Update on the ISA Global Solar Facility

Summary

This working document contains an update on the technical work undertaken by the ISA Secretariat in operationalising the Global Solar Facility.
Update on the ISA Global Solar Facility

A. Background

1. The Fourth Session of the International Solar Alliance (ISA) Assembly held on 20 October 2021 approved the formation of a Blended Finance Risk Mitigation Facility (hereafter referred to as the Global Solar Facility) to mobilise investments to scale up solar, with a dedicated initial focus on the African region and a potential to expand the scope and coverage to other regions of the ISA. The Solar Facility will be a financing vehicle for the African countries for crowding in investments in the solar sector by providing risk mitigation support.

2. The Solar Facility was approved during the Fifth Session of the ISA Assembly on 18 October 2022. The ISA announced the Solar facility on 8 November 2022 at the ISA Pavilion in UNFCCC CoP27 in Sharm El-Sheikh, Egypt. Additionally, the Fifth Session of the Assembly had considered and approved the hiring of a fund manager, collaboration with an international organisation (World bank group- MIGA) to assist the ISA in designing the solar insurance fund, a budget of USD 2 million for operationalising the funds, and secure in-principle commitments for the Facility during 2023 and 2024, under Agenda item 22 contained in the working document ISA/A.05/WD.13.

B. Structure & Methodology

1. The solar facility will stimulate high potential solar technologies by attracting private capital to flow into underserved markets in Africa while ensuring a payment and insurance mechanism as a first loss guarantee as approved by the Fifth Session of the ISA Assembly. The Solar Facility would be operationalised to crowd in investments from various donors across the globe. The solar facility will consist of three funds (the payment guarantee fund, the insurance fund and the investment fund). Projects proposed in Africa could purchase payment guarantees or partial insurance premia from these funds. Annexures I to III, approved by the Fifth Session of the ISA Assembly, provides the details of the facility.

C. Action undertaken by the ISA Secretariat

Following the approval of the facility at the Fifth Session of the ISA Assembly, the ISA Secretariat has undertaken the following activities:

1. Appointed Edhina Capital Advisors LLP following the ISA procurement policies to operationalise and structure the solar facility. The selected firm will assist in drafting the Terms of Reference (ToRs) for hiring a fund manager, selecting a feasible location for legally registering the fund, and assisting in ongoing roundtable discussions to tap into investors for the Solar facility.
2. Announced the facility at a high-level event at COP27 to gauge and establish investors’ appetite for the facility. High-level representatives from MIGA, GCF, French Government, World Bank, and IFC participated and positively contributed.

3. Developed and formalized the final structure of the Global Solar Facility (USD 200M) with a parentco and regional facility structures. The facility will be a USD 200M structure to begin with, and 3 funds (payment guarantee, investment and insurance funds - Annexure II)

4. Held multiple hybrid and in-person discussions with potential investor groups, including the EIB, MIGA group, WB and the pension funds from the Nordics, including Norad, PK Denmark, and Africa 50 in Q1 and Q2 (investors from Copenhagen, Oslo and Stockholm joining the roundtables).

5. Signed an MoU with Multilateral Investment Guarantee agency (MIGA) of the World Bank during the G20 meeting in Goa, India in July 2023. MIGA and ISA have zeroed in the first pilot project to be undertaken as a part of the GSF, to be implemented in 2024.

6. Held an FAQ session (virtual workshop) with potential Investment Managers on September 11, 2023, as the Secretariat looks forward to releasing the Request for Proposal (RfP) for hiring the Investment Manager to manage the facility. The Investment Manager will play a pivotal role in the facility’s management, fundraising, financial capitalization efforts, deployment of funds, and providing oversight of its assets.

7. Socialized the Global Solar Facility at the regional committee meetings of the ISA (Europe, Asian and African) and seeked commitments from various governments of countries and philanthropies.

8. Zeroed in the first buy-in of the GSF by getting in-principal commitments of USD 25M from Government of India. ISA seeks approval to invest in USD 5M in the GSF and is in talks with Bloomberg Philanthropies and GEAPP to invest to the likes of about USD 10-15M in the facility.

D. **Next Steps:**

1. Seek approval of ISA’s assembly for ISA’s contribution to the facility of USD 5M to roll out the facility.

2. Announce government, philanthropic and investor contributions to the facility at CoP28 to roll out the first pilot project under the Global Solar Facility including contributor-announcements and pledges to the facility

3. For successfully operationalising the Solar facility, the ISA secretariat would be undertaking the following activities:

   3.1. Engage a commercial private fund manager(s) following the ISA procurement policies for managing & socialising the facility to mobilise resources to scale up solar investments in emerging geographies beginning with Africa
3.2. Raise finances from countries, philanthropies and investors alike to propel the facility forward (The facility would be rolling out the first pilot project in 2024 along with MIGA in Africa- the project has been identified)

3.3. Register and housing of the Solar Facility Fund in 2024

3.4. Submit the Proposal to GCF- Submission of a full-fledged proposal to the Green Climate Fund for locking in USD 100M fund for the facility in Q4 2023.

The ISA Assembly is requested to consider the update on the Solar Facility and provide guidance thereon.

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Why this facility?

The Global Solar Facility aims to be agile and play the role of helping enhance investment capacity in markets. To manage its various activities, the GSF will have a “ParentCo” – comprised of a team of professionals headed by a competitively selected CEO. ParentCo will have oversight and visibility across regional facilities. ParentCo will raise permanent capital from public investors and donors. This capital will be used as anchor and junior capital for each of the facilities that the GSF launches.

In 2022, USD 308 billion was invested in solar energy globally, however less than 1% investments went to the African continent for solar (about 1.5-2 billion in 2022). The GSF aims to scale investments in solar by deploying its risk mitigation products (guarantees, risk sharing and/or first loss arrangements, and insurance) and equity / quasi-equity investments and leverage its capital to crowd in commercial capital given the de-risking that the GSF’s products are expected to provide.

The GSF will create scale at three levels:

a) Capacity Building – enhance the regulatory environment for solar through technical assistance and working with regional investment managers and project developers in aiding in developing the local markets and enhancing on ground capability.

b) Unlocking financing – provide a small portion of project cost and pool in investments from various donors and countries alike.

c) Replicability – the GSF’s interventions will help create a track-record for investing in solar projects across markets and demystify perceived risks in some markets.

Through its interventions and products, the GSF’s key objectives over the next 5 years include:

a) Help develop robust regulatory frameworks for solar projects across at least [five] countries

b) Help install [2]GW of solar energy across the world

c) Mobilize [5-7]x capital on the basis of the GSF’s investments

d) Enable access to energy to [~10] million people across the world

e) Help avoid [3 million] tonnes of CO2 emission p.a. through installation of solar energy across the world.

The GSF is intended to be a global facility with regional facilities planned for Africa, Asia, Middle East, Latin America etc., run by local investment managers. The GSF will prioritize low-income countries and distributed solar projects to achieve maximum impact through capital deployed. It is important for the facility to begin in the regions with the largest need. Africa has the highest potential of solar energy, yet it accounts for only close to 1.3% of global installed solar capacity, at 11.4 GW in 2021 v/s global total of 849 GW. On the other hand, Africa has nearly 600 million people without access to electricity, making a strong case for distributed solar. Therefore, ISA proposes to commence GSF facilities from Africa. Thereafter, GSF will be rolled out across the globe in other regions, such as Latin America, Middle East, Asia etc. The Regional Facilities (RFs) will be customized to suit the needs of each region. GSF will invest in newer technologies that enhance efficiency of solar energy, start-ups that enable faster implementation of solar energy and other emerging areas of solar energy. In long term it can also support cutting edge research for solar energy across the world.
Why Africa?

Africa is home to over 1.4 billion people, with 600 million people lacking access to electricity\(^1\). Electricity access is poor which is evident from the annual per capita electricity consumption of various nations in the African continent. The per capita electricity consumption is as low as 21 kWh for Somalia, Chad, and Guinea Bissau, while it ranges between 60-80 kWh for the countries such as Rwanda, Ethiopia, and Uganda\(^3\). This is significantly lower than the basic electricity needs of 300 kWh per person per annum that would enable running basic appliances, such as a fan, a shared refrigerator, or a television\(^4\). Power shortages cost the continent about 2% – 4% of GDP a year\(^5\).

The African continent will need to double its capacity to 497 GW between now and 2030 to meet the rising electricity demand. The current power generation mix in Africa is based mostly on coal, oil, and traditional biomass. As such, meeting the rising demand with current sources would have serious repercussions on health and the environment.

Solar and wind power offer the most viable alternatives, with prices now less than that of power desired from fossil fuels. In addition, conditions are favorable for the generation of electricity from solar energy in the African continent, where sunshine is not only abundant but also much more reliable than elsewhere. Yet, the continent accounts for a meager 1% or 12.4 GW of global solar energy production.

![Solarization Potential for Africa](image)

Solar power developers are currently under-represented in Africa because of perception of high risk. Securitisation is therefore essential. In order to enable the flow of finance for solar projects in African countries, ISA puts forward a design and management structure for a risk mitigation facility for solar projects.
as a part of its mandate to scale up solar solutions in developing nations and mobilise required investment for the said purpose.

Stakeholder analysis

The ISA Secretariat, with the support of consultants, has conducted stakeholder consultations with 100+ stakeholders in Africa. In-depth consultations were also conducted, together with Aavishkar, with relevant investors across Africa including Sunfunder; Triple Jump; CrossBoundary; Green Max Capital Advisors; Symbiotics; African Infrastructure Investment Managers (AIIM); Nordics Impact Funds; Lion’s Head Global Partners (LHGP); CAMCO; KawiSafi; SIMA; Acumen; Africa50; Macquarie Group; ALL On; Oikocredit and IFU.

The focus, design, and investment strategy of the Facility was informed through 180+ stakeholder conversations (Enterprises, DFIs, Regulators, Investors) held across Africa

<table>
<thead>
<tr>
<th>Segment</th>
<th>Mini grids</th>
<th>SHS</th>
<th>Rooftop C&amp;I</th>
<th>Solar Pumps</th>
<th>Solar parks</th>
<th>Storage</th>
<th>EV &amp; Charging Infra</th>
<th>Heating &amp; Cooling</th>
</tr>
</thead>
<tbody>
<tr>
<td>Investment need (USD, B)</td>
<td>15</td>
<td>21</td>
<td>6-8</td>
<td>1.6</td>
<td>3.4</td>
<td>4-5</td>
<td>1</td>
<td>16.5</td>
</tr>
</tbody>
</table>

With the analysis and stakeholder consultations conducted, it is underlined that the existing capital positioned to make investments in solar is not more than USD 13 billion (and likely to be considerably lower). Approx USD 40 billion of solar finance funds are positioned for investing in Sub-Saharan Africa, of which about 30% is chasing energy deals (not merely solar)\(^6\). Thus, Africa will need about 6 -10 times more capital to be deployed in solar. Also, existing facilities are not equipped to cater to the solar sector for various reasons, including lack of concessional or risk-appropriate returns - hence, this capital largely remains undeployed and will remain so unless an intervention of the nature proposed by ISA is put into motion.

\(^6\) Convergence analysis based on data as of 2020
The ISA proposes to set up risk mitigation instruments (a payment guarantee mechanisms, and an insurance premium mitigation mechanism) to speed up development and mobilise investments by getting a plethora of potential funders like the Green Climate Fund, Global Environment Facility, the World Bank Group etc, multilateral and bilateral funding agencies, private sector entities, impact investors, and global foundations to contribute to these mechanisms. The Facility, apart from project risk mitigation, would support introduction of policies that enable a regulatory structure to create private sector demand and payment to private sector developers so that they can payback investors. Parallelly, and in close association with the Facility, the ISA will work with Members to help create regulatory interventions that help attract investments in solar applications, particularly in those countries where projects under the Facility are under consideration.

ISA will provide dedicated and strategic support to the facility to enable favorable outcomes

<table>
<thead>
<tr>
<th>Role</th>
<th>International Solar Alliance</th>
<th>Fund Manager</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fundraising</td>
<td>Strategic direction to Fund Manager</td>
<td>Leads the fundraise</td>
</tr>
<tr>
<td>Creating a Bankable Pipeline</td>
<td>Support through member countries</td>
<td>Own deal screening and due diligence process</td>
</tr>
<tr>
<td>Fund Management</td>
<td>Advisory support to the Fund Manager</td>
<td>Leads the investment and management of funds</td>
</tr>
<tr>
<td>Administration of Technical Assistance</td>
<td>Create blueprint for collaboration and co-administration the TA Fund</td>
<td>Co-administer the TA Fund</td>
</tr>
</tbody>
</table>

The ISA Value proposition

ISA will be instrumental in hiring a fund manager, providing technical assistance to the organisations and setting up funds to develop a bankable pipeline of projects. ISA provides a strong value proposition in answering the challenges:

1. **Resource mobilisation** - Philanthropic foundations are open to providing risk protection. ISA is in the process of lining up a few million dollars in commitment from these foundations that will go to de-risk commercial investments.

2. **Provide Technical Assistance** to the enterprises in the form of technical scoping studies and support towards project preparation

3. **Capacity building** - The Facility will also focus on the capacity development of Local FIs with the help of philanthropic capital. To this end, it will work closely with National Development Banks in Africa. Fund managers will be tasked to generate a proportion of the funds from local investors
ANNEXURE II

Proposed Structure of the Global Solar facility

- This Structure will have the “ParentCo” acting as the common platform for all Solar facilities to be launched by ISA
- ParentCo to have in-house team to manage operations, oversee fund activities and handle investor relations

**Capital and funding**

- ParentCo will be set up with seed capital (Government of India gas agreed to look at the possibility of investing up to USD25M in the facility) and select other donors and ISA member countries.
- This capital will be permanent equity for ParentCo.
- ParentCo will use this capital to
  - fund its initial expenses
  - provide junior capital as anchor investment for its Solar / Regional Facilities (RF); and
  - provide Technical Assistance grants to projects.
- Once the RFs are launched, ParentCo will charge an oversight fee to these facilities to cover its own expense. ParentCo will keep raising capital / grants for future RFs and TAs as it expands its operations.
- ParentCo will also earn profits from its capital provided to the RFs and this profit and capital will then be used for future RFs.

**Organization**

- The ParentCo will be responsible to its Board for appropriate governance and operations of all RFs. ParentCo will oversee all RFs on a continuous basis, monitoring investment decision making, portfolio management, and governance.
- In order to build institutional capacity as well as minimize expenses, the ParentCo will carry out common functions beneficial to all RFs such as:
  - Providing anchor capital
  - Access to junior capital and TA as required by each RF
  - Share learnings across all facilities
  - Monitor risk and governance at RFs
• **Board of Directors:** ParentCo will work under ISA’s direction and oversight; ISA President will Chair its Board.

• **Executive Board:** Director General and other senior leaders of ISA will be part of ParentCo’s Executive Board, which will oversee day-to-day operations of the ParentCo.

• **Team:** ParentCo will have a team of 4-5 senior professionals (including the CEO) for these functions.
Eligibility criteria for hiring a fund manager as approved in the Fifth Session of the ISA Assembly
(ISA/A.05/WD.13)

The ISA would like to seek proposals from experienced, trusted and knowledgeable fund managers with expertise in solar energy in early stage and developing markets, fundraising, due diligence, fund creation and operation. The fund manager’s work will include:

1. Leading fundraising of concessionary and private capital
2. Evaluating the financing and funding of a pipeline of projects
3. Monitoring and reporting of impact aligned with ISA’s mandate and objectives

This RFP seeks to gather information to evaluate potential fund managers based on

1. Alignment with the Solar Finance Facility’s mission and vision
2. Ability to execute fund manager responsibilities

Evaluation and Selection Criteria

1. The applying fund manager should preferably be an accredited agency of Green Climate Fund (GCF) or Global Environment Facility (GEF) to be able to channel in GCF/GEF funds in case GCF comes in as an anchor investor
2. The fund manager must have a local presence and existing team based out of Africa
3. The fund manager must have prior experience of successfully raising and deploying capital in solar energy sector in emerging markets
4. The fund manager should have the ability to conduct business relationships in English and French.

Proposals that meet the eligibility criteria will be evaluated on the following key metrics:

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fund Manager’s qualification, capacity and experience</td>
<td>40%</td>
</tr>
<tr>
<td>Proposed methodology, approach and implementation plan</td>
<td>30%</td>
</tr>
<tr>
<td>Management structure and key personnel</td>
<td>30%</td>
</tr>
</tbody>
</table>

Supporting Information and Documents

Kindly provide the following supporting documents:

1. Company registration and certificate of incorporation
2. All active and related funds using chart below:

<table>
<thead>
<tr>
<th>Fund Name</th>
<th>First Close</th>
<th>Fund Tenor/ Term</th>
<th>Size ($mn)</th>
<th>Target IRR (Net)</th>
<th>Realized IRR to Capital Structure (include if</th>
<th>Geography</th>
<th>Investment Thesis</th>
</tr>
</thead>
</table>

7 To be confirmed
### e.g. Africa RE Fund

<table>
<thead>
<tr>
<th>Date (Net)</th>
<th>Leverage is applicable</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td></td>
</tr>
<tr>
<td>10</td>
<td></td>
</tr>
<tr>
<td>$650</td>
<td>9%</td>
</tr>
<tr>
<td></td>
<td>5%</td>
</tr>
<tr>
<td>Private equity</td>
<td>Southern Africa</td>
</tr>
<tr>
<td>Greenfield solar assets</td>
<td></td>
</tr>
</tbody>
</table>

**Total:** $

3. **Alignment with Solar Finance facility’s Mission and Vision**
   Please explain how your firm’s values and experience aligns with the mission and vision of the ISA and the solar finance facility (500 words)?

4. **Technical Proposal**, with following details
   a. **Structure**: Initial views on fund structure and execution; Strategy for portfolio investment risk; Proposed risk tracking methodology for the Solar Finance Facility; Fundraising strategy and timelines
   b. **Staffing and Team Structure**: Core execution team and envisaged roles, relevant experience and resumes, sector focus and geographies
   c. **Sourcing strategy**: Details of strategy around sourcing pipeline and competencies around the same
   d. **Risks** and proposed mitigation strategy

5. **Proposed fee schedule** (with a preference for fees based on the profits on the Solar Finance Facility)

6. **Additional items and references (at least four)**

### Detailed Scope of Work

The fund manager’s scope of work is as follows:

a. **Design & refine mechanics and operational plan of the fund**
   b. **Build pipeline** of investible opportunities
   c. **Managing the entire cash to cash cycle including raising funds by attracting pools of capital and making investments**
   d. **Coordinate with TA facility Manager** to allocate resources for building capacities of enterprises, FIs, and government as deemed fit and necessary for promoting solar and creating an investible pipeline
   e. **Monitoring & Evaluation** of fund’s performance and reporting

Each of these is explained in more detail below.

#### a. Design & refine mechanics and operational plan of the fund

The fund manager will liaise with legal and tax advisors to help design the structure, keeping in mind aspects such as place of incorporation and registration, including all applicable legal filings to operate within the finalised domicile of operations.
The ISA team generated a significant amount of analysis, stakeholder engagement, and planning in order to expedite fund creation. ISA understands that the fund manager will consider this but might also make valuable and important changes to ensure that the strategy positions the fund manager to achieve stated objectives. Accordingly, the fund manager is also expected to define the fund’s operational, financial, and reporting procedures, and get the same approved from ISA.

b. **Build pipeline of investible opportunities**

Refine & detail out investment eligibility criteria: The fund manager is expected to define the enterprise / project eligibility criteria for financing under the facility, as well as to review, adapt, grow and advance the pipeline of investible projects. The profile of the target investments and investment selection process should be refined in line with the solar finance fund’s philosophy.

Supporting the pipeline development strategy: This includes performing critical facility outreach, engagement and opportunity screening, including handling inbound and outbound leads, contributing to developing and implementing a marketing, promotion and communication strategy, and other activities that help maintain a steady pipeline of bankable projects / enterprises.

Developing the pipeline: This will likely require partnerships and communication with on-the-ground entities to perform due diligence on borrowers and identifying suitable investment opportunities. The fund manager will determine the staff to best fit their approach, but should strongly consider an “on-the-ground team” which can be valuable not just for identifying and evaluating investment options but also monitoring the investments and investees on ground.

c. **Managing the entire cash to cash cycle**

The fund manager will be expected to provide all services related to the Initiative’s investment cycle. This includes:

Raising funds: The fund manager is expected to bring a network of potential investors, build relationships with new potential investors, and lead pitch meetings with potential investors. The fund manager will lead the development of a strategy and marketing materials for fundraising. The fund manager will be expected to raise capital for the solar finance facility by attracting both concessionary as well as for-profit private capital pools. The fund manager will set an appropriate risk profile for the fund to accommodate investors per their risk appetite. Assessing insurance options, concessionary capital, and other de-risking strategies will be part of this process.

In this regard, ISA is committed to bringing in concessionary capital from the likes of GCF, DFC and philanthropic foundations. However, this capital may have to be leveraged with matching contribution of some nature from private capital providers. Securing such capital will be the primary responsibility of the fund manager so that 1st close and subsequently final close of the fund takes place within envisaged timelines.

Appraisal: Performing site visits, implementing analysis strategies for critical facility qualification and other types of due diligence to inform investment acceptance into the Solar Finance Facility, and its three funds.

Disburse: Making investments in line with detailed business plans received and vetted by the Fund Manager in tranches as deemed feasible by the Investment Committee.

Monitor: Monitor the portfolio, assess risk exposures as well as exposure limits and sub-limits that may have been promised to investors, and prepare required reports.

FX Management: Manage liquidity and FX exposure, as well as other back-office functions in managing the fund.
Exit opportunities: Source suitable investment exit opportunities both for equity investment, as well as debt (where applicable)

d. Coordinate with TA facility Manager to allocate resources for building capacities
The fund manager will coordinate with TA Facility Manager to allocate resources for building capacities of local financial institutions, enterprises / project sponsors, and respective country governments that will assist in improving project bankability and building a robust pipeline for the fund.

e. Monitoring & Evaluation of fund’s performance and impact
The fund manager will define an optimal M&E strategy to support the impact thesis of the fund, and report on the same.