



## **BUILDINGS AND APPLIANCES TASK FORCE**

**8<sup>th</sup> Meeting**

**7-8 October, 2009**

**Tokyo, Japan**

# **Theme 5: Improvements to Existing Buildings**

# Project Summary

- Project Objective
  - Continuous monitoring of energy performance
  - No-cost/low-cost measures
  - Voluntary market transformation approaches
  - Portfolio management strategies
  - Cost-effective energy efficiency retrofits
  - Improve the energy efficiency of residential buildings
  - Programs and activities



# Project Summary (2)

- Project Elements
  - BATF-06-18 Training workshops: on energy management, low-cost EE in existing buildings, tools, standardization, technical issues
  - BATF-06-19 Pilot implementation of no-cost and low-cost EE measures in existing buildings
  - **BATF-06-20 Proposed framework screening tool for evaluating potential for retrofits (cancelled)**
  - BATF-06-21 Retrofit of Existing Building Chillers in India
  - BATF-06-22 Develop a guide to retrocommissioning of existing buildings
  - BATF-06-23 Energy efficiency upgrade: low energy high rise project (including international extension)
  - BATF-07-38 The urban climate project – building clean and efficient cities
  - BATF-07-39 Australian-Indian building tune-ups
  - BATF-07-40 Energy management program in India
  - **BATF-07-41 Tianjin green office building retrofit (cancelled)**
  - BATF-08-48 Existing Building Renovation in China
  - BATF-09-51 Improving Energy Efficiency in Buildings through Improved Operations

# Project Summary (3)

- Recent Project Outputs
  - (06-18, 06-19, 06-22) Sept 2009 – No activity.
  - (06-21) World Bank selected alternate financial intermediary, the Industrial Development Bank of India (IDBI), to implement the project.
  - (06-23) June 2009 – Stage 2 has been completed with a final report on the potential for extending the Low Energy High Rise (LEHR) project to India and China delivered on 18 June 2009.
  - (07-38) ICLEI working with project cities to develop Detailed Project Reports for clean interventions as prerequisite for JNNURM (national grant for sustainability funding) and related urban development program financing.

# Project Summary (4)

- Recent Project Outputs
  - (07-39) June 2009 – Submitted 2<sup>nd</sup> Progress Report on 15 June 2009, reporting on the period from 12th December 2008 to 12th June 2009. The report was assessed as having substantively satisfied the required milestones for Objective 2 with some minor matters in relation to milestone 8 and 11 to be addressed in Objective 2 A and B.

# Project Summary (5)

- Recent Project Outputs
  - (07-40) Sept 2009 – Project assistance helped BEE award Star Rating program for 50 commercial buildings; Two ESCOs have commenced Municipal Energy Efficiency Project for 10 urban local Bodies in Gujarat; Four workshops on Educational Curriculum Enhancement Program have been completed at Jadavpur University, Kolkata, Chandigarh College of Architecture, Chandigarh, NIT Hamirpur and Faculty of Architecture of UP Technical University, Lucknow ; and Energy Conservation Building Code – User Guide was finalized, printed and launched by BEE on 22 July 2009.

# Project Summary (6)

- Recent Project Outputs
  - (08-48) Review existing China Assoc. Of Science and Technology building, develop an energy-efficient renovation plan; Provide technical assistance to architectural and engineering team and CAST; Prepare case study of building renovation and disseminate in publications and conferences

# Project Summary (7)

- Recent Project Outputs

- (09-51) June 2009: Final No-Cost and Low-Cost training presentation; BETA Building Performance Monitoring Tool; Draft No-Cost and Low-Cost Energy Saving Guidebook; Financial Value Training; Energy Performance Monitoring Tool Training; Building recruitment folder; Chengdu Property Management Association (CCDPMA) workshop resource folder; News coverage of the Chengdu Property Management Association Event

Sept 2009: BETA Automated Opportunity Assessment; Guangzhou workshop resource folder

# Next Steps

- (06-18, 06-19, 06-22) To be determined.
- (06-21) World Bank to identify beta-testers of the financial analysis tool through its equipment manufacturer and building owner contacts in India. IDBI to initiate outreach with building owners and participating equipment vendors to develop project proposals using innovative financing mechanism.
- (06-23) Project is complete. Report was sent to BATF members in July/August 2009.
- (07-38) Sept 14-15, ICLEI held a national APP workshop to train cities on how they can promote low carbon development and integrate clean development principles into their infrastructure implementation plans.



# Next Steps (2)

- (07-39) Pursue Objective 2a: Detailed Feasibility Assessments (DFA's) and Building Tune-Up (BTU) Proposals and Objective 2b: Final Building Owner Sign Up.
- (07-40) Preparation of M&V Plan and case studies for Buildings and Municipalities in partnership with Alliance for an Energy Efficient Economy and DSCLES; Finalization of Municipal Street-Lighting Tip Sheet; Document Gujarat MEEP as a Case Study; and Identify the state in partnership with BEE for ECBC implementation.

# Next Steps (3)

- (08-48) Follow retrofit construction process and evaluate building energy performance after completion, expected June 2010
- (09-51) Chengdu Workshop (Nov 2009) to provide additional support in implementation of energy-saving measures and identify possible case studies; Continue program activities in Chengdu, Guangzhou, and Shenzhen, and begin implementation in additional cities; Begin preparation of documenting results and recognizing achievement in participant buildings



# Input Needed from Project Team

- Commitment required
- Resources required
- Information required
- Meetings required
- Work required

