Energy Efficiency Platform for the Arab region
Workstream "Financing of innovative Energy Efficiency Instruments"
GIZ

Super ESCOs

Presented by: Kawther Lihidheb and Pierre Langlois

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Objectives of the presentation

› Develop a good understanding of the Super ESCO concept

› What are the best practices and different form of Super ESCO
NEED FOR INNOVATIVE INSTRUMENTS

› Energy consumption and energy intensity are comparatively high in the MENA region.
› Growing population and economy increase energy demand, while energy markets open up to the private sector and energy subsidies are reduced.
› **EE** becomes increasingly economically attractive and necessary to fulfill future energy and climate targets in the Arab region.
› Several innovative EE instruments are still not common in the MENA region.
› Innovative instruments should help private sector actors to realize the EE market potential with the support of the public sector.

**Super ESCO** can provide one of the most rapid paths to upscaling EE in the MENA Region.
QUICK REVIEW OF THE EPC CONCEPT AND ESCO BUSINESS MODEL
ESCO Definition

› An ESCO is a type of company whose business model is to implement EE projects through the use of energy performance contracts and where its remuneration is tied to the performance of the project.

› EE Projects + EPC = ESCO
ESCO DEFINITION

ESCO offers:
› Project implementation integration
› Technical risk offset
› M&V (measurement and verification of savings)

Financing is not a key characteristic of ESCOs even though access to adapted financing remains an important barrier for projects implementation.
WHY SHOULD A CUSTOMER BE INTERESTED IN THE EPC CONCEPT

It facilitates EE project implementation and offers:

<table>
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<th>Financial Advantages</th>
<th>Strategic and Operational Advantages</th>
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<tr>
<td>Lower operating costs</td>
<td>Installation of new modern equipment</td>
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<td>Less need to take loans (if the ESCO provides financing)</td>
<td>Environmental impacts reduced</td>
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<td>Enhancing competitiveness</td>
<td>Optimization of the equipment and their useful life</td>
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<td>Improvement of product quality</td>
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<td>Green image</td>
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<td>Higher level of comfort</td>
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WHY SHOULD A CUSTOMER BE INTERESTED IN THE EPC CONCEPT

› Alternative Business models enabling transfer of technical and financial return risks of EE investments

› Benefits of EE more visible and tangible by introducing detailed M&V of the EE improvement

› **Simplify the implementation of EE projects**
Main EPC Contract Types

Guaranteed Savings

Shared Savings
Main EPC Contract Types

**Shared Savings model**

- ESCO finance
- Payment based on energy cost savings

**Guaranteed Saving Model**

- The Customer finance the EE projects
- ESCO guarantees the savings
Introduction to the Super ESCO Model
DEFINITION OF SUPER ESCO

Entity set up by public and/or private investors to function as an ESCO to the point of view of the client

Offers full EPC services, including adapted financing, to its clients

Super ESCOs make it easier to identify untapped opportunities for using EPCs in target markets and are perceived not as competitors of ESCOs but as facilitators
CONCEPT

› Entity set up by government
  › May also be established by a private organization

› The Super ESCO is capitalized with sufficient funds to develop and implement EE projects under the EPC approach
GENERAL BUSINESS MODEL
STAKEHOLDERS: PROJECT HOST

- Public buildings
- MUSH (Municipalities, Universities, Schools and Hospitals)
- Private companies

- High-occupancy, old equipment, and small budget for EE retrofits
- Payments made directly from the project hosts to the Super ESCO
STAKEHOLDERS: FINANCE

- Governments grants, loans or equity
- International financing institutions
- Local financing institutions

- Mechanism in place to repay the loans from amounts received from clients out of the shared savings agreements
STAKEHOLDERS: PRIVATE ESCOS

- Identifying ECMs that reduce energy and water usage;
- Designing the ECMs, implementation plans, project plans, and making drawings and energy savings calculations;
- Implementing and commissioning ECMs through a comprehensive work plan;
- Developing M&V plans and measuring and verifying savings (can be done by a third party);
- Guaranteeing the energy and water savings.
- Providing services and maintaining the installed ECMs for the whole duration of ESPCs (optional).
SUPER ESCO
MAIN CHARACTERISTICS OF THE BUSINESS MODEL

Sell the project
ESCO Selection
Project management, M&V
Quality Check
contract standardization, financing agreement, manufacturing agreement
### PUBLIC AND PRIVATE SUPER ESCO

**Public sector**
- The size and credibility of Super ESCOs as public institutions
- Unique capacity of targeting the largely untapped EE market within the public sector
- In the long term, build the capacities of ESCOs and create a competitive private market for ESCO services.

**Private sector**
- Play a leading role in developing and implementing projects in the private sector,
  - As a financier for ESCOS
  - As an ESCO itself given its credibility and financial capacity
- At a later stage, a Super ESCO could evolve through buying contracts from existing ESCOs once performance would have been demonstrated
WHAT IS EXPECTED FROM A PUBLIC SUPERESCO

› To accelerate EE programmes in the various economic sectors including the public sector (Street lighting, Hospitals, schools…)

› To propose & implement concrete measures to remove the barriers to the development of the ESCO market (Starting by the Public Sector)

› To stimulate and facilitate the emergence of specialized ESCOs and EPCs.
SUPER ESCO EXAMPLES
SUPERESCO EXPERIENCES

- Etihad ESCO
  Dubai

- EESL
  India

- FEDESCO
  Belgium

- SOFIAC
  Canada

- ADES.
  Abu Dhabi
Mission

- To offer complete and innovative support and financial services in EPC
- Designing, structuring, implementing, and managing initiatives to finance energy efficiency projects.

Designer and Manager of the SOFIAC

https://econoler.com/ecofonds/
Sponsors

- 40 years experience in EE
- Experience in 160 countries
- 75 experts, (operations 50% in Canada, 50% internationally)
- Recognized by all IFIs as well as bilateral and multilateral agencies interested in EE
- First ESCO in Canada (1980)
- Operated ESCOs in 10 countries
- Supported ESCO start-ups or ESCO market launches in more than 60 countries
- Assistance in creating the largest Super ESCOs in the world
  - India
  - United Arab Emirates

- Created in 1996
- 3G$ of assets under management
- 175 000 individual shareholder
- 1.5G$ invested in small and medium size enterprise in Quebec
- 40 000 jobs created or maintained
SOFIAC

The first Super ESCO in Canada

• Initial 150M$ financing capacity
  • Commitment period of 5 years
  • Reimbursement period of 15 years after full commitment
• Launched in October 2020
• Structured around
  • a Fund that acts as the Super ESCO
  • a Fund manager as the operator
• 120M$ current prospect pipeline composed of:
  • Airports
  • Industrial facilities
  • Office buildings
  • Multiresidentiel facilities
• First projects launched: summer 2021
SOFIAC Offer

Based on the Super ESCO concept

- A shared savings agreement with clients (typically a share of 85% SOFIAC 15% client)
- Long term contractual agreement (10 to 15 years) to enable deep retrofit and high decarbonization
- Two models in working with ESCOs
  - Procurement through a prequalified lists of preferred vendors
  - Invitation to tender
- ESCO under a guaranteed savings agreement with SOFIAC
- M&V realized by independent M&V experts
SOFIAC innovative Business Model

Private ESCOs
- Guaranteed performance EPC (Payments for performance losses when applicable)

Client
- Design, implementation and start-up
- Shared savings EPC (80 to 100%)

SOFIAC
- Payments for works

Bank Creditors
- Finance a portion of required capital
- Predetermined repayments

Creditors
Financial Institutions
- Finance a portion of required capital
- Predetermined repayments
SOFIAC Solution

SOFIAC’s offer:
- 100% non-recourse financing adapted to EE projects in shared savings mode (without impact on the financing capacity of clients)
- Projects combined into larger calls for tenders to reduce transaction costs

SOFIAC’s offer:
- Shared energy savings leading to benefits from day 1
- Long-term financing agreement

SOFIAC’s offer:
- Standardized and adapted call-for-tender documents
- Subsidy request management
- Subcontractor management

SOFIAC’s offer:
- Credible third-party market aggregator and coordinator
- Open-book approach
- Objective measurement and verification management

SOFIAC’s offer:
- Technical expertise in preliminary savings assessments
- Turnkey projects with minimal client involvement
- Subcontracting to qualified ESCOs

SOFIAC’s offer:
- Assume all technical risks
SOFIAC Operational Structure

- Fund manager in charge of all technical and operational aspects of the Super ESCO
  - Marketing to client
  - Prefeasibility studies
  - Contractual agreements with clients and ESCOs,
  - ESCO selection
  - M&V plans design
  - Fund management
- Project aggregation capacities to reduce transaction costs in selecting ESCOs
- Externalization of M&V plan implementation
Private Equity Partners

- Amount: $30 M$
- Commitment term: 20 years + 1
- Anticipated return: 8-10%
- Management fee: 1% of amounts under management
Bank Creditor

- Amount: $120 M
- Borrower: SOFIAC
- Disbursement: Project by project as works progress (commitment framework agreement for the entire amount)
- Duration of term: According to the project (average term of 10-15 years)
- Guarantees: All fund assets (Performance contracts, ESCO guarantee)
- Rank: Priority over all sponsors
Finance innovation

• Through financial leverage
• Long amortization
• Risk spread over a portfolio of projects
• Presence of concessional actor

Projects combined into calls for tenders

• $10 M calls for tenders allowing economy of scale
• Comprised of more than $1M projects (per client) to reach a highly diversified portfolio
• Client Agreements between 10 to 15 years
CONCLUSION
SUPERESCO
IMPLEMENTATION IN THE MENA REGION: KEY RELEVANT POINTS

• The Super ESCO is well adapted to being piloted in the MENA region and can greatly help tap EE potential in the region and create an enabling environment for a sustainable ESCO market.

• Needs proper national regulations governing ESCOs and EPCs.

• Needs the government’s strong willingness and support to create the Super ESCO.

• Succeeding in introducing this new business model can help boost energy efficiency technologies, services and applications in the MENA region.
SUPERESCO
IMPLEMENTATION IN THE MENA REGION: KEY RELEVANT POINTS

- **Government based Super ESCO:**
  - Can play a major role to facilitate the penetration of ESCOs to the market and improve their credibility.
  - Addresses many barriers such as high transaction cost.
  - Enables the public sector to improve efficiency in buildings and infrastructure.
  - Builds local ESCOs capacity by requesting certification and increasing requirements over time.
Question Period and Discussion