FICCI

Impacts, Governance and Future of CDM

Indian Industry Perspective





FICCI Report on Impacts, Governance and Future of CDM

(Based on UNFCCC CDM Policy Dialogue India Consultation and Industry Survey)

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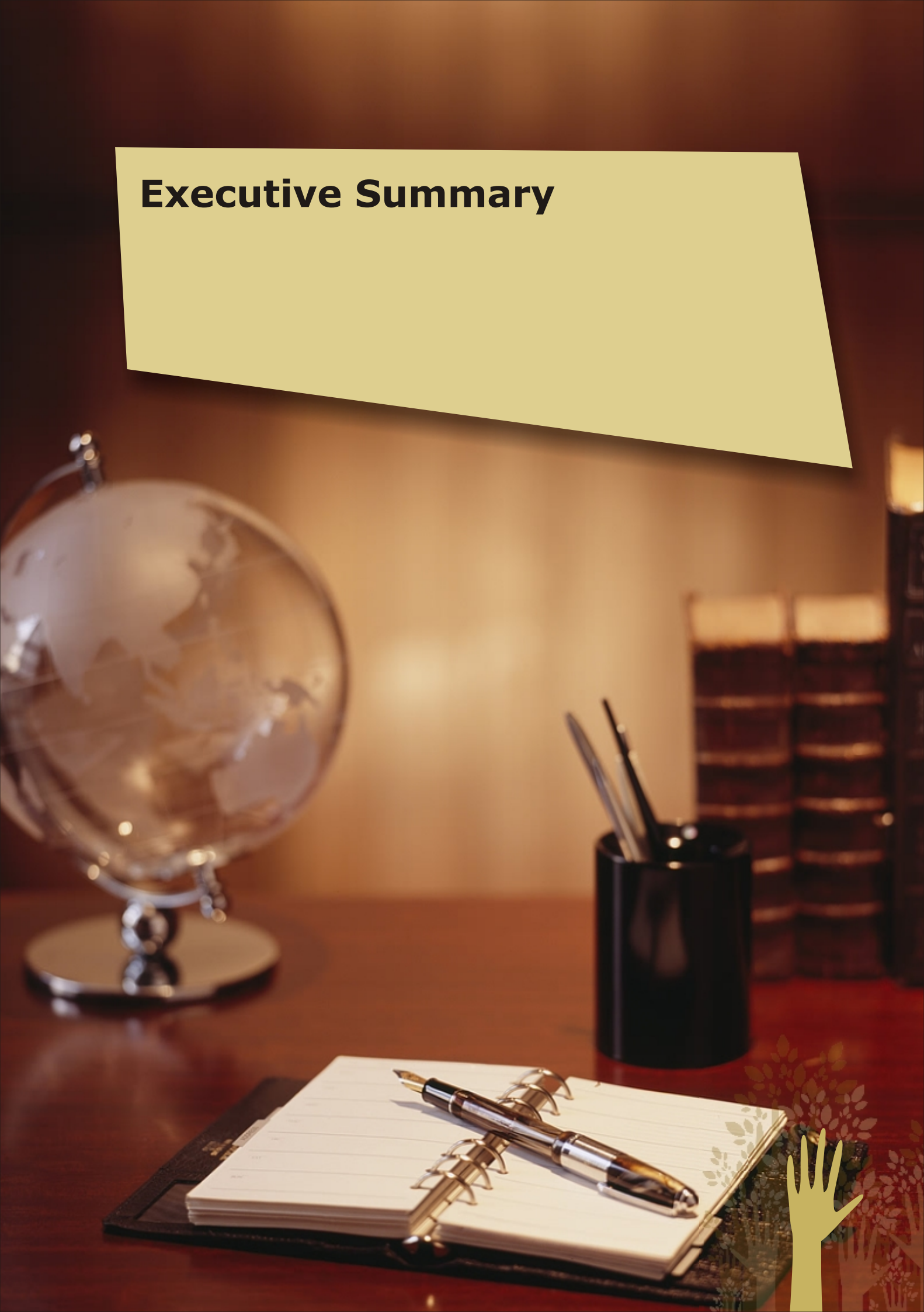
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Executive Summary



Executive Summary

FICCI has been continually engaging with carbon market stakeholders, particularly with project developers from different industry segments to understand and debate the issues facing them with respect to the carbon market and CDM project development. Over the years, it has engaged with industry and government on domestic and international climate policy dialogue with the objective of developing and mainstreaming Indian industry's views. In continuation of this objective, FICCI organized the India Consultation of the UNFCCC CDM Policy Dialogue on 16th July 2012 and an Industry Survey on the Impacts, Governance, and Future of CDM as a precursor to the consultation. Both these were directed towards obtaining industry views and revealed an unfettered interest in CDM albeit in a reformed state going forward.

It was evident that market mechanisms would be the key instrument industry is eyeing for their future mitigation strategy. Market mechanisms that would provide well designed time-efficient and cost effective means to scale up emissions reductions.

Indian industry has been proactively engaged in the carbon market and CDM and supported by the fairly efficient approval process at the host country level, has continued to add projects into the CDM pipeline. There are approximately 2355 approved CDM projects from India as of July 2012. India along with China collectively hosts close to 70% of CDM projects in the world. In spite of the growing number of CDM projects approved, the number registered projects is less than one-third, signifying the slow pace of acceptance at the international registration level and therefore a dampening sentiment of project developers. Apart from the lack of a clear long term signal on CDM and market mechanisms, significant barriers remain in the process, discouraging several potential project developers from participating in the CDM. The barriers include lack of transparency, high transaction costs, long time cycle of the CDM process and lack of predictability in the climate change regulatory regime. Project developers also face difficulty in getting local financing for CDM projects especially stand-alone projects. The difficulty gets compounded further when the returns on investment are completely dependent on the carbon revenue stream. Such bottlenecks in the CDM

process require reforms that would improve the efficiency of CDM and even promote access to CDM for underrepresented regions and sectors.

The aim of the FICCI UNFCCC CDM Policy Dialogue India Consultation was to provide recommendations on how best to position the mechanism going forward. The consultation garnered participation from the industry, government, civil society groups, consultants, designated operational entities (DOEs), and academicians. This consultation was part of a series of global consultations the High-level Panel of CDM Policy Dialogue has conducted through this year. The High-level Panel of the CDM Policy Dialogue has been mandated to carry out wide-ranging discussions and provide recommendations on how best the CDM can be positioned in the future. The sessions of the India Consultation were structured in a manner to provide the panel with insights on issues facing the CDM, including country-specific issues and proposed solutions. The sessions were structured to address issues related to Impact of CDM, Governance of CDM, and Future Context of CDM. The FICCI survey conducted prior to the consultation was also designed on the same lines to elicit views from more stakeholders in industry. The survey respondents and consultation participants represented the following sectors: Iron and Steel, Sugar, Cement, Oil and Gas, Fertilizers, Chemicals, Mining, Power, Pulp and Paper, Solar, Wind, Transport, Diamond and Jewellery, Consultants, Civil Society organizations and academic institutions.

The consultation brought out the issues which project developers have faced over the years while implementing CDM projects. Several issues are related to methodologies, barriers (financial, technical and procedural) and other governance aspects of CDM, faced by project developers across diverse sectors, reflecting a common concern of the stakeholders. The survey also brought out similar concerns and suggestions from the project developers. It is clear that reforming the CDM process will be critical in ensuring its continuity and success. This report brings out some key recommendations from Indian industry which if implemented could streamline the CDM process making it more efficient and transparent. This could go a long way in ensuring the continuity of CDM which has emerged as a key market mechanism for greenhouse gas mitigation, and has catalyzed enhanced industry engagement in climate change mitigation.

Introduction

The High-level Panel of the CDM Policy Dialogue was established in late 2011 by the CDM Executive Board to carry out a Policy Dialogue as a high-level independent process, to take stock of lessons learned in CDM, resulting in recommendations on **how to best position CDM for a continued strong role in the post-2012 carbon markets.** The mandate for the Panel is wide-ranging, allowing the Panel to decide for itself what issues and aspects of the CDM it wishes to consider, and what methods to use to address them. The recommendations were presented at the 69th meeting of the CDM Executive Board in September 2012, and are also publicly available. The recommendations are expected to influence the future design and operation of the CDM, as well as other new market based mechanisms. The High-level Panel consists of distinguished policy makers and representatives of civil society and business who engaged a wide range of stakeholders through meetings and studies to gain a full and unbiased picture of the operations, benefits and shortcomings of the CDM.

The Federation of Indian Chambers of Commerce and Industry (FICCI) representing the voice of the Indian business and industry conducted a Survey on the Impacts, Governance and Future of CDM in July 2012 as part of its ongoing policy research work to get industry feedback. FICCI also organized the India Consultation Workshop of the UNFCCC CDM Policy Dialogue focused on the same themes as the FICCI CDM Survey to allow for an interactive discussion and dialogue amongst participants. The aim of the CDM survey and policy dialogue India consultation was to take stock of the lessons learned in CDM and to provide recommendations on how best to position the mechanism going forward. The survey and consultation workshop together provided a broad based representation of Indian industry views on the CDM.

The respondents of the FICCI CDM Survey represented project developers from a wide array of sectors including Carbon Black, Cement, Chemicals, Community, Diamond and Jewellery, Fertilizers, Hydrocarbons, Hydropower, Iron and Steel, Mining, Pulp and Paper Production, Power Generation (Thermal), Renewable Energy (Solar/Wind), Salt, Sugar and Urban Transport. The Industry consultation workshop also brought under the radar various perspectives of Indian Industry on the above mentioned three aspects of CDM. The Industry

Consultation garnered participation from the Government, Industry, Civil Society, Consultants and Academicians.

The Indian Government and Industry have been very proactive in their approach to carbon market. This has helped them gain an early mover advantage in CDM. In the global CDM market, India is amongst the leading pack of the top 8 countries (in order of CERs issued) with a combined share of 72% of the total CERs issued in the market. India along with China is collectively hosting about 70% of the total CDM projects in the world. As on June 2012, the Indian Designated National Authority (DNA) has approved 2355 CDM projects of which 860 have been registered by the UNFCCC. Renewable energy (44%), energy efficiency (27%) and renewable biomass (18%) type of projects are the highest number in the Indian portfolio of CDM projects. For registered projects energy efficiency (38%), renewable energy (22%) and industrial process (15%) are the top categories in terms of expected CERs. The CER potential from the 860 registered projects is 336 million, whereas the total approved (2355) is expected to yield 700 million upto 2012.

Despite significant progress, there are barriers to CDM project development, registration and governance. While important improvements have been achieved in the CDM procedures and project cycle efficiency, all stages of the project cycle are currently associated with considerable risks. These include insufficient predictability, a lengthy process, and high transaction costs. Project developers also face difficulty in obtaining local financing for CDM projects. This becomes even more difficult when the returns on investment are completely dependent on the carbon revenue stream. Such bottlenecks in the CDM process require reforms that could contribute to increasing the efficiency of the CDM process, reducing transaction costs and time, and enhancing transparency, consistency and predictability, while also improving access to the CDM by underrepresented regions and sectors.

This Report is based on the views and comments received during FICCI CDM Survey and the FICCI-UNFCCC CDM Policy Dialogue Consultation workshop. The report presents industry concerns and suggestions with respect to the future design of the Clean Development Mechanism, views that were based on a set of questions regarding the impacts, governance and future of CDM. These questions have been provided in the Annexure.

Impacts of CDM

CDM and its contribution to net greenhouse gas mitigation

The industry reemphasizing on the objective of CDM projects, stated that CDM should contribute to mitigation of greenhouse gases. Industry asserts that it does not matter if the projects lead to a "net" mitigation of GHG as long as there is mitigation of greenhouse gases from these CDM projects. Industry is also in favour of a renewed second commitment period under the Kyoto protocol.

CDM and its contribution to sustainable development

96% respondents of the FICCI survey indicate that CDM projects have contributed to sustainable development. The survey respondents classified the impacts of CDM under environmental, social, economic, technological and institutional benefits as given below.

Environmental Impacts

Provision of clean energy, reduction in GHG, less pollution, effective utilization of natural resources, improvement in productivity of degraded land.

Social Impacts

Less time lost in traffic/congestion, less respiratory diseases due to less particulate matter, fewer accidents per passenger transported, creation of direct and indirect local employment, provision of basic amenities and facilities.

Economic Impacts

Enhancing the country's energy self-sufficiency, more business opportunities created, generation of additional revenue from carbon credits for farmers.

Technological Impacts

Technology improvement due to modern and improved mass transit use, infiltration of new technologies due to the employment of such technologies in certain sectors.

Institutional Impacts

Development of institutional mechanisms, building partnerships with national/international organizations.

Industry stakeholders raised concerns with respect to the notion of sustainable development as given below:

1. Stakeholders believe that countries should be given freedom to develop their own sustainable development indicators/criteria. The UNFCCC should only provide broad guidelines for developing sustainable development indicators.

2. There is a need to differentiate between climate change mitigation and sustainability. It is suggested that sustainability should be an "add on" for CDM projects. Industry believes that for CDM projects the focus should be on climate change mitigation rather than over-emphasizing the need for sustainability to the extent that it impacts the primary objective of climate change mitigation. For E.g. in the case of renewable energy projects the time taken to get permits is quite long (it can stretch from 6-24 months). If sustainability is also considered as a separate criterion to evaluate these projects, then the time taken to evaluate and verify the project will increase. This will only delay the project's approval cycle further. For such projects, if the focus is on climate change mitigation (greenhouse gas reduction) alone, the process will not get delayed as much and developers will be able to gain benefits from the CDM project.

Key barriers to CDM implementation and the factors which influence its implementation in some countries

Industry stakeholders have highlighted some of the barriers they face in implementing CDM projects. The barriers are mainly financial, technical and/or procedural.

Technical Barriers

Industry raised a point with respect to technology as a mandatory additionality for CDM projects. If additionality in terms of technology were to be made mandatory it would go against the essence of CDM projects which is to mitigate GHG emissions.

Procedural Barriers

Procedural barrier in terms of time taken was highlighted by industry. Several Designated Operational Entities (DOEs) do not have technical review teams in India due to which considerable time is lost. Industry recommends that the DOEs should have the required technical experts/review teams based in India to fast track the process. Industry stakeholders also feel that the entire CDM process is too clerically oriented with excessive focus on documentation, completeness checks and other non-relevant parameters. The process over-emphasizes the need for near perfect documentation (to the extent of focusing on minutest of details) instead of the overall objective of climate change mitigation. Industry also pointed out the importance of verification of sustainable development indicators mentioned in the PDDs at some point of time during the project lifetime. This verification could be done by the DOE. This point has been raised in the interest of having a real impact analysis done in terms of socio-economic impacts of the project. Industry also suggests that a mechanism should be evolved to do a spot check or verification of the actual impact analysis of registered projects. In addition to this the project participants also feel the transaction costs of CDM are significantly high. There is a need to make the process simpler and economical.

Financial Barriers

One of the financial barriers requires the project developers to show that proposed project activity is less attractive (financially) without CDM. The DOEs always require the Internal Rate of Return (IRR) to be around 9%-11% to pass this barrier. This however is an anomaly because financial institutions do not accept projects with IRR below 16%. This problem of contradictions mainly arises because financial institutions of every country have criteria and requirement which differs from that of the UNFCCC.

Industry feels that such a barrier (9%-11% IRR) is not required. Industry stakeholders also suggest that if at all a financial barrier has to be there, it

should be made country specific because interest rates and inflation are country specific. In terms of additionality it is suggested that financial additionality should be linked to how a project is evaluated in terms of its sustainable development benefits. Those projects which have high sustainable development benefits should be exempted from financial additionality requirements. On the other hand, projects which do not have very high sustainable development benefits should have country specific financial additionality hurdle rates. Industry also voiced its opinion to have sectoral benchmarks for IRR as this would simplify the financial additionality criterion. These benchmarks should be set by the host country and not by external agencies.

Regional distribution of CDM projects and mitigation activities

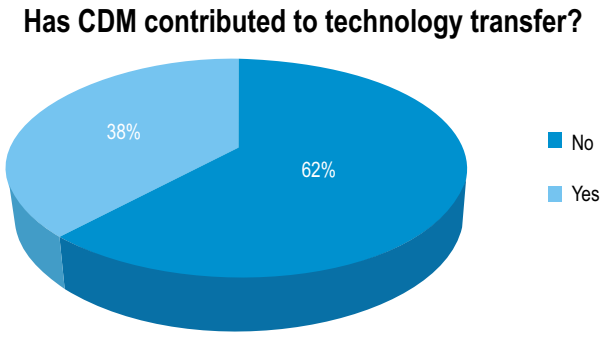
The UNFCCC is currently focusing on regional distribution of projects internationally. Indian industry suggests that the CDM loan scheme should be opened to certain areas within countries (such as India) where some regions have not seen the level of CDM activity that other regions have seen. The focus should be both on international regional distribution as well as intra-national regional distribution of projects.

CDM's contribution to increased energy security in developing countries

Industry feels that CDM projects have contributed to increased energy supply. But some issues have also been raised with respect to energy efficiency projects in India. Most of these projects (lighting energy efficiency projects) have an impact on rural energy availability and energy security. The assessment is that huge peak demand could be saved by implementing such projects. However, against the assessed savings potential, a minimal potential has been realized so far. This implies that the contribution of CDM on such projects so far has been very low. Many of the processes and procedures make it difficult for developers to implement these projects and the methodologies complicate things further. Project proponents face many roadblocks while implementing these energy efficiency projects. A possible solution is to rewrite the procedures and methodologies for energy efficiency projects to simplify them. This would ensure that the time taken for project implementation and verification/validation is much less than the current time cycle. This will streamline the process further.

CDM's contribution to technology transfer

Industry feels that CDM has not contributed to technology transfer. Project developers state that technology transfer has not taken place in the case of unilateral projects as well as several bilateral and multilateral projects. One of the probable reasons for this is the lack of financial assistance. Majority of the survey respondents (62%) also are of the opinion that technology transfer did not take place.



In cases where technology transfer did take place, the kinds of technology which were provided are given below

Technology transferred to Indian CDM projects	Country
Higher MW wind turbines internationally available used in India E.g. 1.65 MW Vestas previously and now the 2 MW Gamesa WTG	Denmark and Spain
Regenerative Braking Technology	Japan
Multi shaft technology from ALSTOM Power Systems for the Utran II project (374.571 MW) activity	Switzerland
Roller press for energy efficiency project	Germany
Imported capital equipment like MSW processing plants, an ORC based WHR power plant etc.	Not Specified
The technology for the Heat Recovery System in one project has been supplied by MECS	USA
The technology for feed switchover project by Haldor Topsoe (HTAS)	Denmark
The technology for CO2 Recovery plant in the feed switchover project is developed and supported by Mitsubishi Heavy Industries Ltd	Japan

An example of a type of project where technology transfer did take place was given at the consultation. This happened in case of a project on Coke Dry Quenching (CDQ) in India in 2003, for which technology transfer was agreed upon in lieu of CERs. In case of the CDQ project, nothing significant happened after the technology transfer took place. One of the reasons why the project could not succeed was the fact that there was a choice of buying only one technology.

There are two ways that technology transfer can happen - (i) Money is provided from a central fund or global fund along with the choice of technology (ii) A country gives technology and project developer transfers CERs generated. In this context it is suggested that the proposed fund should be utilized in transfer of technology which is acceptable to the project proponents rather than imposing a particular technology upon the project developers.

Type of technology transfer

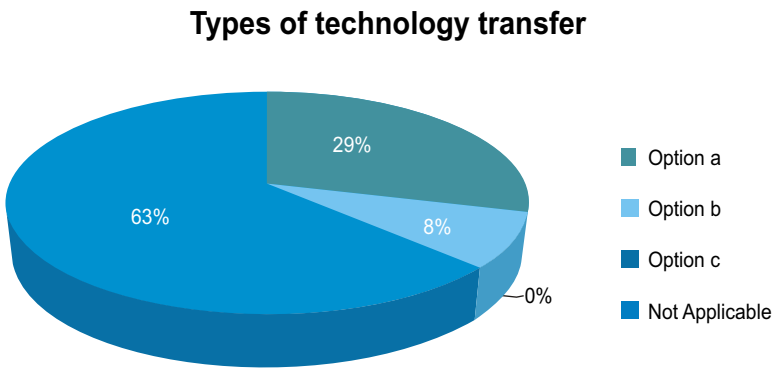
The responses to these are on the basis of the following options

(a) Import of capital equipment embodying the technology and training in the operation and maintenance of the equipment,

(b) Licensing of IPRs involved in the technology

(c) Both (a) and (b)

A majority of the survey respondents (29%) have indicated Option (a), 0% has indicated Option (b), 8% have indicated option (c) as their answer while a majority (63%) mention the question is "Not Applicable".



The responses obtained also corroborate the views expressed by majority of the Policy Dialogue participants that there has been no substantial technology transfer in the case of CDM projects.

CDM's leverage of new and additional financing mechanism for mitigation

Industry is of the opinion that CDM could play a very important role in the context of additional financing. This however is dictated by CER prices. The FICCI survey also indicates that a majority of the stakeholders are of the opinion that CDM did not leverage additional financing mechanisms.

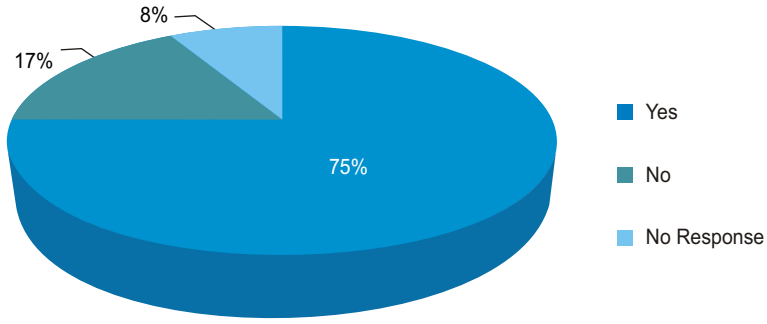
Distortions in the CDM mechanism due to lack of standardized baselines and accounting for suppressed demand

Industry feels that standardized baselines will help CDM projects as they will speed up the process and reduce costs. However, in case of technology it is difficult to set standardized baselines since the default factors will be different for different regions and different technologies will also have different baselines. The baselines would be useful if they are standardized with respect to specific technologies for specific regions, but these should be broad based and not micro-level. Such baselines will avoid situations where a specific project is approved in one country but rejected in another. Exemplifying India's numerous biogas programmes, industry stakeholders have also points related to the methodologies of CDM. The UNFCCC has in its methodology a default value of 5% for biogas (which could be relevant under the old methodology for household biogas or medium sized biogas). However, in case of industrial biogas plants involving co-digestion, the leakage factor in a biogas plant is less than 0.1%. If a 5% leakage factor is considered, then it totally offsets any benefits from methane avoidance which one gets from the manure. The methodology panel should thus look at technology specific methodologies rather than generic "biogas". The generic terms in the guidelines also need to be revisited. One could look into the PAT system designed by India for formulating baselines since the CDM baselines are not designed adequately. The baselines defined by the PAT scheme are much more acceptable to industry compared to those under the CDM.

CDM investments in renewable energy sources and/or improved demand side energy efficiency

In the FICCI survey, a majority of the respondents (75%) agree that CDM has led to investments in renewable energy and improved demand side energy efficiency projects. 17% do not agree with this point and 8% have not given any response on this.

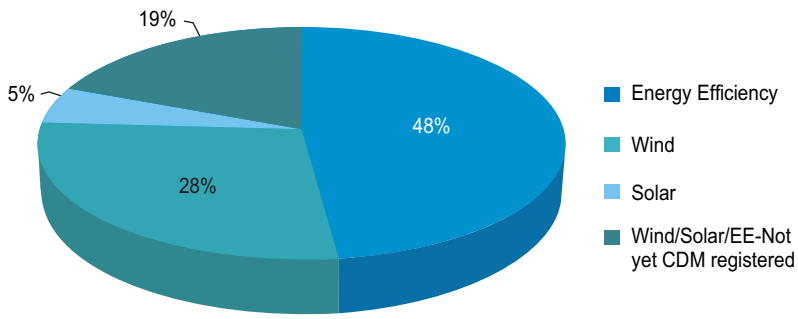
Investments in renewables and/or demand side EE



Type of CDM investments in RE sources and/or improved demand side energy efficiency

A majority of the investments have been made in Energy Efficiency projects (48%) followed by Wind (28%) and solar (5%). The remaining 19% projects are wind/solar/energy efficiency projects which have been approved but are yet to be registered by UNFCCC.

Type of CDM investments in RE and/or improved EE



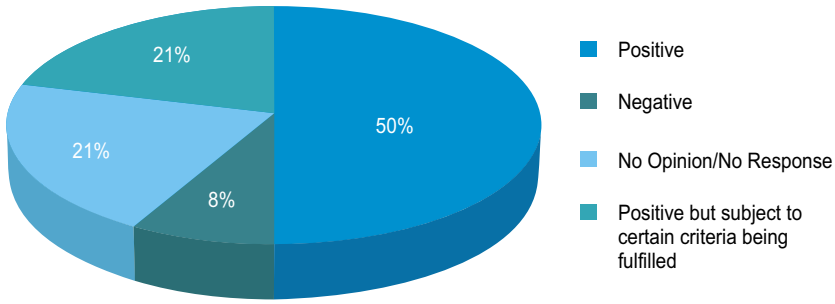
View on the inclusion of large scale hydro projects in the CDM process

A majority of the respondents are in favor (50%) of inclusion of large scale hydro projects under CDM, 21% are in favor with subject to certain criteria being met/fulfilled, an equal number (21%) have no opinion on this, while 8% are against the inclusion of large scale hydro projects in the CDM process.

In case of the 21% who have responded positively subject to certain criteria being met the criteria mentioned are;

- The hydro projects should incur least (minimal) social and environmental damage
- Proper stakeholder consultations should be carried out with local inhabitants
- The implications of large hydro projects on biodiversity and local population migration should be thoroughly considered before their inclusion in CDM process

View on inclusion of large-scale hydro projects in CDM



Types of CDM projects successful in attracting private sector investment and the factors constraining CDM investments in India

According to the FICCI survey respondents, the following projects have been most successful in attracting private sector investment

i. Renewable Energy projects

ii. Energy Efficiency projects (Some respondents have even mentioned methane, biomass based cogeneration projects and waste heat recovery projects)

According to the FICCI survey, the major constraints for CDM investments in India are

i. Market uncertainties; Kyoto uncertainties;

ii. Unclear guidelines;

iii. rigid methodologies;

iv. Long processing periods; change in methodologies & additional demands midway of project;

v. Proving additionality principle for projects becomes difficult due to the numerous documents, data and information required

Key Highlights

There is an overall sense of consensus amongst industry on the issues pertaining to technology transfer, transparency in the process of CDM registration as well as the transaction time and costs associated with the project approval and validation process. The participants also were positive about the role played by CDM in promoting sustainable development in the region where projects were implemented. The positive economic, social and environmental impacts of CDM projects were recognized by the project developers. However, there are a couple of issues pertaining to market uncertainties, unilateral measures by developed countries and methodologies, and guidelines related problems which need to be addressed. If these issues are looked into and addressed properly, the CDM will be able to deliver much more in terms of promoting sustainable development and energy access.

Governance of CDM

Streamlining of project cycle to improve efficiency and reduce costs

On streamlining the project cycle to increase efficiency and reduce costs, industry stakeholders assert that the inefficiency of CDM lies at the heart of the methodology and in the definition of "additionality". Stakeholders frequently criticize the current project cycle as being time consuming, having stringent guidelines, with high cost of validation and verification, and requiring a lot of documentation resulting in unnecessary delays. Project proponents stated that a lot of effort is put in by them and the Designated Operational Entities (DOEs) to satisfy the requirements of financial additionality. Industry expresses a desire for a methodology that is technology specific, clearly articulating the requirements for additionality (financial and technological). In such a scenario, stakeholders suggested that the UNFCCC and CDM Executive Board have a separate committee for prescreening which allows for simple factors to be prescreened.

Reforming the current validation/verification model

A widely held stakeholder view is that the current validation/verification model needs to be reformed as the current model is time consuming and expensive. Quoting the example of the price of compact fluorescent lamps (CFL), industry feels that the need for evidence at the validation stage for trivial issues (such as price of CFL) that are unconnected to additionality is excessive and not specified in the methodology. Stakeholders propose that the validation process be realistic, simplified, and guidelines strengthened with adherence to a timeline based approach. Industry stakeholders assert that the same DOE should perform the validation and verification process as the involvement of different DOEs brings in difference in interpretation. Stakeholders also express a desire for additional number of DOEs.

Additionally, industry stakeholders raised concerns about the additionality of projects. Stakeholders note that there are numerous points which need to be addressed every time a project is submitted. Stakeholders suggest that these points be compressed to ones related to additionality alone. Apart from additionality, in the interest of fast tracking the process, stakeholders suggest that there should be an express queue for categories of projects that are simpler in nature or

more in number. The process in the UNFCCC for doing a check on the projects given for registrations should be categorized into different queues so that the projects which are simpler in nature are not impacted by the longer queues. Industry stakeholders suggest that the UNFCCC can have a decentralized setup so that operations can be carried out from different countries.

In case of transfer of money several stakeholders suggest that it should be transferred from the project proponent to the UNFCCC and then to the DOE as this would bring in more credibility in the process.

Strengthening the current requirements for stakeholder consultation

Industry is of the view that monitoring the stakeholder consultation process should be carried out effectively by an entity designated by the host country DNA and that the consultations should be standardized. Stakeholders suggest that a standard operating procedure with checklist and formats as part of the DOE audit might be an effective step to ensure transparency and authenticity.

Requirement of change in the methods for determining additionality

Industry stakeholders express the need for an explicit checklist for the additionality criteria. Stakeholders raised concerns about the excessive information needed in the methodology of projects together with a lot of evidence required for trivial issues in the validation stage that are unconnected to additionality. Stakeholders suggest that the methodology should not necessarily be simplified but be unambiguous in its specification of what constitutes additionality.

Professionalism of Executive Board in terms of composition and conduct

Industry is of the opinion that the members of the Executive Board should have professional qualification and experience. The Executive Board should have formally specified criterion for the selection of members, who are full-time with access to sectoral expertise.

The Executive Board as a body in the CDM process and its effectiveness in discharging responsibilities

The industry is of the view that Executive Board lacks transparency and speed and suggests that the EB be clearer with timelines. Stakeholders

note that although the EB takes it very strictly to complete all details of CDM project but a lot of improvement is still required to make the process faster. Stakeholders suggest the need for flexibility in the decision-making process and further strengthening of the Executive Board for effective delivery of their responsibilities. The industry notes that the Executive Board as a body has been instrumental in formulating the modalities that enable the development and implementation of projects under CDM, however suggests that the Executive Board have a decentralized setup with committees in certain regions and countries. With respect to the effectiveness of the functioning of Executive Board stakeholders are of the view that the sectoral spread of projects would need to be given due consideration as there has been a definitive focus on some sectors whereas some other sectors which could provide more advantages have been neglected. Stakeholders indicate that the interpretation of the DOEs should be considered as final and should not be challenged by the project participant and that there should be clear communication regarding any deadline of the project activity from UNFCCC after the submission of revised monitoring plan.

Circumstances and damages (excess issuance, environmental and sustainability aspects etc) for which project proponents can be held liable and the impacts on business operation

Industry stakeholders highlighted that there are instances of misinterpretations and collusions between the DOE and the project proponent which lead to failure of the entire mechanism. It was therefore suggested that under such situations of collusions at the time of issuance, both DOE and the project proponent should be held liable and the DNA should be able to file the liability claim. According to many stakeholders the DNA should be competent to authorize action against any legal violations in both the environmental and sustainability aspects of projects. Stakeholders also pointed out the need for a clear accountability mechanism for the DOEs. If the DOE acts unreasonable the project proponent should be able to hold the DOE responsible. Many stakeholders were also of the view that the level of proof and aggressiveness seen at the validation stage should instead be applied to the verification stage where issuance happens since that would demonstrate the project's ability to generate the quantum of CERs it claimed in its project design document.

Opinion on an appeals process for registration and issuance decisions

Stakeholders express a positive response towards an appeals process, but assert that an appeal against any decision should be carried out by a separate arm of the CDM Executive Board and not by the Executive Board itself. Stakeholders feel that the appeals process should be time bound, specific and brief. Many stakeholders acknowledge the appeals process for registration and issuance decisions as it is better streamlined. The Executive Board is more open to discussing the issues, especially with the introduction of stakeholder interaction wherein a project participant can request for a one-to-one telephone call to discuss the issues raised in review requests.

Further simplification of the process, without compromising environmental integrity

A widely held stakeholder view is that there is need for further simplification of the process. They propose that simplification of the process could be done through relaxation of the benchmark to a more country specific one with some modifications in methodology for the approval of a project. This mechanism should be flexible and dynamic allowing for additions and deletions in initiatives. Stakeholders indicate instances where a project may get stuck in trying to demonstrate additionality in terms of "first of its kind" project. In tune with this stakeholders highlighted that the availability of data in public domain to display "first of its kind" requirement is very scarce. If a project is genuinely displaying positive reduction of GHG from baseline, these requirements can be relaxed to encourage such projects. Industry stakeholders suggest that the process for receiving global stakeholder comments should be monitored and filtered to avoid the occurrence of biased comments which hold no relevance with the CDM subject matter.

Concerns about the functioning of DOEs

Stakeholders hold the view that the current functioning of DOEs with respect to verification and validation is satisfactory; however concerns were raised with respect to limited DOEs being accredited by UNFCCC causing delay in project registration. Stakeholders suggest that more number of DOEs should be accredited to reduce time and cost and that there should be more DOEs based in the host country to reduce time. Several stakeholders also note that the present validation process lacks efficiency because there is no time limit for DOEs, causing the delay of project by years. Many stakeholders also suggest that the documentation requirement during validation and verification stages can be simplified in

the form of checklists and formats in an effort to minimize uncertainties and reduce time lines with a clearly defined time line for each activity at the DOE level.

Few Indian DOEs affect project registration and/or increase costs

71% of the respondents to the FICCI CDM Survey highlighted that having very few Indian DOEs affects project registration and/or increases costs. Majority of the stakeholders highlighted that the presence of limited number of DOEs in India causes delay in the timelines of the project activity. Stakeholders highlighted that in the current scenario, due to 2012 deadline, there is a huge rush of projects in the market and simultaneous scarcity of India-based DOEs causing many projects to remain in the validation pipeline. In such a scenario stakeholders pointed out those projects under validation are not expected to get through till December 2012 as the small number of DOEs would end up taking projects beyond their capacity. Suggestions arose that having some good Indian DOEs can bring in competitiveness and alleviate this problem as foreign DOEs end up taking much time for internal technical review while corresponding with their head offices located abroad. Industry stakeholders also pointed out that due to the uncertainty about the future of CDM and reduced CER price, DOEs are diversifying into other climate related activities by reducing their CDM activity level and the respective manpower resulting in further glut in the validation pipeline.

Concerns about the additionality of certain CDM projects (E+/E-)

The FICCI CDM Survey results showed that 57% of the respondents agree with the concerns about additionality of certain CDM projects. Stakeholders assert that the proving of additionality be made simpler and flexible as additionality clauses make the CDM procedure more complicated and create uncertainty in the financial closure of projects. Industry stakeholders highlight that the implications due to various domestic market mechanisms and schemes such as Renewable Energy Certificate (REC), Perform Achieve and Trade (PAT), and Generation Based Incentive (GBI) which were implemented after the Kyoto Protocol need to be clarified under E+/E- policies for additionality determination. Stakeholders also noted that E+/E- policy of UNFCCC has complicated the additionality of projects.

Communication between various stakeholders in the CDM process, for example, between EB and DOEs, DOEs and Project Proponents, Project Proponents and EB, EB support staff and EB,

EB support staff and DOE/Project Proponent, Secretariat and EB, Secretariat and other Stakeholders etc.

Stakeholders note that the communication process has undergone major improvement as the Executive Board was working extensively to develop more streamlined process to facilitate better communication. However, industry is of the view that the interaction between various stakeholders involved in the CDM process and Executive Board should be more transparent and efficient and generic issues should be made available for public reference. Stakeholders suggest that the communication between Executive Board and project proponent be improved as this would motivate project proponents to invest in emission reduction projects. Stakeholders acknowledge the communication between DOE and Project Proponent as active and adequate while criticize the communication between Executive Board/Executive Board Support Staff/Secretariat and the Project Proponent/DOE as passive and inadequate. Industry stakeholders suggest that a mechanism be worked out for direct presentation and discussion with the Executive Board/Secretariat for large projects. Stakeholders also express the desire for a communication channel from the UNFCCC where project participant would be able to get updates on their project activity status and also clarify doubts effectively in less time.

Key Highlights

In terms of efficiency and costs, industry is of the view that the current project cycle takes too much time, has stringent guidelines, and overemphasizes excessively on documentation which results in unnecessary delays. Significant benefits would accrue with reforming the current validation and verification as presently the process is expensive and time consuming. Industry stakeholders raised concerns over the additionality criteria of projects and suggest that an explicit list of criteria be made available to satisfy the additionality requirement. Stakeholders are in favor of an appeals process, but suggest that the appeals process be made time bound, specific and brief. Concerns were raised over there being a limited number of Indian DOEs, resulting in a supply-demand gap and resultant increase in time and costs. Stakeholders acknowledge the improved communication process between DOE and the project proponent, however, encourage a more active communication between Executive Board/Executive Board Support Staff/Secretariat and Project Proponent/DOE.

Future Context

Comparative advantage of CDM in light of emergence of other carbon mechanisms

Industry feels that CDM has an advantage when it comes to incremental costs per ton of reduction. Irrespective of the emergence of other carbon markets, carbon credit price would not increase until there is adequate demand from developed countries backed by higher commitment which can result from stringent targets on emissions reductions. Some of the views expressed on comparative advantage of CDM by the FICCI survey respondents are -

- There should be fungibility (of credits) in the markets.
- CDM is a well defined and well established mechanism. Hence, it should play a major role in global efforts to mitigate climate change. At the same time, learnings from CDM can be used to develop new mitigation tools and mechanisms.
- CDM project cycle follows defined, specific and transparent procedures at every stage and hence CDM projects have advantage over voluntary carbon standard (VCS) and other mechanisms.
- CDM also is more credible (as compared to other mechanisms)
- CDM has methodologies which other mechanisms can borrow. The knowledge database which CDM has generated over the years should be effectively used.
- CDM has a comparative advantage as it is compliance based.
- CDM incorporates a broad range of project types and has led to development of numerous methodologies over the years. Other carbon mechanisms may take time to evolve rules and regulations for accommodating a similar range of project types.

The views expressed by the diverse industry sectors indicate that majority of them would like the CDM to continue and even provide a guiding framework for other new market mechanisms which are evolving. The stakeholders would also like the CDM to be strengthened with stronger commitment from the developed countries to provide stability to the market.

Role of CDM in improving standards for emerging carbon mechanisms around the world and modification of the role and functioning of the EB, Secretariat and DOEs in this context

Stakeholders are of the view that CDM has an important role to play in the future as far as multilateral rules and procedures are concerned and can also serve as a benchmark for the fungibility of units across markets. The views expressed by diverse industry sectors in the FICCI survey are given below -

- CDM has emerged as a well developed mechanism over a period of time and hence it can definitely facilitate the evolution of new carbon mechanisms while maintaining its critical role in mitigation efforts.
- CDM could become the base for all kinds of compliance mechanisms to come up. It is the most effective system that has been built, though there is still scope for improvement.
- CDM can play the role of improving carbon mechanisms in more approachable manner by giving some relaxation in the process of project approval and this can only be achieved after modification in rules and regulations of EB, secretariat and DOEs. The CDM also provides a well laid down platform for new mechanisms. The concepts for these new mechanisms can be assimilated in line the CDM as far as execution is concerned.
- Duplication in the efforts of DOE and EB can be avoided.
- CDM can play a role in improving other standards by developing more standardized baselines which are sector specific.
- The present role of CDM is the standard setter. There is strong possibility that many domestic carbon markets will emerge in near future which will be structured following the existing CDM framework. CDM is a rule based mechanism. Other mechanisms can take advantage of such robust and detailed rules.
- CDM should be allowed to continue. The functions of EB, Secretariat and DOEs should be carried out within stipulated time frame. CDM has given lot of sustainable development projects in developing economies. Efforts should be made for clear and transparent system for real and sustainable benefits.
- Promote DOEs at national level in addition to the existing ones.

- CDM methodologies can be adapted to various other carbon mechanisms. The CDM EB, Secretariat and DOEs can help transfer knowledge and key experiences for development of other carbon mechanisms.
- Carbon offsets especially in the case of forestry and livelihoods should be structured around the areas of social credits which would facilitate uptake by corporate entities. Standards can be derived to include the assessment of socio-economic benefits that this sector is able to offer.

Views on project by project offset generation in the context of other carbon mechanisms (e.g. country based NAMAs like PAT or sectoral mechanism; PAT focused on the steel sector or policy based actions like the renewable portfolio standard which may come out in the future at both national and international levels)

Industry feels that in order to have a sectoral approach a sectoral benchmark will have to be arrived at. There has to be sectoral uniformity. Until this uniformity is not present, project by project mechanism still has an advantage. In the FICCI survey, a majority of the respondents (58%) say project-by-project offset generation should continue.

Views on sectoral mechanism for certain sectors (e.g. a sectoral mechanism which covers coal based power plant sector but does not cover the steel sector)

In such cases, industry feels that CDM will have to be retained for the sector which is not covered. Mechanisms like the PAT have more clarity as compared to CDM e.g. on measurement of baselines. CDM has a comparative disadvantage because of its very high transaction costs and the long time duration involved. If a mechanism like PAT is designed at an international or national level then it would not be worthwhile to pursue CDM since it has a comparative disadvantage. The disadvantages of CDM are - high transaction costs, long lead time involved, no local CER exchange (it has to be done through a third party).

Views on CDM's role to promote useful learning-by-doing on sectoral mitigation

The UNFCCC and European Union countries can attempt this at a pilot scale. The results of these pilot projects could be out within a year in terms of data available for benchmarking. This will help to assess whether these projects are helping in actually mitigating CO2 emissions and whether any actions have been taken by the plants to reduce their emissions.

Views on CDM's role to promote useful learning-by-doing on REDD+

The CDM should be used to try out some REDD+ projects at the community level. This will work only if there is funding available. Industry feels that there should be a fund and a minimum support price for REDD+ projects under the CDM.

Views on continuation of the CDM in the United Nations/UNFCCC

Industry is of the view that the CDM should remain embedded under the UNFCCC. However, it is proposed that the process of verification and issuance should be decentralized while the rest of the mechanism should stay under the UNFCCC.

Views on ensuring that a PAT scheme in India is equivalent to an emission reduction scheme in Australia (For e.g. 100 tons of CO2 reduction in India is equivalent to 100 tons of CO2 reduction in Australia)

Industry feels that a common standard is required for calculation of CO2 reduction under different mechanisms. An online global trading system should be set up for project developers which would enable them to move from one mechanism to another depending on market movements. This online system should be set up irrespective of the particular instruments and mechanisms in any country. This will ensure removal of any ambiguities in emissions reduction calculations across different carbon market mechanisms.

Key Highlights

Industry is of the view that CDM framework should be used to formulate the new mechanisms which will emerge in the future. New mechanisms should be built on the success of the CDM and should also ensure that the glitches and disadvantages of the CDM are avoided. Project by project offset generation should also continue until country specific sectoral benchmarks are developed. Industry has also expressed its positive outlook towards domestic mechanisms like the PAT and REC schemes. Many project developers believe PAT and REC schemes are better than the existing CDM framework. New mechanisms could also be built along similar lines to encourage project developers. Lastly, industry also believes that the carbon markets cannot improve until there is renewed commitment from the developed countries. Even if new mechanisms emerge, the market situation will not improve until the developed countries participate in it.

Key Recommendations

The report recommends the following actions across different areas to make CDM robust for the future

1. Streamline the current project cycle to increase efficiency and reduce costs

Streamline the registration process to ensure effective implementation of CDM projects. Many of the barriers (financial, procedural, technology) have hindered effective implementation of CDM projects. Streamlining the process would reduce the overall transaction time and costs associated with implementing CDM projects enabling other small project developers to take advantage of the CDM.

2. Rethink the additionality principle

The concept of additionality needs to be revisited. Stakeholders believe that additionality as a concept should not be mandatory. If at all additionality has to be there, the indicators for proving it should be country specific.

3. Need to formulate standardized baselines

Industry proposes that a set of standardized baselines are formulated for evaluating projects. These baselines should be country specific and the UNFCCC should provide guidelines to develop these at a macro level.

4. Reform the current verification/validation model

Stakeholders propose that the validation process be realistic, simplified, and guidelines strengthened with adherence to a timeline based approach.

5. Strengthen the current requirements for stakeholder consultation

Stakeholder consultation process be carried out effectively by an entity designated by the host country DNA and that the consultation process be standardized.

6. Modify the appeals process for registration and issuance

Stakeholders recommend that the appeals process be time bound, specific and brief and assert that an appeal against any decision should be

carried out by a separate arm of the CDM Executive Board and not by the Executive Board itself.

7. Improve distribution of Projects

The CDM should encourage regional distribution of projects both at the international and national level.

8. Increase the number of DOEs and technical review teams

Stakeholders suggest that more number of DOEs be accredited to reduce time and cost as the present validation process lacks efficiency because there is no time limit for DOEs, causing the delay of project by years. Technical review teams of DOEs should be present across different regions in order to reduce the overall time for validation/verification of projects.

9. New Market mechanisms should build upon existing CDM framework

Stakeholders assert that the new market mechanisms that will emerge in the future be built upon the success of CDM and use the knowledge and capacity which has been built up over the years by the CDM. The CDM framework could be used as an effective base to be incorporated into the new market mechanisms.

10. Professionalism of Executive Board

Industry is of the opinion that the members of the Executive Board should have professional qualification and experience.

Abbreviations

CDM -	Clean Development Mechanism
CER -	Certified Emission Reduction
CDQ -	Coke Dry Quenching
CFL -	Compact Fluorescent Lamps
CO2 -	Carbon Dioxide
DOE -	Designated Operational Entities
EB -	Executive Board
EE -	Energy Efficiency
EU -	European Union
FICCI -	Federation of Indian Chambers of Commerce and Industry
GHG -	Greenhouse Gas
IRR -	Internal Rate of Return
MSW -	Municipal Solid Waste
NAMA -	Nationally Appropriate Mitigation Action
PAT -	Perform Achieve and Trade
RE -	Renewable Energy
REC -	Renewable Energy Certificate
REDD+ -	Reducing Emissions from Deforestation and Forest Degradation
UNFCCC -	United Nations Framework Convention on Climate Change

Annexure I:Questions

Annexure I consists of the list of questions which were a part of the India Consultation and FICCI survey. The outcomes of the two feedback mechanisms presented in this Report are based on these set of questions.

Impacts of CDM

1. Should the CDM contribute to net mitigation of greenhouse gas emissions?
2. Has the CDM contributed to sustainable development? Should it?
3. What are the key barriers in implementation of CDM? What factors influence CDM implementation in some countries?
4. Should the CDM aim at increasing the regional distribution of projects and mitigation activities? If so, how?
5. What is the contribution of CDM to increased energy security in developing countries? Is it a significant factor to consider in future operations of CDM?
6. (i) To what extent does CDM contribute to technology transfer?

   (ii) What exactly did you mean by technology transfer:
7. To what extent does CDM leverage new and additional financing for mitigation?
8. To what extent has the lack of standardized baselines and accounting for suppressed demand resulted in distortions in the CDM mechanism?
9. (i) Have you made CDM investments in renewable energy sources, and/or improved demand side energy efficiency?

   (ii) If Yes, please specify (CDM investments in RE sources and/or improved demand side energy efficiency)

   (iii) What is your view on the inclusion of large scale hydro projects in the CDM process?
10. According to you, what CDM project types are more successful in attracting private sector investment? What factors constraints CDM investments in India?

Governance of CDM

1. Can the project cycle be further streamlined to improve efficiency and reduce costs? How can it be done?
2. Should the current validation/verification model be reformed? If so, how?
3. What are your concerns about the current stakeholder consultation processes and outcome (in particular the projects that have subsequently attracted criticism)?
4. Should the methods for determining additionality be changed? If so, how?
5. Should the EB be professionalized in terms of composition and conduct? If so, how?
6. Do you agree/disagree with the concerns about the additionality of certain CDM projects/ project types (e.g. E+/E-)?
7. Under what circumstances and for what damages (excess issuance, environmental and sustainability aspects, etc.) would you accept that project proponents can be held liable? What entity would bear the liability (project owner, consultant, CME, etc.) and what impacts on the business operation could be foreseen?
8. Please comment on the EB as a body in the CDM process. Does EB discharge its responsibilities effectively?
9. Please comment on the communication between various stakeholders in the CDM process, for example, between EB and DOEs, DOEs and Project Proponents, Project Proponents and EB, EB support staff and EB, EB support staff and DOE/Project Proponent, Secretariat and EB, Secretariat and other Stakeholders etc. Do you feel these communications are adequate? What improvements would you suggest?

Future of CDM

1. What should be the role of the CDM under each of the plausible future scenarios for the international carbon market?
2. In the light of emergence of other carbon mechanisms (e.g. voluntary, domestic, bilateral, UNFCCC), what is the CDM's comparative advantage?
3. How can CDM play a role in improving the standards for emerging carbon mechanisms around the world? What role if any should CDM play in directly issuing credits to these markets?
4. Should project-by-project offset generation, as currently carried out in the CDM, remain part of the future climate mitigation architecture?
5. Without prejudging global negotiations, how could CDM promote useful learning-by-doing on REDD+?
6. Without prejudging global negotiations, how could CDM promote learning-by-doing on sectoral mitigation?
7. Should project-by-project offset generation, as currently carried out in the CDM, remain part of the future climate mitigation architecture?
8. Should the CDM remain embedded in the United Nations / UNFCCC? If so, who should operate it?

Annexure II

Sectors which participated in Consultation and Survey

- Cement
- Chemicals
- Fertilisers
- Food Processing
- Iron & Steel
- Mining
- Oil & Gas
- Power
- Pulp & Paper
- Solar
- Sugar
- Transport
- Wind

Type of stakeholders who participated in the Consultation

- Academia
- Consultants
- Designated Operational Entities
- Bilateral/Multilateral agencies
- Government
- Industry
- Law Firms
- Non Government Organizations

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Federation of Indian Chambers of Commerce and Industry (FICCI)

FICCI, the apex industry organisation in India, is the leader in policy thinking and change and is in the vanguard of nation building. Established in 1927 and with a nationwide membership of over 1500 corporates and over 500 chambers of commerce and business associations, FICCI espouses the shared vision of Indian businesses and speaks directly and indirectly for over 2,50,000 business units. It has an expanding direct membership of enterprises drawn from large, medium, small and tiny segments of manufacturing, distributive trade and services. FICCI maintains the lead as the proactive business solution provider through research, interactions at the highest political level and global networking. It is constantly involved in bringing about integration of the Indian economy with the global mainstream. FICCI facilitates business-to-business linkages, promotes trade and investment linkages, creates awareness on key issues for the economy, provides inputs for policymaking, acts as a conduit for government-industry exchange and promotes bilateral ties.

FICCI's Expert Committees and Task Forces, headed by leading Industrialists, regularly meet to discuss the current issues. Joint Business Councils (JBCs), FICCI's track two business diplomacy with India's trading partners, open up new business opportunities to Indian businessmen with overseas investors, technology suppliers, multilateral and bilateral funding agencies.

In the area of climate change and carbon market, FICCI has been creating widespread stakeholder awareness in India and familiarizing stakeholders with the core issues and challenges confronting them. FICCI is involved in promoting policy dialogue nationally and internationally, facilitating stakeholder platforms, performing in depth research and analysis on climate change policy and connecting Indian carbon market with global mainstream. FICCI has a Climate Change Task Force, which serves as the voice of Indian industry on domestic and international policy and regulatory issues pertaining to climate change and carbon market. FICCI has been promoting Indian business interest in the global carbon market.

FICCI is an accredited observer organization under the United Nations Framework Convention on Climate Change (UNFCCC).

For more details, please visit **www.ficci.com**

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