



CLIMATE RESILIENT LANDSCAPE FINANCE

INSTRUMENT ANALYSIS
SEPTEMBER 2023



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LAB INSTRUMENT ANALYSIS

September 2023

DESCRIPTION & GOAL

An innovative and concessional umbrella facility combining microfinance, private debt, and technical assistance to address the underlying challenges to climate-resilient land management in and around African conservation areas.

CRLF will mobilize USD 12 million in concessional and commercial capital to improve and scale conservation efforts to create self-sustaining conservation areas and economies in ecosystems of critical biodiversity importance, leveraging international markets for carbon and biodiversity credits.

SECTOR

Sustainable Agriculture

Other Land Use

Climate Resilience

FINANCE TARGET

Grants: Conservation donors (philanthropies, endowment funds, etc.), development finance institutions

Concessional debt: Climate funds, development finance institutions, philanthropies

Commercial debt: Banks, impact investors, pension funds

GEOGRAPHY

Pilot phase: Kenya, beginning in the Northern Maasai Mara

In the future: Eastern and Southern Africa.

The Lab identifies, develops, and launches sustainable finance instruments that can drive billions to a low-carbon economy. The 2023 Lab cycle targets two thematic areas (gender and adaptation), three geographic regions (Brazil, India, and East & Southern Africa), and one global open slot.

AUTHORS AND ACKNOWLEDGEMENTS

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SUMMARY

Areas of conservation importance are currently under threat from extractive commercial agriculture and urbanization, resulting in loss of biodiversity, fragmentation of land, soil degradation, and often local community livelihoods, as soil productivity reduces. Climate Resilient Landscape Finance (CRLF) is a concessional debt facility that holistically addresses the barriers to expanding sustainable land management in Africa via conservation areas, allowing for the free movement of wildlife, restoration of land and biodiversity, while protecting and strengthening natural carbon sinks and physical climate risk buffers.

CRLF incorporates three synergistic facilities:

- **A microfinance facility** offering innovative lease-backed loans to local landowners, fostering financial inclusion through preferential terms, supplemented by technical assistance to support the development of sustainable livelihoods and micro, small and medium enterprises (MSMEs), reducing dependence on natural resources;
- **A private debt facility** offering growth financing to landscape management companies (conservancies) and sustainable agriculture and forestry operators, enabled by technical assistance to build and implement diversified growth strategies while implementing sustainable practices. This will improve bankability;
- **A technical assistance facility** to support enterprise growth and governance, in part through unlocking access to international carbon and biodiversity markets.

CRLF demonstrably meets the Lab criteria for a compelling climate finance instrument: -

- **Innovative:** Unique in enabling inclusive, robust, equitable, and scalable conservation-centered economies, providing finance to key economic actors through unlocking access to multiple revenue streams and sources of capital.
- **Financially Sustainable:** Leveraging expert fund management capabilities, portfolio diversification strategies, and targeted technical assistance improving return on investment, CRLF will continuously reduce reliance on grant funding, reinvesting all profits.
- **Catalytic:** The pilot will catalyze USD 2.5m domestic private capital for a secured sustainable microfinance portfolio, catalyzing investment towards achieving the 30x30 goal in key conservation regions in Africa, including via innovative structured instruments.
- **Actionable:** Platcorp and proposed strategic partner Conservation International bring a wealth of experience in Kenyan microfinance and conservation finance respectively, whilst Dascot Limited and Conservation Capital bring decades of conservation management and financing experience, investing three years in laying foundations for implementation in Kenyan ecosystems.

Immediate next steps will involve formalization of partnerships, legal and operational structure, fundraising for pilot implementation, and establishment of a special purpose vehicle for the facility.

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CONTEXT

While biodiversity finance flows rose by 2.6% between 2021 and 2022, volume continues to fall far short of the annual need of USD 824 billion

Africa hosts one-third of the planet's biological diversity, with approximately one-quarter of mammalian species and one-fifth of all birds (WWF, 2016). While protected areas (PAs) have historically played a critical role in safeguarding biodiverse ecosystems, important areas for biodiversity conservation beyond and around PAs are under threat from extractive commercial agriculture activities and urban and industrial development, which provide the highest economic return to landowners (Chardonnet, 2019). The resulting loss of biodiversity, natural carbon sinks, and diminishing soil quality result in the destruction of natural capital and reduction in adaptive capacity, increasing the vulnerability of local communities.

To deliver on the 30x30 goal of the Global Biodiversity Framework, an annual amount of USD 20-25 billion is required globally. Currently, less than 20 percent of Africa's land and seas are protected due to insufficient economic incentives, inadequate management capacity, and lack of access to private capital (Lindsey et al., 2020). Traditional revenue streams from governments¹, donor support and tourism – satisfy only 10 to 20 percent of management needs² (IUCN, ESARO, 2020). Thus, it is difficult to imagine how a substantially larger PA network could be financed.

Kenya's Maasai Mara ecosystem embodies many of the current challenges experienced in biodiversity conservation across Africa. The Maasai Mara ecosystem is recognized for having one of the most diverse and dense populations of large mammals in the world but continues to face severe biodiversity loss and land transformation from the sale of private land and agriculture (Tyrell et al., 2020). While conservancies have tried to counter the conversion of private land, current revenue sources are insufficient to manage the land, let alone provide sufficient economic incentives to landowners to meet the opportunity costs of forgoing agricultural or other commercial development.

Climate Resilience Landscape Finance (CRLF) aims to address these challenges by rebalancing the economics of conservation and offering finance for the improvement and expansion of sustainable land use, including in areas adjacent to conservancies. This instrument is being developed by a consortium of three entities: Platcorp Group – an impact-focused African asset manager with a well-established microfinance business in Kenya; Conservation Capital – a conservation finance boutique advisory firm; and Dascot Limited – a technical conservation consultancy. The intent is to implement the instrument jointly with Conservation International, a global leader in conservation action and finance, leveraging its success and track record in managing the African Conservancies Fund (ACF).

¹ To illustrate this point, 47% of the Kenya Wildlife Service budget was provided by the Government in 2015.

² To effectively manage Africa's 1,812 national parks, covering 3.1 million square kilometers, annual funding of approximately USD 10.2 billion is required, along with USD 1 to USD 2 billion for protected areas housing lions.

CONCEPT

1. INSTRUMENT MECHANICS

CRLF provides concessional financing products tied to sustainable land use, offering an investable structure with broad investor appeal

The CRLF instrument will be an evergreen open-ended vehicle, building capacity for sustainable local enterprise and disbursing low-cost debt to finance its growth, whilst reinvesting all surpluses. It provides avenues for philanthropies to support conservation enterprise in a more financially sustainable and impactful manner than traditional grant funding, whilst enabling local investor participation in a de-risked microfinance portfolio, paving the way for an impact securitization program. Innovative design addresses both in-situ and ex-situ incentives and financing needs.

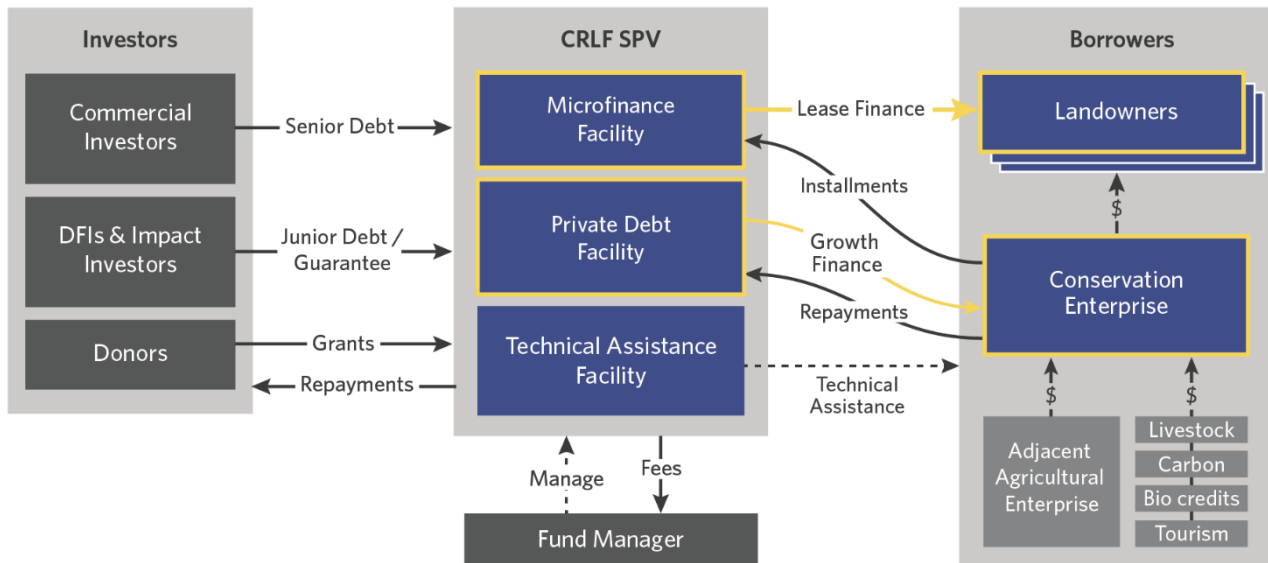
CRLF is designed as an umbrella facility with a representative governance body setting investment strategy and policy, and monitoring operation of three synergistic facilities:

- **A microfinance facility** offering innovative lease-backed loans to local landowners, fostering financial inclusion through preferential terms, supplemented by technical assistance to support the development of sustainable business. Leveraging its existing microfinance infrastructure and network, Platcorp will manage this facility.
- **A private debt facility** offering patient growth capital to landscape management companies, conservancies (collectively “conservation enterprises”), and later, potentially sustainable agriculture and forestry operators around conservation areas. Finance will be advanced against credible, diversified growth strategies, with implementation supported by technical assistance. The proponent is in late-stage discussions with Conservation International (CI) to serve as a manager for this facility.
- **A technical assistance facility (TAF)** encompassing business development and support services to support the growth and governance of local enterprise, with nature finance skills to establish linkages to international carbon and biodiversity markets. Platcorp and the private debt manager will jointly manage this facility.
- Each facility will be ringfenced to manage the impacts of credit and currency risk.

An overarching CRLF governance structure representing fund managers, investors, and other key stakeholders will be put in place to mobilize funding, ensure coordinated financing and investment activities across the three facilities, and provide investors with regular reports on performance (financial and impact) and progress against key milestones. Further detail regarding the scope of the TAF offering, and a preliminary proposal in respect of service providers with experience in Kenya, can be found in the annexure. Key stakeholders include:

- MMWCA (umbrella body);
- All the conservancies under the landscape management companies (LMC) - Lemek, Ol Chorro, Mbokishi, and Enonkishu could all stand to benefit in this first phase;
- One Mara Carbon Project.

Figure 1: CRLF mechanics



The microfinance facility will be capitalized with local currency (Kenyan Shillings, or KES), financing clients accordingly. Platcorp will contribute the equivalent of USD 1 million upfront, comprising USD 500,000 non-repayable grants from its Foundation and aligned donors, and USD 500,000 in commercial junior debt, repaid last. This will enable the development of an initial portfolio and lease-backed loan track record to facilitate fundraising from commercial banks and other local investors by year 3, with credit enhancement via a DFI guarantee³ if necessary. As the microfinance portfolio scales, performing assets may be transferred into a warehousing vehicle for private securitization. This mechanism will enable the recycling of commercial capital to enable growth.

By contrast, the private debt facility will be capitalized with dollars. Most envisioned sustainable land use revenue streams are denominated in dollars⁴, providing a natural hedge to manage currency risk. Concessional debt will be sourced from philanthropies, DFIs, and impact investors at highly concessional pricing, potentially with incentives. Over time, extension to sustainable agricultural partners will reduce reliance on subsidy, with pricing matching market levels and extended repayment terms attracting business.

The pilot target market lies in the Maasai Mara in Kenya, with replication expected across other conservation areas in Kenya and the region. The pilot business case has been validated through consultation with key stakeholder groups, informed by initial feasibility studies interrogating conservancy management capabilities, financing needs, and additional revenue streams, including from carbon and biodiversity credits. Whilst no legal or regulatory obstacles to implementation have been identified, developments in the Kenyan microfinance regulatory landscape will need to be monitored, and vehicle jurisdiction determined together with prospective investors.

³ Exploratory discussions have been held with SIDA, DFC, DFCD/FMO, and other guarantors, confirming availability of required credit enhancement tools for the intended purpose.

⁴ Ecotourism, carbon credits, biodiversity credits, export sustainable agroforestry products.

2. INNOVATION

CRLF derisks and expands financing for conservation areas, developing investable structures linked to growing sustainable production capacity

2.1 BARRIERS ADDRESSED: LACK OF BANKABILITY OF SUSTAINABLE LAND USE

Private financing for nature-based and conservation projects remains minimal due to the unattractive risk/return profile and small scale of most existing investment opportunities (United Nations Environment Programme, 2021). This is a consequence of inadequate market signals for sustainable land use, such as conservation, sustainable agriculture, and forestry; inadequate skills to develop and operate sustainable land use; and weak enterprise balance sheets. Commercial agriculture still outcompetes sustainable land use, resulting in rapid land conversion, financed by commercial capital.

CRLF finances a diversity of key actors in conservation-based economies on the back of growth in international markets for sustainable goods and services (like ecotourism, and sustainable agricultural products) and environmental attributes, including surging corporate demand for nature-based carbon credits. Prices for nature restoration credits have doubled over the past year to USD20/tCO₂eq, buoyed by support from corporate membership of the Science-Based Targets Initiative (SBTI). Recently, interest in biodiversity attributes has led to the commencement of work on technical standards for biodiversity credits by two major bodies: Plan Vivo and Verra. The proponent team is working closely with leaders to develop the large potential of this nascent market to unlock it for the benefit of African conservation.

CRLF effectively addresses all major barriers to finance for sustainable land use in conservation critical areas:

Table 1: CRLF strategy for overcoming barriers to sustainable land use

Barrier	Response	Impact
Lack of incentive for sustainable land use	<ul style="list-style-type: none"> Unlock access to innovative, nature-positive, and concessional revenue streams Link financing terms to sustainable land use 	<ul style="list-style-type: none"> Increase financial yield per hectare and scale of operation to enable competitive lease rates for sustainable land use
Lack of skill to develop sustainable enterprise	<ul style="list-style-type: none"> Dedicated TAF provides large and small enterprises with targeted business development support 	<ul style="list-style-type: none"> Sustainable production capacity increases, improving financial access and improving livelihoods
Lack of affordable, patient capital to finance sustainable enterprise	<ul style="list-style-type: none"> Tailored and aligned financial products with concessional terms facilitate switch to and scaling of sustainable business 	<ul style="list-style-type: none"> Diversified and inclusive sustainable enterprise scales and attracts private finance as it matures
Lack of investable, nature-positive instruments	<ul style="list-style-type: none"> Ringfenced vehicles with a common mission but distinct investment strategies and risk-return profiles Expert fund management unlocks commercial capital 	<ul style="list-style-type: none"> Grants are leveraged to catalyze commercial and developmental debt A range of aligned investor types is attracted

2.2 INNOVATION: FINANCING DIVERSITY TO DRIVE INCLUSIVE GROWTH

CRLF is a unique climate and biodiversity finance mechanism that presents opportunities to scale sustainable land use at both large and small enterprise level in conservation areas. Whilst other sustainable land use debt instruments exist, they finance existing revenue streams. This leaves conservancies vulnerable to fluctuations in ecotourism and grant income, and smallholders dependent on land use – often unsustainable.

CRLF is the first instrument to drive diversified expansion strategies with conservancy-led enterprises through structured venture financing support, sharing the financial benefits with small landowners by enhanced income streams and affordable access to MSME finance. It builds on the success achieved by CI's ACF in implementing a revenue-based financing product with Kenyan conservancies to restore their financial sustainability during the Covid-19 crisis. This was introduced to protect conservancies from the consequences of temporarily stalled tourism, yielding early evidence of the feasibility of financing conservancy operations when correctly implemented.

Table 2: Comparable instruments

Similar Instruments	Description
Agri-Business Capital (ABC) Fund	Investment fund that targets smallholder farmers and aims to support projects that create viable employment opportunities for rural youth, and men and women led SMEs.
Smallholder Resilience Fund (SRF)	A synchronized investment approach aims to build capacity of existing smallholder farmers and SMEs to achieve higher incomes and greater climate resilience.
Africa Conservation & Communities Tourism (ACCT) Fund	Provides loans to ecotourism businesses in conservation areas, either directly or through special purpose vehicles.

2.3 CHALLENGES TO INSTRUMENT SUCCESS

In terms of actionability, there are two main challenges:

- **Coordinating activity across multiple implementing partners**, including Platcorp and CI expected as parallel fund managers, and a range of TAF program partners;
- **Managing operational complexity** associated with three embedded facilities serving diverse target groups.

The first challenge arises because Platcorp and CI will manage separate facility entities under the CRLF umbrella. It will be managed through establishing a joint governance structure from the start and synchronizing implementation. Once the pilot has been implemented, a case could be made for an integrated fund vehicle and governance structures to take the business model to scale (USD 10m+).

The second challenge will be addressed structurally by appointing dedicated fund managers to develop the microfinance and private debt portfolios under segregated but aligned mandates. In this way, each fund manager can focus its resources and systems on single target groups.

MARKET TEST AND BEYOND

3. IMPLEMENTATION PATHWAY AND REPLICATION

After piloting in the biodiversity-rich Northern Mara, the instrument will expand to other key conservation areas in Kenya.

While Kenya is considered one of the world's 10 mega-biodiverse nations, the unabated expansion of agriculture is a significant threat (Mungal, 2023). Over 60% of Kenya's wildlife exists outside PAs, and the current network does not adequately protect the country's biodiversity (Western & Russell, 2009; Tyrell et al., 2020). This is particularly true within the Greater Maasai Mara ecosystem, where approximately 25 percent of Kenya's wildlife resides – much of it outside national reserves in conservancy areas (Mara Conservancies, 2023). This wildlife is central to ecotourism, earning much-needed revenue for these critical conservation areas.

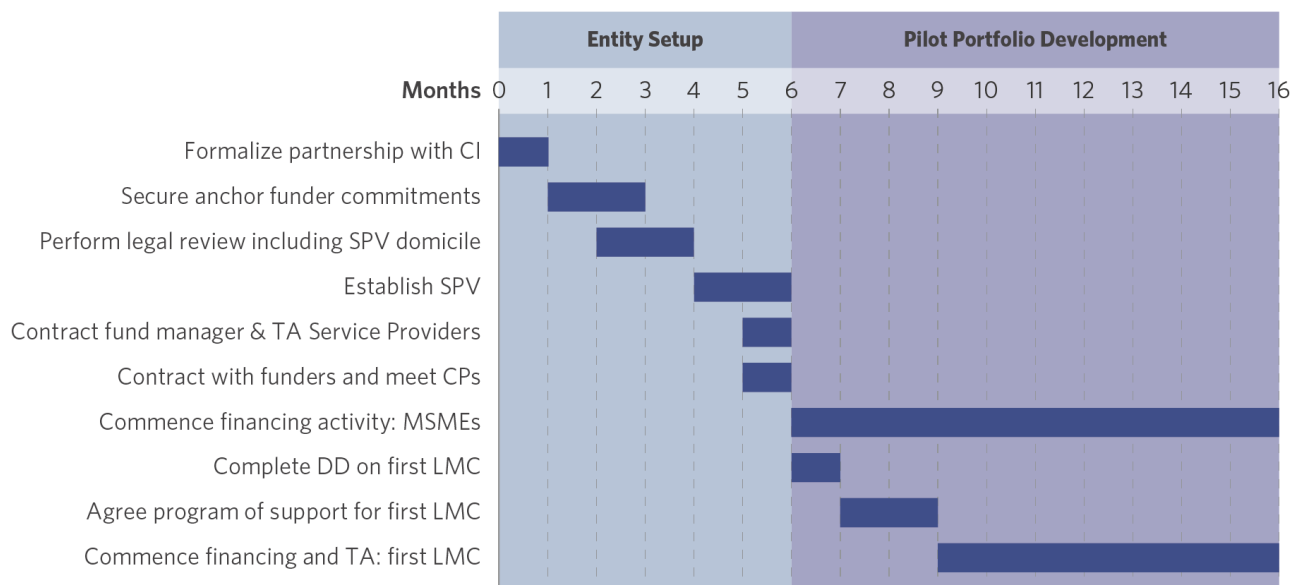
The Northern Mara region is a good test bed for the CRLF due to its world-renowned ecosystem spanning 46,000 hectares, well-established conservancies, and tourism partners, large-scale philanthropic and bilateral grant inflows, and partnerships where trust has already been established over the past three years of intensive preparatory work. CRLF will pilot here, deploying USD 9.2m over the first decade, leveraging the management capabilities and lease book of the Enonkishu conservancy.

By year 5, CRLF will move to a second site⁵, deploying an additional USD 7.1m to scale across Kenya. By this stage, the track record from the first site, a portfolio of performing loans and a strengthened balance sheet should broaden access to investors through derisking participation. Further, economies of scale and a maturing book will lessen reliance on subsidies, reducing reliance on grants. The success in Kenya will serve as an exemplar capable of applying new best practices in other regions. Replication could take place where similar dynamics exist, including Tanzania, Rwanda, Zambia, and South Africa, dependent on conservation ecosystems and local property regimes. Criteria for selection are as follows:

- Climate resilience under threat
- Rich biodiversity with supportive conservation and sustainable land use policy
- Large-scale philanthropic and bilateral grant inflows reflecting conservation value
- Conducive property rights regimes
- Well-established conservancies and tourism partners.

⁵ The site has not been selected yet. For now, it has been assumed to be of the same scale and risk profile as the first site. A range of potential sites are included in the annex to demonstrate relevance.

Figure 2: Milestone plan



4. FINANCIAL IMPACT AND SUSTAINABILITY

4.1 QUANTITATIVE MODELING

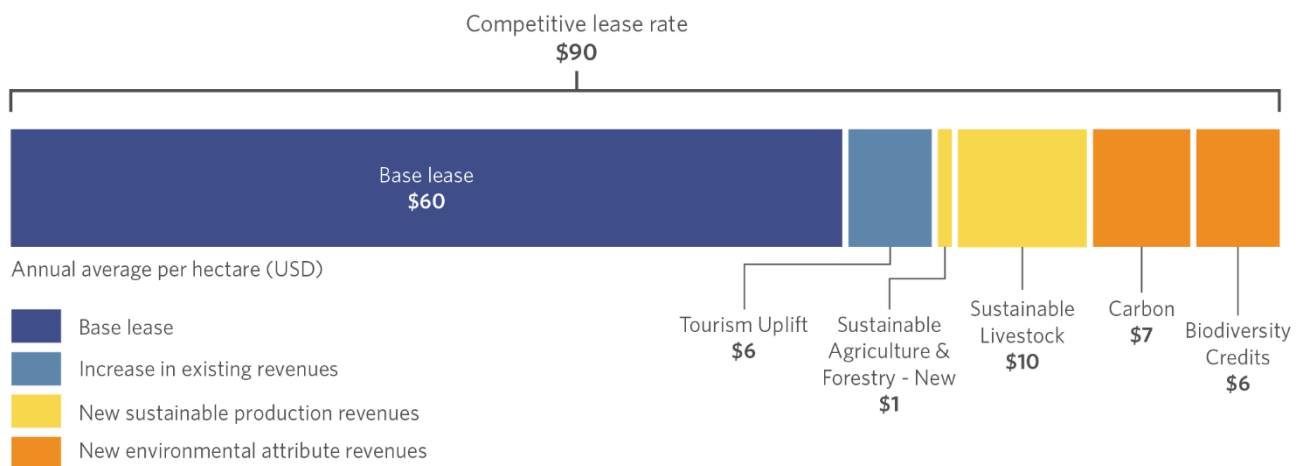
Lab financial analysis was undertaken for both CRLF and a typical principal borrower, namely an LMC. Even investors in the microfinance portfolio are taking credit risk on the LMC as it is the source of lease income to service the microloans and the collections agency, hence it is critical to assess its financial position.

LMC analysis focused primarily on closing the gap to commercial agriculture in terms of the returns to land in and around conservancy areas. Competitive lease rates are crucial to prevent landowners from clearing land for other unsustainable uses. Thus, the focal point was the net contribution from various revenue streams to the marginal lease rate, from existing non-competitive levels. The diagram below reflects how current lease rates of approximately USD 60/ha in the Northern Maasai Mara could be improved by 50% to USD 90/ha, through a combination of the following non-correlated revenue streams, offering substantial diversification benefits:

- **Improving the ecotourist experience**, initially through investing in roads, and over time through a better game viewing experience, enabled by the proliferation of wildlife. This will lead to increased occupancies, establishment of new lodges aligned to conservation principles, and enhanced revenue per bed-night;
- **Providing ecosystem services** to adjacent sustainable agriculture and forestry operators;
- **Developing a sustainable livestock business**, adopting emerging best practices from programs like Herds for Growth;

- **Developing carbon credits** based on sustainable rangeland management – validated potential based on a detailed feasibility study⁶ and likely to be implemented via CI's forthcoming OneMara carbon program;
- **Developing biodiversity credits** – either stapled to carbon credits to fetch a premium, or sold separately to buyers with specific interest in biodiversity, e.g., corporates aligned to Taskforce on Nature-Related Financial Disclosures (TNFD), high net worth individuals (possibly including ecotourists to the region)⁷.

Figure 3: Contributions to lease rates by revenue stream, first site



Venture financing will be structured per LMC to take into account existing finances and growth plans. For instance, more mature LMCs deriving significant tourism revenues may qualify for larger facilities using more traditional loan structures based on their credit risk profiles. By contrast, emerging conservancies may be offered loans with sculpted profiles easing cash flows in the early years, or flexible revenue-based financing. In these cases, the size of facility per LMC would be smaller to compensate for higher credit risk.

CRLF facility analysis focused on weaning the instrument off reliance on grant funding by the end of the pilot. This was achieved through structuring, optimizing funding, and scaling to achieve economies of scale. This instrument includes two new credit concepts, being lease-backed loans to MSMEs (KES), and a venture debt product to LMCs, implemented by the private debt facility (USD). Sustainability was achieved as follows:

- **Structuring:** Since the two products will be denominated in different currencies, it was decided they would be capitalized by different investor groups – microfinance by lead-proponent Platcorp (grants and junior debt) and domestic commercial lenders (commercial senior debt, possibly with a DFI credit guarantee), private debt (LMC-focused initially) by development finance institutions (DFIs) or philanthropies with highly concessional mezzanine debt. Commercial capital is

⁶ The two most suitable methodologies are VM0032: abatement from reducing density of grazing animals and the frequency of prescribed fires into an uncultivated grassland landscape; and VM0042: abatement resulting from the adoption of improved agricultural land management (ALM) practices.

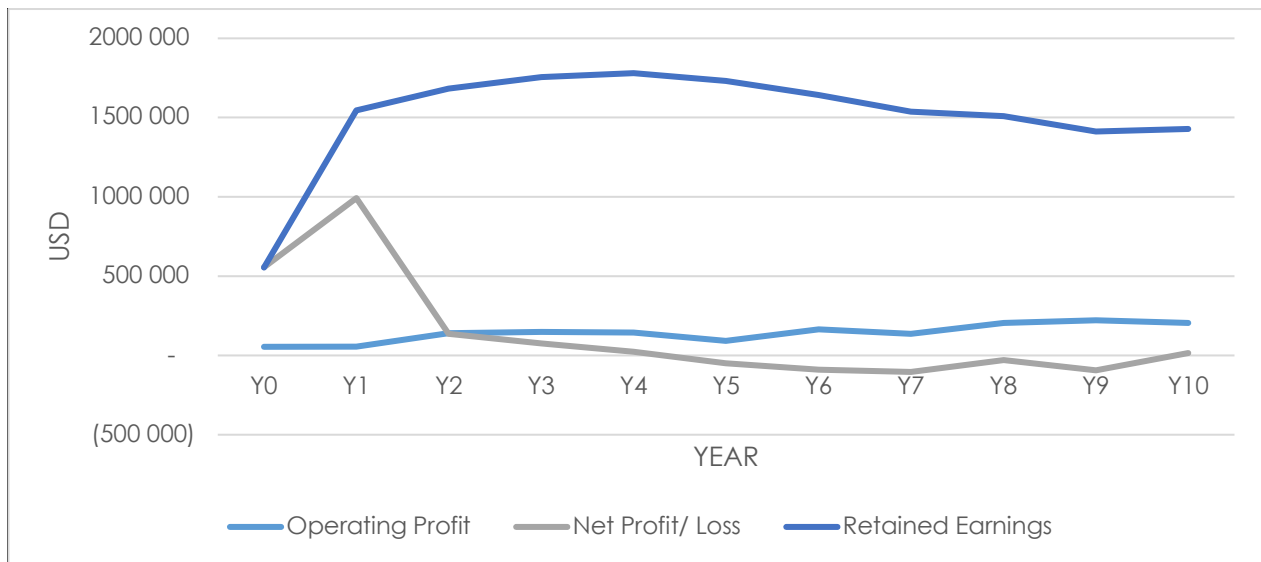
⁷ Technical experts in the proponent team are liaising with leaders in biodiversity credit transactions to explore establishing a pioneering large scale biodiversity credit project pilot in the Mara.

feasible given microfinance pricing and Platcorp's experience and profile in the Kenyan market.

- **Optimizing funding:** Based on Lab research, the best strategic use of conservation grants would be to capitalize on a first loss facility to service both debt facilities, absorbing risk otherwise faced by lenders while proving concept and keeping initial financing costs low. In this way, a dollar WACC (Weighted Average Cost of Capital) of 5% was achieved.
- **Scaling:** As the portfolio scales to USD 10m+, fund management fees as a share of assets fall from 4% to 3%. Further, the portfolio diversification impact streamlines cash flows and limits the impact of default events.

Figure 4 shows how retained earnings reach USD 1.5m by the end of the first decade in the baseline scenario, enabling an additional USD 2-3m credit capacity (assuming 70% gearing).

Figure 4: Pathway to financial sustainability – retained income accrual over the pilot



4.2 PRIVATE FINANCE MOBILIZATION AND REPLICATION POTENTIAL

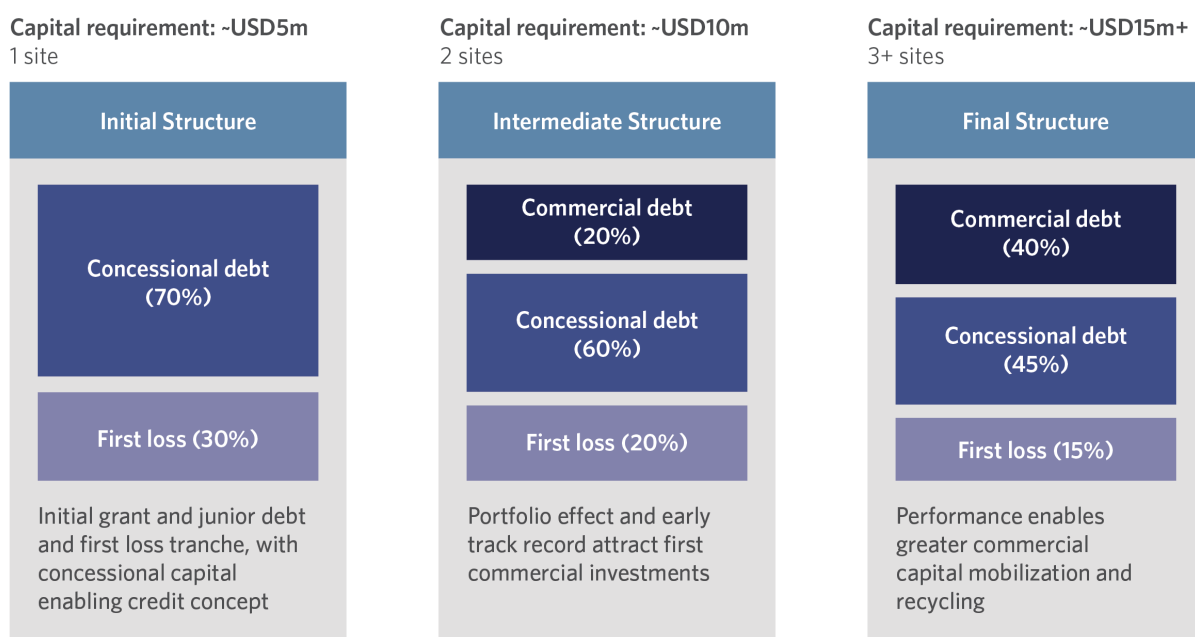
The CRLF shows potential to mobilize private finance across the facility, with potential for commercial returns on the local investment into the microfinance facility. During the pilot period, CRLF is expected to mobilize USD 2.5m in commercial finance, of which USD 0.5m in junior debt from Platcorp and USD 2m in senior debt from Kenyan commercial lenders, funding the microfinance portfolio. Considering ACF experience, philanthropies may provide the required USD 6m conservancy debt if incentives are provided to compensate for low capacity to service coupons – for example, options on biodiversity credits produced.

Over time, catalytic impact will be achieved through building up equity, portfolio scaling, and diversifying the private debt facility client base to commercially mature, sustainable agriculture and forestry clients proximate to the conservancy areas. These entities would be provided with debt products priced at close to commercial terms yet with extended tenors rewarding sustainable land use management.

To manage financial risks, four strategies will be deployed to attract private investors:

1. Receivables will serve as security for at least the microfinance portfolio (i.e. lease backing), limiting the likelihood of credit loss;
2. Grants will capitalize a first loss facility on conservative assumptions, with interest invested;
3. If necessary, further credit enhancement will be added via a credit guarantee protecting private investors; and
4. Extensive technical assistance will build the productive capacity of borrowers while embedding good governance and sustainable stewardship of the land through social, environmental, and governance covenants.

Figure 5: Evolution of capital stack



Note: this diagram does not reflect TAF funding, estimated at USD 2m across the first two sites.

The instrument is subject to various financial risks, considered below.

Table 3: Risk Management

Risk Type	Description	Strategy
Demand Risk	Low uptake of financial products	<ul style="list-style-type: none"> Product design - preferential pricing, extended term
Product Risk	Excessive MSME indebtedness arising from borrowing for consumption	<ul style="list-style-type: none"> TAF enterprise growth support Borrower financial education Credit assessment
ESG Risk	Perceptions of 'green-grabbing' rural land	<ul style="list-style-type: none"> Community-led model with local decision-making, transparency, value sharing
Compliance Risk	Failure by borrowers to comply with covenants, resulting in default	<ul style="list-style-type: none"> Punitive pricing (reset to market rates) triggered by non-compliance Restrict future access to finance

Credit Risk	Bad debts arising from failure of borrowers to meet financial obligations	<ul style="list-style-type: none"> Product design: <ul style="list-style-type: none"> - Security (e.g. leases - MSME finance) - Staggered disbursements Credit guarantees Capacity building Portfolio diversification
Liquidity Risk	Inability to meet financial obligations	<ul style="list-style-type: none"> Capital tranching Establishment of debt reserve fund

5. ENVIRONMENTAL AND SOCIO-ECONOMIC IMPACT

CRLF will uplift communities while restoring biodiversity and carbon sinks

CRLF takes a holistic approach to financing conservation-led economic development in areas of critical biodiversity importance, aiming to strengthen climate resilience whilst transforming business models at large and small scale. This encompassing approach is very well aligned with the UN Agenda 2030, aligning to at least ten goals:



Seven key quantitative indicators have been identified to describe CRLF's impacts. Table 4 summarizes the expected impact for the baseline model portfolio based on current projections over the 10-year period.

Table 4: Quantitative impact indicators

Impact	Measure	Portfolio Impact
Biodiverse land protected and restored	Hectares	~92,000
Sequestered emissions	TCO ₂ eq	5m over 30-year project lifecycle
Rural landowners benefiting from value sharing and financial inclusion	No. of landowners	2,040
Volume of MSME loans issued	No. of loans issued	2,562
Financing and support for sustainable livelihoods	USD million	6.3m microfinance / 2m technical assistance

Financing for expansion of conservation-led land management	USD million	10
Economic benefit to conservancy-based rural areas (direct and indirect)	USD million	69

5.1 ENVIRONMENTAL IMPACT

CRLF provides a viable financial mechanism to prevent the conversion of conservation land in Kenya and beyond. During its first decade, it is expected to contribute to the conservation and restoration of over 90,000 hectares of land via conservancies. In addition, considerable areas of existing farmland and forestry will have improved environmental practices. Restoration of natural vegetation will provide resilience in respect of physical risk, while a switch to sustainable MSME business will reduce the exposure of communities to changing climatic conditions impacting agricultural output.

CRLF supports climate mitigation as well as adaptation. The expansion of conservation areas, via improved management of livestock grazing, has the capacity to sequester 5 million tCO₂e_q in natural carbon sinks over a 30-year carbon project lifecycle, considering the first two sites alone. The public cost of carbon capture using this method is only USD1.45/tCO₂e_q⁸, outperforming most other options.

Table 5: Contributions to environmental SDGs

SDG Impacted	Description of Impact
SDG 13: Climate action	<ul style="list-style-type: none"> Through improved ecosystem functioning, the carbon sequestration potential of these conservation areas increases.
SDG 15: Life on land	<ul style="list-style-type: none"> Rangeland health, biodiversity increased through larger tracts for wildlife, including large mammals such as lions, elephants, rhinos. Through expanding the reach of conservation activities, CRLF will safeguard valuable species in some of the world's most important biomes.

5.2 SOCIAL AND ECONOMIC IMPACT

CRLF has the potential to transform the economics of conservation-critical areas by monetizing the value of climate, biodiversity, and sustainable production, and sharing these benefits with subsistence households. These impacts are discussed in detail in Table 6 below.

Table 6: Contributions towards socioeconomic SDGs

SDG Impacted	Description of Impact
SDG 1: No poverty	<ul style="list-style-type: none"> Increased and expanded leasing for sustainable management (and tourism), jobs generated in the conservation, livestock, and tourism sectors, providing sustained income.

⁸ Public capital comprises the donor grant funding and concessional debt.

	<ul style="list-style-type: none"> o Preferential access to finance, and technical assistance to support business growth provide landowners vulnerable to climate change with a growing, resilient income base.
SDG 5: Gender equality	<ul style="list-style-type: none"> o CRLF will explore gender targeting technical assistance support, considering both lower rates of financial inclusion for women and their frequently greater domestic financial obligations.
SDG 10: Reduced inequality	<ul style="list-style-type: none"> o Stakeholder representatives (i.e., landowners, LMCs, conservancies and tourism partners) are involved in land management companies, ensuring transparent and equitable decision-making. o Strengthening the managerial and productive capacity of land management companies equips these institutions to grow their revenue bases to the benefit of all landowners.
SDG 11: Sustainable cities and communities	<ul style="list-style-type: none"> o CRLF will prevent further clearing of critical conservation land for unsustainable economic development, working with communities to develop sustainable livelihoods.
SDG 16: Peace, justice, and strong institutions	<ul style="list-style-type: none"> o CRLF will incentivize and strengthen the governance of conservation-based enterprises, currently under-capacitated and often unbankable. o Through a community-led conservation model, CRLF will reduce social tensions and human-wildlife conflict.
SDG 17: Partnership for the goals	<ul style="list-style-type: none"> o CRLF provides new programmatic investment opportunities for philanthropies and private capital currently unable to invest in nature-based solutions.

NEXT STEPS

The most immediate next step will involve formalizing implementation arrangements including partnerships with CI and technical assistance providers and CRLF governance and operational structures.

In parallel, the proponent will continue fundraising for pilot implementation, with anchor investors guiding choice of jurisdiction for the vehicle, legal review, and due diligence.

As these key milestones are reached, the financial modeling will be updated, and a special purpose vehicle established to operationalize the facility.

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ANNEX 1: POTENTIAL SITES FOR IMPLEMENTATION, KENYA

	Northern Mara: PILOT - FIRST SITE	Western Mara/Nyakweri Forest	Core Mara Conservancies	Mara - Loita Forest Corridor	Mara - Loita Plains Corridor	Amboseli
Land area (ha)	~50,000 ha	~20,000 ha	~100,000 ha	~40,000 ha	>100,000 ha	>100,000 ha
Status of LMC (noting reliance on functional LMC)	New CLG to be formed. Strong management team in place	Conservancies established	Large established conservancies	Emerging conservancies and development needed	Emerging conservancies and development needed	Several conservancies established with a lease model, more emerging
Status of eco-tourism	Well established	Close proximity to the Mara	Well established	Limited	Limited	Limited but potential growth
# Landowners (estimate)	1,600	660	3,300	1,320	>3,300	>3,300
Biodiversity appeal	Rich biodiversity	Rich biodiversity, more endemics than main Mara	Rich biodiversity	Rich biodiversity and key corridor	Rich biodiversity and key corridor	Rich biodiversity
Conservation grant inflows	High	Medium	Very High	Low	Low	Medium
Need for CRLF	Diversify revenue streams	Protect from conversion to commercial agric	Diversify revenue streams	Re-open corridors and Protect from conversion to commercial agric	Protect from conversion to commercial agric	Protect from conversion to commercial agric

ANNEX 2: CUSTOMER VALUE PROPOSITION

MSMEs: Lease-backed financing

Lease-backed loans will range from USD 2,500-5,000, sized at 40-60% of lease receipts, ensuring responsible product design (i.e., installments will not exceed lease receipts). Subject to satisfactory credit history, landowners will be able to apply for readvances against their long-term leases. Accompanying technical assistance will be used to promote financial literacy, support the development of sustainable businesses, and encourage sound environmental stewardship. Platcorp will draw on its Kenyan experience in designing the package of support and administering the loans. Borrowers will need to comply with a range of environmental, social, and governance covenants driving sound resource management and decision-making accountability. Accordingly, the disbursement will be linked to performance triggers linked to sustainable land management outcomes.

Concessions relative to the market include longer tenors of up to 8 years, and APRs of 20-25%, well below industry standards of 40-80%, to reward the landowner for making land available to conservation enterprises for sustainable land use. The Kenyan MSME business finance landscape overview table below demonstrates how expensive MFI finance is in Kenya, along with the barriers faced by MSMEs to accessing alternative sources of business finance.

Institutions	Examples	Product Type and Parameters	Risk/ Barriers
Microfinance Institutions	<ul style="list-style-type: none"> Musoni F3 Life ECLOF Kenya 	<ul style="list-style-type: none"> Microfinance Size: USD 1k - 22k (rarely USD 50k+) Pricing: 40-150% APR 	<ul style="list-style-type: none"> Collateral required High APRs
Banks	<ul style="list-style-type: none"> Barclays Chase Bank Equity Bank National Bank of Kenya 	<ul style="list-style-type: none"> Business finance Size: Up to USD 20k for MSMEs, extending to USD 50k, if security available Pricing: 20-30% APR 	<ul style="list-style-type: none"> MSMEs lack balance sheet i.e. collateral MSMEs lack necessary documentation, e.g., business plans, audited financial statements
Private Equity and Venture Capital Firms	<ul style="list-style-type: none"> VC4Africa Safaricom Spark Fund DOB Equity Savannah Fund 	<ul style="list-style-type: none"> Equity-based growth finance (filling unsecured business bank lending vacuum) Seed, late-seed, early-growth Ticket sizes of USD 50k -150k Target sectors are high margin types like technology, financial services 	<ul style="list-style-type: none"> Larger tickets to justify long DD processes often preclude MSMEs Funders seek equity returns, hence target high margin sectors – sustainable land use challenging

Conservancies/land management companies: Private debt - venture finance

Highly concessional loans with 5-8 year terms will be made available to implement credible, TAF-supported growth plans targeting both areas under management and diversification of revenue streams. As in the instance of the microfinance facility, borrowers will need to comply with a range of ESG covenants driving sound resource management and decision-making accountability and equitable benefit sharing. Each conservancy enterprise will qualify for a facility of up to USD 5 million, drawn down in tranches with conditions precedent including financial and institutional performance measures. The intent with conservancy

enterprises is to improve their bankability through strengthening their balance sheets, cash flows, and management capabilities. A full spectrum of technical assistance will be made available over the loan period to help achieve these objectives. This program of support will be informed by learnings from the recently implemented African Conservancies Fund, which financed Kenyan conservancies during the Covid outbreak.

As seen below, there are currently no suitable private financing products available for conservancy enterprises, unless they have large balance sheets. Even then, short tenors disincentivize financing for expansion purposes given typical investment payback periods of 5-10 years.

Institution Types	Examples	Product Type and Broad Parameters	Risk/ Barriers in CRLF Context
Banks	<ul style="list-style-type: none"> • Stanbic • Absa Bank 	<ul style="list-style-type: none"> • Loan size dependent on collateral • Interest rate of 16-38% • Tenor of 6 months – 2 years 	<ul style="list-style-type: none"> • Collateral required to secure loans: banks are averse to cash-flow lending
Private Equity and Venture Capital Firms	<ul style="list-style-type: none"> • Ethos • Inspired Evolution • Catalyst Fund • ENZA Capital • VestedWorld • Acumen 	<ul style="list-style-type: none"> • USD 50k – USD 1 million • Tech, agribusiness, water, forestry, renewable energy, and waste management sectors 	<ul style="list-style-type: none"> • As equity investors, they typically don't provide funding to NPOs like LMCs

ANNEX 3: PRELIMINARY TAF SCOPE & SERVICE PROVIDERS

Technical Assistance	Specific Support	Target Beneficiaries	Potential Service Providers
Environmental	Conservation support and Impact M&E	LMCs	Dascot
	Livestock and rangeland management		True Range
	Carbon management		Dascot / Level
	Human-wildlife conflict management	MSMEs / Landowners	Maa Trust / MEP
	Environmental stewardship		Maa Trust / MEP
Social	Social surveys and Impact M&E	LMCs	Dascot
	Community engagement and development		Dascot
	Sustainable livelihood development	MSMEs / Landowners	Maa Trust
Economic / Financial	Corporate financial management	LMCs	Conservation Capital
	Business growth planning		Conservation Capital
	Business management		Conservation Capital
	Carbon / biodiversity credit development		Dascot
	Financial literacy	MSMEs / Landowners	Farm Africa / MSC Microsave
	Sustainable business development		Farm Africa / MSC Microsave
Governance	Governance and strategy	LMCs	Maliasili
	Company administration		Africa Nature Investors
	Conservancy administration		Africa Nature Investors
	Lease administration		Africa Nature Investors

ANNEX 4: CARBON AND BIODIVERSITY CREDIT POTENTIAL

Context

A key assumption driving the design and sizing of the CRLF instrument is that multiple natural assets can be developed within conservation-based areas, with biodiverse land ultimately supporting the creation of resilient business that taps diverse revenue streams.

Historically, such areas have struggled to mobilize funding, including through “payment-for-ecosystem” (PES) business models. Some of the key challenges in the local monetization of natural assets relate to their nature as a public good making it difficult to demarcate ownership and develop a business case, a lack of methodologies to accurately measure and create sellable PES units, and a lack of desire in the market to pay for PES.

The role of carbon and biodiversity credits

Carbon and biodiversity credits overcome these localized challenges to a degree.

Carbon credits are quantified by well-established, science-based standards like the Verified Carbon Standard and Gold Standard and backed by international agreements. A single unit of measure (tCO₂eq) and widespread adoption of the Paris Agreement goals facilitating growing global corporate demand for credits offset emissions that cannot feasibly be reduced at source. More than 300m credits are traded in the voluntary carbon market annually, with 10-20% annual growth expected up to 2050. Especially high demand exists for removal credits, with nature-based projects yielding especially appealing co-benefits in terms of community livelihoods and biodiversity (which can be verified under Verra Climate, Community & Biodiversity Standards). African credits occupy a niche in the carbon market, rewarded by substantial premia in international carbon markets due to excess demand.

A unit of biodiversity can be defined as a 1% uplift or avoided loss in the median value of the basket of metrics per hectare (CPIC, 2022). This allows philanthropic, governmental, or private sector projects to account for the biodiversity benefits their funding is providing. These biodiversity credits can be independently validated and verified, and the methodology is open source for any organization to apply. Biodiversity credits can be traded using the same architecture as carbon credits (additionality, permanence, leakage, avoidance of double counting, retirement of credits) so it is easy for corporates to apply alongside their existing carbon credit purchase program.

Biodiversity credits are at a nascent stage of market development, with Plan Vivo and Verra currently working on standards to define and measure these attributes. Biodiversity credits are used to finance actions that result in measurable positive outcomes for biodiversity, through the creation and sale of biodiversity units. Due to biodiversity credits financing activities that deliver net positive gains or avoided loss, they can support nature-positive actions such as long-term conservation and restoration of nature, regardless of the viability of a carbon project linked to mitigation impacts.

It is important to note that while many biodiversity-linked projects have been funded through carbon credits to date (such as mangroves and wildlife) biodiversity credits are not competitors to carbon offsets (Benedito & Sarmiento, 2022). They are designed to work alongside the carbon market, allowing funding to reach even the smallest climate change mitigation projects to protect threatened ecosystems.

A strong wave of demand for biodiversity credits is expected once the standards are released (Manuell, 2023). One of the key drivers is the historic Global Biodiversity Framework (GBF) agreement at COP15 in Montreal in 2022. The GBF called on private finance to help close the gap in investments in nature protection and restoration, with explicit mention of crediting as a potential avenue to achieve this (Nikiforova, 2023). At a corporate level, the release of the Taskforce on Nature-related Financial Disclosures serves as a driver of the adoption of nature-positive action.

Biodiversity schemes, still in the pilot phase, currently cover approximately 800,000 hectares with USD 8m in funding so far pledged towards biodiversity credit investment (Manuell, 2023). For biodiversity credit markets to be successful, they need to deliver on their core purposes of scale (timely generation of significant financial resources), price (prices paid are sufficient and have a price floor) and impact (credible, measurable, and significant positive impacts).

Application to CRLF

The One Mara Carbon project (OMCP) is a combined project between the Maasai Mara Wildlife Conservancies Association (MMWCA) representing the conservancies and their landowners, Ahueni, and CI. It is at a mature stage of development with pre-feasibility conducted, and the project design document under development. The OMCP is an ecosystem-level conservation initiative that aims to protect ecological resources and provide economic and social co-benefits for local communities in the Maasai Mara. The goal of OMCP is to reduce emissions, restore the degraded landscape, inform grassland management options, provide alternative livelihoods for communities, build resilient conservancies, increase biodiversity conservation efforts, and enhance tourism.

The project is being registered via the VCS, with it likely that VM0032 will be used. This is the methodology according to which carbon yield has been quantified for the CRLF instrument. Extensive technical feasibility work has been undertaken to validate estimates per these methodologies.

VM0032 quantifies the emission reductions and removals from activities that introduce sustainable adjustment of the density of grazing animals and the frequency of prescribed fires into an uncultivated grassland landscape. This method has already been implemented in Kenya under the guidance of Soils for the Future and the Northern Rangelands Trust. The method focuses on restoring rangelands and soils via the increased sequestration of soil organic carbon (SOC) and its long-term storage.

Using these methods, assuming the livestock husbandry actively restores very degraded landscapes, with depleted stores of Soil Organic Carbon (SOC) a yield of approximately 46 credits per hectare can be obtained over a period of 30 years (~1.5 credits/ha/a). At an approximate price estimate of USD 20 / tCO₂eq, this delivers an extra USD 30 revenue per hectare, netting USD 10-15 after project costs. To be conservative, we have assumed USD 7 / ha / in our modeling.

Of relevance to the Mara, ValueNature has secured funding to develop three biodiversity credit projects to bring to market in 2023. Each Biodiversity Credit is unique and represents one hectare of land protected for 10 years. The initial assessments include a measure of intactness, an indication of how well the project site compares to a pristine reference site or an expected state. 80% of revenue generated is passed back to the custodians responsible for protecting and growing these assets.

Initial conversations with organizations such as rePLANET (submitting applications under PlanVivo) and the Verra SD Vista Nature Framework indicate an immediate appetite for this type of project. In particular, the core nature of the project – expanding conservation areas – will create the most lucrative market offering via biodiversity uplifting. In addition, the project team is engaged with the World Economic Forum that is developing a Frontrunners Coalition to participate in the first-ever pilot biodiversity credit auction.

The Maasai Mara is one of the most biologically diverse areas in the world, especially when it comes to mega-fauna and grazing animals. It would serve as an ideal large-scale pilot for biodiversity credits, particularly if delivering a biodiversity upliftment. An estimate of USD 7/ha / a has been used in our modeling – equivalent to the carbon net benefit. However, this contribution to financial sustainability is less certain than the carbon financing one.

ANNEX 5: FINANCIAL MODELLING

MODEL MECHANICS AND KEY ASSUMPTIONS

CRLF's main incomes stem from:

1. Initial non-repayable grant revenue;
2. Revenue earned via interest on capital deployed, net of credit losses assumed; and
3. Interest received on excess cash invested in money market funds.

Main costs, excluding technical assistance which has not been included, consist of:

1. Financing costs, including interest expense and incentives payable to subordinated lenders (concessional and commercial); and
2. Fund manager fees.

Fundamental assumptions are included in Table 1 below:

Table 1: Key assumptions

Category	Dimension	Description
Instrument capital structure	Non-repayable Grants	Grants are used for two purposes: <ul style="list-style-type: none"> - to write first microloans and set-up fund - to serve as first loss capital and prove the credit concepts.
	Commercial Senior Debt	Commercial senior debt mobilized in the local Kenyan market, enabled by credit guarantee with the possibility of capital recycling via OTC securitization or a warehouse facility transaction
	Concessional Debt	Funding from philanthropies and development finance institutions at concessional interest rates
	Private Junior Debt	Private investors receive an incentive at debt redemption as compensation for higher risk.
Income structure	Interest on MSME Finance	Primary revenue stream from offering lease-backed loans to landowner MSMEs to promote conservation practices
	Interest on Venture Finance	Secondary revenue stream from offering venture debt to Landscape Management Companies (LMCs) to improve sustainability
	Grants	Non-repayable grant funding recognized as other income in the early years
	Interest on Positive Cash Balances	Interest earned on excess cash via treasury strategies, enabled by mobilization of grant funding in the early years
Credit losses	Default rate	Assumed at different rates on MSME and Venture financing products based on their respective credit risk profiles
Cost structure	Interest on debt funding	Interest on the various sources of debt funding as described above are repaid according to the respective terms and conditions
	Investment incentives	Payable to selected debt investors at maturity as compensation for risk
	Fund Management Fee Structure	Flat fee calculated as a percentage of assets under management per facility product

SCENARIO MODELLING

To understand CRLF's capital needs and its long-term financial viability, two growth pathways were modeled. These tested the sensitivity of the viability of the Instrument to both favorable and less favorable market conditions. See Table 2 for a summary of key scenario parameterization assumptions.

In the Baseline (Moderate) scenario, MSME loans and venture debt will be offered at two sites, with the first site being the Northern Mara ecosystem. USD 10m debt will be deployed to two Land Management Companies as venture debt with USD 6.3m disbursed to 3,200 MSME landowners (USD 6.3m). Total initial capitalization amounts to USD 9.75m (excl. the USD 2m TA facility), with gearing levels approaching 70% by Y6. Retained earnings build up to USD 1.5m by Y10, facilitating further commercial and developmental capital mobilization for a third site.

In contrast, the Low scenario assumes that MSME loan products and venture debt will be offered only to conservancies in the Northern Mara district. Deployment drops to USD 9.2m, with USD 5m advanced to one Land Management Company as venture debt and USD 4.2m across 1,660 MSME landowners. Total capitalization amounts to USD 5.3m (excl. the TA facility of USD 1m), with gearing levels reaching 75% by Y6. Retained earnings reach USD 0.9m by Y10.

Table 2: Scenario Modeling Assumptions

Variable	Baseline	Low
Total MSME capital deployed (USD)	\$6,311,597	\$ 4,197,691
Interest rate on debt facilities (% , USD equivalent):		
- 5yr microloan product	22.5%	20.0%
- 8yr microloan product	17.5%	15.0%
Tenor (years)	5/ 8yrs	
Credit loss rate (%)	10%	15%
Total Venture Debt capital deployed (USD)	\$10,000,000	\$5,000,000
Interest rate on debt facilities (%)	5%	4%
Tenor (years)	8yrs	
Credit loss rate (%)	10%	15%
Total Grant Funding (USD)	\$1,500,000	\$1,200,000
Commercial Senior Debt Funding (USD equivalent)	\$1,950,000	\$750,000
Interest rate (% , USD equivalent)	10%	
Tenor	5yrs	
Concessional Debt Funding (USD)	\$5,800,000	\$ 2,850,000
Interest rate (%)	3%	
Incentive payable on maturity (% , compound)	3%	
Tenor	8yrs	
Commercial Junior Debt Funding (USD equivalent)	\$500,000	
Incentive payable on maturity (% , compound)	10%	5%
Tenor	9yrs	
Fund management fee (%)	3.5%	4%

KEY MODELLING RESULTS

CRLF is expected to be financially viable in terms of operating profitability as of the first year of operations in both the Base and Low scenarios modeled. This can be seen in Figure 1 below, showing high net profitability in the initial years based on grant funding recognized as revenue. This initial funding covers instrument set-up costs and funds initial microfinance loans and avoids the need for debt to cover early losses. This also contributes significantly to the operating profit position from the onset.

Figure 1: Cumulative Retained Earnings, Baseline vs. Low Scenario (USD)

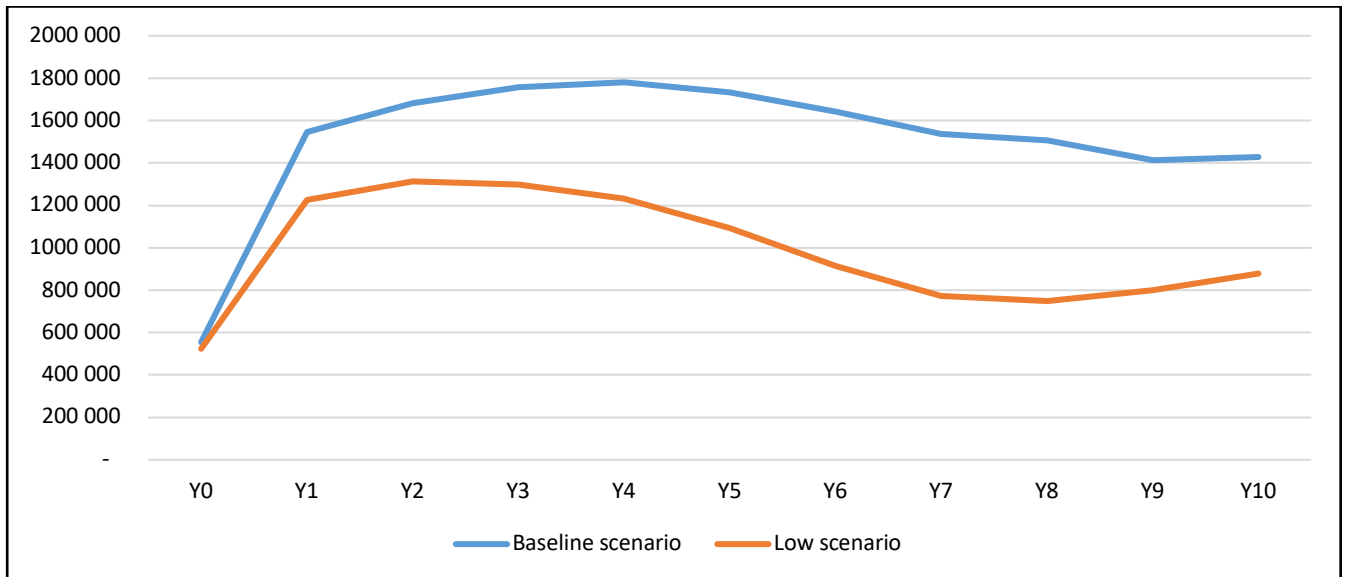


Figure 2 below shows the contributions to CRLF's capital structure to achieve these results for the baseline scenario. Grants comprise only 15% of capital and the instrument is no longer reliant on this source of funding after Y2. The WACC excluding the non-repayable grants is 6.6% over the 10-year period. Senior commercial debt is mobilized.

Figure 2: CRLF Capita Mobilization – Baseline Scenario (Annual Draws, USD)

