

The Purpose and Outline of Energy Efficiency Standards and Labeling Policy Supporting Project; Progress to Date

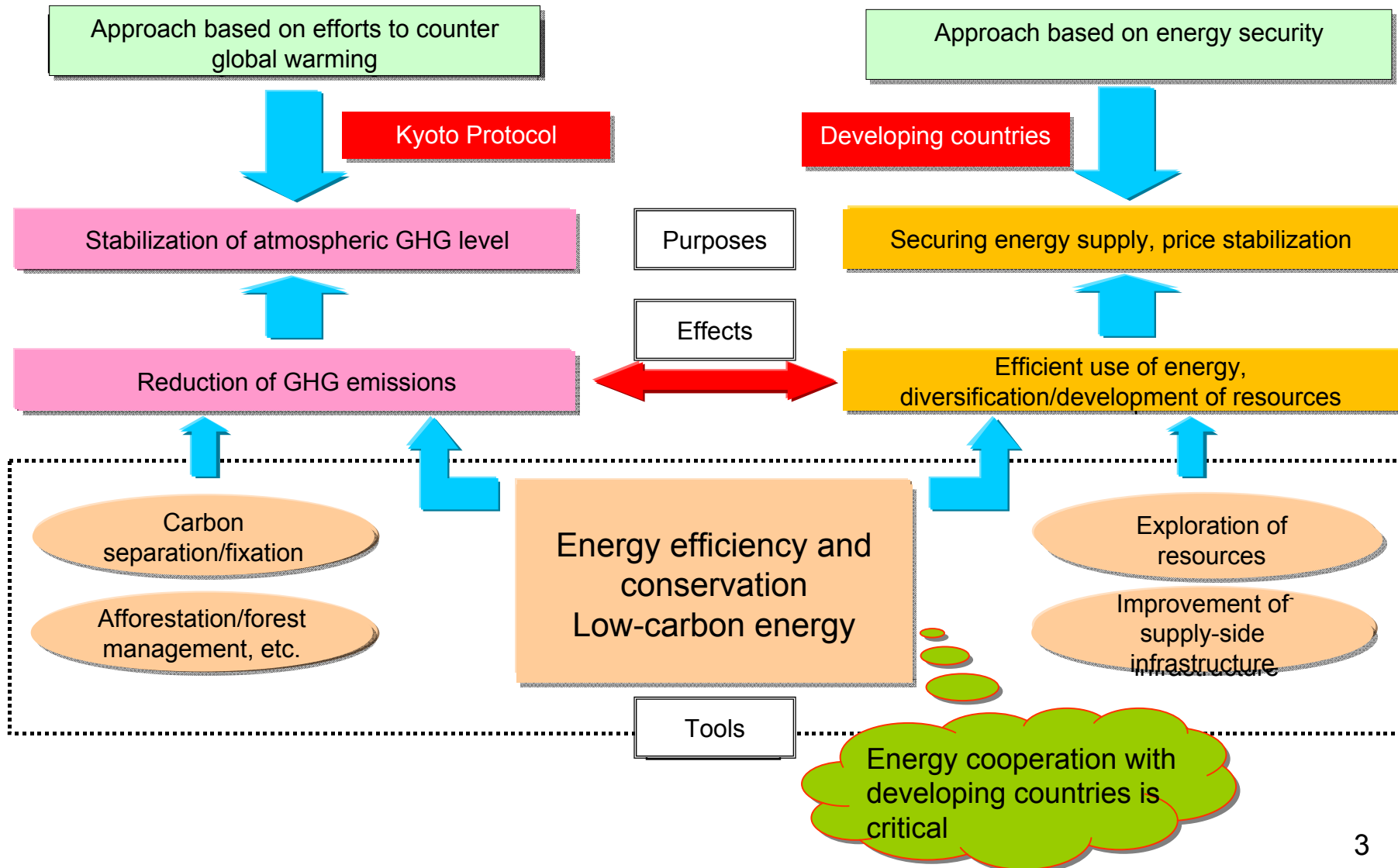
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Background of Policy Development Assistance Projects for Energy Efficiency

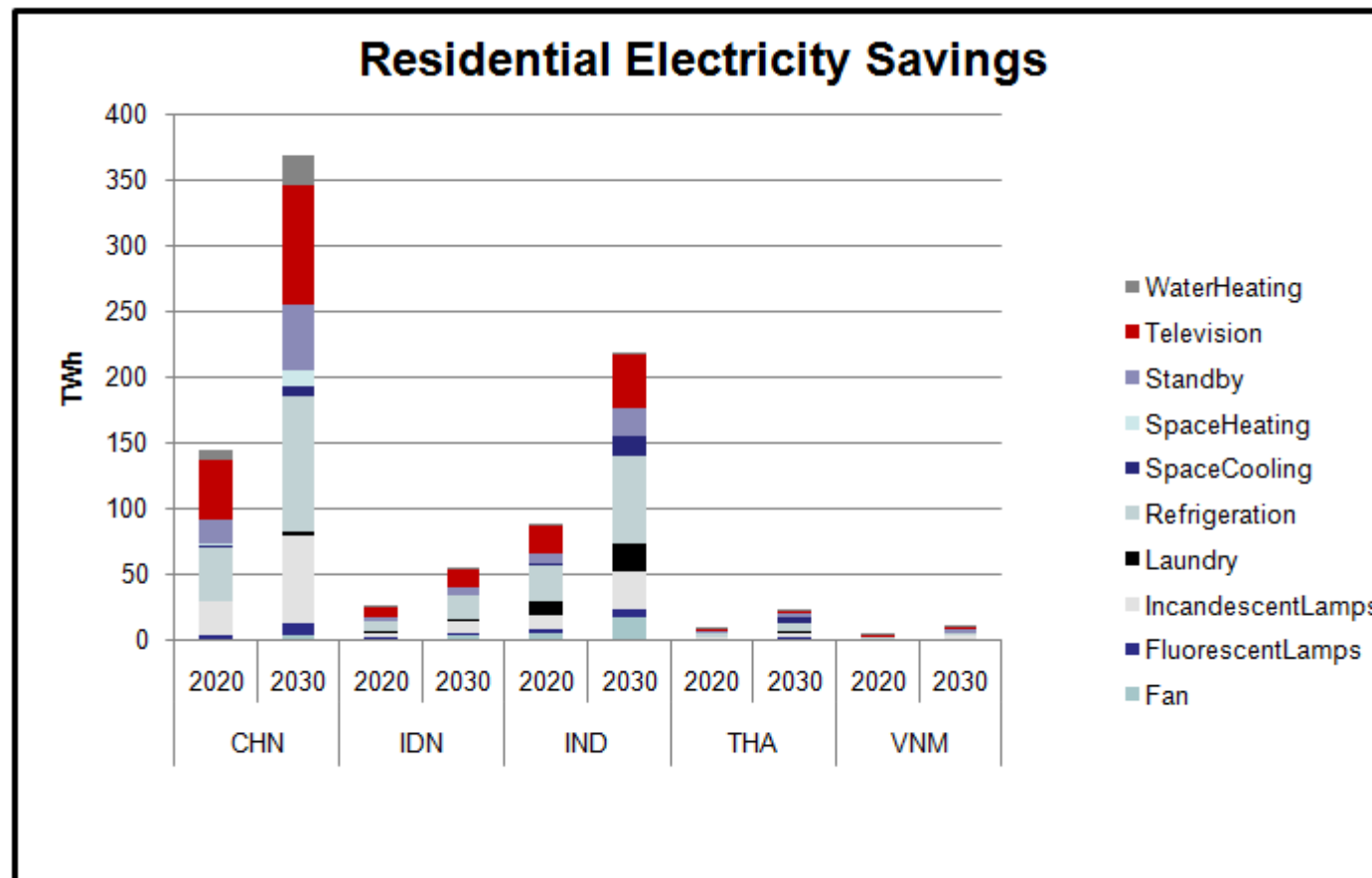
- ⊕ Japan's efforts to establish a "low-carbon society" managing both climate change and energy security issues
- ⊕ Need for developing countries consume energy more efficiently in order to maintain high economic growth.
- ⊕ Ever-increasing importance of cooperation for regional and global optimization by employing Japanese technology and knowledge to promote higher efficiency in developing countries

Efforts to tackle climate change and energy-related issues



Potential for S&L Policy in Household Appliance Sector

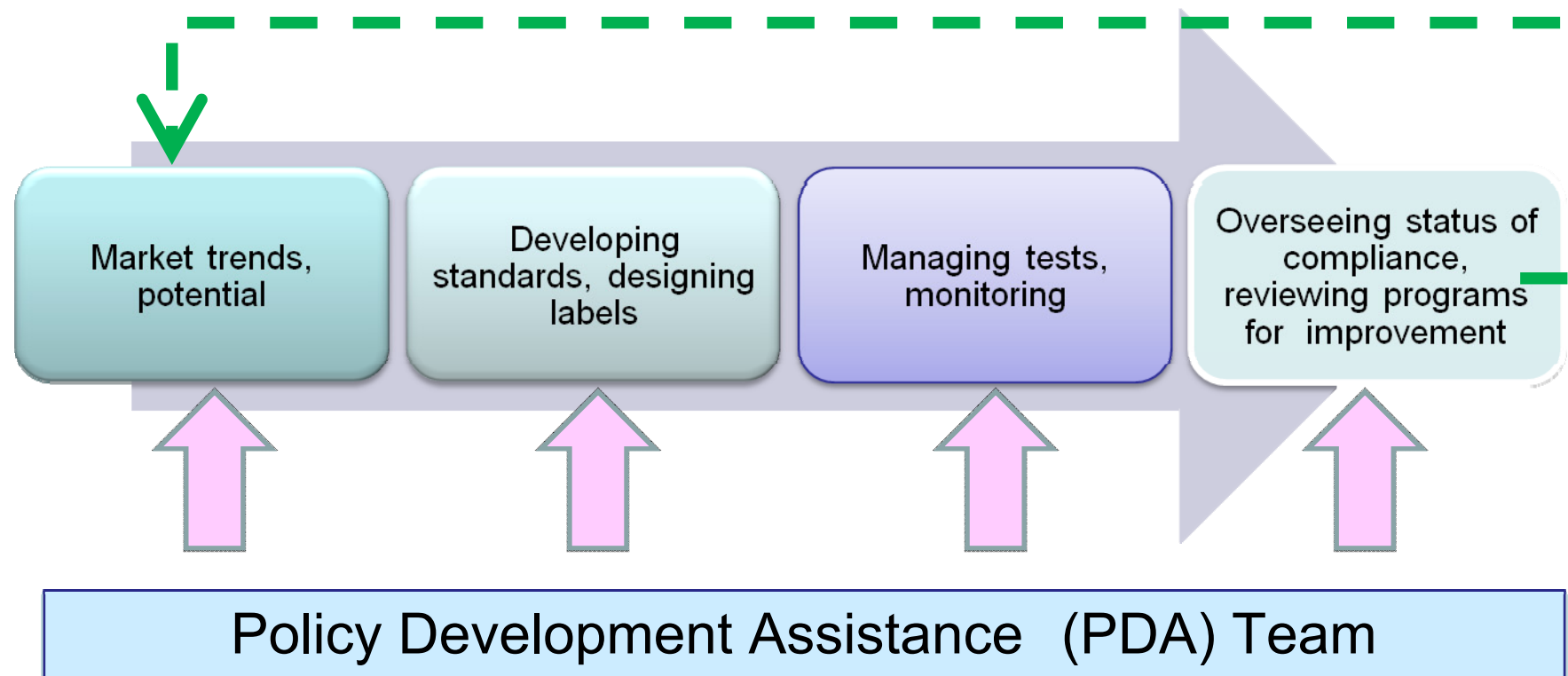
- ⊕ In light of future Asian economic growth, an effective S&L policy in household appliance sector is important.



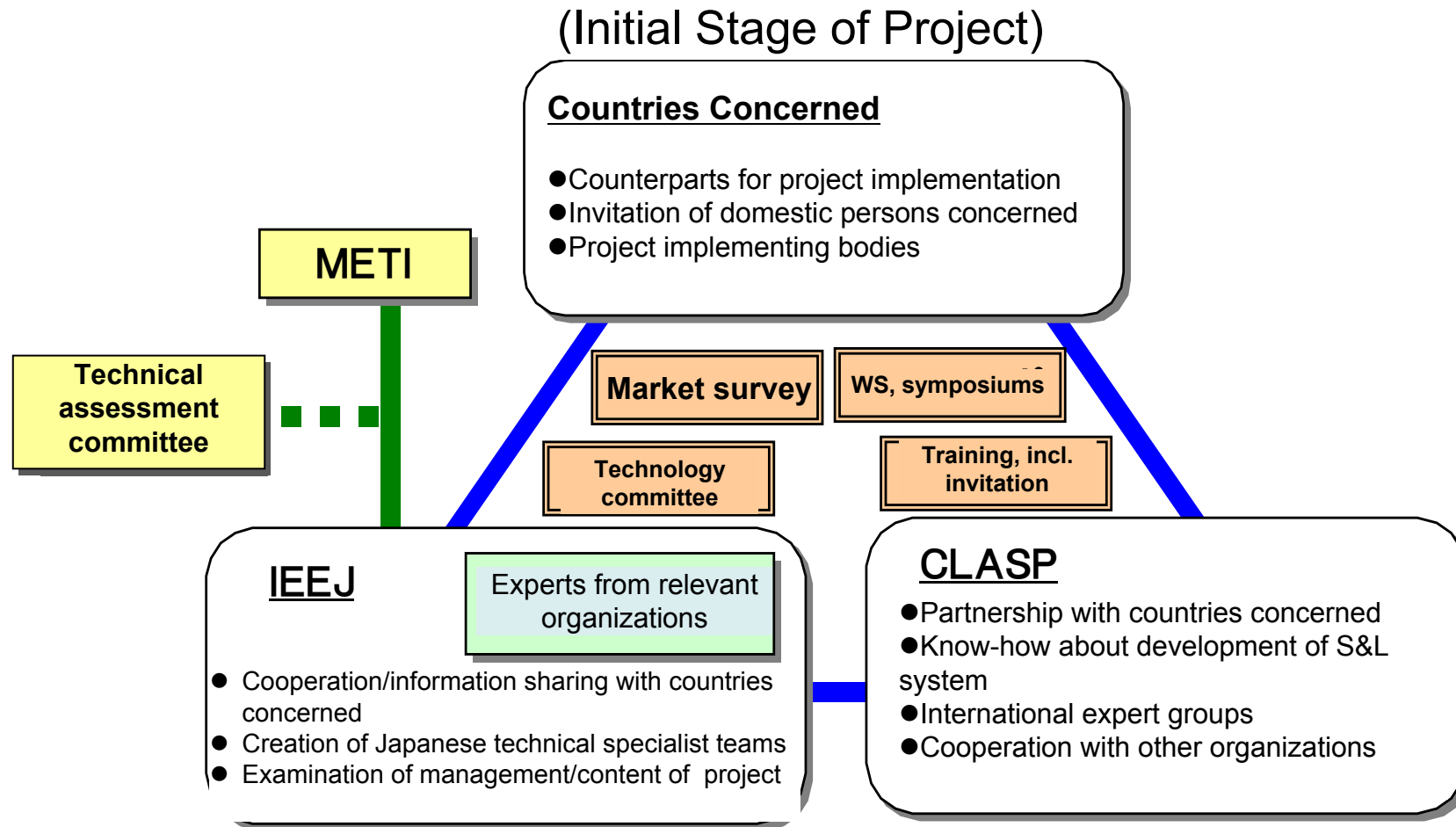
(Source) IEEJ/CLASP Project in 2006

How will S&L Policy Development Assistance in the Household Appliances Sector work?

- ✦ Japanese technical specialist team to support S&L policy development and improvement according to country-specific circumstances, based on detailed review of market trends, current stage of policy review and status of policy implementation in host countries.

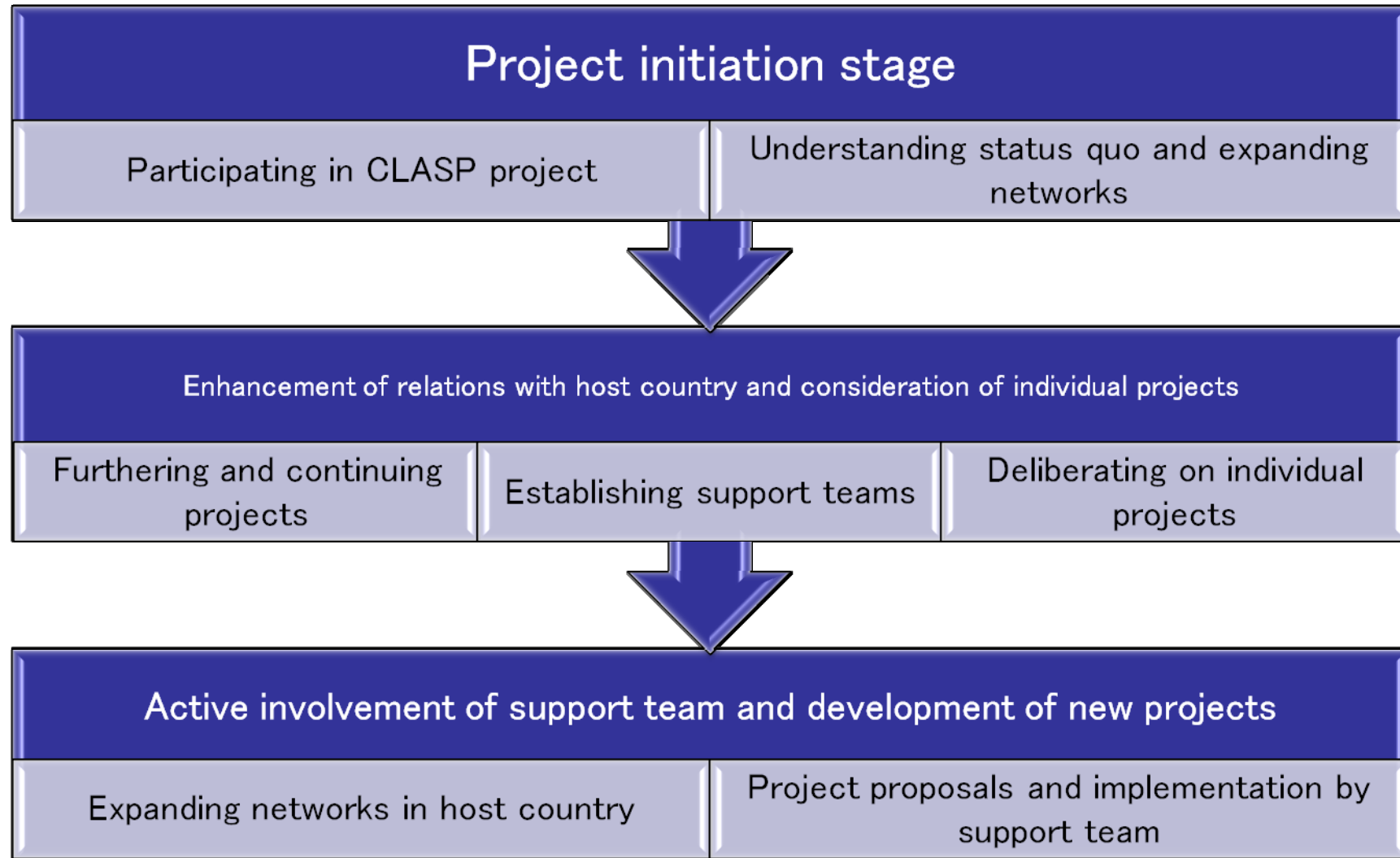


S&L Policy Assistance Framework

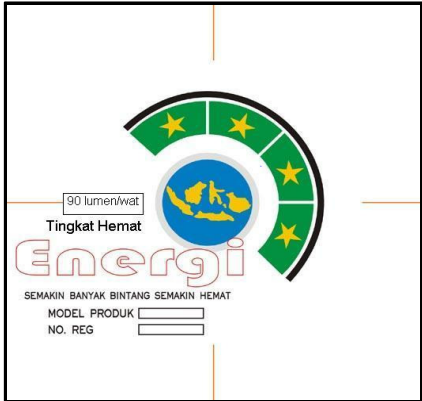


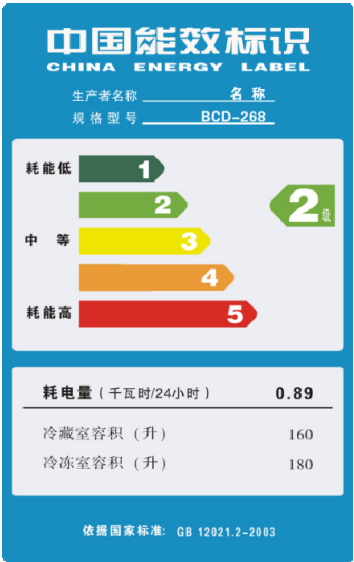

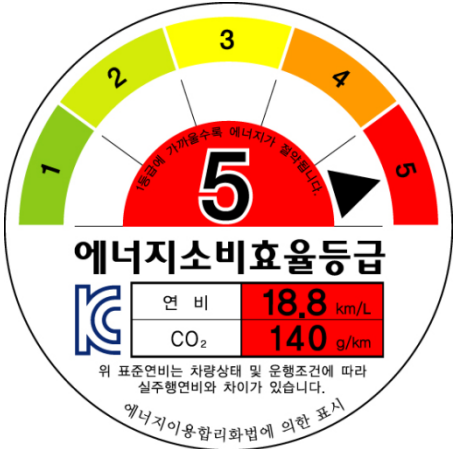


•**CLASP** (Collaborative Labeling and Appliance Standards Program) is an NPO based in the US devoted to the global promotion of energy efficiency. It was launched in 1996 as a initiative with a mission to support the development of energy efficiency S & L programs in developing countries, in particular, and became an international independent organization in 2005. In China, it has cooperated in promoting energy efficiency improvements, capacity-building in relevant institutions and a deeper understanding for the dynamics of energy use. The Lawrence Berkley National Laboratory (LBNL), CLASP's main partner, currently collaborates with China's CNIS to develop S&L policy and sends specialists for technical training of personnel.

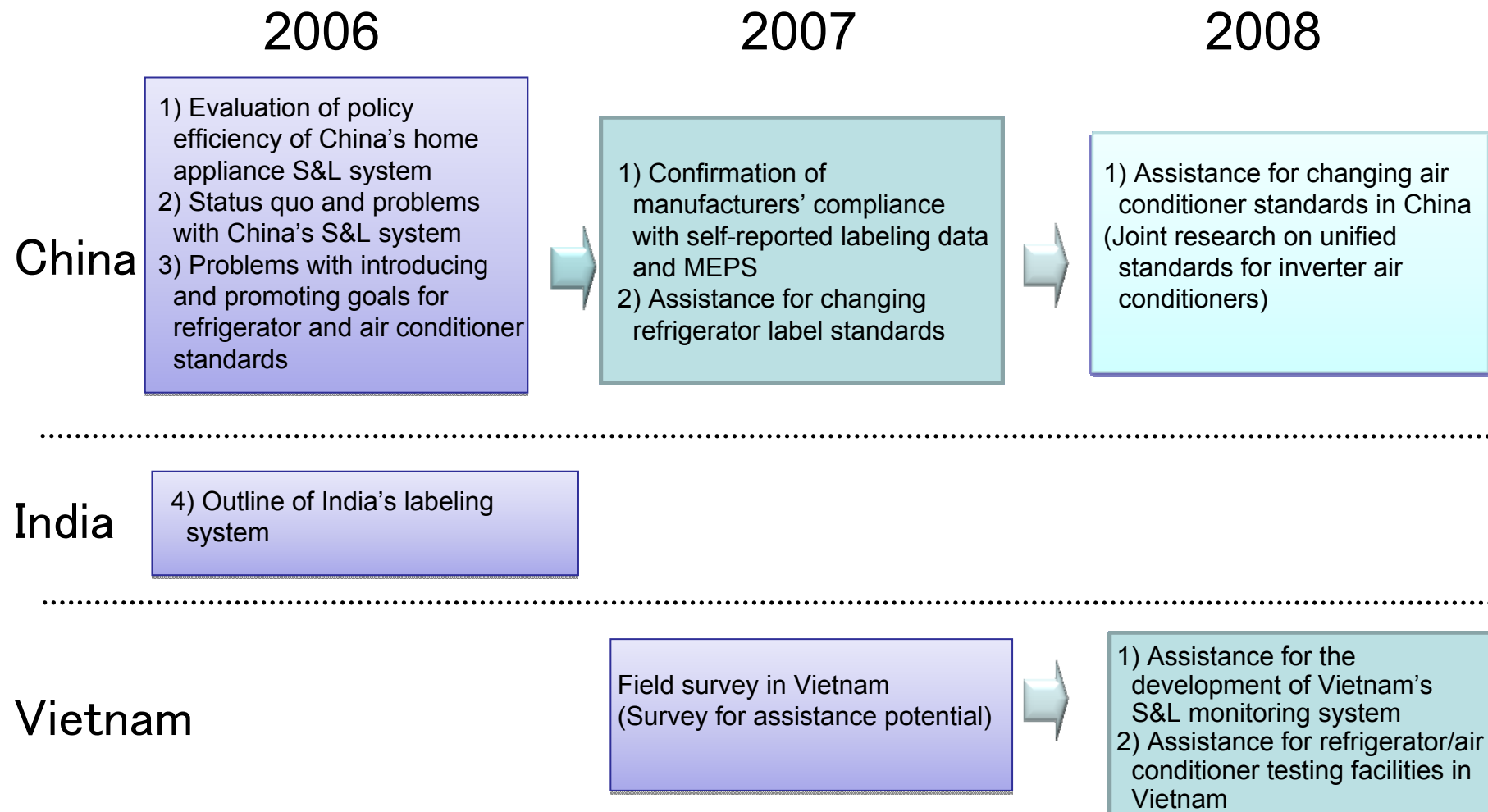
Step by step for creating project scheme



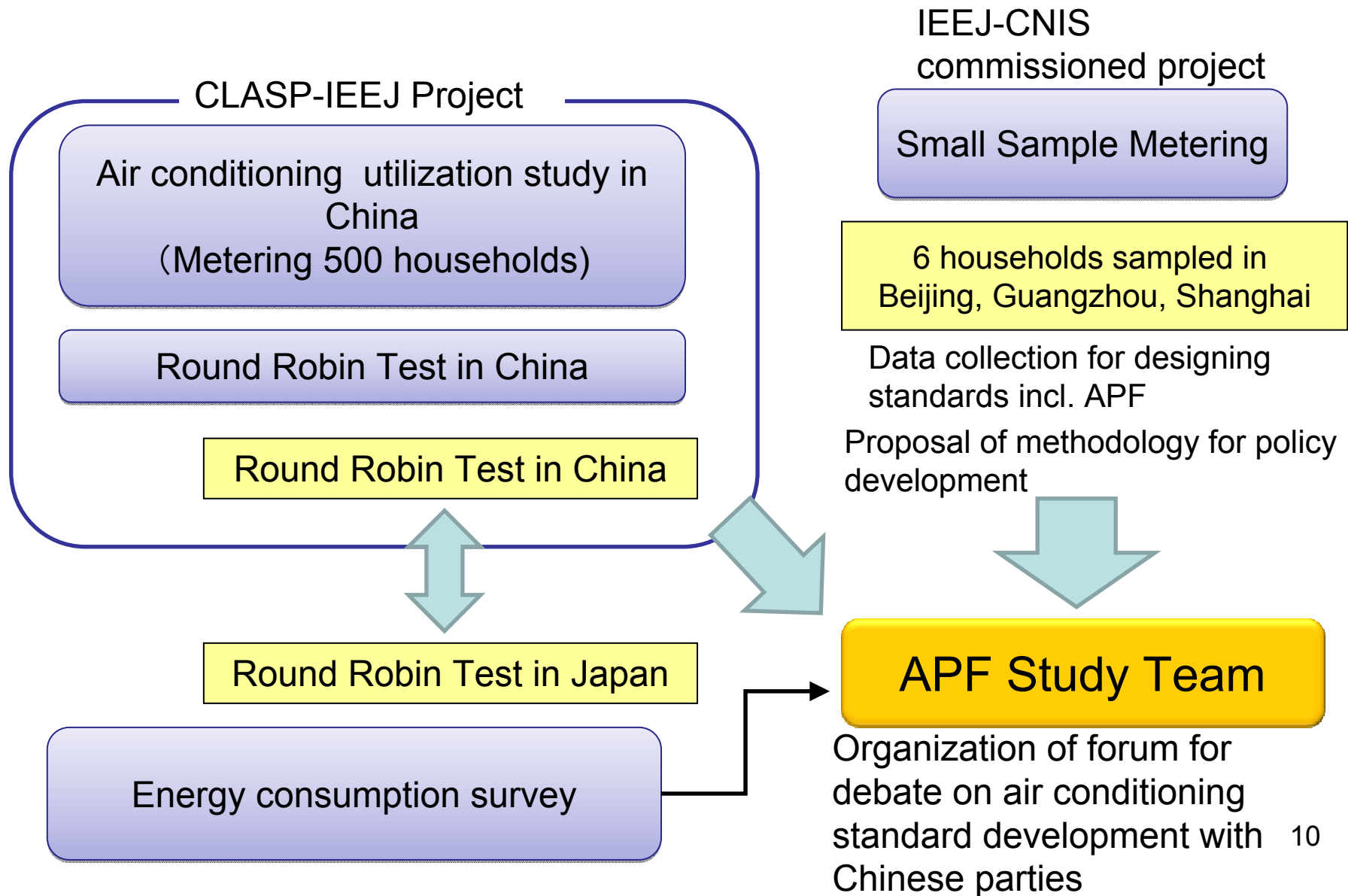
Labels in Major Asian Countries

Indonesia	Vietnam (draft)	Thailand
 <p>90 lumen/wat Tingkat Hemat Energi SEMAKIN BANYAK BINTANG SEMAKIN HEMAT MODEL PRODUK _____ NO. REG _____</p>	 <p>TIỆT KIỆM NĂNG LƯỢNG MỨC TIÊU CHUẨN: 620 kWh/năm Tên sản phẩm: _____ Mã: _____ Dùng tích: _____ Hãng sản xuất: _____ Logo: _____ Thông tin nhà sản xuất</p>	 <p>เกณฑ์พลังงาน 2008 ฉลากประหยัดพลังงาน ประเภท : หลอดไฟฟลูออโรเรซิน ประสิทธิภาพ (lm/watt) _____ หลอดไฟฟลูออโรเรซิน รุ่น _____ ยี่ห้อ (ชื่อ) _____ แบรนด์ _____ กฟผ. กระทรวงพลังงาน</p>
China	Japan	Korea
 <p>中国能效标识 CHINA ENERGY LABEL 生产者名称 _____ 名称 _____ 规格型号 _____ BCD-268 _____ 耗能低 1 2 3 4 5 中等 耗能高 耗电量 (千瓦时/24小时) 0.89 冷藏室容积 (升) 160 冷冻室容积 (升) 180 依据国家标准: GB 12021.2-2003</p>	 <p>この商品の省エネルギー性能は? 省エネ等級 5 省エネルギー等級 (100%) 年間消費電力量 120kWh 年間消費電力量 420kWh 9,240円 この製品を1年間使用した際の目安価格です 民生用標準消費電力量 (100%)と省エネ等級5の製品を比較した場合、</p>	 <p>에너지소비효율등급 연비 18.8 km/L CO₂ 140 g/km 위 표준연비는 차량상태 및 운행조건에 따라 실주행연비와 차이가 있습니다. 에너지이용합리화법에 의한 표시</p>

Project Outline for FY 2006~2008



Outline of Project in China, FY2009



Accomplishments of APF Study Team

- ⊕ Support team and CNIS (China National Institute of Standardization) engaged in numerous consultations.
- ⊕ Participants from academic and industrial circles joined WS held by China Association of Refrigeration to discuss energy efficiency improvements and standardization in air conditioning
- ⊕ Architectural and consumer specialists and industry representatives discussed status of air conditioning utilization in Beijing, Shanghai and Guangzhou: how should the average household be defined?
- ⊕ Project introduced at Japan-China Energy Conservation and Environment Forum's Working Session for Top-Runner Programs to encourage shared awareness.

Vietnam Project, FY2009

Support for improvements in testing technologies
at air conditioning test facilities in Vietnam

Training at test facilities in Vietnam

- ✓ Development of test manual to meet status quo of Vietnamese test facilities with help of Japan Refrigeration and Air Conditioning Association (JRAIA)

Training on test methods in Japan

- ✓ Performance tests demonstrated in presence of technical experts from Vietnamese test facilities
- ✓ Comparison of JRAIA and Vietnamese test results to identify issues regarding test equipment and testing methodology issues and to improve testing technologies.

Collaboration with JRAIA

Consideration of Projects in Thailand

- DEDE (Department of Alternative Energy Development and Efficiency, Ministry of Energy, Thailand) plans to develop HEPS (voluntary standards) for inverter air conditioners (possibly in summer 2010)
- Local forum for opinion exchange in response to requests from participants at 2007 symposium for this project
- Chiang Mai University leads standard development with main focus on introducing SEER (seasonal energy efficiency rating) and taking US and Japanese APF into consideration.
- Thai delegates visit Japan for hearings on background and outline of APF development in Japan, testing facilities, operations, etc. (Jan. 25-26, 2010)

Issues for Future Consideration

- Reviewing models and countries to address and considering potential for expansion.
- Enhancing networks with host country
 - ✓ Careful review and understanding of policy decision process and selection of appropriate counter, enhanced relation
 - ✓ What is the ideal method for network enhancement & maintenance?
- Establishing scheme that will adequately accommodate host country needs
 - ✓ In particular, securing experts and establishment and enhancement of collaboration with specialized institutions incl. universities
 - ✓ What is the ideal Japanese scheme? (should be founded on accumulated data and knowledge and continuity; e.g. US = CLASP, LBNL)

My deep thanks for your
understanding and cooperation in our
project.

Thank you very much
for your attention.