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Report No: PAD00100

INTERNATIONAL BANK FOR RECONSTRUCTION AND DEVELOPMENT

PROJECT APPRAISAL DOCUMENT

ON A
PROPOSED GRANT

IN THE AMOUNT OF US\$12 MILLION

TO THE

KINGDOM OF MOROCCO

FOR THE

MOROCCO SUSTAINABLE OASIS ECOSYSTEMS MANAGEMENT PROJECT

MAY 20, 2024

Environment, Natural Resources & the Blue Economy
Middle East And North Africa

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CURRENCY EQUIVALENTS

(Exchange Rate Effective {Apr 30, 2024})

Currency Unit =

10.06 DHS = US\$1

US\$ 1.33 = SDR 1

FISCAL YEAR

January 1 - December 31

Regional Vice President: Ousmane Dione

Regional Director: Meskerem Brhane

Country Director: Jesko S. Hentschel

Practice Manager: Maria Sarraf

Task Team Leader(s): Amos Abu, Kimberly Vilar

ABBREVIATIONS AND ACRONYMS

ABH	<i>Agence de Bassin Hydraulique</i> (Hydraulic Basin Agency)
ABH-GZR	<i>Agence de Bassin Hydraulique-Guir-Ziz-Rheris</i> (Hydraulic Basin Agency-Guir-Ziz-Rheris)
ABH-DON	<i>Agence de Bassin Hydraulique-Draa Oued Noun</i> (Hydraulic Basin Agency-Draa Oued Noun)
ADA	<i>Agence pour le Développement Agricole</i> (Agricultural Development Agency)
AM	Accountability Mechanism
ANDZOA	<i>Agence Nationale pour le Développement des Zones Oasiennes et de l'Arganier</i> (National Agency for the Development of Oasis Zones and the Argan Tree)
ANEF	<i>Agence Nationale des Eaux et Forêts</i> (National Water and Forest Agency)
BETF	Bank Executed Trust Fund
CPP	<i>Comité de Pilotage du Projet</i> (Project Steering Committee)
CPF	Country Partnership Framework
CSO	Civil Society Organization
DDFP	<i>Direction de Développement des Filières de Production</i> (Development of production chains Department)
DF	<i>Direction Financière</i> (Finance Department)
DPA	<i>Direction Provinciale de l'Agriculture</i> (Provincial Department of Agriculture)
DRA	<i>Direction Régionale de l'Agriculture</i> (Regional Department of Agriculture)
DSS	<i>Direction de la Stratégie et des Statistiques</i> (Strategy and Statistics Department)
ENABEL	<i>Agence de Développement du Gouvernement Fédéral Belge</i> (Belgian Federal Government Development Agency)
FM	Financial Management
FMA	Financial Management Assessment
GDP	Gross Domestic Product
GHG	Greenhouse Gas
GRM	Grievance Redress Mechanism
GRS	Grievance Redress Service
IBRD	International Bank for Reconstruction and Development
IDA	International Development Association
IFR	Interim Financial Report
ILDP	Integrated Local Development Plan
IPF	Investment Project Financing
MAPMDREF	<i>Ministère de l'agriculture, de la pêche maritime, du développement rural et des eaux et forêts</i> (Ministry of Agriculture, Maritime Fisheries, Rural Development, and Water and Forests)
MDA	Ministries, Departments and Agencies
Morocco Climate PforR	Morocco Climate Operation/Support to NDC (P178763) Program-for-Results
M&E	Monitoring and Evaluation
NDC	Nationally Determined Contribution
NGO	Non-Governmental Organization
ONCA	<i>Office National du Conseil Agricole</i> (National Agricultural Advisory National Office)
ORMVA	<i>Office Régional de Mise en Valeur Agricole</i> (Regional Office of Agricultural Valorization, National Office)
ORMVAT	<i>Office Régional de Mise en Valeur Agricole-Tafilalet</i> (Regional Office of Agricultural Valorization - Tafilalet)

ONSSA	<i>Office National de Sécurité Sanitaire des produits Alimentaires (Hygiene and Safety of Food Products, National Office)</i>
PDO	Project Development Objective
PFM	Public Financial Management
PforR	Program-for-Results
POM	Project Operational Manual
PIU	Project Implementation Unit
PPSD	Project Procurement Strategy for Development
PROGREEN	Global Partnership for Sustainable and Resilient Landscapes
RVP	Regional Vice President
SDR	Special Drawing Rights
SEP	Stakeholder Engagement Plan
SEA/SH	Sexual Exploitation and Abuse/Sexual Harassment
SG	Sub-Grant
STEP	Systematic Tracking of Exchanges in Procurement
ToR	Terms of Reference



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**DATASHEET****BASIC INFORMATION**

Project Beneficiary(ies)	Operation Name		
Morocco	Morocco Sustainable Oasis Ecosystems Management Project		
Operation ID	Financing Instrument	Environmental and Social Risk Classification	
P500402	Investment Project Financing (IPF)	Substantial	

Financing & Implementation Modalities

<input type="checkbox"/> Multiphase Programmatic Approach (MPA)	<input type="checkbox"/> Contingent Emergency Response Component (CERC)
<input type="checkbox"/> Series of Projects (SOP)	<input type="checkbox"/> Fragile State(s)
<input type="checkbox"/> Performance-Based Conditions (PBCs)	<input type="checkbox"/> Small State(s)
<input type="checkbox"/> Financial Intermediaries (FI)	<input type="checkbox"/> Fragile within a non-fragile Country
<input type="checkbox"/> Project-Based Guarantee	<input type="checkbox"/> Conflict
<input type="checkbox"/> Deferred Drawdown	<input type="checkbox"/> Responding to Natural or Man-made Disaster
<input type="checkbox"/> Alternative Procurement Arrangements (APA)	<input type="checkbox"/> Hands-on Expanded Implementation Support (HEIS)

Expected Approval Date	Expected Closing Date
23-May-2024	31-Dec-2026
Bank/IFC Collaboration	
No	

Proposed Development Objective(s)



The project development objective (PDO) is to strengthen the sustainable oasis ecosystems management for climate resilience in Aoufous and Akka Oasis and develop a national standard for integrated oasis management.

Components

Component Name	Cost (US\$)
Component 1: Institutional Strengthening and Sharing of Innovative Oasis Knowledge	2,600,000.00
Component 2: Restoration of Oasis Ecosystems and Livelihoods	13,000,000.00
Component 3: Project Management	700,000.00

Organizations

Borrower:	Kingdom of Morocco
Implementing Agency:	Agence Nationale pour le Développement des Zones Oasiennes et de l'Arganier (ANDZOA)

PROJECT FINANCING DATA (US\$, Millions)**Maximizing Finance for Development**

Is this an MFD-Enabling Project (MFD-EP)?	No
Is this project Private Capital Enabling (PCE)?	No

SUMMARY

Total Operation Cost	16.30
Total Financing	16.30
Financing Gap	0.00

DETAILS**Non-World Bank Group Financing**

Trust Funds	12.00
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Global P'ship for Sust. and Resilient Landscapes - PROGREEN	12.00
Counterpart Funding	4.30
National Government	4.30

Expected Disbursements (US\$, Millions)

WB Fiscal Year	2024	2025	2026	2027	2028
Annual	2.10	4.00	4.90	1.00	0.00
Cumulative	2.10	6.10	11.00	12.00	12.00

PRACTICE AREA(S)

Practice Area (Lead)

Environment, Natural Resources & the Blue Economy

Contributing Practice Areas

Agriculture and Food; Social Sustainability and Inclusion; Climate Change

SYSTEMATIC OPERATIONS RISK- RATING TOOL (SORT)

Risk Category	Rating
1. Political and Governance	● Moderate
2. Macroeconomic	● Substantial
3. Sector Strategies and Policies	● Moderate
4. Technical Design of Project or Program	● Moderate
5. Institutional Capacity for Implementation and Sustainability	● Substantial
6. Fiduciary	● Substantial
7. Environment and Social	● Substantial
8. Stakeholders	● Moderate



9. Overall

● Substantial**POLICY COMPLIANCE****Policy**

Does the project depart from the CPF in content or in other significant respects?

Yes No

Does the project require any waivers of Bank policies?

Yes No

Have these been approved by Bank management?

Yes No

Is approval for any policy waiver sought from the Board?

Yes No

ENVIRONMENTAL AND SOCIAL**Environmental and Social Standards Relevance Given its Context at the Time of Appraisal**

E & S Standards	Relevance
ESS 1: Assessment and Management of Environmental and Social Risks and Impacts	Relevant
ESS 10: Stakeholder Engagement and Information Disclosure	Relevant
ESS 2: Labor and Working Conditions	Relevant
ESS 3: Resource Efficiency and Pollution Prevention and Management	Relevant
ESS 4: Community Health and Safety	Relevant
ESS 5: Land Acquisition, Restrictions on Land Use and Involuntary Resettlement	Relevant



ESS 6: Biodiversity Conservation and Sustainable Management of Living Natural Resources	Relevant
ESS 7: Indigenous Peoples/Sub-Saharan African Historically Underserved Traditional Local Communities	Not Currently Relevant
ESS 8: Cultural Heritage	Relevant
ESS 9: Financial Intermediaries	Not Currently Relevant

NOTE: For further information regarding the World Bank's due diligence assessment of the Project's potential environmental and social risks and impacts, please refer to the Project's Appraisal Environmental and Social Review Summary (ESRS).

LEGAL

Legal Covenants

Sections and Description

The Recipient, shall no later than ninety (90) days after the Signature Date, establish and thereafter maintain throughout Project implementation a committee, chaired by the Secretary General of the Ministry of agriculture, maritime Fisheries, Rural Development, and Water and Forests or their representative and composed of representatives of the Recipient's entities and institutions participating in the implementation, monitoring and evaluation of the Project.

The Recipient, shall cause ANDZOA to, no later than thirty (30) days after the Signature Date or such later date as agreed by the Bank, establish and thereafter maintain throughout: (i) Project implementation unit within ANDZOA with resources, with competent staff in adequate numbers and with terms of reference, qualifications, and experience satisfactory to the Bank.

The Recipient, shall cause ANDZOA to no later than thirty (30) days after the Signature Date or such later date as agreed by the Bank, establish and thereafter maintain throughout establish two (2) Provincial Technical Committee of the Project (PTCs) supported by two (2) Territorial Departments (TDs) within ANDZOA at the provincial level with resources, with competent staff in adequate numbers and with terms of reference, qualifications, and experience satisfactory to the Bank.

The Recipient, shall cause ANDZOA to prepare, no later than two (2) months after the Signature Date prepare, and thereafter carry out its Respective Parts of the Project in accordance with, the Project Operations Manual ("POM"), in form and with substance acceptable to the Bank, which shall include the arrangements, procedures and guidelines for the carrying out of the Project.

The Recipient, shall not later than one (1) month after the Signature Date, and thereafter by November 30 of each subsequent year during the implementation of the Project. The Recipient shall afford the Bank a reasonable opportunity to exchange views with the Recipient on such proposed AWPB and incorporate the views of the Bank in the final AWPB to be adopted no later than one (1) month after the date referred to above.

The Recipient, shall ensure that each Project interim financial Report is furnished to the Bank not later than forty-five (45) days after the end of each calendar semester, covering the calendar semester.

**Conditions**

Type	Citation	Description	Financing Source

I. STRATEGIC CONTEXT**A. Country Context**

1. **Morocco's development priority is to accelerate inclusive private sector-led growth and job creation.** Economic growth declined from 8 percent in 2021 to 1.3 percent in 2022 due to the collapse of agricultural production, a terms-of-trade shock triggered by the war on Ukraine, and inflation. Even though real gross domestic product (GDP) growth recovered to 2.9 percent year-on-year in the first semester of 2023, sustained by net exports and the improved performance of the agriculture and tourism sectors, domestic demand (private consumption and investment) is contributing negatively to growth, which can be partly attributed to inflationary shock.
2. **The September 2023 earthquake in Al Haouz was devastating for remote mountain communities but is unlikely to have major macroeconomic impacts.** Although close to 3,000 lives were lost, the earthquake's macroeconomic impact is expected to be modest because the affected areas contribute a small share to Morocco's GDP. The government has provided financial assistance to affected households and drafted an ambitious development plan for the High Atlas provinces. This plan could stimulate more inclusive growth in the medium to long term but, depending on how it is financed, could also place additional pressure on public finances. In addition, a national agency has been set up under decree-law no. 2.23.870, to coordinate the reconstruction and modernization efforts in the provinces affected by the aforementioned earthquake.
3. **The Kingdom recognizes that climate change is a major threat to Morocco's development,¹ particularly impacting vulnerable ecosystems such as oases.** Morocco is one of the world's climate hotspots,² with average temperatures increasing by almost 1.36°C between 1970 and 2019. Precipitation become more erratic and declined overall, with more frequent and intense droughts as well as severe rain events. Over the past 60 years, overall water inflows have reduced by about 30 percent, placing Morocco in structural water stress.³ These climatic shocks pose a significant threat to vulnerable ecosystems like Oases by driving soil erosion, land degradation, and the incidence of wildfires.
4. **Lower-income groups such as women and youth are disproportionately vulnerable to climate-related shocks, especially in rural areas where many depend on rain-fed agriculture.** Oasis ecosystems, which already face socioeconomic challenges, are particularly susceptible to climate-induced reductions in water availability and crop yields, which threaten rural livelihoods and could drive agricultural GDP losses of up to 9.3 percent, according to the Morocco Climate Change and Development Report (CCDR). Poverty rates in oases are particularly high, underscoring the urgent need for sustainable jobs and agricultural practices that enhance resilience. Women, who play significant roles in Oasis agriculture, face heightened exposure and vulnerability due to limited resources and decision-making power, highlighting the importance of gender-sensitive adaptation strategies and inclusive development initiatives.

¹ World Bank. 2022. "Morocco Climate and Development Report." Washington, DC: World Bank.

² IPCC. 2022. "Climate Change: Impacts, Adaptation and Vulnerability."

³ With about 620 m³ of available renewable water per person per year, Morocco is considered to be in a situation of structural water stress (below 1,000 m³), fast approaching the absolute water scarcity threshold of 500 m³ per person per year.



B. Sectoral and Institutional Context

5. **Moroccan oases—unique ecosystems with exceptional biological, cultural, and architectural diversity—face a challenging socioeconomic situation.** Oases occur in the south and southwest of Morocco, and cover about 29 percent of the land. Six percent of the population lives in oases. In 2021, the poverty rate of Oasis inhabitants was 16 percent, against a national average of 9 percent.
6. **Two-thirds of Moroccan oases have disappeared over the past century.⁴** The main barriers to sustainable development of oases are: (i) regional imbalances and socioeconomic conditions; (ii) unsustainable land and agriculture management practices, including intensive monoculture; (iii) water scarcity and unregulated water management, including the unregulated digging of artisanal wells and the overexploitation of water tables; (iv) limited institutional capacity to implement nature-based, geo-enabled Oasis management systems and to use participatory methods in planning integrated Oasis management; (v) overexploitation of existing natural resources; (vi) high levels of gender bias, despite advancements in promoting gender equity; and (vii) climate change. Even though most of residents in Oasis and argan zones⁵ have access to water, renewable water resources total only 530 cubic meters (m^3) per inhabitant per year against a national average of 620 m^3 . Climate change is expected to exacerbate the risk of wildfires and disease (including Bayoud disease, which destroyed 10 million palm trees in a century)⁶, reduce agricultural yields, increase poverty, and drive the deterioration of natural resources, prompting urban migration, especially of the youth.
7. **About 1.1 million women live in oases, accounting for 51 percent of the overall Oasis population.** A notable 61 percent of these women live in rural areas, while the remaining 39 percent live in urban settings. Forty-seven percent of Oasis women are illiterate. On a positive note, 89 percent of Oasis girls (aged 7 to 12) have access to primary education. The employment rate of Oasis women is only 14.4 percent, which is more an indication that the household, agricultural and livestock-rearing work they do is undervalued than a reflection of their actual contributions. Of the active population, only 17 percent (96,633 women) are engaged in the workforce. Oasis women face many obstacles to achieving higher social status including the cultural rules of Oasis society, high illiteracy rates, limited access to education, restricted land rights, and limited access to the means of agricultural production, including financial resources. They are also sidelined in decision-making, both in their households and in the public sphere, and are underrepresented in salaried employment.
8. **Residents of Aoufous and Akka face socioeconomic challenges that are typical to Oasis dwellers.** These two oases encompass 24 catchment areas (over 5,127 hectares) and include 37,000 inhabitants.⁷ Both areas have high rates of illiteracy (30 percent for Aoufous, 36 percent for Akka) and unemployment (11 percent for Aoufous, 24 percent for Akka), and rank low on the multidimensional local development index (0.65 for Aoufous, 0.66 for Akka), for an average development deficit of 34 percent. Annex 1 contains maps of the oases' project sites.
9. **Oasis ecosystem preservation ranks high on the Moroccan government's list of priorities. To this end, a dedicated agency was formed in 2010 to address the socioeconomic and environmental issues plaguing these regions.** The National Agency for the Development of Oasis and Argan (*Agence Nationale pour le Développement des Zones*

⁴ANDZOA. 2016. "COP22: Présentation de l'Initiative Oasis Durables par M. le Ministre de l'Agriculture." <http://andzoa.ma/fr/2016/11/15/cop22-presentation-de-linitiative-oasis-durables-par-m-le-ministre-de-lagriculture/>

⁵ The argan vegetation belt occurs in western Morocco and is also managed by ANDZOA.

⁶ Bouhlali EDT, Derouich M, Ben-Amar H, Meziani R, and Essarioui A. 2020. "Exploring the potential of using bioactive plant products in the management of *Fusarium oxysporum* f. sp. albedinis: the causal agent of Bayoud disease on date palm (*Phoenix dactylifera L.*)."*Beni-Suef University Journal of Basic and Applied Sciences*. 9(1): 1–9.

⁷ The Aoufous valley in Errachidia province comprises two rural municipalities: Aoufous and R'teb. It includes 15 oases and 15 *douars* (villages) over 4,000 hectares, and has a population of about 24,000. Akka in the Souss-Massa region, Tata province, incorporate two territorial municipalities (Kasbat Sidi Abdellah Mbarek and Akka) and consists of nine oases and nine *douars* over 1,257 hectares, including about 700 hectares of agricultural land. About 13,000 people live here (per the 2014 census).



Oasiennes et de l'Arganier, ANDZOA) is mandated to coordinate and drive sectoral policies and improve the living conditions of Oasis populations by promoting integrated and sustainable Oasis management, with a focus on water resource management, agriculture, and ecotourism.

10. **A new strategy and action plan for developing Oasis areas and argan trees for the period up to 2030 is being prepared.** ANDZOA is currently developing a new strategy to develop Oasis areas that includes a roadmap, an action plan, an evaluation and monitoring system, and a communication strategy. This new strategy will form part of the Green Generation Strategy, a government program that focuses on human development and the sustainability of agricultural development for the period 2020–2030.
11. **The government and its partners have undertaken important efforts to preserve, restore, and rehabilitate oases in Morocco.** Efforts to restore Oasis territories have doubled since 2008. In 2023, four programs were launched for the date palm, argan, perfume rose, and saffron industries.

C. Relevance to Higher Level Objectives

12. **The project aligns with the third pillar of the World Bank Group's Country Partnership Framework (CPF) 2019–2024 for Morocco and the subsequent Performance and Learning Review (PLR),** with focused on Inclusive and Resilient Territorial Development, including strengthening adaptation to climate change and resilience to natural disasters. It does so by contributing to the implementation of effective, sustainable, and integrated natural resource management to enhance the resilience of beneficiaries. Specifically, it supports Objective 10 (promote a “whole of government” approach to climate change) and Objective 9 (strengthen resilience to climate shocks/change and mitigation) under the CPF’s third pillar. The project also supports the CPF’s cross-cutting gender theme and aligns with the World Bank Group’s Gender Strategy (2024–2030). The project will support the CPF’s objectives of improving transparency and developing more effective citizen-state engagement. This includes providing technical advisory to strengthen participatory approaches, developing gender-responsive and climate-resilient integrated local development plans (ILDPs), and supporting collaboration with non-governmental organizations (NGOs) and civil society during the project’s implementation.
13. **The project supports the country’s 2021 revised Nationally Determined Contribution (NDC), its National Plan Against Climate Change 2030, and its Long-Term Strategy.**⁸ The activities of this project are especially well aligned to foster community resilience and emissions mitigation.
14. **The project aligns with PROGREEN Trust Fund objectives, in that, it supports locally led Oasis landscape protection and restoration, among other activities.** It also aligns with broader World Bank objectives such as climate mitigation and resilience, as set out in the Morocco Country Climate Development Report and the Morocco Climate Operation/Support to the Nationally Determined Contribution Program for Results (Morocco Climate PforR, P178763).
15. **PROGREEN fits into bigger picture of World Bank and other Interventions:** The proposed project supports and complements the World Bank and other efforts in strengthening integrated and sustainable Oasis landscape management in a changing climate (See Box A1).

⁸ In June 2021, Morocco submitted a more ambitious NDC that targets a 45.5 percent reduction of greenhouse gases emissions by 2030, of which 18.3 percent is unconditional. Morocco’s Long-Term Strategy sets the target of carbon neutrality by 2050. Its National Adaptation Plan (NAP) is under development.

**Box A1: How the PROGREEN fits into the Broader Engagement of the World Bank on Oasis**

World Bank's efforts in sustainable Oasis landscape management include: (i) analytical reports: the Climate Change Development Report for Morocco (P177376), The World Bank, October 2022, and regional report "Supporting the Integrated and Sustainable Management of Historical Oasis Landscapes in North Africa"; and (ii) lending program: Morocco Climate PforR (P178763). The proposed project fits into the ongoing programs through the capacity building of several institutions that are involved in the implementation of the Morocco Climate PforR^[1]. It aims to pilot innovative Oasis^[2] landscape protection and restoration activities, and geoinformatics solutions, set-up a national system for Oasis ecosystem management, integrate local planning integrated with citizen engagement and vulnerability considerations (based on gender, disability, age, low income, etc.), develop eco-systems services and locally-led climate action, which all can be scaled up to, and replicated, in other parts of Morocco through the ongoing Morocco Climate PforR, and other operations. Thus, both the Morocco Climate PforR and this proposed project present one integrated package, leveraging various instruments^[3] and sources of financing^[4], including the potential co-financing from the Asian Infrastructure Investment Bank (AIIB) under discussion. Therefore, there will be extensive coordination between the two interconnected operations during their implementation to maximize synergies and cross-fertilization between operations within the Bank's broader engagement on climate change in Morocco.

^[1] Agencies involved in the implementation of the Morocco Climate PforR are: ANDZOA (Agence Nationale pour le Développement des Zones Oasiennes et de l'Arganier), ANEF (Agence Nationale des Eaux et Forêts), ORMVA (Office Régional de Mise en Valeur Agricole), ABHs (Agences de Bassin Hydraulique), ADA (Agence pour le Développement Agricole), DDFP (Direction de Développement des Filières de Production), DSS (Direction de la Stratégie et des Statistiques), DF (Direction Financière), DPA (Direction Provinciale de l'Agriculture), ONCA (Office National du Conseil Agricole)

^[2] In the NDC Morocco commits to planting 3 million date palms to improve Oasis productivity and combat desertification and the rural exodus of young people. This strategic goal will be supported by the Morocco Climate PforR (P178763).

^[3] PforR through the Morocco Climate PforR, and IPF through this proposed project.

^[4] IBRD Morocco Climate PforR, and PROGREEN Trust Fund through this proposed project through this proposed project.

16. **The project also supports the objectives of the Morocco Country Climate and Development Report (2022) and the Morocco Climate PforR (P178763).** This project will finance the piloting of innovative Oasis⁹ landscape protection and restoration activities in the Aoufous and Akka regions. The government and other development partners (such as the Asian Infrastructure Investment Bank, which has expressed an interest in co-financing the project) can then scale these activities across Morocco. This project will build the capacity of institutions that are implementing the PforR. It will also develop the monitoring, evaluation, and reporting systems of Moroccan institutions to enhance alignment with international best practices. Thus, the Moroccan Climate Operation PforR (P178763) and this Investment Project Financing (IPF) (P500402) are presented as one package to the client. PROGREEN-financed activities will be processed as an IPF, as agreed with the counterparts.

II. PROJECT DESCRIPTION**A. Project Development Objective**

⁹ In its NDC, Morocco committed to planting 3 million date palms. This strategic goal will be supported by the Morocco Climate PforR.



PDO Statement

17. The project development objective (PDO) is to strengthen the sustainable oasis ecosystems management for climate resilience¹⁰ in Aoufous and Akka Oasis and develop a national standard for integrated oasis management.
18. **Rationale for selecting the two pilot oases (Aoufous and Akka):** The two historical oases are found in different geographic zones—intermediate and plains zones (Aoufous) and Saharan oases (Akka). Selection criteria include: (i) severity of degradation of the natural capital stock; (ii) contrasting biophysical and ecological settings; (iii) the availability of studies to inform project design and activity selection; (iv) the availability of indigenous species that could be reintroduced; (v) the existence of joint committees between ANDZOA and another ministry, department, or agency (MDA) on the ground; (vi) the presence of strong community leadership and cooperative groups; and (vii) the opportunity to replicate successfully piloted models.

PDO Level Indicators

- Land area under sustainable Oasis landscape management practices¹¹
- National standard for integrated Oasis management is developed and shared with all other regional Oasis.

B. Project Components

Component 1: Institutional Strengthening and Sharing of Innovative Oasis Knowledge (US\$2.6 million)

19. **Subcomponent 1.1: Strengthening the capacity of ANDZOA, ANEF, ORMVA, ABHs, ADA, DDFP, DF, DSS, DPA, and ONCA.** This subcomponent will build institutional and community capacity to promote integrated Oasis landscape management and inclusive livelihoods in a changing climate. It will provide technical assistance to strengthen the capacity of ANDZOA and other relevant MDAs implementing the Morocco Climate PforR, in line with recommendations from the institutional capacity assessment and the strengthening plan for ANDZOA and other stakeholders. Specifically, it will strengthen ANDZOA's capacity to implement inclusive and participatory approaches. The subcomponent will also support: (i) strengthening capacity for locally led climate action, including implementing an institutional assessment tool and preparing action plans to implement the diagnostic's findings; (ii) developing a gender strategy for ANDZOA and strengthening risk management systems; (iii) developing national guidelines for preparing gender and climate sensitive ILDPs; and (iv) developing and disseminating a national framework for integrated Oasis management.
20. **Subcomponent 1.2: Innovative solutions geoinformatics platform, integrated local planning, and promotion of Oasis as part of Morocco's national heritage.** To support Morocco's National Oasis Strategy, the project will design, develop, and maintain a geographic information system (GIS) (a Geo-Enabled Oasis Knowledge platform) using modern digital geospatial technologies and analytics methods. This platform will be backed by cloud analytics, data visualization, dashboards, and other interactive modalities. Training and outreach will be included to socialize this technology with government, researchers, and community organizations, especially those that work with the youth. The knowledge platform will also: (i) foster further research in collaboration with local NGOs and academia, in line with the project's Stakeholder Engagement Plan (SEP); (ii) support awareness to promote oases as part of Morocco's

¹⁰ "Sustainable oasis landscape management" refers to the use of technologies and approaches to improve soil quality and restore degraded oasis lands that connect protected areas, forest lands, rangeland, and agriculture land with a given oasis precinct, so contributing to climate change mitigation and increasing resilience.

¹¹ "Sustainable oasis landscape management" refers to the use of technologies and approaches to improve soil quality and restore degraded oasis lands that connect protected areas, forest lands, rangeland, and agriculture land with a given oasis precinct, so contributing to climate change adaptation and mitigation and increasing the resilience of ecosystems and local populations.



national heritage; and (iii) support municipalities (or *collectivités locales*) in developing local development plans that are gender-responsive, participatory, and climate-resilient.

Component 2: Restoration of Oasis Ecosystems and Livelihoods (US\$13 million [US\$8.7 million, PROGREEN; and US\$4.3 million, Government of Morocco])

21. **This component will use a participatory process to prioritize climate-resilient investments in restoration, job creation, and livelihood restoration in a climate-informed manner.**
22. **Subcomponent 2.1: Restoration of Oasis landscapes and ecosystem services.** This subcomponent will support, among other activities: (i) the piloting of innovative approaches for integrated Oasis management, including the use of nature-based solutions such as climate-smart planting and nurturing of palms and local native species; (ii) the protection of oases against floods, sandstorms and fires; (iii) the restoration of soil fertility, the reduction of soil erosion, and the control of runoff; (iv) the rehabilitation of climate-smart traditional water infrastructure (20 kilometers [km] of *seguias* in Aoufous valley and *khettaras* in Akka's oases) in alignment with OP/BP 7.50;¹² (v) make landscape-level investments into community-led climate actions, as prioritized in the local ILDP (for example, the upgrade of rural roads or managed aquifer recharge); and (vi) make investments for community work in restoration activities through sub-grants (SG), with a focus on encouraging women and youth to participate in restoration action plans including tree planting. The related project operational manual (POM) will include: (i) selection criteria of activities and activity promoters based on specific vulnerabilities, climate resilience, and the demonstrated benefits of proposed activities; (ii) activities to be financed by the project; and (iii) bidding procedures, including technical assistance for the preparation of proposals, submission procedures, and the provision of sub-grants.
23. **Subcomponent 2.2: Community resilience and livelihoods restoration.** This subcomponent will improve and enhance the economic, social, and environmental sustainability of the livelihoods of vulnerable groups, especially rural women and youth, by supporting innovative solutions for new and existing enterprises by, for example, providing Sub-Grants (SGs). These SGs are envisaged as a once-off, non-reimbursable transfer to a project beneficiary. The POM will spell out the activities and groups that will not require matching (in cash or kind), and what percentage certain activities/beneficiaries will be eligible to receive. Women's associations and women-led groups would be eligible for these SGs, with priority given to vulnerable individuals or groups. The subcomponent will also provide setup and post-creation support for cooperatives to enhance competitiveness and productivity. Economic diversification will focus on both farming and non-farming activities, which are less sensitive to climate impacts. This subcomponent will support inclusive, climate-resilient livelihoods, natural capital management, and productive alliances in selected value chains (such as date palm and medicinal and aromatic plants).

Component 3: Project Management (US\$0.7 million)

24. **This component will support project management, communication, monitoring, and implementation at the national and regional levels.** It will finance: (i) general operating costs; (ii) the implementation/operationalization of monitoring systems and dashboards, including the geo-enabled monitoring system developed under Component 1, to track progress and facilitate ongoing learning and scaling; (iii) the improvement of workflow processes to facilitate coordination across agencies at the central and regional levels; and (iv) coordination activities to ensure alignment with fiduciary and environment, social, and risk management requirements.
25. **This component will also support the implementation of a communication strategy and related action plan (developed under Component 1) for targeted oases, as well as knowledge management to improve dialogue and co-learning.** The geo-enabled information system (developed under Component 1) will be used to disseminate

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nature-based solutions for climate-smart Oasis restoration and protection. A communication specialist will be recruited in the project implementation unit (PIU) to execute these tasks.

Table 1: Project cost by component and source of financing (US\$ million)

Project components and subcomponents	PROGREEN financing Years 2024, 2025, and 2026			Total financing PROGREEN	Total financing Government of Morocco	Total project costs
	2024	2025	2026			
1. Institutional strengthening and sharing of innovative Oasis knowledge	0.9	1.0	0.6	2.5	0.0	2.5
1.1 Strengthening the capacity of ANDZOA and partners	0.9	0.6	0.5	2	0.0	2
1.2 Innovative solutions geoinformatics platform and integrated local planning, and promotion of Oasis as part of Morocco's national heritage	0.0	0.4	0.1	0.5	0.0	0.5
2. Restoration of Oasis ecosystems and livelihoods	0.8	4.8	3.1	8.7	4.3	13.0
2.1 Restoration of Oasis landscapes and ecosystem services	0.7	4.2	2.7	7.6	4.3	11.9
2.2. Community resilience and livelihoods restoration	0.1	0.6	0.4	1.1	0.0	1.1
3. Project management	0.4	0.2	0.2	0.8	0.0	0.8
Total	2.1	6	3.9	12.0	4.3	16.3

C. Project Beneficiaries

26. **The project is expected to directly benefit 36,885 inhabitants (13,000 in Akka and 23,885 in Aoufouss) and indirectly benefit about 1.7 million inhabitants living in the vicinity of the targeted oases** by strengthening targeted value chains, enhancing ANDZOA's planning and implementation capacities, and establishing the two pilot sites as territorial planning units. Vulnerable households, civil society, businesses and enterprises, and local and national decision-makers will all benefit from the project.

D. Results Chain

27. **The project's theory of change (Figure 1) rests on its strategy to enhance local capacities and draw on nature-based solutions to address key constraints**, including water scarcity due to climate change, land degradation, insufficient infrastructure, poor access to markets and jobs, and limited institutional capacity.

E. Rationale for Bank Involvement and Role of Partners

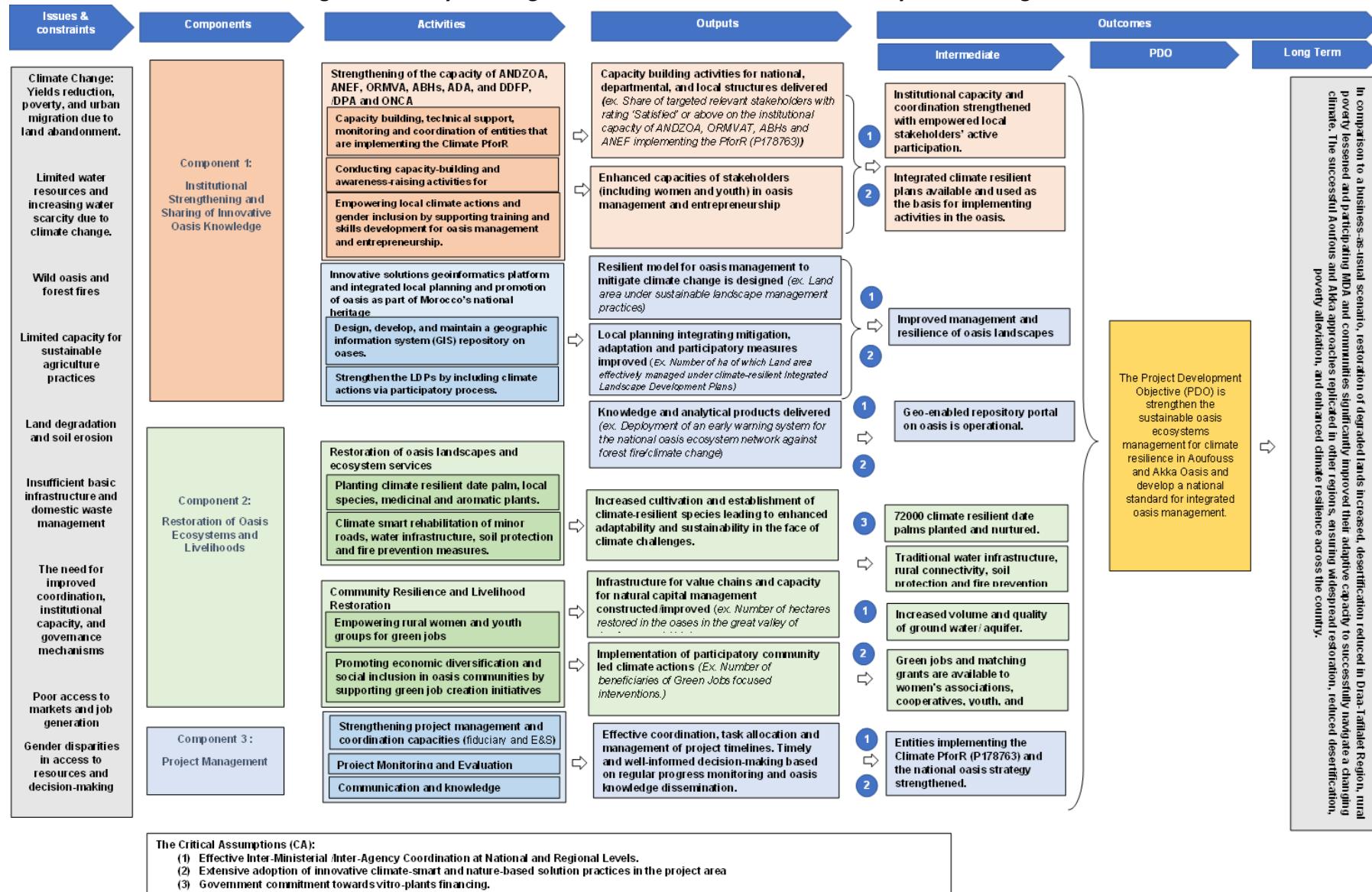
28. **The World Bank contributes technical assistance that is innovative, cross-sectoral, and based on best international practice, especially in the fields of integrated landscape management and nature-based and climate-smart solutions.** This contribution is complemented by substantial investment experience. The result is an operational design rooted in analytical, diagnostic, and policy work (see Section F).
29. **The World Bank possesses unique expertise in Oasis landscape management.** The project's design draws on targeted World Bank Technical Assistance funded by PROGREEN, complemented by a large body of research and experience across the Maghreb, including the Tunisia Sustainable Oasis Landscape Management Project (P169955) and the Tunisia Integrated Landscapes Management in Lagging Regions Project (P151030).
30. **The World Bank is a global leader in the development of innovative spatial technologies**, which will strengthen the project's capacity to develop the envisaged geo-enabled GIS platform.



31. **The project complements existing lending projects**, including the Morocco Climate PforR, by strengthening entities such as ANDZOA and ANEF (see Section F).
32. **The additionality of PROGREEN.** PROGREEN's involvement will enable the project to deploy innovative nature-based solutions and climate-smart techniques and to track progress using PROGREEN indicators on, among other metrics, conservation Oasis landscapes management practices, the reintroduction of local species, and restoration. Lessons learned and knowledge produced under the Bank Executed PROGREEN TF (BETF) highlighted the sense of urgency and the green jobs potentials of Oasis landscapes, which informed the design of this operation.
33. **The World Bank's convening power and partnerships will play a crucial role in the operation's success.** The first International Congress of Oasis (CIO) was hosted in Ouarzazate, Morocco, in May 2023, bringing together key players and development partners. The World Bank team will continue coordinating with key donors to ensure the program's success by strengthening synergies and contributing expertise and resources.



Figure 1: Theory of change for Morocco's sustainable Oasis ecosystems management





F. Lessons Learned and Reflected in the Project Design

34. **The project design was informed by lessons learned from similar projects in the region**, including Morocco's Rainfed Agriculture Development Project (P069124), the National Initiative for Human Development Project for Morocco (P116201), the Tunisia Oases Ecosystems and Livelihood Project (P132157), and the Tunisia Integrated Landscapes Management in Lagging Regions Project (P151030).
35. **Based on these lessons, this operation has been designed to, among other measures:** (i) take an integrated approach that prioritizes adaptation, because natural and socioeconomic systems are inextricably linked; (ii) promote active stakeholder participation and ownership; (iii) provide beneficiaries with the resources and capacities needed to support a participatory, “bottom-up” approach to decision-making; (iv) decentralize implementation structures to support projects in remote locations, with strong coordination to avoid conflicts; (v) ensure appropriate funding mechanisms for demand-driven, community-based approaches; and (vi) avoid complex institutional structures and prohibitive administrative processes. Establishing a single, multi-ministry, fit-for-purpose PIU that is supported by technical assistance, skilled expertise, and a clear roadmap will be key. A functioning Grievance Redress Mechanism (GRM) with capacity to address complaints, including sexual exploitation and abuse/sexual harassment (SEA/SH) cases, in a confidential and survivor-centric manner should be in place from the start of the project.

III. IMPLEMENTATION ARRANGEMENTS

A. Institutional and Implementation Arrangements

36. **The implementation arrangement consists of a small but fit-for-purpose structure.** The project steering committee, or *Comité de Pilotage du Projet* (CPP)—chaired by the Secretary-General of the Ministry of Agriculture, Maritime Fisheries, Rural Development, and Water and Forests (MAPMDREF) with the Director-General of ANDZOA as the alternate—is the highest decision-making entity of this project. The CPP comprises key stakeholder representatives working on natural management, social inclusion, and climate change. Its role will include approving the annual work plan, budget progress reports, and supervision of ANDZOA. The CPP will ensure that the project adheres to national strategies and policies and the requirements for government programs. ANDZOA will be responsible for implementing the project and, with support from a consultancy firm embedded in the PIU, will coordinate and supervise the work of regional offices and implementing entities. Provincial technical committees will be set up to strengthen implementation capacity and facilitate institutional coordination on the ground. The PIU and the provincial technical committees will provide support to ANDZOA on: (i) strengthening consultations with all stakeholders; (ii) validating eligible activities; (iii) technical evaluation of bids; (iv) monitoring activity implementation; and (v) implementing project activities in the field. The PIU and the core committees will be supported by technical partners including DR-Environment, ABH-GZR, ABH-DON, DR-ANEF, DR-ONCA, DR-ONSSA, DR-TA, DRA/DPA, Regional Agricultural Development Office of Tafilalet (*Office Régional de Mise en Valeur Agricole du Tafilalet*, ORMVAT), and NGO representatives. The institutional arrangement therefore includes the project's owners and beneficiaries: civil society members, community organizations, women's groups, professional associations, civil society, cooperative groups, farmers, households, and people with disabilities. These participants will be appointed on a biennial, rotational basis in response to calls for expressions of interest and will inform project activities, especially priority climate change actions, livelihood restoration, green jobs, preparation, and implementation of ILDP. See Annex 1 for details on the implementation arrangement.
37. **Project operational manual (POM).** An advanced draft POM is available and will be adopted no later than two (2) months after the Signature Date and in accordance with terms of reference acceptable to the World Bank. The POM will include implementation and monitoring and evaluation (M&E) arrangements, financial management (FM) and



procurement procedures, environmental and social instruments and tools, and terms of reference (ToRs) for experts.

B. Results Monitoring and Evaluation Arrangements

38. **ANDZOA will monitor project implementation and progress towards targets (per the results framework) and biannually report its findings to the World Bank.** The project will report on PROGREEN results indicators as discussed in “Section VII. Results Framework and Monitoring”. The results will be logged onto an open-access, web-enabled information management system. A dedicated M&E specialist within the PIU will ensure frequent updates and quality data and help CSOs develop Oasis ILDPs. Progress will be monitored monthly and reported to the PIU, with quarterly reports shared with the World Bank. Environmental and social monitoring will focus on compliance with Morocco’s environmental regulations, the Environmental and Social Commitment Plan, environmental and social standards, and environmental and social assessment provisions. Financial progress will be tracked via quarterly Interim Financial Reports (IFRs).

C. Sustainability

39. **Several factors support the sustainability of this project.** First is the Government of Morocco’s commitment to developing lagging areas, particularly the Aoufous and Akka oases. The government has demonstrated ownership of the project—a subset of its own program to restore Morocco’s oases—by contributing at the level of US\$4.3 million. Second, the project will build ANDZOA’s institutional strength for Oasis interventions and for programs linked to the Morocco Climate PforR and other development initiatives. Finally, the project will use best global practices to build scalable models of participatory approaches by using measurable sustainability indexes.

IV. PROJECT APPRAISAL SUMMARY

A. Technical, Economic and Financial Analysis (if applicable)

Technical analysis

40. **ANDZOA is experienced in Oasis restoration, protection, and development; the Office Régional de Mise en Valeur Agricole du Tafilalet (ORMVATF, Regional Agricultural Development Office of Tafilalet) has experience in constructing/rehabilitating rural infrastructure and in rural development; and the Agence de Bassin Hydraulique (ABHs) of Draa Oued Noun and Guir Ziz-Rhreris have the capacities to address water-related issues.** New project activities, such as defining the national heritage Oasis sites, will be supported through BETF Technical Assistance. The project will build on the lessons learned from previous projects pertaining to Oasis landscape management, especially those supported by the FAO (Revitalization Of Oasis Agroecosystems Through An Integrated Approach Sustainable And Landscaped In The Draa-Tafilalet Region [OASIL] project (that demonstrated the importance of the use of local species and involvement of many stakeholders to deliver sustainable results), Adaptation Fund [Climate Change Adaptation Project in Oasis areas (PACC-ZO)] project (which showed the economic and ecological benefits of the use of climate resilient infrastructure), and Enabel (*Agence de Développement du Gouvernement Fédéral Belge*, the Belgian development agency; Support For Economic Interest Groups For The Development Of The Palm Trees Sector In Moroccan Oases Project [PAGIE] (which depicted the additionality that could result from the valorization of Oasis products and value chains).

41. **The project is aligned with the mitigation and adaptation goals of the Paris Agreement:** (i) **Adaptation Risks:** Oasis landscapes and associated livelihoods are highly reliant on agriculture and tourism, both of which are highly vulnerable to extreme climatic events and long-term climate changes. The project interventions are also moderately exposed to climate hazards—particularly drought, desertification, and forest fires—which could affect the project



outcomes. These identified risks will be mitigated with the adoption of nature-based solutions. Contour ridges/terracing will be utilized in agricultural landscape to reduce soil erosion and flooding. Micro-basins will be deployed in project area to retain water for the palm dates and other trees and foster aquifer recharge to improve water availability and mitigate the impact of drought and erratic rainfall. Other NBS that will be implemented include reforestation/replanting of date palms and selection and reintroduction of indigenous medicinal and aromatic plant species targeting oasis landscapes impacted by climate change and forest fires. The rehabilitation of traditional water infrastructure will reduce water losses and will be powered by gravity and renewable energy sources such as solar panels to eliminate emission from fossil fuel-based equipment. The provision of fire equipment and community based early warning and response system will prevent and contain climate induced oasis forest fire outbreak. In addition, the implementation of the E & S actions set forth in the ESCP including ESS3, will ensure efficiency in the use of resources such as water and energy. Furthermore, the CERC component and the associated activities with potential adaptation and mitigation risks have been removed from the project. Accordingly, the residual risk from adaptation is assessed to be low. **(ii) Mitigation Risks:** The Project activities are assessed to be universally aligned: Component 1 is on capacity building and knowledge sharing and is accordingly considered universally aligned as per the [SPJ Sector Note](#). Furthermore, activities under Component 2, such as planting of palms and medicinal and aromatic plants will foster biodiversity conservation and carbon sequestration and carbon sinks. The proposed upgrading of rural roads is considered universally aligned as there will be no risk of deforestation that is likely to significantly reduce carbon stocks (Cf. Table 1 in [TRA Sector Toolkit](#)); conservation of natural habitats and ecosystems and any small scale/low impact infrastructure such as culverts associated with it, can be considered universally aligned (Cf. [ENB Sector Toolkit](#)). Rehabilitated or constructed buildings will meet criteria laid out in the [URL Sector Note](#). Given its scope, activities related to soil health improvement under this project, can also be considered universally aligned as they will not expand into high carbon stocks or biodiverse areas. Water supply infrastructure such as rehabilitation of traditional water infrastructure are considered to be universally aligned as it will not use on-site fossil fuels as its main energy source nor involve desalination systems, and/or are not expected to expand into high carbon stocks or biodiverse areas (Cf. Annex 1 in [AGF Sector Toolkit](#)). Component 3 is on project management and it is considered to be universally aligned. Therefore, the residual risk resulting from mitigation is assessed to be low. **(iii) Conclusion:** In sum, this Project will finance innovative nature based-solutions and climate smart activities that will strengthen community resilience to climate change and reduce emissions. Therefore, the adaptation and mitigation risks of this project are assessed to be low.

42. **Gender.** The project presents an opportunity to economically empower women in oases and places a strong emphasis on gender integration. There are two main lines of support for women in oases: first, the project will provide high-level support to ensure that gender considerations are systematically integrated at the level of ANDZOA through the preparation of a gender strategy and action plan with supporting policies. Second, the project will directly support women by enhancing their entrepreneurial activities. The results framework includes a gender indicator for women's economic empowerment, and other indicators will disaggregate results by gender. The project will take measures to support women's participation such as ensuring access to childcare during training.
43. **Global environmental benefits.** Project results are expected to extend beyond Morocco's borders by supporting local Oasis communities, empowering young graduates, and women, and promoting inclusive and sustainable economic growth. This could encourage people to remain in or return to Oasis areas. Fire prevention and management (under Component 2) could avoid the emission of particulate matter, which can cause widespread health problems. Finally, the Geo-Enabled Oasis Knowledge Hub could share knowledge via the North Africa Oasis Knowledge Platform, supporting the evidence base for landscape management in the region.
44. **Citizen engagement.** Through Component 1, the project will: (i) provide institutional capacity building on inclusive stakeholder engagement for ANDZOA, regional implementing agencies, and selected municipalities; (ii) provide support for the Geo-Enabled Oasis Knowledge Hub and use this platform to build the capacity of, and foster



collaboration with, a wider group of stakeholders including local NGOs and academia; (iii) build on municipalities' participatory processes, integrating a participatory climate risk assessment to develop climate-informed ILDPs; and (iv) strengthen consultation processes in terms of both quantity and quality, and explore more collaborative approaches such as social accountability committees, public hearings, and community surveys. Through Component 2, the project will invite inputs from community representatives, civil society, and the private sector in preparing an analysis of climate-resilient economic opportunities and challenges. Its support for livelihood generation and restoration activities will target disadvantaged groups. Institutional arrangements for project implementation and monitoring will ensure representation by local communities and civil society, including on the steering committee.

45. **Stakeholders.** The program's design focuses on enhancing participatory and communication efforts within the program area. This includes: (i) implementing methods to identify and address barriers to inclusion; (ii) formulating a gender strategy; and (iii) establishing a robust communication and knowledge management system to foster dialogue and shared learning among stakeholders. The program will further promote local planning that is gender-sensitive and climate-adaptive, ensuring the involvement of all parties. The SEP, which includes the efforts above, will lay the groundwork for a positive relationship between ANDZOA, institutional partners, and stakeholders. This includes project-affected people and other interested parties such as regulatory authorities, local authorities and communities that stand to gain from project-related work and improved social facilities; and CSOs advocating for environmental, socioeconomic, and community rights. Special attention is given to vulnerable groups. The SEP acknowledges the complex realities of intersecting vulnerabilities among these groups and aligns with World Bank standards for stakeholder engagement and information disclosure. It encapsulates the engagement conducted during project preparation and outlines ongoing measures for implementation, which includes a project-level GRM. Engagement tools will include community assemblies, focus groups, individual interviews, local committees, and various communication channels such as brochures, emails, and social media.

Economic and financial analysis

46. **The project is expected to produce both tangible and intangible benefits.** An *ex-ante* economic analysis was carried out to estimate the benefits of investments in improving traditional Oasis systems. Although the project is expected to produce both tangible and intangible benefits (for example, in policy and institutional strengthening), the economic analysis only considered tangible local and global benefits of selected investments under Component 2. Local benefits associated with Component 2 investments include: (i) improved date production; (ii) reduced land erosion and siltation; (iii) improved water retention and moisture-holding capacity; and (iv) improved products and services (the increase in ancillary products from restored Oasis systems are valued in the economic analysis). Global benefits include climate change mitigation (see next paragraph). The base case scenario of local and global benefits with 6 percent social discount rate has a positive net present value of US\$15.8 million, a robust internal rate of return of 12 percent, and positive present value benefit-cost of 1.4. The sensitivity analysis considered ± 2 percent discount rate, ± 10 percent cost increase, and ± 10 percent benefits, representing the pessimistic scenario (a 10 percent increase in costs and a 10 percent decrease in benefits over the base case and an 8 percent discount rate) and an optimistic scenario (a 10 increase in benefits and a 10 percent decrease in costs over the base case and a 4 percent discount rate). The project offers local and global benefits and is viable under all three scenarios—base case, pessimistic, and optimistic. The project is more sensitive to a decrease in benefits than to an increase in costs, reflecting the potential for increasing project benefits with improved project performance.
47. **Greenhouse gas (GHG) accounting.** The FAO Ex-Ante Carbon Balance Tool (EX-ACT, version 9.2) was used to assess the net GHG balance of improved Oasis production system (Project Scenario) versus the "without project" scenario (Baseline Scenario) over a 20-year period, which was also the period adopted for financial and economic analysis. The Baseline Scenario assumed a degraded or abandoned traditional Oasis, while the Project Scenario assumed the replanting and restoration of traditional Oasis and implementation of improved production practices. For Oasis restoration, above- and below-ground biomass data was parametrized using the EXACT model to reflect



improvements in biomass density under improved Oasis production systems. The total GHG emission reductions under the Project Scenario over 20 years is projected to be 297,944 tCO_{2e} at an average annual net GHG emissions reduction of 14,897 tCO_{2e}.

48. **Rationale for public sector financing.** Climate change disproportionately impacts oases. Without public investment, Oasis ecosystems and economies may suffer long-term irreversible impacts, including desertification and the exodus of Oasis populations to cities. Ecosystem services provide the basis of most formal and informal employment in Oasis areas, particularly in the agriculture and tourism sectors. The project has strong potential to secure those livelihoods while reducing poverty and inequality, addressing existing market failures, and creating job opportunities, especially for women.

B. Fiduciary

(i) Financial Management

49. **The financial management assessment (FMA) for this operation covered ANDZOA, which was also assessed for the Morocco Climate PforR.** ANDZOA will execute and coordinate all project activities, including the implementation of Financial Management (FM) arrangements which, according to the FMA, satisfy the World Bank's minimum requirements under World Bank Policy and Directive for IPF (March 13, 2023). The arrangement is assessed as being adequate to provide, with reasonable assurance, accurate and timely FM information on the status of the project, as required by the World Bank. The FMA covered the PIU in ANDZOA. The ANDZOA will implement planned activities with the technical support of the provincial technical committee and other regional entities such as the ABHs, DRA, DPA and ORMVAT. These entities were not assessed because they will not be involved in the financial flow of project funds.
50. **The FMA concluded that ANDZOA has acceptable FM systems (governance bodies, internal audit unit, external auditing, and so on); effective FM tools (such as accounting software); and adequate staffing arrangements to manage the project funds in an economic, efficient, and transparent way.** The FM mechanisms for the PROGREEN project will be based on those established under the Morocco Climate PforR. These mechanisms rely on the country's public financial management (PFM), which is deemed acceptable to the World Bank and is currently used in all World Bank-funded operations in Morocco. The use of the country PFM in World Bank-financed operations requires that all financial transactions, including commitments and payments, made by PROGREEN implementing entities be subject to review and approval by the *Contrôleur d'Etat* (financial controller) and the *Trésorier Payeur* (treasurer) assigned to each entity.
51. **The substantial fiduciary risk in the Morocco Climate PforR indicated that ANDZOA is unfamiliar with World Bank finance instruments and would need fiduciary capacity strengthening.** Additional risks involve delayed budget execution for activities coordinated with other regional entities.
52. **Existing arrangements in the Morocco Climate PforR will be supplemented with systems and capacity-strengthening/mitigation measures to address the above risks.** These measures could include: (i) assigning or recruiting, under ToR accepted by the World Bank, an FM officer who is familiar with World Bank FM procedures to ANDZOA's PIU, together with capacity-strengthening activities by the World Bank FM team; and (ii) using a web tool to be installed at ANDZOA to monitor the project's operational and FM activities. The web tool could support preparation of the project's unaudited IFRs and annual financial statements via dashboards and summary reports.
53. **ANDZOA's PIU will be the World Bank FM focal point, with the fiduciary responsibility of financial reporting and external audit.** The project will prepare and submit a consolidated annual work plan and budget by November 30 of the year preceding implementation. An unaudited interim financial report must be submitted to the World Bank 45 days after the end of each semester. Further, the *Inspection Générale des Finances* will prepare an audit report



- of the project's annual financial statements, which ANDZOA will submit to the World Bank within nine months after each calendar year to align with the Morocco Climate PforR audit timeline.
54. **Should the advance disbursement method be used, disbursements would be based on the IFRs and would likely involve opening a segregated designated account with the General Treasury of the Kingdom (*Trésorerie Générale du Royaume*) into which the International Bank for Reconstruction and Development (IBRD) would deposit funds.** The designated account's ceiling could be stated in the disbursement and financial information letter, and replenishment could be based on the IFRs.
- (ii) **Procurement**
55. **Procurement procedures.** Project procurement will be in line with: the World Bank Procurement Regulations for IPF Borrowers (September 2023); "Guidelines on Preventing and Combating Fraud and Corruption in Projects Financed by IBRD Loans and IDA Credits and Grants" (October 15, 2006, revised in January 2011, and as of July 1, 2016); and the provisions stipulated in the financial agreement. The project will use systematic tracking of exchanges in procurement (STEP) to plan, record, and track procurement transactions. National open competitive procurement arrangements shall be subject to Paragraph 5.4 of the Procurement Regulations. Other national procurement arrangements (other than national open competitive procurement arrangements) shall be subject to Paragraph 5.5 of the Procurement Regulations.
56. **Project procurement strategy for development (PPSD).** The Government of Morocco has prepared a simplified PSD and a procurement plan for the project. The procurement plan can be updated at least every 12 months, or as required, to reflect the project's implementation needs, with each update requiring the World Bank's approval. All updated procurement plans will be publicly disclosed in accordance with the World Bank's disclosure policy. The contracts to be launched in the first 12 months amount to about US\$7.4 million (61 percent of the project) and consist mainly of works contracts (US\$4.6 million, or 63 percent of the first 12 months' contracts) and consultant services (US\$2.1 million, 29 percent), with some goods contracts. Works contracts include climate-smart hydraulic works, roadworks, water-point creation, site restoration, and rehabilitation of traditional water infrastructure—none of which present a major risk to the procurement process. These contracts will mainly be processed through requests for quotations and requests for bids for activities of about US\$500,000 and can be met by local and national companies given their non-complex and low-value nature. Consultant services comprise feasibility studies, training, policy development, and strategic studies, and will be contracted mainly through the consultant qualification selection method. Overall, no high-value or risky contracts are expected, other than the technical assistance contract (about US\$1 million), which will be launched using the quality and cost-based selection method.
57. **Bidding procurement documents.** The beneficiary will use the standard procurement documents developed by the World Bank for recipients, including all contracts subject to international competitive procurement and those specified in the STEP. For bidding processes in the national market, requests for quotations and bidding documents will be agreed with the World Bank.
58. **The procurement risk is rated substantial.** A procurement capacity and risk assessment for the implementing agency, ANDZOA, was conducted. The assessment considered the entire procurement process (planning, preparing ToRs and bidding documents, receipt and evaluation of bids or proposals, finalization and signing of the contract or agreement, monitoring execution, and filing and archiving of documents for audit and post review). The aim was to determine whether ANDZOA could adequately execute the project's procurement activities. The assessment was based on ANDZOA's knowledge and procurement experience in implementing World Bank and non-World Bank projects, considering the nature of the expenditures and the likely size of the contracts to be procured. This assessment also considered the performance of the Morocco public procurement system and the overall implementation rate of the World Bank's portfolio in Morocco. Potential procurement risks identified during the assessment were analyzed to recommend adequate mitigation measures.



59. **Frequency of procurement supervision.** The World Bank will perform annual procurement post-review missions, with a minimum sample of 20 percent of all post-review contracts. Procurement will be part of regular World Bank supervision missions.

C. Legal Operational Policies

Legal Operational Policies	Triggered?
Projects on International Waterways OP 7.50	Yes
Projects in Disputed Area OP 7.60	No

Projects on International Waterways OP 7.50 is triggered given that works are limited to rehabilitation and do not cause appreciable harm, and therefore the exception to the notification requirement under paragraph 7 (a) applies. An RVP exception memo has been prepared in collaboration with LEGEN and has been approved on March 27, 2024 prior to Negotiations as required.

D. Environmental and Social

60. **The overall rating of environmental risk is substantial.** Given the nature of the activities and ecosystems involved in the project, which are not overly complex, the environmental and social impacts are deemed substantial. The effects of the project on areas of high biodiversity value or sensitivity, such as traditional oases, are expected to be lower than high-risk projects. There is a potential for indirect and cumulative impacts, but these are likely to be less severe (specifically on water resources) and can be avoided or mitigated. Component 2 is expected to have limited adverse impacts during the construction of small hydraulic and/or access infrastructure, which may present risks or impacts linked to the generation of waste (including hazardous waste, air emissions, and noise).
61. **Environmental risks are expected to be site-specific, temporary, and readily addressed through standard mitigation measures and compliance with national laws.** The project's environmental and mitigation measures will be tailored to address the sensitivity of this area and ensure the conservation of species and their habitats.
62. **The project's social risk rating is moderate, with most risks emanating from the second component focused on the revitalization of Oasis ecosystems and the enhancement of local livelihoods.** Specifically, the rehabilitation of climate-resilient traditional water infrastructure and the improvement of rural roads have the potential to spark social tensions due to issues like temporary limitations on land and water access and usage, occupational health and safety concerns, and minor land acquisition. Nevertheless, these risks are regarded as manageable in light of the comprehensive stakeholder consultations that have been conducted. Ongoing meaningful consultations and a well-established GRM will further mitigate these concerns. In addition, careful attention is being paid to the eligibility and selection criteria for bidding processes and activities to (i) prevent the exclusion of groups with higher vulnerabilities and lower incomes; and (ii) avoid elite capture (a risk identified during field visits) to ensure the fair distribution of project benefits and to promote inclusivity, with a focus on enhancing women's roles. Institutional capacity building (Component 1) will equip responsible authorities with the training and tools needed to make informed decisions regarding the selection of activities. Effective communication of project activities and plans to affect stakeholders is crucial, as is the creation of a robust feedback mechanism to ensure prompt access to resources and services. Lastly, ANDZOA's plan to augment its workforce by recruiting civil servants, consultants,



contracted personnel, and potentially community and primary supply workers brings potential labor-related risks. However, these are expected to be minimal across Components 1 to 3.

63. **ANDZOA has prepared the following key environmental and social framework instruments:** an Environmental and Social Management Framework; Labor Management Procedures; a Resettlement Framework; an SEA/SH plan; and the SEP. These have been reviewed by the World Bank and publicly disclosed on ANDZOA's and the World Bank's websites on April 4, 2024. ANDZOA will make sure to be compliant with the requirements of the Environmental and Social Commitment Plan as well as the findings and actions of the environmental and social framework instruments.

V. GRIEVANCE REDRESS SERVICES

64. **The project will establish a project specific GRM accessible to beneficiaries and stakeholders in all targeted oases to collect, review, and address stakeholders' complaints and grievances within a specific timeframe.** Local level grievance redress committees will include both female and male participants. The GRM will have multiple uptake locations and methods (verbally through an intermediary, in writing, and by telephone) to ensure accessibility for all stakeholders to report concerns or complaints if they feel affected by any of the activities' interventions. The GRM will include specific procedures to address SEA/SH-related complaints, with multiple accessible entry points; referral to gender-based-violence service providers; and confidential, survivor-centered complaint management protocols. A detailed description of the GRM and its procedures will be included in the POM.
65. **Communities and individuals who believe they are adversely affected by a project supported by the World Bank may submit complaints to existing project-level grievance mechanisms or the World Bank's Grievance Redress Service (GRS).** The GRS ensures that complaints received are promptly reviewed and addressed. Project-affected communities and individuals may submit their complaint to the World Bank's independent Accountability Mechanism (AM). The AM includes the Inspection Panel, which determines whether harm occurred or could occur as a result of non-compliance with World Bank policies and procedures. The AM also includes the Dispute Resolution Service, which provides communities and borrowers with the opportunity to resolve disputes. Complaints may be submitted to the AM at any time after concerns have been brought directly to the attention of World Bank management and after management has been given an opportunity to respond. For information on how to submit complaints to the World Bank's GRS, visit <http://www.worldbank.org/GRS>. For information on how to submit complaints to the World Bank's AM, visit <https://accountability.worldbank.org>.

VI. KEY RISKS

66. **Overall, the project risk rating is substantial.** The most relevant risks and their mitigation measures are listed below.
67. **Macroeconomics risk is substantial.** Morocco's perilous macroeconomic outlook could affect the government's ability to provide project funding. However, the New Development Model and the Reform Agenda could attract private investment and mitigate the impact of potential risks. The Morocco Climate PforR would help mitigate both physical and transitional climate change risks. The IMF has recently approved a US\$5 billion precautionary flexible credit line, which will boost Morocco's external buffers and help mitigate residual macroeconomic risks.
68. **Institutional capacity for implementation and sustainability risk is substantial.** Strengthening the resilience of Oasis ecosystems will involve numerous institutions, and coordination across institutions carries risk. Risk mitigation measures include ensuring that: (i) entities are familiar with World Bank programs and capacity-building needs are



met; (ii) ANDZOA can support stakeholder coordination mechanisms; and (iii) regional institutions can work closely together. The operation will use ANDZOA to implement corresponding activities and rely on a continued collaboration with Ministry of Economy and Finance, the Ministry of Agriculture, and regional governance entities.

Fiduciary risk is substantial

69. **Procurement risk is substantial.** According to the PPSD, the main risks relate to: (i) the quantitative and qualitative control of needs; (ii) environmental and social aspects of the planned activities; (iii) price increases for works contracts due to rising raw material prices; and (iv) ANDZOA's limited experience in using the World Bank's procurement procedures and STEP. Risk mitigation measures include: (i) planning and initiating the procurement activities as soon as possible; (ii) ensuring coordination between technical and procurement teams; (iii) undertaking either environmental and social impact studies, developing environmental and social management plans, and/or including environmental and social provisions in the contracts; (iv) incorporating a procurement section in the POM; and (v) hiring a procurement specialist with experience in the World Bank procurement procedures.
70. **Financial management is substantial.** ANDZOA has acceptable fiduciary capacity. The development of a web tool will facilitate financial execution monitoring and reporting, and capacity-building programs will strengthen financial planning and execution. The residual risk is substantial due to limited experience in implementing IPF instruments and coordination difficulties. The FMA includes mitigation measures after which the risk rating will be reassessed.
71. **Environmental and social risks are substantial.** The environmental risks and impacts of the project include generating low to medium noise and dust pollution; removing vegetation and degrading land in the rehabilitation sites; and generating and improperly disposing of general construction waste. The potential social risks/impacts include occupational and community health and safety risks; elite capture and exclusion of vulnerable groups; social tensions linked to temporary water and land restriction, minor land acquisitions, and labor and working conditions; and sexual harassment, exploitation, and abuse. These identified environmental and social risks will be mitigated through the preparation and implementation of site-specific instruments enunciated in the ESCP and in a manner consistent with the ESF.
72. **Other risks are substantial.** Climate-related risks include water scarcity, erratic rainfall, and forest fires. The project is designed to include coping mechanisms, such as nature-based solutions, to reduce damage from climate shocks. As a result, for the Paris Alignment assessment, the residual risks are categorized as moderate, which the project's interventions will reduce to an acceptable level.



VII. RESULTS FRAMEWORK AND MONITORING

PDO Indicators by PDO Outcomes

Baseline	Period 1	Period 2	Period 3	Closing Period
National standard for integrated oasis management is developed and shared with all other oasis regional agencies. (Yes/No)				
Feb/2024	Dec/2026			Dec/2026
0	Yes			Yes
Land area under sustainable Oasis landscape management practices (CRI and PROGREEN Outcome indicator), as a result of the project. (Hectare(Ha))				
Feb/2024	Dec/2024	Dec/2025	Dec/2026	Dec/2026
0	1000	2500	4000	4000
Land area under sustainable Oasis landscape management practices (CRI), as a result of the project.				
National standard for integrated oasis management is developed and shared with all other oasis regional agencies.				

Intermediate Indicators by Components

Baseline	Period 1	Period 2	Period 3	Closing Period
Traditional Water Infrastructure build/rehabilitated (Kilometers)				
Feb/2024	Dec/2024	Dec/2025	Dec/2026	Dec/2026
0	5	15	20	20
Integrated Landscape Development Plans in selected Project area developed and approved), PROGREEN Cross-pillar indicator (Number)				
Feb/2024	Dec/2024	Dec/2025		Dec/2026
0	6	20		24
Number of palm dates planted and nurtured in the targeted Oasis as a result of the project (Number)				
	Dec/2024	Dec/2025	Dec/2026	
	36000	50000	72000	
Participants involved in the ILDP preparation process who expressed satisfaction with the participatory aspects of the ILDP preparation (Percentage)				
Feb/2024	Dec/2024	Dec/2025	Dec/2026	Dec/2026



0	25	50	70	70
GIS-enabled knowledge hub/GIS portal operational for Oases in Morocco (Number)				
Feb/2024	Dec/2024	Dec/2025	Dec/2026	Dec/2026
0	0	0	1	1
Land users adopting sustainable oasis land mgt. practices as a result of the project (Number)				
Feb/2024	Dec/2024	Dec/2025	Dec/2026	Dec/2026
0	500	1500	2000	2000
Participants involved in the ILDP preparation process who expressed satisfaction with the participatory aspects of the ILDP preparation (Percentage)				
Farmers and non-farm producers "adopting" climate resilient technologies and practices (Number)				
				Dec/2026
				2000
Women and youth engaged in new income-earning enterprises as a result of the project (Number)				
Feb/2024				Dec/2026
0				1000
Terrestrial and aquatic areas under enhanced conservation and management (Hectare(Ha))^{CRI}				
Component 1: Institutional Strengthening and Sharing of Innovative Oasis Knowledge				
Component 2: Restoration of Oasis Ecosystems and Livelihoods				
Component 3: Project Management				

**Monitoring & Evaluation Plan: PDO Indicators by PDO Outcomes**

Land area under sustainable Oasis landscape management practices (CRI), as a result of the project	
Land area under sustainable Oasis landscape management practices (CRI and PROGREEN outcome indicator) as a result of the project (ha)	
Description	<p>Sustainable Oasis Landscape Management refers to technologies and approaches to increase land quality and restore degraded oasis lands that connect protected areas, forest land, rangeland, and agriculture land with a given Oasis precinct, which contribute to climate change adaptation and mitigation, increasing resilience of ecosystems and local populations.</p> <p>Integrated Oasis Landscape Management refers to collaboration among different groups of Oasis land managers and stakeholders to benefit from the multiple functions and services provided by oases ecosystems, such as agricultural production; protection of biodiversity; landscape beauty; identity and recreation value; support of communities and local livelihoods, human health and well-being. This will be actualized with the participatory development and implementation of Local Development Plans.</p> <p>Key habitats are clearly defined spaces where the environmental conditions for key organism(s) to survive do exist. Protection covers the means, e.g. legal and management means that effectively ensure these conditions will prevail. This indicator will report on the PROGREEN indicator " Key habitats protected (number)". The indicator will measures the number of key habitats that are protected (two focal Oasis of Aoufous and Akka).</p>
Frequency	Biannual cumulative targets
Data source	Project and activity records, including progress reports
Methodology for data collection	Measurement of area where at least two new practices were introduced as part of the project
Responsibility for data collection	PIU, through the M&E system
Number of local species that have been reintroduced in the selected Oasis landscape area	
Oasis landscape with same or increased vegetation cover and diversified with local species (ha)	
Description	<p>The indicator measures the land area of the Oasis where biodiversity has been enhanced with the introduction of indigenous local species, such as medicinal and/or aromatic plants of at least two drought-resilient palms, aromatic plants, drought-reliant medicinal plants; and early maturing palms within the project area.</p> <p>This will also report on PROGREEN indicator "Area of conservation landscapes under sustainable use (ha)"</p>
Frequency	Annual cumulative targets
Data source	Project and activity records, including progress reports
Methodology for data collection	Measurement of area where at least two new species were introduced as a result of the project
Responsibility for data collection	PIU, through the M&E system
Beneficiaries of Job-focused interventions	
Women and youth engaged new income-earning enterprises as a result of the project (PROGREEN outcome indicator)	
Description	<p>This indicator corresponds with the PROGREEN indicator "People in targeted oases landscapes with increased benefits (number) (disaggregated by sex; age (youth))". This indicator measures the extent to which women and youth (between 18 and 35 years of age) have seen improved livelihood as a result of intervention targeted at value chains. These benefits may cover both monetary income, such as salaries and profit. and non-monetary benefits. Such as improved and easier access to fuel wood, non-timber forest products, and cultural and spiritual services. This indicator includes the total number of women and youth employed in green jobs or environmental and sustainable tasks (such as tree planting, waste management, and processing of date palms products), as well as new income-earning enterprises as a result of the project. The indicator measures the number of people in a targeted area of the landscape, and not the entire population, that have benefitted.</p>
Frequency	Annual surveys
Data source	PIU, through the M&E system
Methodology for data collection	Questionnaires, and project records
Responsibility for data collection	PIU, through the M&E system

**Monitoring & Evaluation Plan: Intermediate Results Indicators by Components**

Component 1: Institutional Strengthening and Sharing of Innovative Oasis Knowledge	
Integrated Landscape Development Plans in selected Project area developed and approved (Number)	
Description	This indicator is related to the number of integrated local development plans that will be developed in a participatory manner and approved by the steering committee. These plans will be climate smart, inclusive, and informed, and will aim for community participation and gender sensitivity. This indicator corresponds with PROGREEN indicator " Policies, plans, and regulations informed (number)". The indicator measures the number of policies, laws, strategies, plans, regulations, and standards for which formulation or implementation was influenced or informed by PROGREEN supported activities. These terms are understood broadly to refer to changes in the institutional frameworks of key institutions and their modus operandi in a country, region or globally. World Bank knowledge products themselves are not to be counted under this indicator.
Frequency	Annual
Data source	PIU, through the M&E system
Methodology for data collection	Project records, and minutes of meeting from the steering committee
Responsibility for data collection	PIU, through the M&E system
National standard for integrated Oasis management is developed and officially shared with all other Oasis regional agencies (Number)	
Description	The national standard/framework will be the gold standard and a powerful new approach to the design, implementation, monitoring, management, and evaluation of development national and subnational programs and in sync with the national strategy on oases. This indicator corresponds with PROGREEN Indicator "Countries with policy and institutional framework improved (number)". The indicator counts the number of countries where the policy and institutional framework for forests and landscapes has been improved due to targeted interventions. The institutional framework covers the system of laws, regulations, procedures, etc. that govern forests and landscapes while the policy framework covers the range of objectives expressed by government that underpin the institutional framework or seeks to change it. Interventions could include – but not limited to interventions that seek to improve the planning framework, do capacity building, revise laws and regulations, influence public expenditures, update policy documents. This is a national-level indicator.
Frequency	Annual
Data source	PIU
Methodology for data collection	Project records, and minutes of meeting from the steering committee
Responsibility for data collection	PIU, through the M&E system
GIS-enabled knowledge hub/GIS portal operational for Oasis in Morocco (Yes/No)	
Description	This indicator will measure the number of tools created with the PROGREEN support. It measures the delivery of resources or instruments designed to perform specific functions or tasks, often with the aim to enhance productivity, efficiency, or effectiveness in a particular context. This corresponds with PROGREEN indicator "Tools developed (number)". Examples include software applications, methodologies, templates, standardized procedures, protocols, and guidelines. Specifically, geo-enabled Oasis knowledge hub is a geographic information system (GIS) on oases in Morocco that will comprise a repository of latest data and knowledge, best governance practices, management approaches, and tools on Oasis landscapes. The platform will include a WebGIS module, which enables uploading and visualizing geographical data related to oases; a decision support system (DSS) that will inform decisions for management and protection; and a general website on oases in Morocco.
Frequency	Annual
Data source	PIU, through the M&E system
Methodology for data collection	A specialized firm that will be hired, and data from open sources including the use of satellite images; earth observatories; topographical maps; reports; and ground truthing
Responsibility for data collection	PIU, through the M&E system
Component 2: Restoration of Oasis Ecosystems and Livelihoods	



Traditional Water Infrastructure built/rehabilitated (Kilometers)	
Description	This indicator is related to the number and length (km) of the traditional water infrastructure (seguias and khattaras) rehabilitated by the project. This indicator will report on the PROGREEN Indicator "Key infrastructure climate-resilient (number)". This indicator counts the number of key infrastructures that are designed and implemented to be resilient to climate change impacts. Specifically a total of 4 Traditional Water Infrastructure (2 in Aoufous and 2 in Akka) will be built/rehabilitated. It assesses the preparedness of critical infrastructure systems, to withstand and recover from climate-related events. It provides insights into the level of adaptation and mitigation measures implemented to ensure the long-term sustainability of key systems.
Frequency	Quarterly
Data source	PIU, through the M&E system
Methodology for data collection	The number of contracts awarded, and progress reports
Responsibility for data collection	PIU, through the M&E system
Number of palm dates planted and nurtured in the targeted Oasis as a result of the project (Number)	
Description	This indicator will report on the number of the palm dates planted and nurtured in the targeted Oasis in a manner that is consistent with land restoration practices. This indicator will report on the PROGREEN indicator "land area under restoration (ha)". Restoration refers to activities that increase the quality of degraded land, i.e. improvement in the capacity of a land area to provide environmental, social and economic services through -amongst other - agronomic, vegetative, and management measures. A target of 3000 hectare land area under restoration (ha)" is expected to be achieved by this project.
Frequency	Quarterly
Data source	Progress Report
Methodology for data collection	Inventory of the number of vitro-plants of palm procured, distributed, planted, and nurtured and the land area covered
Responsibility for data collection	PIU, through the M&E system
Land users adopting sustainable Oasis land management practices as a result of the project (Number / percentage)	
Description	The indicator measures the land-users in a targeted area of the landscape, and not the entire population, and the proportion that uses a new practices as a result of the project. This indicator will report on the PROGREEN indicator "Share of land-users adopting new practices in targeted landscapes (%)" . This indicator measures the percentage of land-users who are using new practices to increase land quality and restore degraded land through for example agronomic, vegetative, and management measures. Land-users are users of the land for economic and cultural activities (e.g., agricultural, residential, industrial, mining, and recreational uses).
Frequency	Annual
Data source	Field survey
Methodology for data collection	Field survey conducted by third party.
Responsibility for data collection	PIU, through the M&E system
Number of local species that have been reintroduced in the selected Oasis landscape area	
Oasis landscape with same or increased vegetation cover and diversified with local species (ha)	
Description	The indicator measures the land area of the Oasis where biodiversity has been enhanced with the introduction of indigenous local species, such as medicinal and/or aromatic plants of at least two drought-resilient palms, aromatic plants, drought-reliant medicinal plants; and early maturing palms within the project area. This will also report on PROGREEN indicator "Area of conservation landscapes under sustainable use (ha)"
Frequency	Annual cumulative targets
Data source	Project and activity records, including progress reports
Methodology for data collection	Measurement of area where at least two new species were introduced as a result of the project
Responsibility for data	PIU, through the M&E system



collection	
Innovative nature-based solutions used in production landscapes (number)	
Description	This is a PROGREEN indicator "Innovative nature-based solutions used in production landscapes (number)". This indicator will measure the number of nature-based solutions (NBS) established and that introduce new methods or approaches in the local context. That these are used in production landscapes indicates the creation of environmental benefits in support of production and beyond. Nature-based solutions are actions to protect, conserve, restore, sustainably use and manage natural or modified ecosystems, which address social, economic and environmental challenges effectively and adaptively, while simultaneously providing human well-being, ecosystem services and resilience and biodiversity benefits.
Frequency	Annual
Data source	Project and activity records, including progress reports
Methodology for data collection	Documentation of female and youth businesses from the project's records
Responsibility for data collection	PIU, through the M&E system
Women/youth-led cooperatives or businesses involved in the generation of products in the palm tree waste value chain in the intervention area (Number)	
Description	The indicator measures women and youth's participation in project-supported activities (sub-projects) to support the palm dates value chain.
Frequency	Annual
Data source	Project and activity records, including progress reports
Methodology for data collection	Documentation of female and youth businesses from the project's records
Responsibility for data collection	PIU, through the M&E system
Farmers and non-farm producers "adopting" climate resilient technologies and practices (Number)	
Description	This indicator measures the number of land-users who are using new practices to increase land quality and restore degraded land through for example agronomic, vegetative, and management measures. Specifically, this indicator will measure the number of project beneficiaries (Farmers and non-farm producers) "adopting" climate resilient technologies and practices, including at least 1 of the following: planting of drought resistant species, zero tillage, adoption of early maturing and or less water dependent plants and use of renewable energy to power farm inputs. Land-users are users of the land for economic and cultural activities (e.g., agricultural, residential, industrial, mining, and recreational uses). This indicator will also report on the PROGREEN indicator "Farmers adopting agroecological agricultural practices (number) (disaggregated by poor)", the land-users in a targeted area of the landscape, and not the entire population, and the proportion that uses a new practice. The indicator measures the number of farmers that adopt one or more practices related to agro-food production. Examples of agroecological practices are agroforestry and organic farming.
Frequency	Annual
Data source	Third party field survey
Methodology for data Collection	Project records, including progress reports
Responsibility for data Collection	PIU, through the M&E system
Participants involved in the ILDP preparation process who expressed satisfaction with the participatory aspects of the ILDP preparation (%)	
Description	This indicator is a good practice to measure the benefits of participatory planning approaches
Frequency	Once after the process is complete.
Data source	Progress Report
Methodology for data collection	Participants feedback survey or equivalent
Responsibility for data collection	PIU
Women/youth-led cooperatives or businesses involved in the generation of products in the priority value chains (Number)	

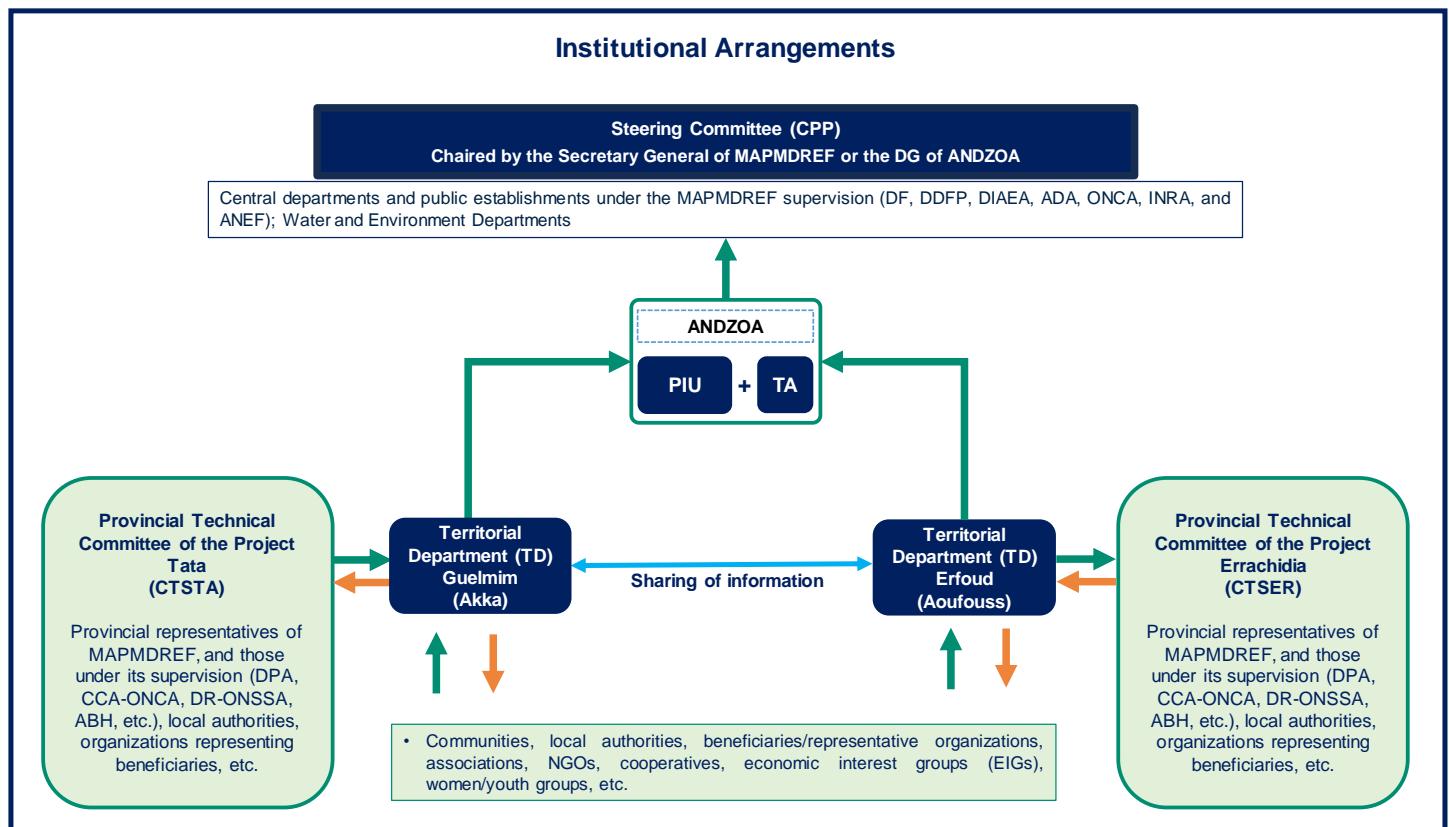


Description	This indicator will measure the extent to which women and youth (range 18 to 35 years of age) have seen improved livelihood as a result of intervention targeted at value chains. This indicator will report on the PROGREEN indicator "Women and youth with increased benefits from landscape-based value chains (number) (disaggregated by poor)". These benefits may cover both monetary income such as salaries and profit and non-monetary benefits such as improved and easier access to fuel wood, non-timber forest products and cultural and spiritual services. The indicator thus, measures women and youth's participation in project-supported activities (sub-projects). A total/target of 500 women and youth's beneficiarie is envisaged. The indicator measures the number of people in a targeted area of the landscape, and not the entire population, that have benefitted.
Frequency	Annual
Data source	Project and activity records, including progress reports
Methodology for data collection	Documentation of female and youth businesses from the project's records
Responsibility for data collection	PIU, through the M&E system
Hectares of terrestrial and aquatic areas under enhanced conservation and management (Ha)	
Description	This is a new WBG Scorecard Indicator. Specifically, for this project this indicator reads "Oasis landscapes under enhanced conservation and management (ha)" with Oasis landscape coming under terrestrial area per this WBG corporate indicator (aquatic areas are not part of this Project). This indicator will report on the PROGREEN indicator "Area of conservation Oasis landscapes under sustainable use (ha)". The indicator measures the area of a conservation landscape brought under sustainable use practices. Sustainable use practices refer to methods and strategies that help maintain the long-term viability and health of natural systems and resources by balancing ecological, economic, and social considerations. This involves implementing environmentally friendly and socially responsible approaches to land management, considering factors such as conservation of biodiversity, soil health, water resources, and the overall ecological balance. Conservation landscapes refer to landscapes predominantly managed for conservation (e.g., protected areas). The indicator measures, in hectares, the land area in which new and/or improved sustainable Oasis landscape management practices have been introduced. Integrated sustainable Oasis landscape management refers to collaboration among different groups of Oasis land managers and stakeholders to benefit from the multiple functions and services provided by oases ecosystems, such as agricultural production, protection of biodiversity, landscape beauty, identity and recreation value, and support for communities and local livelihoods.
Frequency	Bi-Annual cumulative targets
Data source	Project and activity records, including progress reports
Methodology for data collection	Measurement of area where at least two new practices were introduced as part of the project
Responsibility for data collection	PIU, through the M&E system

Component 3: Project Management

**ANNEX 1: Implementation Arrangements and Support Plan****COUNTRY: Kingdom of Morocco**
Morocco Sustainable Oasis Ecosystems Management Project

This annex sets out the project's administration mechanism, including institutional and implementation arrangements and the role of communities. The project will promote long-term climate resilient development and strengthen natural resource management and livelihoods in the targeted Oasis. To do so, the operation will take an integrated Oasis landscape management approach and specifically address the interlinked challenges of ecosystem services, climate change, poverty, gender, institutional capacity, and governance. In general, the national-level project structure will reinforce the regional-and community-level structures.

Figure 1A: Institutional arrangements



The project's steering committee (CPP) will be the highest decision-making organ of this project with the National Project Director as its Secretary. The CPP, chaired by the General Secretary of the MAPMDREF (with DG ANDZOA as the Alternate) will comprise representatives of key stakeholders in natural management, social inclusion (gender, disability, and youth), and climate change, and will be inaugurated by the MAPMDREF three months after the project comes into effect. Civil society members of the CPP will be appointed on a biennial, rotational basis in response to Calls for Expressions of Interest. The CPP will meet biannually (or when necessary) and will (i) supervise and approve Joint Annual Work Program activities, each with identified lead ministries, departments, and agencies (MDAs); (ii) provide guidance to the project implementation unit (PIU); (iii) ensure conformity with national sector and development planning; (iv) harmonize sector, policy, and project; (v) nurture multisector and multiregional dialogue; (vi) decide on recommendations forwarded by the PIU; and (vii) approve updated versions of the PIU.

The PIU, embedded in ANDZOA and headed by the National Project Director, coordinates the project and facilitates delivery of advisory services and supervision of activities carried out. PIU responsibilities and accountabilities include: (i) act as Secretariat to the steering committees; (ii) manage joint annual work program exercises with national MDAs; (iii) handle the procurement of goods, works, and consultancy services and supports the procurement implementation; (iv) support lead national ministries, departments, and agencies (MDAs) on implementing specific tasks; (v) organize multi-regional learning events; (vi) aggregate regions' M&E information and reports to national level; and (vii) oversee project communications and advocacy. The PIU comprises the National Project Director and key technical staff, including specialists from multiple fields. When necessary, the PIU will be supported by a professional consultancy firm with proven competencies in integrated Oasis landscape management, biodiversity, procurement, FM, environment, social, gender, and M&E—specifically to develop the project's M&E system. The firm will ensure high quality ILDPs by working with relevant MDAs, and local and community actors. The PIU may recruit other international or national consultants to strengthen project planning and management. Individual national MDAs can provide technical advice when necessary and will participate in the Joint Annual Work Program process facilitated by the PIU, which could be backed by inter-MDA Memoranda of Understanding if needed, as well as in the bidding processes of the PIU. The responsibilities and accountabilities of each MDA will be detailed in the PIU.

The project Provincial Technical Committee will be chaired by a regional project director as its secretary. The committee will: (i) refine the joint annual work program for regional project activities as identified by communities, groups, and MDAs; (ii) review reporting; (iii) provide guidance to PIU and advise on its decision-making; (iv) assist the PIU in the management of the sub-grants, (v) foster multi-sector dialogue; (v) ensure conformity between national and regional sector and development planning; and (vi) harmonize sector, policy, and projects. The accountabilities of regional and national MDAs on the committee are similar.

NGOs and CSOs will facilitate local community engagement through consultation and collaboration. The NGOs/CSOs will be selected on a competitive basis in each region, and will be responsible for: (i) community sensitization and social mobilization; (ii) helping communities form a representative community association; (iii) guiding communities in the participatory watershed planning process and vegetative land management activities; (iv) guiding communities in livelihood activities; (v) mobilizing cooperative labor for physical works under sub-component 2.1; (vi) developing community-owned processes for conflict management; and (vii) supporting community participatory monitoring.

Both processes—the public investments through Component 2.1, as well as the private support to entrepreneurship through Component 2.2—have been designed to ensure checks of balances amongst local governance actors. Firstly, the municipalities in the target regions already prepare communal action plans with limited citizen participation. The project will support local governments to build upon current practices to fulfill the characteristics of full ILDPs, namely by enhancing participatory processes with climate-resilient and gender-responsive criteria. They will continue to be driven



by the municipalities, though the project will support enhanced participatory budgeting by engaging a civil society committee throughout the selection and implementation stages.

Second, in terms of livelihood sub-grants, the calls for proposals for cooperatives will continue to be managed directly by ANDZOA. However, local municipalities, private sector representatives, and civil society will have a role in setting eligibility criteria, the selection process, and monitoring implementation.

The various players and stakeholders identified are:

- **Project affected parties**, including households directly affected by project activities; Oasis women; populations using the infrastructures that are subject to the project; service providers (for example, subcontractors); Oasis farmers; and individuals and communities within the country who use or have used the cultural heritage within living memory.
- **Other interested parties**, which may include: (i) national or local regulatory authorities (municipalities or “communes”) that are entrusted with natural resource use and environmental protection, community health and safety, human welfare, social protection and employment, and the protection of cultural heritage; (ii) local authorities and riverside communities that may benefit from work, employment, and training opportunities arising from the project and from the improvement of social facilities and infrastructure in the areas served by the project; and (iii) CSOs that pursue environmental, socioeconomic, and community interests and rights.
- **Vulnerable groups** including: (i) people with low levels of education or those who are neither in education, employment, or training; (ii) elderly people with little access to information or little interest; (iii) people with disabilities and special needs, or those suffering from chronic, serious, or incurable illnesses who may not be able to participate in meetings or read written documents; (iv) female-headed households and, more generally, women who are not necessarily involved in information dissemination or decision-making; (v) people living in poverty or on very limited incomes who are unable to attend information and consultation sessions due to lack of means of transport or lack of time; and (vi) widows, children, and orphans.



Map 1: Project sites

