CATALYTIC FINANCE STORIES

ACGF ASEAN CATALYTIC GREEN FINANCE FACILITY | An ASEAN Infrastructure Fund Initiative

ENERGY TRANSITION SECTOR DEVELOPMENT PROGRAM IN CAMBODIA

How financing and technical assistance from the ASEAN Catalytic Green Finance Facility is supporting Cambodia's clean energy transition and attracting private sector investment for sustainable growth.

Worker at Cambodia's National Solar Farm (photo by ADB).

On 6 October 2025, the Asian Development Bank (ADB) approved the second phase of [Cambodia's Energy Transition Sector Development Program](), advancing the country's shift toward cleaner and more secure energy. Building on the foundations of subprogram 1—which introduced policy measures to accelerate the adoption of clean energy, and supported investments in energy storage and efficiency initiatives—the $82.5 million subprogram 2 will continue to support the country's energy policy reforms while piloting demonstration projects that encourage private sector participation in the transition. A key feature is the establishment of an energy efficiency revolving fund to expand access to finance for small and medium-sized enterprises (SMEs), enabling wider uptake of cost-saving and low-carbon technologies.

The ASEAN Catalytic Green Finance Facility (ACGF) has supported the program from its inception. For subprogram 1, ACGF mobilized $22 million in cofinancing from the ASEAN Infrastructure Fund (AIF) and the Green Climate Fund (GCF), while also providing technical assistance to strengthen implementation and prepare subprogram 2. For subprogram 2, ACGF is contributing $30 million in cofinancing from AIF, GCF, and the United Kingdom (UK), alongside dedicated technical assistance.

PARTNERS

ADB | AIF ASEAN Infrastructure Fund | GREEN CLIMATE FUND | UK International Development Partnership | Progress | Prosperity

PROGRAM AT A GLANCE

Robust economic growth over the last 15 years has significantly increased Cambodia's energy needs, particularly the demand for electricity. At the same time, around half of the electricity supplied to the grid is still generated from coal.

ADB partnered with Cambodia's Ministry of Mines and Energy to develop the Energy Transition Sector Development Program, supporting policy reforms and investments to expand renewable capacity and improve efficiency in response to growing demand. Subprogram 1 was approved on 14 December 2022, followed by subprogram 2 on 6 October 2025.

Subprogram 1 advanced the development of national energy policies and strategic plans, and financed a utility-scale battery energy storage system and energy-efficient street lighting. These initiatives were made possible through ACGF cofinancing and technical support. In addition, ACGF technical assistance supported targeted efforts to increase women's participation in the energy transition.

Subprogram 2 will continue advancing regulatory development, with a stronger emphasis on energy efficiency, which will be complemented with the establishment of an energy efficiency revolving fund to catalyze private sector investment in energy-saving technologies funded by ACGF partners.

The program is expected to boost renewable electricity generation by 30% and cut electricity demand by 9% annually by 2029 (vs. 2023), while channeling $20 million through the revolving fund to SMEs—with at least 30% for women-owned or led enterprises—expected to result in annual savings of 280,000 tCO_2e over the next 15 years.

> *"Cambodia's energy transition is a national priority, and we are proud to partner with ADB, AIF, and ACGF to accelerate this journey. The collaboration has been instrumental in advancing policy reforms, piloting innovative solutions, and catalyzing finance. These efforts are helping us strengthen energy resilience, advance clean energy systems, and ensure that our transition is inclusive and sustainable. We deeply value the ongoing collaboration with our partners, as together we turn ambition into reality and shape practical, forward-looking solutions for Cambodia's energy future."*
>
> **H.E. Dr. Ty Norin**
> Permanent Secretary of State,
> Ministry of Mines and Energy, Cambodia

Ninefold increase in electricity demand since 2009

50% reliance on coal for electricity generation in 2024

Total Financing

SUBPROGRAM 1: $77 million

ADB **$40 million**	AIF **$10 million**	GCF **$12 million**
SCF* **$11 million**	Government **$4 million**	

*Strategic Climate Fund

SUBPROGRAM 2: $84.75 million

ADB **$50 million**	AIF **$10 million**	UK **$12 million**
GCF **$8 million**	ACliFF* **$2.5 million**	Government **$2.25 million**

* Asia-Pacific Climate Finance Fund

Expected Outcomes

30% increase in renewable electricity generation*

9% annual reduction in electricity demand through improved energy efficiency*

* by 2029 relative to 2023

$20 million Energy Efficiency Revolving Fund for SMEs:

280,000 tCO_2e in annual emissions savings over the next 15 years

Minimum 30% allocated to women-owned or women-led enterprises

Aerial footage of the Cambodia National Solar Park (photo by ADB).

Robust economic growth has driven a surge in Cambodia's energy demand. Between 2009 and 2024, household electricity access rose from under 20% to 95%, while total electricity demand grew more than ninefold. Cambodia has reduced power imports over the past decade, but they remain an expensive source of supply and contribute to high tariffs. This affects both industry competitiveness and household affordability.

In 2024, renewable energy accounted for around 47% of Cambodia's power mix, mainly from hydro and solar. With ongoing solar expansion and new wind power projects, the government is targeting 70% by 2030.

To reduce reliance on imports and lower end-user prices, the government is also prioritizing greater energy efficiency. Yet adoption has been slow, held back by limited sector-specific regulations, low awareness, and challenges in accessing finance for energy efficiency investments by small and medium enterprises.

Private sector participation in the energy transition remains limited. Meeting Cambodia's renewable energy targets will require at least $5.9 billion in new investment in renewable energy generation over the next 15 years, much of which must come from private sources.

- Ninefold increase in energy demand since 2009
- Coal remains significant in the energy-mix
- Limited regulation on energy efficiency
- Limited access to finance for energy efficiency investments by small and medium enterprises
- $5.9 billion in private investment in renewable energy generation needed over the next 15 years

Cambodia's energy transition is complex and will take years to fully materialize. Success depends on a strong policy framework, backed by strategic investments. ADB has been a longstanding partner in this transition. Under the leadership of the Ministry of Mines and Energy, and in close collaboration with Electricité du Cambodge, ADB supported the development of the Energy Transition Sector Development Program, structured as a three-phased policy-based loan with investment components, focusing on: (i) energy planning and governance, (ii) low-carbon and circular economy transition, and (iii) transparent and competitive investment in new solutions.

Subprogram 1 advanced key regulatory instruments, steering the country towards a clean energy transition. These included Cambodia's first long-term Power Development Master Plan (2022–2040) and the National Energy Efficiency Policy (2022). It also supported investments in a pioneering grid-connected utility-scale battery energy storage system and energy-efficient street lighting in two provinces, demonstrating the benefits of innovative technologies while improving public infrastructure.

Subprogram 2 builds on the policy foundations of subprogram 1, with a stronger focus on energy efficiency. It also addresses a critical barrier: access to finance for SMEs. Through an energy efficiency revolving fund, designed with a financial intermediation structure and capitalized by ACGF partners—GCF and the UK—the fund will finance SME investments in energy efficiency and other transition-aligned interventions, complementing the broader programmatic approach.

Programmatic Reform Areas

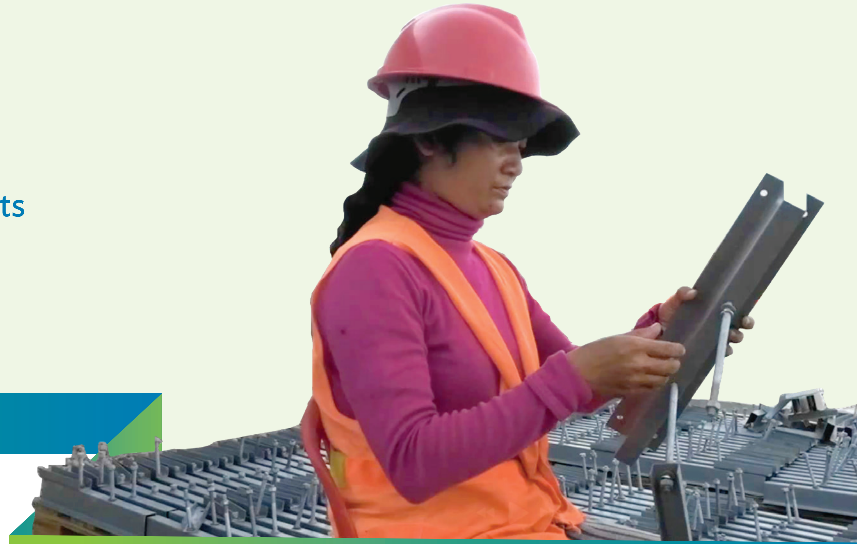
- Energy planning and governance
- Low-carbon and circular economy transition
- Investment in new solutions

ACGF-funded Investments

- Battery energy storage system
- Energy efficiency revolving fund

ACGF IMPACT

Concessional finance and technical assistance ensured that innovative investment components were embedded into the program design.



Worker at Cambodia's National Solar Farm (photo by ADB).

Early dialogue ensured ACGF financing was built into the program structure from the start.

Discussions between ACGF and ADB energy sector teams began in 2020, with the program included in the GCF-ACGF partnership pipeline. Alongside policy support, concessional finance and technical assistance from GCF and AIF were integrated into the program design and were instrumental to the investment component of subprogram 1.

Concessional finance from ACGF helped pilot energy storage technologies and will be used to catalyze private sector investment in energy efficiency.

The battery energy storage system, funded by ACGF under subprogram 1, will be completed in 2026. For subprogram 2, concessional finance from GCF and the UK supports Cambodia's first energy efficiency revolving fund to improve access to finance for SMEs, boost the green technology market, and build confidence among financial institutions. The fund is expected to lend $20 million over the next three years and result in 280,000 tCO_2e savings per year over the next 15 years, with strong potential to catalyze additional private capital.

Technical assistance during implementation contributed to enhanced regulation and enabled the revolving fund.

In 2024, ACGF funds from GCF supported the development of new policies for energy transition and the revolving fund's design. ACGF funds also helped advance the program's Gender Action Plan of subprogram 1, enhancing women's participation in the transition through gender-responsive activities, such as awareness-raising, curriculum development, and STEM-focused initiatives for female students. Looking ahead, ACGF will continue supporting implementation by assisting financial institutions under the revolving fund with project assessments, safeguards screening, and monitoring of greenhouse gas emission reductions.

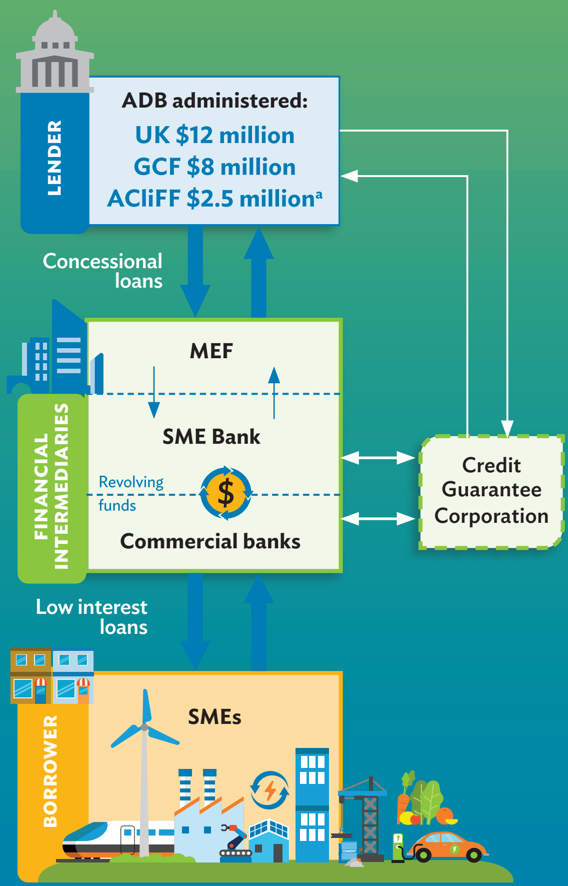
Parallel upstream technical assistance expanded the impact beyond the core program, including for private sector investments.

In collaboration with ADB's Energy Sector Group and Office of Markets Development and Public-Private Partnerships, ACGF funded policy and technical assessments to help create an enabling environment for large-scale renewable energy deployment. This included zone assessments, feasibility studies, and safeguard evaluations that identified priority sites for solar parks with integrated battery storage, as well as wind energy projects with strong generation potential. As a result, ACGF contributed to Cambodia's first-of-its-kind, private sector financed 100 MW solar and battery energy storage systems project, expected to go to market by the end of 2025.

These activities informed government planning, supported regulatory development, and structured financial options, demonstrating how targeted upstream technical assistance can accelerate private sector involvement and clean energy investments beyond the core program.

ENERGY EFFICIENCY REVOLVING FUND

Scaling investment to support Cambodia's green transition



Designed to unlock private sector investment, the Energy Efficiency Revolving fund is capitalized with $12 million from the United Kingdom and $8 million from the Green Climate Fund, channeled through the SME Bank of Cambodia. The fund will enable local banks to offer low-interest loans to SMEs for energy-saving technologies, building retrofits, and other projects aligned with Cambodia's National Energy Efficiency Policy and related energy transition and energy performance standards.

Operating on a revolving basis, repayments will be reinvested to finance future projects—creating a cycle of green investment, accelerating adoption of energy efficiency measures nationwide. The fund will also offer options mixing the revolving fund with participating banks own resources, catalyzing further private sector financing for the energy transition.

An optional credit guarantee— via Cambodia's Credit Guarantee Corporation, supported by the Asia–Pacific Climate Finance Fund—will facilitate cash flow based lending and help mitigate credit risk e.g. for loans lacking traditional collateral.

Aligned with policy reforms supported under the Energy Transition Sector Development Program, the fund not only addresses the financing gap but also strengthens the private sector's role in contributing to Cambodia's clean energy goals. It offers a market-driven pathway toward a more energy-efficient and environmentally responsible economy.

[a] Grant funding for the Credit Guarantee.
ACliFF = Asia-Pacific Climate Finance Fund, ADB = Asian Development Bank, GCF = Green Climate Fund, MEF = Ministry of Economy and Finance, SME = small and medium-sized enterprise, UK = United Kingdom.
Source: ADB.

"The Cambodia Energy Transition Sector Development Program exemplifies the kind of transformative initiative AIF is proud to support. The concessional financing provided by AIF and our ACGF partners reflects a shared commitment to innovation, sustainability, and inclusive growth. These efforts are helping Cambodia move closer to its climate and energy goals, while also encouraging private sector involvement and creating green jobs. For AIF, supporting the energy transition across ASEAN is not just about infrastructure—it's about empowering countries to build resilient, inclusive, and sustainable futures."

H.E. Pen Thirong
Secretary of State, Ministry of Economy and Finance, Cambodia, and
Cambodia's Representative to the AIF Board of Directors

AIF ASEAN Infrastructure Fund

Since its establishment in 2012, AIF has financed **three other energy sector projects and one program**, expanding energy access across the region.

- **2012**
- **2013** — **INDONESIA**: Java–Bali 500 kV Power Transmission Crossing Project
- **2014** — **VIET NAM**: Ha Noi and Ho Chi Minh City Power Grid Development Sector Project
- **2015** — **INDONESIA**: Electricity Grid Strengthening—Sumatra Program
- **INDONESIA**: Sustainable and Inclusive Energy Program
  - **2015** — Subprogram 1
  - **2017** — Subprogram 2
  - **2022** — Subprogram 3

Workers install equipment at the Cambodia National Solar Farm (photo by ADB).

PARTNER PERSPECTIVE

Dominic Williams MBE

British Ambassador to Cambodia

How does the UK's support for Cambodia's energy transition align with the UK's global commitments?

The UK's support for Cambodia's energy transition reflects our broader commitment to tackling climate change and promoting inclusive, sustainable development globally. Through our International Climate Finance Strategy, we are helping developing countries reduce emissions, build resilience, and protect nature. Clean energy is one of our priority areas, and Cambodia's Energy Transition Sector Development Program aligns closely with our goals—especially in supporting regulatory reform, private sector engagement, and innovative financing mechanisms like the energy efficiency revolving fund. The program is a great example of how climate finance can drive real change.

What benefits does the collaboration with ADB and ACGF bring to the UK's work in Southeast Asia?

Working with ADB and ACGF enables the UK to deliver climate finance more effectively. The partnership brings strong government relationships, deep regional expertise, and a solid track record in infrastructure development. The ACGF model—combining concessional finance with targeted technical assistance—helps de-risk investments and accelerate the adoption of innovative solutions. At the same time, the UK brings its own experience in climate finance and policy, and we're pleased to contribute to shaping programs that deliver real impact on the ground. Together, we're helping mobilize private capital and foster inclusive, climate-resilient growth across the region.

Hemant Mandal

Director, Department of the Asia and Pacific Region, Green Climate Fund

How does the Cambodia Energy Transition Sector Development Program contribute to GCF's strategic priorities?

This program advances GCF's strategic priorities by driving Cambodia's energy transition through policy reforms and targeted investments. It supports national energy policies, prioritizes renewable energy and efficiency, and pilots innovative projects like a battery storage system and an SME energy efficiency fund. Technical assistance from ACGF, funded by GCF, strengthens regulatory frameworks, greenhouse gas tracking, and gender inclusion. These efforts align with GCF's objectives to promote low-carbon development, mobilize private capital, and build institutional capacity for effective climate action in developing countries.

What aspects of this program illustrate GCF's approach to climate finance?

This program embodies GCF's impactful climate finance by leveraging concessional funding to pilot Cambodia's first utility-scale battery energy storage and an SME energy efficiency fund. By blending GCF resources with partners like ADB, it mobilizes additional public and private capital. Technical assistance strengthens national energy policies, efficiency standards, and greenhouse gas tracking, fostering policy reform and institutional capacity. Ultimately, the program demonstrates GCF's approach: combining finance and support to unlock private investment, enable regulatory transformation, and drive measurable climate and development impacts in Cambodia.

> *"The United Kingdom is proud to support Cambodia's energy transition through our partnership with the Asian Development Bank. This program represents a landmark shift toward clean energy systems. By combining policy reform with $12 million in funding from the UK we are directly helping Cambodian-led SMEs secure funding to invest in energy efficiency—driving down their costs, enhancing their competitiveness and protecting our planet."*
>
> **Dominic Williams MBE**
> British Ambassador to Cambodia

> *"This landmark program demonstrates how GCF deploys its finance to catalyze larger-scale climate action. The program uses concessional finance and technical assistance to unlock private investment, drive policy reform, and deliver measurable climate and development impacts in Cambodia."*
>
> **Hemant Mandal**
> Director, Department of the Asia and Pacific Region,
> Green Climate Fund

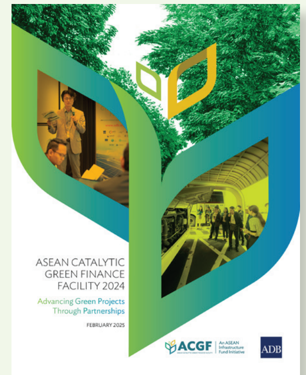
ADDITIONAL RESOURCES

Asian Development Bank (ADB)

- ADB News Release: ADB's $82.5 Million Reform Program to Accelerate Cambodia's Energy Transition
- Cambodia: Energy Transition Sector Development Program, Subprogram 1
- Cambodia: Energy Transition Sector Development Program, Subprogram 2
- ADB's Work in Cambodia
- Cambodia: Country Partnership Strategy (2024–2028)

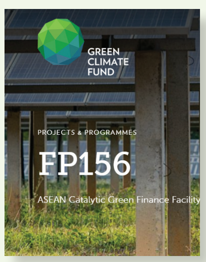
ASEAN Catalytic Green Finance Facility (ACGF)

- About ACGF
- ACGF Annual Report 2024
- ACGF: Investment Principles and Eligibility Criteria



ASEAN Infrastructure Fund (AIF) and ACGF Partners

- Green Climate Fund
- United Kingdom – Foreign, Commonwealth, and Development Office
- ASEAN Infrastructure Fund



Cambodia Government Partners

- Ministry of Mines and Energy
- Electricité du Cambodge

About the ASEAN Catalytic Green Finance Facility (ACGF)

The ASEAN Catalytic Green Finance Facility (ACGF), launched in 2019, is an ASEAN Infrastructure Fund (AIF) initiative designed as a one-stop platform to unlock climate finance and mobilize investment-ready green projects. Managed by the Asian Development Bank, ACGF offers flexible and concessional financing from AIF and its partners, project development support, and innovative blended finance instruments.

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