

Program NAMAs and Its MRV

19th Asia-Pacific Seminar on Climate Change

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Kitakyushu, JAPAN

 $20^{th}\,-23^{th}$ July, 2010



国家发展和改革委员会能源研究所 Energy Research Institute National Development and Reform Commission

1. NAMAs and Program NAMAs



1.1 National appropriate mitigation actions (NAMAs)

origin 1: 1(b)ii, Bali Action Plan

•Nationally appropriate mitigation actions by developing country Parties in the context of sustainable development, supported and enabled by technology, financing and capacitybuilding, in a measurable, reportable and verifiable manner.

origin 2: country driven sustainable develoment and poverty elevation \rightarrow Distinct from one to another.





| Forms | Examples | | | |
|------------------------------------------------|---------------------------------------------------------|--|--|--|
| Integrated CC program | National/ provincial program | | | |
| Individual project under CC program | Energy efficiency project in resident sector | | | |
| Legislation and regulation | Renewable energy law | | | |
| Standards | Iron-steel industry energy efficiency standard | | | |
| Institutional arrangement | National authority or coordination mechanism | | | |
| Fiscal measures | Eliminate subsidy, Tax | | | |
| Market-based measures | Voluntary emission reduction market | | | |
| Industry/sector program | Phasing out backward technology and production capacity | | | |
| Public awareness, education, capacity building | Climate related training and media program | | | |
| R,D&D | Low-carbon technology R,D&D | | | |





| Forms | Examples in China | | | | |
|---------------------------------------|-------------------------------------------------------------------------------------------|--|--|--|--|
| Integrated CC program | Climate change program of Xinjiang Uygur Autonomous Region, 24 th Sep. 2007 | | | | |
| Individual project under CC program | energy-saving lamps popularized project: 62 million in 2008 | | | | |
| Legislation and regulation | Renewable energy law, 28th Feb, 2005 | | | | |
| Standards | Household refrigerators energy efficiency standard, 1 st Mar. 2005 | | | | |
| Institutional arrangement | National Leading Committee on CC, Jun. 2007 | | | | |
| Fiscal measures | Export rebates elimination, 22 nd Jun. 2010 | | | | |
| Market-based measures | Voluntary emission reduction market | | | | |
| Industry/sector program | Shut down small thermal power units: 16.29 GW in 2008 | | | | |
| Public awareness, education, capacity | "Energy Saving Manual", 9th Jun.2010 | | | | |
| building | http://gjjnzx.ndrc.gov.cn/jnsc%20800-600.html | | | | |
| R,D&D | Cooperation Action within CCS China-EU | | | | |





1.2 NAMAs and assessment

| Type of actions | Sovereignty irrespective? | Mitigation specific driven? | Qualitative assessment? | Quantitative assessment? |
|------------------------------------------------|------------------------------|-----------------------------|-------------------------|--------------------------|
| Integrated CC program | × | × | | |
| Individual project under CC program | \checkmark | \checkmark | \checkmark | |
| Legislation and regulation | × | × | | × |
| Standards | \checkmark | \checkmark | | |
| Institutional arrangement | × | × | | × |
| Fiscal measures | × | × | | |
| Market-based measures | | × | | |
| Industry/sector program | | \checkmark | | |
| Public awareness, education, capacity building | | × | | × |
| R,D&D | | | | |





- Annex I Party mitigation;
- *Financial and technological support* of non-Annex I mitigation, and
- Non-Annex I mitigation *program* supported by developed countries.



2. MRV

•*Financial support:* International balance sheet

(eg. Copenhagen Accord's Fast Start financing)

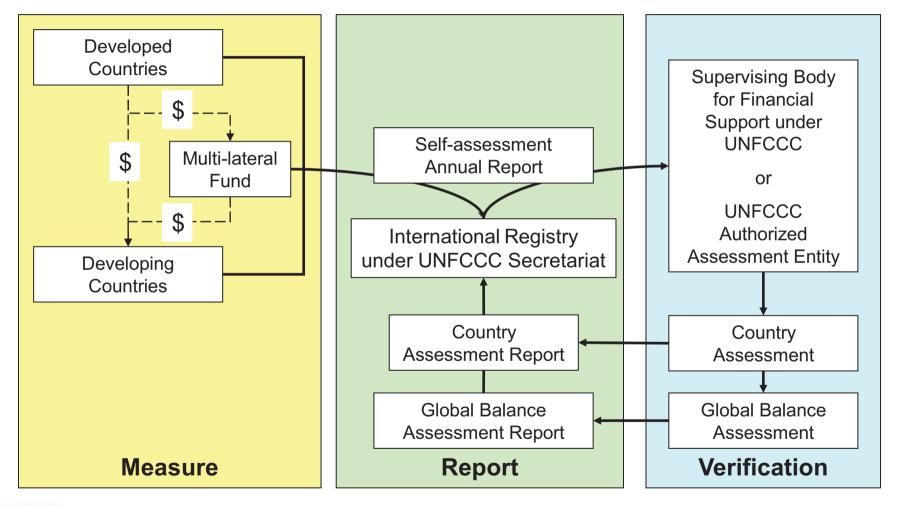
| | Expenditure | Developed Countries | | Developing Countries | | | Multilateral | | duuntuu | |
|--------------|-------------------------------------------------|---------------------|--|----------------------|---------------------|--|--------------|-----------|-----------|----------------------------|
| Inc | ome | Austr alia | | USA | Afgh anist an | | Zimb abwe | Fund A | Fund B | Country Total Income |
| Developed | Australia | N.A. | | 0 | 0 | | 0 | 0 | 0 | 0 |
| | | | | | | | | | | |
| Ω | USA | 0 | | N.A. | 0 | | 0 | 0 | 0 | 0 |
| Developing | Afghanistan | 10 | | 30 | N.A. | | 0 | 20 | 15 | 75 |
| | | | | | | | | | | |
| Ă | Zimbabwe | 10 | | 30 | 1 | | N.A. | 20 | 15 | 76 |
| Multilateral | Fund A | 2 | | 6 | 0 | | 2 | 2* | 0 | 12 |
| | Fund B | 8 | | 4 | 1 | | 0 | 8 | 3* | 24 |
| | Country Total Expenditure | 30 | | 70 | 2 | | 2 | 50 | 33 | |
| Note | Note: * incomes from interest etc. of the fund. | | | | | | | | | |



2. MRV

•Financial support







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2. MRV



Technological support

- MV: effectiveness: GHGs mitigation
- MV: Monetize?

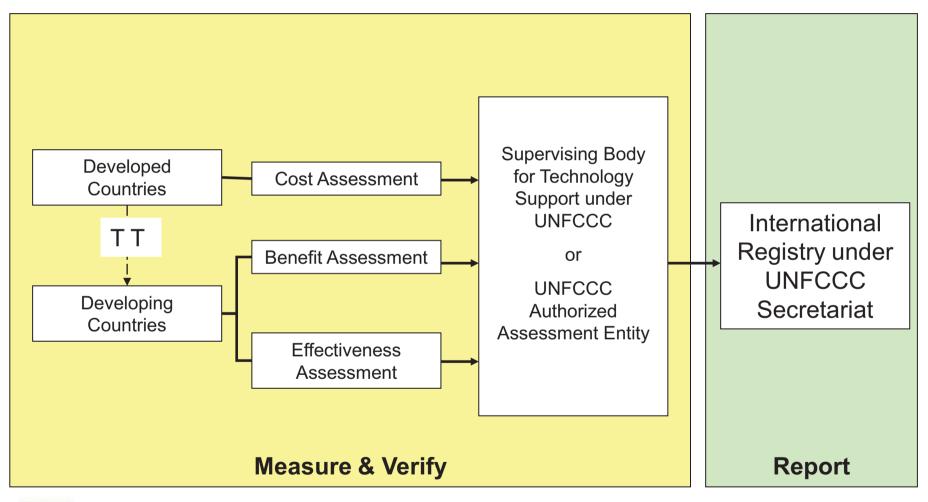
Cost assessment: $\sum_{i} Cost(R\&D_i + assist_i - transfer_i)$ Benefit assessment: \sum benefit(application_i - BAU_i)

• R: publication platform, beside National Communication

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2. MRV

Technological support

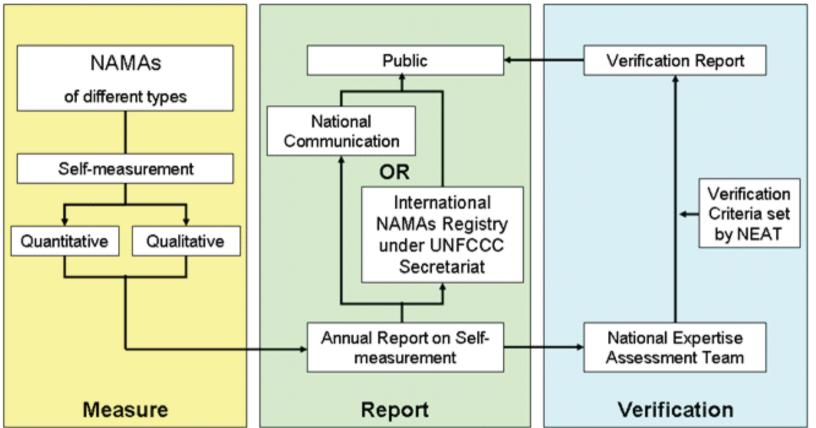




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3. Program NAMAs and Its MRV



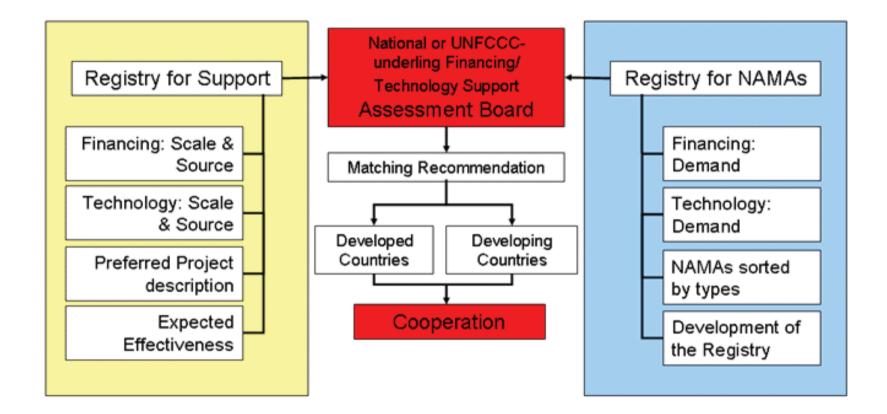


MV: criteria/index for assessment & procedure

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4. NAMAs: Matching support with actions









Thank you!



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