

ANNEX I: Mid-term goals: resourcing scenarios, assumptions and trade-offs

1. This Annex sets out scenarios and analysis designed to inform the Board's further deliberations on the mid-term goals in DRF.02 of the update of the Green Climate Fund Strategic Plan 2024-2027. Responding to requests received from Board members on DRF.01, it elaborates:
 - (a) resourcing scenarios for 2024-2027, based on 'status quo' (USD 10 billion), 'mid' (USD 12.5 billion) and 'high' (USD 15 billion) overall resourcing for 2024-2027 (**Table A**);
 - (b) potential programming resource allocations across each of the five DRF.02 strategic programming objectives and sub-goal areas, in the status quo, mid and high scenarios (**Table A**);
 - (c) logic for setting mid-term goals and target levels, based on the proposed resourcing scenarios and programming allocations, with underlying assumptions and feasibility analysis (**Tables B1 – B5**).
2. The Annex sets out a series of proposals for testing to allow the Board to explore the results implications of different resourcing and programming scenarios and engage with trade-offs. The Secretariat will be able to show the effects of adjustments to the scenarios and assumptions through a dynamic model as the Board progresses its deliberations. The initially proposed programming resource allocations have been constructed as follows (*all figures are approximations for illustrative purposes*):
 - (a) **All scenarios account for fund operating costs**, covering administrative budgets, risk buffer and AE fees. AE fees are calculated at an average 5% of funding proposal programming. Administrative budget is assumed to be relatively flat in the status quo and mid scenario, but increases in the high scenario due to the significant extra programming effort implied.
 - (b) **Resourcing for Objective 1** is based on preliminary estimates for the Readiness Programme and Project Preparation Facility, to be revised as these papers are considered by the Board. The scaling in mid and high scenarios principally reflects the additional DAE and project development support that would be called upon in the higher programming scenarios;
 - (c) **In the status quo scenario**, the programming resource allocations for Objectives 2 to 5 are based on analysis of 'maturing pipeline': that is, project ideas that have received concept endorsement, are accessing PPF, under active origination or in interdivisional or later stages of review. In the status quo scenario, the maturing pipeline could absorb the bulk of available resources. This implies significant trade-offs would exist to address new programming or shifts in programming focus, and clear prioritization criteria needed for pipeline management;
 - (d) **In the mid scenario**, the programming resource allocations across Objectives 2 to 5 have been augmented to partially relieve trade-offs. More funding is available across all objectives but particularly for: (i) CIEWS, allowing GCF to increase its contribution to action to deliver universal early warning systems protection in the next 5 years in line with the EWS4ALL goal; (ii) Objective 4 to allow more headroom for new country-driven sectoral programming, giving relatively stronger emphasis to food systems and ecosystems transitions, in conjunction with delivering a further phase of REDD+ results based payments and stronger focus on nature-based solutions. These also reflect areas that could be augmented with a relatively lower call on GCF capacity;
 - (e) **In the high scenario**, trade-offs are further eased by additional allocations across all objectives, but with a stronger focus on Objectives 2, 3, 5. This would allow GCF to become more involved in emerging programming areas such as innovation and helping countries green financial systems, as well as in areas that would require substantial new pipeline origination, such as devolved financing for locally led action. The potential to act as a convenor under Objective 4, funding at larger ticket sizes, could also increase the fund's catalytic impact and deliver relatively greater results per GCF dollar.

Table A: Resourcing scenarios and indicative programming resourcing allocations to the five strategic objectives (Figures in USD millions)

			Status quo \$ 10 billion		Mid \$ 12.5 billion		High \$ 15 billion		
Objectives		Portfolio baseline ¹	Pipeline ²	2024-27 allocation	% FP resourcing	2024-27 allocation	% FP resourcing	2024-27 allocation	% FP resourcing
	Administration	1,312	NA	1,100	-	1,200	-	1,400	-
O1	Investment capacity	661	NA	550	-	575	-	600	-
O2	Innovation	2%	6.5%	585	7%	735	7%	1,030	8%
O3	Adaptation for most vulnerable	4.5%	13%	1,170	14%	1,745	16%	2,245	17%
O4	Systems transition	83%	73%	5,595	67%	6,845	64%	7,725	59%
	4.1 Energy transition	40%	21%	1,510	18%	1,710	16%	1,885	15%
	4.2 Ecosystems transition	17%	16%	1,455 ³	17%	1,855	17%	2,105	16%
	4.3 Food transition	11.5%	19%	1,400	17%	1,800	17%	2,050	16%
	4.4 Infrastructure transition	14.5%	16%	1,230	15%	1,480	14%	1,635	13%
O5	Greening finance	10.5%	8%	1,000	12%	1,400	13%	2,000	15%
TOTAL				\$ 10,000		\$ 12,500		\$ 15,000	

¹ Portfolio baseline reflects cumulative figures covering IRM and GCF-1 to date. For modelling, portfolio and pipeline have been tagged based on the primary objective to which an FP contributes, but in practice an FP may contribute to more than one objective. Accordingly the above results should be treated as indicative for modelling purposes only.

² For PSF pipeline typically only extends for 12-18 months, accordingly to reach the status quo allocations pipeline figures have also been extrapolated using portfolio trends.

³ Ecosystems transition is increased relative to other Objective 4 transitions to allow headroom for second phase of REDD+ results based payments.

Table B1: 2027 goals analysis – Objective 1

Objective 1: Strengthening country capacity for climate investment

NDCs and global context: Almost three quarters of countries identified capacity-building as a prerequisite for implementation of their NDCs. These included capacity building for formulating policy, integrating mitigation and adaptation into sectoral planning processes, accessing finance and providing the information necessary for clarity, transparency and understanding of NDCs. Compared with previous NDCs, more countries listed capacity-building needs specific for adaptation.

Targeted result	2027 goal	Baseline	Metric	Target in each resourcing scenario			Results measurement	Assumptions
				Low	Mid	High		
				\$550	\$575	\$600		
1A: Strengthening developing country capacities and enabling environments for systemic, country-driven climate investment planning	# countries able to develop integrated climate investment plans	44 GCF country programmes completed to date, but learning still needed to translate NDCs into integrated investment plans	Simple count by # countries	50			RPSP outcome 2.1, measured via Readiness Results Management Framework	Assumes translation of NDCs/NAPs/LTS into integrated investment plans can be accelerated through update to RPSP strategy and modalities, improved investment planning guidance, qualified technical support, and more flexible and dynamic GCF approach to country programming. Also assumes results not linked to resourcing scale but driven by country uptake.
1B: Strengthening direct access entity programming capacities to enable significantly increased participation in GCF programming	# DAEs with approved GCF funding proposals	29 DAEs with approved FPs	Simple count by # DAEs	58 (doubling)			Simple count using portfolio data	There are 43 accredited DAEs that have not yet programmed with GCF, of which 39 have active CN/PPF/FPs. Reaching this goal would require 6-7 new DAEs to have FPs approved per year. This assumes strengthened capacity and project development support via more tailored RPSP and PPF modalities, and enhanced efforts by GCF to support DAE programming are effective with high partner uptake. There are potential trade-offs in that targeting a higher number of new DAEs programming may lower the overall share of funding channeled through DAEs, as first-time DAEs may begin programming at smaller scale.
	Key enablers	As elaborated under Objective 1 of DRF.02, including: <ul style="list-style-type: none"> • Update to the Readiness and Preparatory Support Programme strategy and modalities, with predictable funding secured • Enhancing GCF technical support, guidance, tools on investment planning, climate assessments, and DAE programming • Updating GCF country ownership guidelines and approach to country programming • Enhancing GCF internal capacity and skills to support key activities, and identifying and training qualified delivery partners • Exploring feasibility of GCF regional presence to bring GCF closer to developing countries and local conditions 						

Table B2: 2027 goals analysis – Objective 2

GCF Strategic Objective 2: Accelerating innovation of new climate solutions

NDCs and global context: Around 30% of countries included information related to technology innovation and research and development in their NDCs. 37% of identified measures were multisectoral, followed by 15% in agriculture. According to the UNFCCC, of the 70 estimated climate technology incubators and accelerators, only 25 are in developing countries.

Targeted result	2027 goal	Baseline	Metric	GCF-2 Objective-level resourcing (million USD) Low \$585, Mid \$735, High \$1,030			Results measurement	Assumptions	
				Goal-level \$	# FPs	Target			
2A: Incubating and accelerating emerging climate technologies, and inclusive innovation based on local and traditional knowledge	# new incubators or accelerators established for key regions	3, through two FPs	Average 2 incubators/ accelerators/FP	L	\$200	6	11	Additional FP tagging needed to measure incubators/ accelerators GHG – IRMF core 1 Beneficiaries – IRMF core 2 & supplementary 2.5	Based on portfolio and pipeline data, one FP may support 2 to 6 incubators or accelerators with diverse regional coverage. Assumes use of an RfP to generate expanded pipeline, particularly for regions not covered by current pipeline. Use of incubator/ accelerator metric is proposed based on COP guidance, GCF does not otherwise have an aggregable technology or innovation metric.
			Average FP \$35m GCF, 1:2 co-finance	M	\$250	7	14		
				H	\$350	10	20		
	Inclusive finance innovation	Two FPs	Average FP \$15-20m GCF	L	\$85	6	Not factored into goal calculation	As above for GHG and beneficiaries	
	M	\$85	6						
	H	\$180	9						
2B: Establishing proof of concept for new business models and instruments, particularly for adaptation	# start-ups and MSMEs with enhanced access to seed or early-stage capital	200+, through three FPs	Average 100 startups/MSMEs per FP	L	\$300	8	750	Additional FP tagging required to measure startups/MSMEs GHG – IRMF core 1 Beneficiaries – IRMF core 2 & supplementary 2.5	Based on portfolio and pipeline data, one early-stage growth mechanism may support dozens of MSMEs and one incubator/accelerator over 100 startups/MSMEs. Assumes active PSF engagement to mature current pipeline in line with the private sector strategy, focused on business models for adaptation, nature-based solutions & universal energy access. Also assumes increased uptake by AEs or securing new partners with relevant delivery capabilities.
			Average FP \$40m GCF, 1:2 co-finance	M	\$400	10	1000		
				H	\$500	13	1250		
	Key enablers	As elaborated under Objective 2 of DRF.02, including: <ul style="list-style-type: none"> • Launch of RfP for technology incubators and accelerators, with availability of PSAA for non-AE partners • Launch of RfP or other dedicated pipeline development for inclusive financing innovation, including based on local & traditional knowledge • Focused partner engagement and project development to mature pipeline for seed and early stage capital, based on private sector strategy • Collaboration with range of partners engaged in earlier stages of innovation cycle to identify ideas with potential for scaling • Fully capacitated PSF 							

Table B3: 2027 goals analysis – Objective 3

GCF Strategic Objective 3: Building resilience to urgent climate threats

NDCs and global context: Of adaptation components in NDCs, 55% described measures for enhancing EWS and disaster risk management. 30% of countries with an adaptation component described the role of indigenous peoples and local communities in climate action. The IPCC estimates that 3.3-3.6 billion people (over 40% of the world’s population) are highly vulnerable to climate change because of the location and circumstances in which they live, with the most significant gaps in SIDS, LDCs and Africa. The Sharm El Sheikh Adaptation Agenda set a goal to enhance resilience for 4 billion people living in the most climate vulnerable communities by 2030; the UN Secretary General / WMO have set a goal to ensure every person on earth is protected by early warning systems within five years (2027) for targeted investments of USD 3.1 billion.

Targeted result	2027 goal	Baseline	Metric	GCF-2 Objective-level resourcing (million USD) Low \$1,169, Mid \$1,744, High \$2,244			Results measurement	Assumptions	
				Goal-level \$	# FPs	Target			
3A: Rapidly expanding coverage of climate information and early warning systems, and supporting integrated risk management approaches	# countries (SIDS/LDCS/ Africa) protected by new or improved CIEWS	72 countries	\$10-17m per country from GCF Average 1 : 0.75 co-finance	L	\$500	17	50	Countries - count using portfolio data Beneficiaries – IRMF core 2 & supp. 2.4 & 2.7	Assumes GCF will aim to make a significant contribution to the UN EWS for all goal. In a lower resource scenario GCF would strive to deliver minimum coverage for all lacking it; higher scenarios would allow more sophisticated interventions in target countries. Assumes delivery through a mix of replicable SAP fast-tracking packages and multi-country/regional FPs (NB in mid/high scenario)
				M	\$1,000	20	60		
				H	\$1,000	20	60		
	Integrated risk management and social protection	Five FPs	Average FP \$30m GCF	L	\$269	9	Not factored into goal calculation	Beneficiaries – IRMF core 2 & 3 and supp. 2.1, 2.7, 3.1	
				M	\$344	11			
				H	\$444	15			
3B: Scaling-up locally led adaptation action through devolved financing to increase resilience of the most vulnerable people and communities	# countries (SIDS/LDCS/ Africa) with vulnerable communities accessing devolved financing for locally-led adaptation	7 countries	\$20m per country from GCF	L	\$400	20	20	Countries – count using portfolio data Beneficiaries – IRMF core 2 and supp. 2.1 & 2.5	Assumes SAP-size single-country FPs continue to be the main channel for programming, through both DAEs/ EDA and IAEs with scope for on-granting. Also assumes increased GCF capacity for concerted origination efforts to replicate successes, and willingness for uptake by qualified AE partners with relevant accreditation scope and deep local knowledge.
				M	\$400	20	20		
				H	\$800	40	40		
	Key enablers	As elaborated under Objective 3 of DRF.02, including: <ul style="list-style-type: none"> Ability to effectively deploy SAP and SAP/EDA as a fast-tracking mechanism to rapidly replicate proven models Focused project development with AE partners to deploy part of programming at scale through multi-country/regional initiatives Collaboration with peer funds, community-led programmes, local and indigenous actors to source and expand pipeline of locally-led action Additional GCF capacity to support significant new origination in the high scenario 							

Table B4: 2027 goals analysis – Objective 4

GCF Strategic Objective 4: Forging coalitions for financing just systems transitions

NDCs and global context – Energy transition: 92% of countries NDCs include energy supply as a priority for mitigation; 44% also highlight the importance of adaptation in the energy sector. These countries identified 781 energy sector needs (costed USD 640B); 91 needs on industry (costed USD 218B) and 253 needs on transportation (costed USD 1016B).

UN/IEA/IRENA/UNFCCC Marrakech Partnership Climate Action Pathway identify the following energy transition goals: reaching a global share of at least 60% zero-carbon energy in electricity generation; universal access to clean energy; 50% electrification of end use sectors; and accelerated decarbonization of hard-to-abate sectors by 2030.

NDCs and global context – Infrastructure transition: 55% of countries NDCs identified infrastructure as a priority for adaptation. Countries identified a total of 162 needs for buildings and infrastructure, two thirds of which were for adaptation purposes (costed USD 20.5B). SDG9 sets out a goal of facilitating sustainable and resilient infrastructure.

NDCs and global context – Food systems transition: 77% of countries’ NDCs identify agriculture as a priority for mitigation and 84% for adaptation. 86% prioritized measures for adapting food systems and ensuring food security. Countries identified a total of 603 needs on agriculture (costed USD 114B). SDG2/Food systems summit/Sharm El Sheikh Adaptation Agenda set goals to: ensure sustainable food production, implement resilient agricultural practices, and boost nature positive production to increase yields by 17%, reduce emissions from agricultural production by 22% and improve livelihoods of smallholder farmers.

NDCs and global context - Ecosystems transition: 80% of countries identified LULUCF as a priority for mitigation as well as adaptation. 149 needs were identified for adaptation on ecosystems and biodiversity (costed USD 48B). Countries identified 346 needs on forestry, the majority for mitigation (costed USD 52B). The Kunming-Montreal Global Biodiversity Framework set 2030 goals of achieving effective conservation and management of at least 30% of the world’s lands/inland waters/coastal areas/oceans; restoration on at least 30% of degraded ecosystems; and reducing to near zero loss of areas of high biodiversity importance.

Targeted result	2027 goal	Baseline	Metric	GCF-2 Objective-level resourcing (million USD) Low \$5,595, Mid \$6,845, High \$7,725			Results measurement	Assumptions	
				Goal-level \$	# FPs	Target			
4A: Advancing high-impact, cross-cutting, country-led initiatives across key sector or system transitions through co-investment collaborations &	# countries supported to advance just energy transitions, through (i) energy access (ii) new markets for RE/ electrification (iii) novel solutions for hard-to-abate sectors	100 countries	Average \$250m per country total, \$35-50m from GCF	L	\$1,510	17	32	Countries – count using portfolio data	Covers energy and energy end-use sectors (transport, industry etc). Assumes large pipeline can be actively managed, with GCF focus on areas of most value-add (eg energy access, de-risk demonstration projects, market creation). Also assumes higher mobilization in mid/high scenario via more multi-country deals at scale. Country metric used as results not all aggregable given different country needs.
				M	\$1,710	18	44	GHG – IRMF core 1	
				H	\$1,885	19	53	Energy – IRMF supp. 1.1-1.5	
	# countries securing critical infrastructure, through systemic resilience planning and sustainable resilient infrastructure investments, drawing on nature based solutions	78	Average co-finance 1:4 to 1:6 depending on ticket sizes	L	\$1,230	17	44	Beneficiaries – IRMF core 2	
				M	\$1,480	21	52	Countries – count using portfolio data	
				H	\$1,685	24	58	GHG – IRMF core 1	
			Average 2 countries per FP and 10 through readiness					Beneficiaries – IRMF core 2 & supp. 2.3 & 2.6	
			Average FP 70-80m GCF, co-finance 1:2.5					Asset value – IRMF core 3 & supp. 3.1	

4B: Deploying blended finance to de-risk private sector investment at scale in new asset classes or markets for climate goods and services	# smallholders (millions) helped to adopt low-emission, climate-resilient agricultural and fisheries practices	31 million smallholder households / 141 million beneficiaries	\$26 per smallholder household average 4.5 beneficiaries/ household Average FP 55-65m GCF, co-finance 1:1.5	L	\$1,400	25	54	Beneficiaries – IRMF core 2 & supp. 2.1 & 2.2, aggregated to smallholder level GHG – IRMF core 1	Assumes food systems programming continues to grow to a larger share of GCF programming, including for PSF. Assumes FPs scale to materially larger average size than IRM/GCF-1, steady efficiency increases in impact delivery and that GCF can partner with a wider range of entities able to program at scale. Metric chosen as 90% of interventions under all sector pathways contribute to this goal, with pipeline emphasis on promoting resilient agro-ecology and reconfiguring food systems.
				M	\$1,700	30	65		
				H	\$1,950	32	75		
	# million hectares of terrestrial and marine areas conserved, restored or brought under sustainable management	39 million hectares ¹ - 13 Mha restored and 26Mha under improved management	\$25/ha for conservation, \$100-1500/ha restoration, \$12/ha sustainable management Average FP 55-65m GCF, 1:1 co-finance	L	\$1,255	26	100	Hectares – IRMF core 4 & supp 4.1-4.3 GHG – IRMF core 1 Beneficiaries – IRMF core 2	Assumes ecosystems & forests results areas continue to grow to a larger share of GCF programming, reflecting emphasis on nature-based solutions and biodiversity co-benefits. Assumes ecosystems FPs scale to materially larger average size than IRM/GCF-1, and that GCF can partner wider a wider range of entities who can program at scale, including opening opportunities for private sector. Cost per hectare metrics based on global benchmarks.
				M	\$1,455	30	115		
				H	\$1,705	32	135		
	REDD+ results based payments	USD 500m at \$5/tonne	TBD as part of Phase 2	L	\$200	TBD	Based on RfP	Indicators per REDD+ framework	Assumes use of RfP for REDD+ RBP Phase 2. Projected tonnes of results based payments would be based on price agreed for Phase 2.
				M	\$500	TBD	Based on RfP		
				H	\$500	TBD	Based on RfP		
		Key enablers	<p>As elaborated under Objective 4 of DRF.02, including:</p> <ul style="list-style-type: none"> Active programming engagement with AEs to manage over- and under-subscribed areas of sectoral/system transition programming, targeting more programming through DAEs, countries without GCF FPs, and highest impact potential GCF efforts to build collaborations between public and private sector partners to finance developing countries programming priorities, including ability to act as convener through ticket sizes at sufficient scale, and helping to attract co-investors to close Launch of RfP for second phase of REDD+ results based payments Uptake of RPSP and technical support to support systemic infrastructure resilience planning and test asset repricing approaches Full use of GCF's flexible and de-risking instruments, including local currency financing Building awareness of opportunities to design for paradigm shift and just systems transition 						

¹ The Secretariat has assessed that results to date have likely been under-reported due to lack of capacity and expected to improve through iRMF roll-out and enhanced support under O1.

Table B5: 2027 goals analysis – Objective 5

GCF Strategic Objective 5: Helping countries green financial systems

NDCs and global context: IPCC estimates global climate finance needs amount to USD 1.6-3.8 trillion annually through to 2050 for mitigation, and an additional USD 140-300 billion annually for adaptation. Analysis by the UNFCCC Standing Committee on Finance notes that as at 31 May 2021, NDCs from 153 Parties included 4,274 needs, with 1,782 costed needs identified across 78 NDCs, cumulatively amounting to USD 5.8-5.9 trillion up to 2030. Of this amount, USD 502 billion is identified as needs requiring international sources of finance, USD 112 billion as sourced from domestic finance, and 89% providing no information on possible sources of finance. 2020 data reported 12 countries with operational green banks (3 developing) and 24 countries actively exploring green banks (20 developing).

Targeted result	2027 goal	Baseline	Metric	GCF-2 Objective-level resourcing (million USD) Low \$1,000, Mid \$1,400, High \$2,000			Results measurement	Assumptions	
				Goal-level \$	# FPs	Target			
5A: Supporting developing country financial institutions to expand access to green finance, including by deepening financial and capital markets & 5B: Helping national and regional financial institutions build capacity, as requested, to mainstream climate into their investment operations	# green financing institutions established	3, plus more supported at development phase by RPSP	One green financing institution per FP	L	\$200	3	3	Additional FP tagging needed to measure new green finance institutions GHG – IRMF core 1 Beneficiaries – IRMF core 2	Covers green banks, facilities and other climate financial market infrastructure and institutions. Assumes use of RPSP support for preparatory work on new green institutions (including green banks) maturing into FP development with qualified AE partners.
				M	\$300	5	5		
				H	\$400	7	7		
	# local financial institutions engaged to expand access to green finance and deepen domestic financial and capital markets	122 LFIs against O5. 325 LFIs total across O4&O5	\$10 million per LFI	L	\$800	7	80	Additional FP tagging needed to new green finance institutions GHG – IRMF core 1 Beneficiaries – IRMF core 2	Covers proposals whose <i>primary</i> objective is creating new green loans for on-lending by LFIs/local intermediaries through blending GCF concessional finance, and proposals where GCF funds are used to guarantee or otherwise de-risk LFIs lending or fundraising. GCF also engages LFIs through many FPs under Objective 4, where credit lines/blended loans are used to finance sectoral/system transition strategies. Assumes ability to mature and grow pipeline through engagement with AE banks, including DAE banks, as part of private sector strategy
				M	\$1,100	10	110		
				H	\$1,600	14	160		
	Key enablers	As elaborated under Objective 5 of DRF.02, including: <ul style="list-style-type: none"> • Uptake of RPSP for work on greening finance through qualified technical partners, and maturation of current RPSP support into investment FPs • Programming engagement with AE banks operating as lenders for LFIs, including DAE public and development banks • Interest and uptake from developing country governments and institutions in mainstreaming climate more widely in operations, including developing frameworks and methodologies for greening finance • PSF capacitated to deliver private sector strategy, engaging qualified technical partners in delivery 							