP	MFA	GEF-5	MSP	Integrating Global Environmental Priorities into National Policies and Programmes
VANUATU					
1682	UNDP	BD	GEF-3	MSP	Facilitating and Strengthening the Conservation Initiatives of Traditional Landholders and their Communities to Achieve Biodiversity Conservation Objectives
3798	World Bank	CCA (LDCF)	GEF-4	FSP	Increasing Resilience to Climate Change and Natural Hazards
5049	UNDP	CCA (LDCF)	GEF-5	FSP	Adaptation to Climate Change in the Coastal Zone in Vanuatu
5655	UNDP	MFA	GEF-5	MSP	Mainstreaming Global Environmental Priorities into National Policies and Programmes
9197	ADB	CCA (LDCF)	GEF-5	FSP	Protecting Urban Areas Against the Impacts of Climate Change in Vanuatu

ANNEX 3: COUNTRIES' RATIFICATION OF INTERNATIONAL ENVIRONMENTAL AGREEMENTS

	UNFCCC	UNCCD	CBD	Stockholm	Rotterdam	Basel	Minamata	CILSS	Marine
Africa									
Angola	Yes	Yes	Yes	Yes	Signature	Yes	Signature	N/A	Abidjan
Benin	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Burkina Faso	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A
Burundi	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	N/A
Central African Republic	Yes	Yes	Yes	Yes	No	Yes	Yes	N/A	N/A
Chad	Yes	Yes	Yes	Yes	Yes	Yes	Yes	No	N/A
Comoros	Yes	Yes	Yes	Yes	No	Yes	Yes	N/A	Nairobi
Congo Democratic Rep.	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	Abidjan
Djibouti	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	-
Eritrea	Yes	Yes	Yes	Yes	Yes	Yes	No	N/A	-
Ethiopia	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	-
Gambia	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Guinea	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Guinea-Bissau	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Lesotho	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	N/A
Liberia	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	Abidjan
Madagascar	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	-
Malawi	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	N/A
Mali	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A
Mauritania	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Mozambique	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	-
Niger	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A
Rwanda	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	N/A
Sao Tome & Principe	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	-
Senegal	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Sierra Leone	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	Abidjan
Somalia	Yes	Yes	Yes	Yes	Yes	Yes	No	N/A	-
South Sudan	Signature	Yes	Yes	No	No	No	No	N/A	N/A
Sudan	Yes	Yes	Yes	Yes	Yes	Yes	Yes	No	N/A
Tanzania	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	-
Togo	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Abidjan
Uganda	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	N/A
Zambia	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	N/A

Asia and the Pacific									
Afghanistan	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	N/A
Bangladesh	Yes	Yes	Yes	Yes	No	Yes	Signature	N/A	-
Bhutan	Yes	Yes	Yes	No	No	Yes	No	N/A	N/A
Cambodia	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	-
Kiribati	Yes	Yes	Yes	Yes	No	Yes	Yes	N/A	SPTT
Lao PDR	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	N/A
Myanmar	Yes	Yes	Yes	Yes	No	Yes	No	N/A	-
Nepal	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	N/A
Solomon Islands	Yes	Yes	Yes	Yes	Yes	No	No	N/A	SPTT
Timor Leste	Yes	Yes	Yes	No	No	No	No	N/A	-
Tuvalu	Yes	Yes	Yes	Yes	No	No	Yes	N/A	SPTT
Vanuatu	Yes	Yes	Yes	Yes	Yes	Yes	Yes	N/A	SPTT
Yemen	Yes	Yes	Yes	Yes	Yes	Yes	Signature	N/A	-
Latin America and the Caribbean									
Haiti	Yes	Yes	Yes	Signature	No	Signature	No	N/A	-

Source: Convention websites.

Notes: UNFCCC = United Nations Framework Convention on Climate Change, UNCCD = United Nations Convention to Combat Desertification, CBD = Convention on Biological Diversity, Stockholm = Stockholm Convention on Persistent Organic Pollutants, Rotterdam = Rotterdam Convention on the Prior Informed Consent Procedure for Certain Hazardous Chemicals and Pesticides in International Trade, Basel = Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal, Minamata = Minamata Convention on Mercury.

Marine = regional conventions focused on the marine environment. Abidjan = Abidjan Convention for Co-operation in the Protection and Development of the Marine and Coastal Environment of the West and Central African Region. Nairobi = Nairobi Convention of the Protection, Management and Development of the Marine and Coastal Environment of the Eastern African Region. SPTT = South Pacific Tuna Treaty.

ANNEX 4: GENDER RATING SCALE

Not gender relevant. Gender plays no role in the planned intervention.

Gender-blind. Project does not demonstrate awareness of the set of roles, rights, responsibilities, and power relations associated with being male or female.

Gender-aware. Project recognizes the economic/social/political roles, rights, entitlements, responsibilities, obligations, and power relations socially assigned to men and women, but might work around existing gender differences and inequalities or does not sufficiently show how it addresses gender differences and promotes gender equalities.

Gender-sensitive. Project adopts gender-sensitive methodologies (a gender assessment is undertaken, gender-disaggregated data are collected, gender-sensitive indicators are integrated in M&E) to address gender differences and promote gender equality.

Gender-mainstreamed. Project ensures that gender perspectives and attention to the goal of gender equality are central to most, if not all, activities. It assesses the implications for women and men of any planned action, including legislation, policies, or programs, in any area and at all levels.

Gender-transformative. Project goes beyond gender mainstreaming and facilitates a critical examination of gender norms, roles, and relationships; strengthens or creates systems that support gender equity; and/or questions and changes gender norms and dynamics.

ANNEX 5: CLASSIFICATION OF FRAGILITY, CONFLICT, AND VIOLENCE SITUATIONS IN LDCs

Country	Fragile (FY06)	Fragile (FY07)	Fragile (FY08)	Fragile (FY09)	FY10	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY18 Peacekeeping (PK)/Peacebuilding & Political Mission (P)	TREND
Africa															
Angola	Core	Core	Core	Core	2.95	2.98	2.98	2.95							(0.0012)
Benin															
Burkina Faso															
Burundi	Core	Core	Core	Core	3.04	3.04	3.03	3.10	3.3	3.3	3.3	3.15	3.04	P	0.0181
Central African Republic	Severe	Severe	Core	Core	2.67	2.78	2.850	2.84	2.8	2.4	2.4	2.42	2.45	P	(0.0548)
Chad	Marginal	Core	Core	Core	2.81	2.79	2.74	2.80	2.9	2.9	3.0	3.02	2.99		0.0335
Comoros	Severe	Severe	Core	Core	2.35	2.5	2.55	2.55	2.6	2.6	2.6	2.54	2.49		0.0139
Congo DR	Core	Core	Core	Core	2.77	2.76	2.81	2.85	3.0	3.1	3.1	3.16	3.08	PK	0.0544
Djibouti	Core	Marginal	Marginal	Marginal	3.2							3.16	3.13		(0.0082)
Eritrea	Core	Core	Core	Core	2.39	2.28	2.27	2.15	2.0	2.0	2.1	2.02	1.99		(0.0482)
Ethiopia															
Gambia	Marginal	Marginal	Marginal	Marginal	3.250						3.2	3.02	2.93	PK	(0.0341)
Guinea	Core	Core	Core	Core	3.08	2.98	3.050	3.08							0.0062
Guinea-Bissau	Core	Core	Core	Core	2.79	2.850	2.950	3.04	2.7	2.6	2.6	2.60	2.54	P	(0.0480)
Lesotho															
Liberia	Severe	Severe	Core	Core	3.13	3.23	3.27	3.38	3.4	3.3	3.3	3.28	3.23	PK	0.0090
Madagascar									3.1	3.1	3.2	3.15			0.025
Malawi									3.2						
Mali									3.7	3.6	3.5	3.53	3.55	PK	(0.0370)
Mauritania		Marginal													
Mozambique													3.20		
Niger															

Country	Fragile (FY06)	Fragile (FY07)	Fragile (FY08)	Fragile (FY09)	FY10	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY18 Peacekeeping (PK)/Peacebuilding & Political Mission (P)	TREND
Rwanda															
Sao Tome and Principe	Marginal	Marginal	Core	Core	3.14	3.15									
Senegal															
Sierra Leone	Marginal	Marginal	Marginal	Marginal	3.22	3.33	3.31	3.33	3.3	3.4	3.3	3.29	3.28	P	0.0028
Somalia	Severe	Severe	Core	Core				1.13	1.2	1.1	1.1	1.11	1.47	P	0.0409
South Sudan									2.2	2.2	2.1	1.92	1.72	PK	(0.1240)
Sudan	Core	Core	Core	Core	2.6	2.51	2.53	2.48	2.5	2.5	2.5	2.49	2.51	PK	(0.0079)
Tanzania															
Togo	Core	Severe	Core	Core	2.800	2.91	2.97	2.94	3.1		3.1	3.10	3.11		0.0361
Uganda															
Zambia															
Asia and Pacific															
Afghanistan	Severe	Severe	Core	Core	2.59	2.76	2.73	2.74	2.9	2.7	2.7	2.75	2.75	P	0.0084
Bangladesh															
Bhutan															
Cambodia	Core	Marginal	Marginal	Marginal											
Kiribati			Marginal	Marginal	2.85	2.950	2.88	2.86	2.9	2.9	3.0	3.00	2.95		0.014
Lao PDR	Core	Core	Marginal	Marginal											
Myanmar	Severe	Severe	Core	Core						3.0	3.1	3.10	3.19		0.057
Nepal					3.54	3.66	3.65	3.69	3.7						0.0351
Solomon Islands	Core	Core	Core	Core	2.91	2.97	3.02	3.11	3.2	3.1	3.1	3.10	3.10		0.0217
Timor Leste	Core	Core	Core	Core	2.77	2.93	2.96	3.16	3.2	3.0					0.0614
Tuvalu									2.9	2.9	2.9	2.92	2.94		0.01
Vanuatu	Core	Marginal	Marginal												
Yemen				Marginal	3.19	3.150	3.17	2.98	3.0	3.0	3.0	2.61	2.38		(0.0864)

Country	Fragile (FY06)	Fragile (FY07)	Fragile (FY08)	Fragile (FY09)	FY10	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY18 Peacekeeping (PK)/Peacebuilding & Political Mission (P)	TREND
Latin America and the Caribbean															
Haiti	Core	Core	Core	Core	2.86	2.93	2.93	2.90	2.9	2.8	2.9	2.90	2.88	PK	(0.0023)

Source: [World Bank 2018](#). Note: FY=fiscal year.