IFC International Finance Corporation World Bank Group

GSMA Development Fund

IFC – GSMA green power initiative

Delhi September 23, 2009







Workshop Structure

- 10 min: Introduction
- 10 min: **Topic 1**: In House Green Power generation
- 20 min: Group Discussion
- 10 min: **Topic 2**: Full Outsourcing of Green Power generation
- 20 min: Group Discussion
- 40 min: Discuss the results overlaying some Financing concepts. Conclusions.

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Presentation of IFC

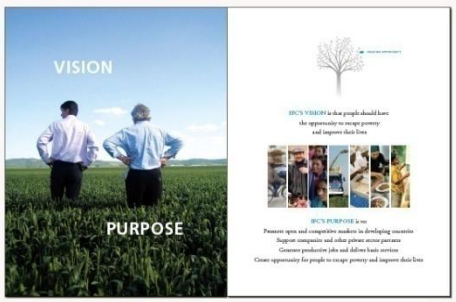
- **Mission:** Help people escape poverty and improve their lives, by providing solutions and services to the private sector.
  - IFC brings solutions to clients through integrated investments and advisory services
  - IFC helps fill unmet needs by directing capital and knowledge to areas not yet benefiting from growth in emerging markets
- **Structure:**
  - Owned by 181 member countries
  - IFC is the main driver of private sector development in the World Bank Group
  - Collaborates with other members of the group, including the World Bank (IBRD and IDA) and MIGA
  - Global: Headquartered in Washington, D.C.
  - Local: More than 100 offices worldwide in 81 countries, more than half of IFC's 3,325 staff work in field offices

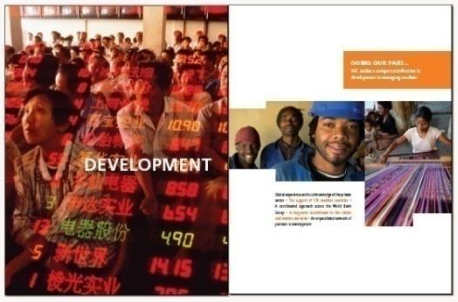
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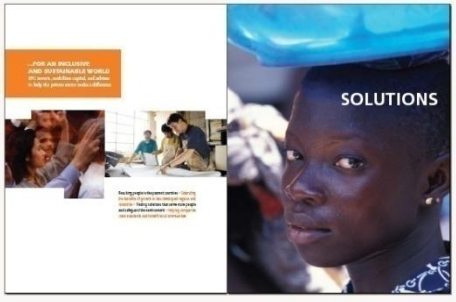
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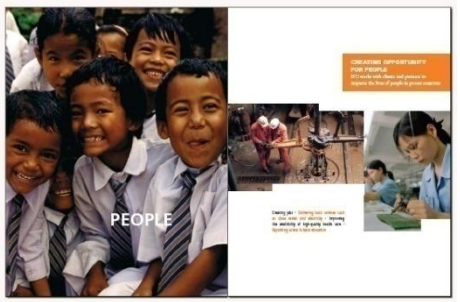
Presentation of IFC - Fiscal Year 2008 Highlights

- **Investments:** 372 new projects in 85 countries
- **Advisory services**: 299 new projects in 75 countries
- **$16.2 billion in financing:** $11.4 billion for IFC's own account, $4.8 billion mobilized
- **IDA countries** accounted for 45 percent of IFC investments including:
  - $1.4 billion invested in Sub-Saharan Africa
  - $1.4 billion invested in the Middle East and North Africa









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IFC's Products and Services

Senior Debt

- On-lending
- Liquidity management
- Acquisition financing
- Warehousing facilities
- Syndicated loans

Structured Finance

- Partial credit guarantees
- Securitization
- Bond underwriting

Mezzanine Finance

- Convertible debt
- Subordinated debt
- Other Tier II instruments

Private Equity

- Common shares
- Preferred shares

Global Trade Finance Program

- $1 billion program
- Guarantees to issuing banks
- 46 issuing banks in 24 countries
- 92 confirming banks in 62 countries
- $579 million of issued guarantees in first 12 months

Advisory Services

- Corporate governance
- Risk management
- Small and medium business banking
- Housing finance
- Energy efficiency finance

Sustainable Finance

- Carbon finance
- Renewable energy
- Supply chain financing
- Corporate governance financing

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Context of the Initiative

Power source

Current Situation

Mobile Operators

New BTS construction
(network expansion)
Existing BTS (retrofit)

Diesel Generators

Target Situation

Mobile Operators

New BTS construction
(network expansion)
Existing BTS (retrofit)

Renewable Energy Sources (hybrids)

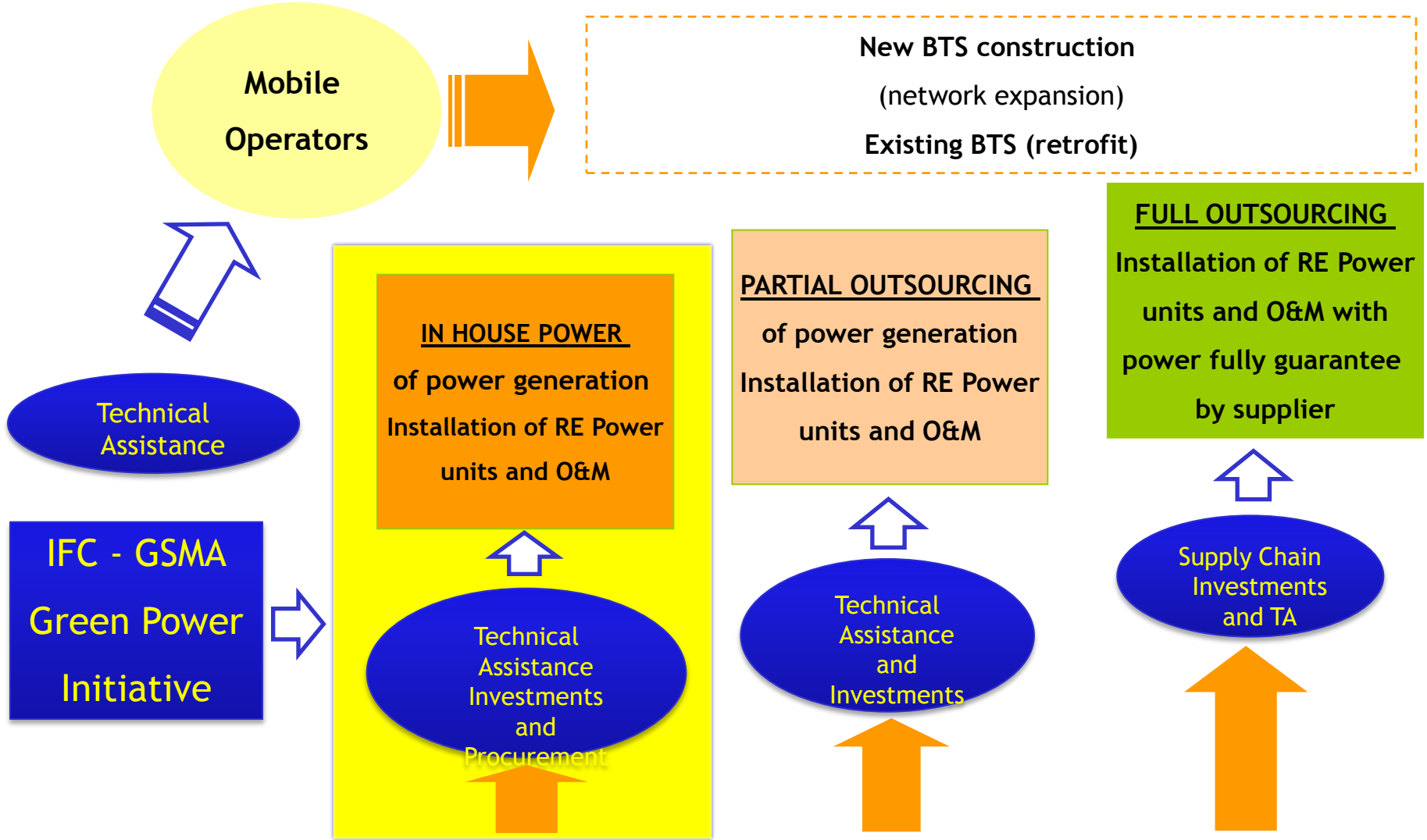
GSMA-IFC Initiative

- Direct Technical Assistance for GPM roll-outs
  - Direct support for a feasibility study of Green Powered BTS in developing country Mobile Network Operations, providing dimensioning support and development of rollout plan
- Green Power for Mobile Database
  - Develop criteria and data facility for global Green Power for Mobile database of deployments including details on equipment used, approximate payback period, challenges, successes
- Bi-annual Green Power for Mobile Industry reports
  - Bi-annual Green Power for Mobile Industry report containing global baseline tracking, case studies, industry updates, interviews, best practice articles

GSMA-IFC Initiative

- Green Power for Mobile Training
  - Development of training materials/curriculum for existing Green Power for Mobile methodology, tools & models
  - Development of training materials/curriculum for use of HOMER software for telecoms base stations
  - Development of Interactive Replication Guide for 'Implementing Green Power Solutions'
- Establish the economic approach for green power base stations
  - Establishing the Economic basis of Green power solutions
  - Review of Available Financial Instruments
  - Assessment of existing needs

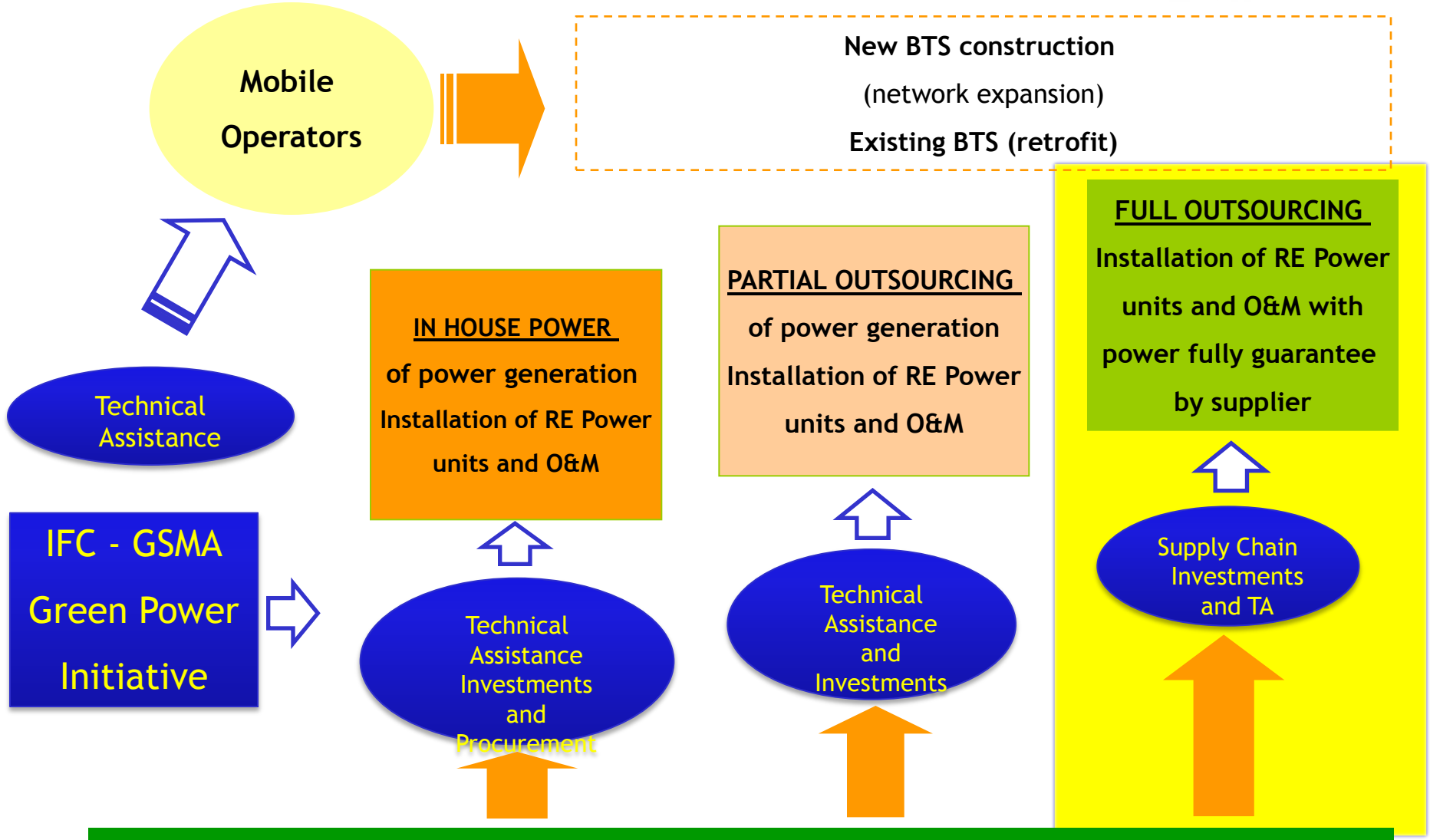
The Initiative



In House Green Power Generation
Discussion Questions

- What % of OpEx is spent on energy for BTS?
- Trial experience to date with Green Power for Mobiles ("GPM")
  - How do you view the economics of GPM systems
  - % of OpEx on energy (up to 40%)
- Where in roll out decision process and GPM planning/implementation process
  - Existing BTS; new BTS build out plans, related CapEx plan
  - Characterize where the Operator is in GPM evaluation & implementation planning
- When is there a good Business case for GPM?

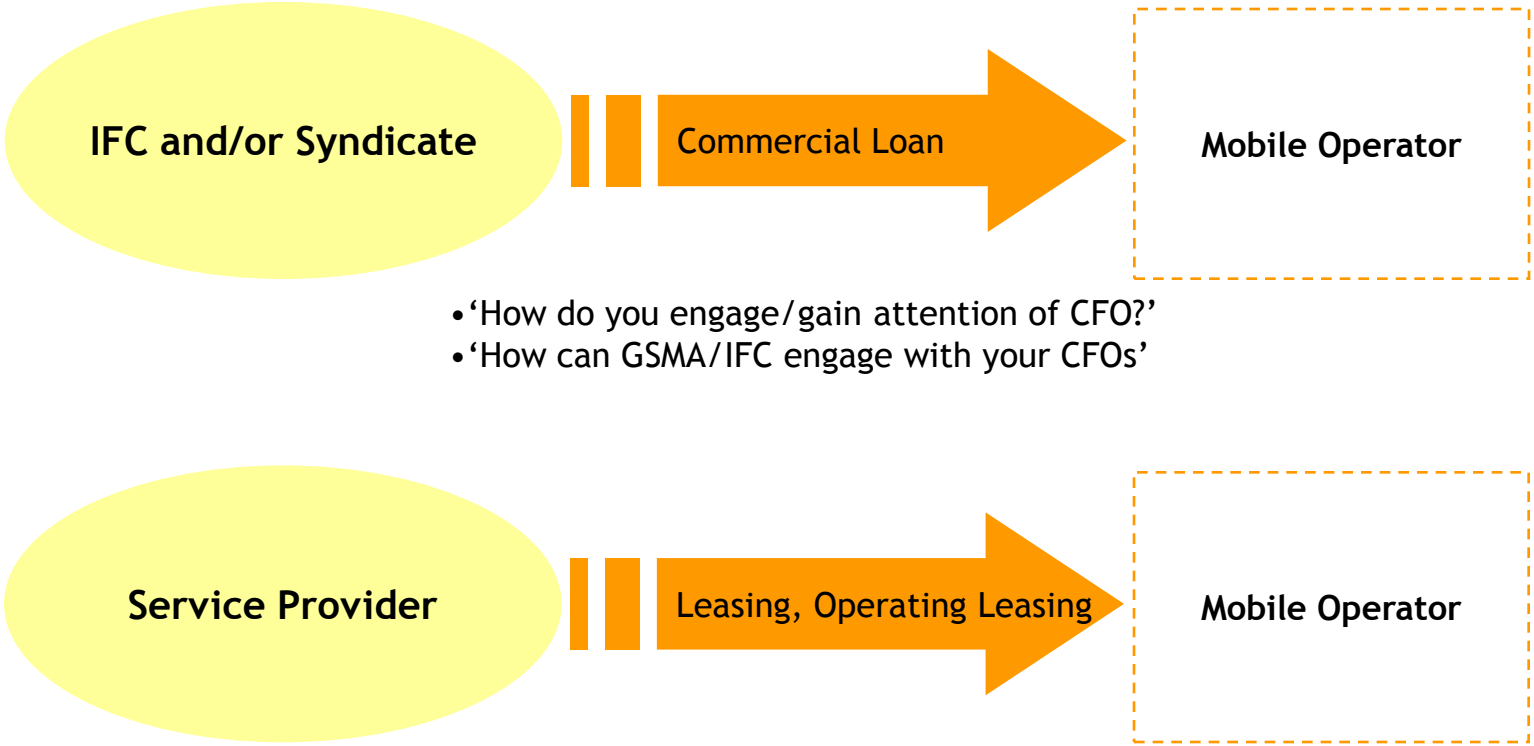
The Initiative



Full Outsourcing of Green Power Generation Discussion Questions

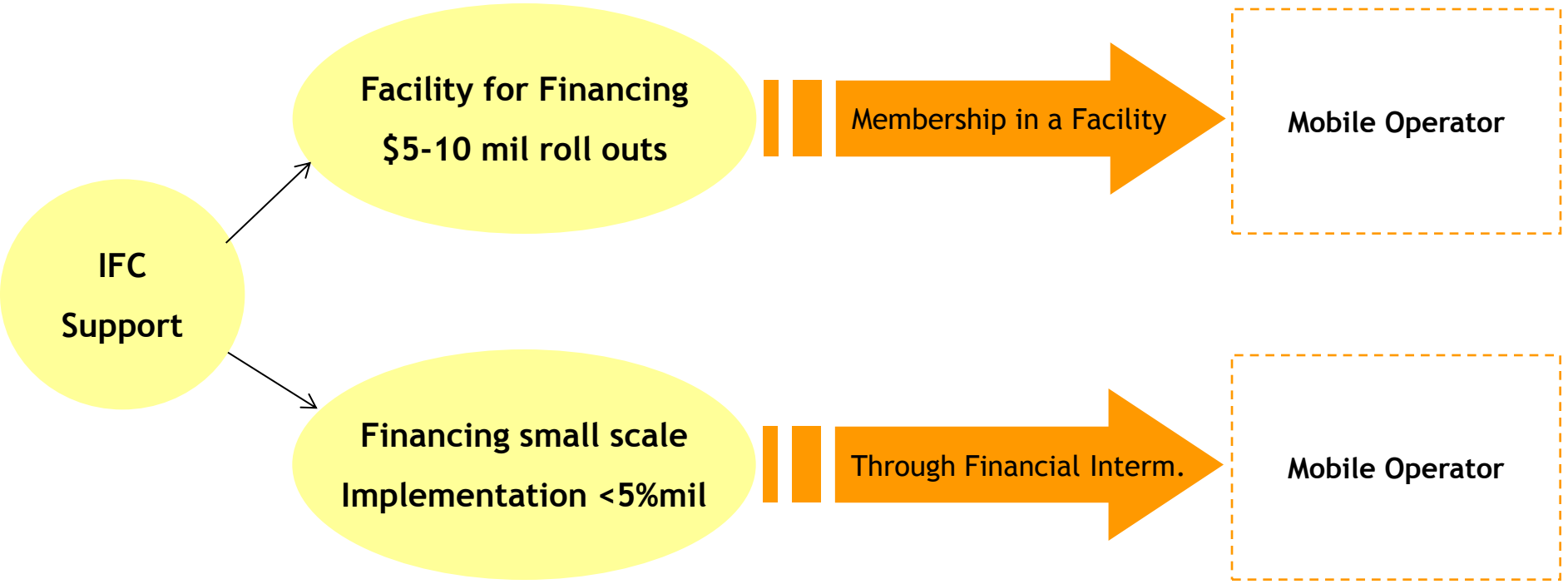
- What are the Strategic concerns of outsourcing the Green Power generation?
- What are the Technical concerns of outsourcing?
- Does outsourcing address any of the barriers identified in the previous discussion?
- What are the outsourcing contract structures you consider in order to mitigate credit and operational risk?

Financing Concepts



- 'How do you engage/gain attention of CFO?'
- 'How can GSMA/IFC engage with your CFOs'

Financing Concepts



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Financing Concepts

1. Capacity and interest to borrow; direct borrowing from IFC and/or syndicate
2. Leasing, operating leasing
3. Membership in a Facility, for financing $5-20 million roll outs
4. Local FI/lease financing for small scale implementation, e.g., < $5 million

Contact Details

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