

Financing Bundled Municipal Energy Efficiency Project

- Through Energy Performance Contracting in Tamil Nadu, India

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Energy Efficiency (EE) in Indian Municipalities - Context

- Municipalities spend an estimated 40-60% of their annual expenditure towards energy charges
- High rates of unaccounted for water; unreliable water services
- Lack of adequate Metering
- Municipalities often lack technical, managerial and financial capacity for improvement of services
- No existing Government policy on reducing energy consumption in water delivery and street lighting

Water and Energy Efficiency

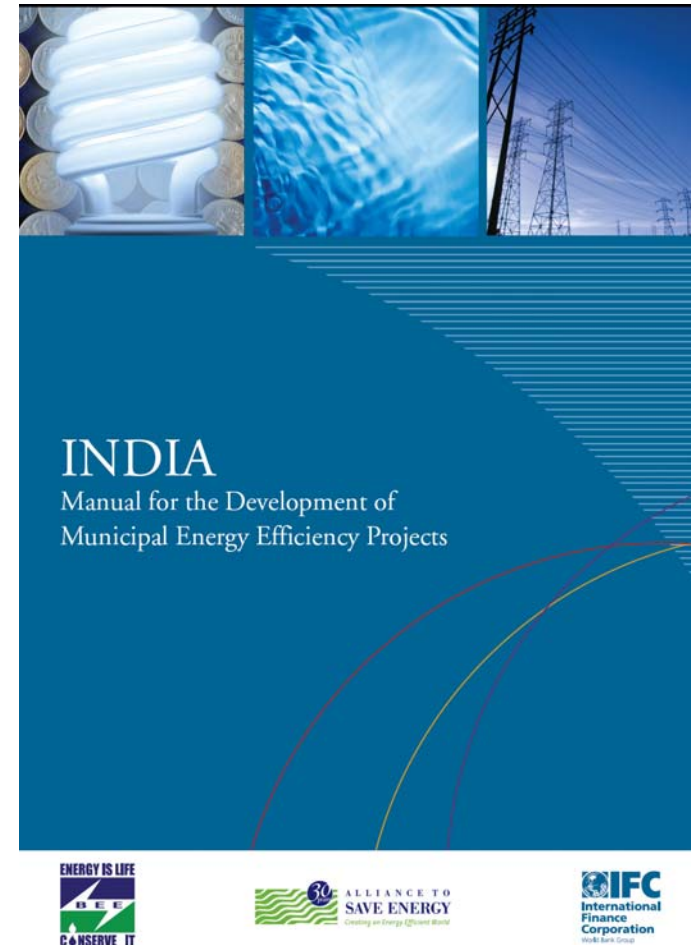
- Benefits to Municipalities



- Distribute water and treat wastewater efficiently, saving water, energy and costs
- Huge Savings potential: at least 25% saved from energy costs; much higher possible
- Quick Payback
- Provide cost effective water services while reducing energy consumption and protecting the environment
- Ensure access to sustainable water and energy resources for the urban poor

Manual for the Development of Municipal Energy Efficiency Projects in India

- Manual for EE projects in India was developed jointly along with IFC and Bureau of Energy Efficiency (BEE)
- Endorsed by BEE as a Standard Reference Document for all stakeholders
- Manual Includes guidelines on:
 - Self assessment
 - ESCOs
 - IGA
 - Procurement
 - Financing
 - M&V
- Templates
 - EOI, RFP, IGA and Performance contracts



Ways of Financing EE Projects

- The Municipality uses its internal funds such as O&M budget and capital budget

- The Municipality borrows from financial institutions

- ESCO brings the finance and implements agreed upon energy saving measures
 - Turnkey
 - Performance contract

Tamil Nadu - Bundling Municipal EE Projects

- Partnership with Tamil Nadu Urban Infrastructure Financial Services Limited (TNUIFSL), CMA, ULBs.
- Implementing energy efficiency projects in 29 municipalities in Phase One in Water pumping and Street lighting



Tamil Nadu Project

-Background and Purpose



Background:

- The barrier for Watergy/EE projects in India has been the financing
- Lack of awareness and Low confidence in ESCO projects in the public sector
- ESCO industry's hesitance to undertake public sector project. Issue of non-payment and disputes.

Objective:

- Create confidence in the use of Performance contracts in public sector among all stakeholders by ensuring the success of the Tamil Nadu Municipal Energy Efficiency Program

Result:

- A first of its kind bundled Municipal EE projects

Addressing ESCO financing issues in TN

Issues

- Availability of Finance to ESCOs.
- Payment Guarantee Mechanism to ESCOs
- ESCO projects in India often falter if not fail due to disputes over quantifying energy savings resulting from the project

Solutions

- TNUIFSL / TNUDF willing to finance ESCOs
- Setting up of TRA Account with electricity bill payment escrowed
- Using The International Performance Monitoring and Verification Protocol (**IPMVP**)
- Oversee Project progress and Provide technical support to develop local capacity
- Document IPMVP's suitability to Indian scenario.
- Develop financing tool kit including performance contracting case studies for replication in other cities
- Facilitate market transformation



TN Municipal EE Project Specifics



- Bid documents developed after many consultations with all stakeholders
- 29 towns divided into 3 geographical groups based on physical proximity
- Bid Evaluation Process:
 - EOI – 13 Responses.
 - RFP issued to 8.
 - Responses to RFP - 6.
 - LOI issued to 2 ESCOs
- IGA in progress



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For More Information

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