



# **Asian Development Bank's Global Environment Facility Activities in the People's Republic of China**

A review from the 2007 Country Assistance Program  
Evaluation on the People's Republic of China: *Success  
Drives Demand for More Innovative and Responsive  
Services*

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# Abbreviations

ADB	Asian Development Bank
GEF	Global Environment Facility
PRC	People's Republic of China
RETA	regional technical assistance
TA	technical assistance

## Note

In this report, "\$" refers to US dollars.

1. Of the 177 countries participating in the Global Environment Facility<sup>1</sup> (GEF), the People's Republic of China (PRC) has the largest number of projects. It accounts for 4.3% of the total number of approved<sup>2</sup> GEF projects or 10.6% if global and regional projects are excluded. Within the Asian Development Bank (ADB)-GEF portfolio, the PRC has been the most important recipient, with 6 of the 10 GEF-related projects approved<sup>3</sup> by ADB and the GEF since 1999 (Table 1). In terms of amounts, the PRC projects accounted for 64% of total ADB financing for GEF-related projects until 2005 and 54% of total GEF grants approved for such ADB projects. Table 2 presents the portfolio. The assessment in this paper covers only five approved activities (excluding the regional technical assistance [RETA] on the Greater Mekong Subregion) and a GEF proposal that was subsequently dropped.<sup>4</sup>

**Table 1: GEF-Related Projects Approved by ADB and/or GEF: PRC vs. Non-PRC**

Status	Year	PRC	Non-PRC	Share of PRC to Total (%)
Number of GEF-related project approved by ADB	1999–2005	6	4	60.0
Amount of ADB financing approved (in \$ million) <sup>a</sup>		108	61	64.1
Amount of GEF financing approved (in \$ million) <sup>b</sup>		32	27	54.4
Share of GEF to ADB financing (%)		29.7	44.4	
Number of GEF-related projects cancelled, dropped, or withdrawn		1	4	20.0
Number of GEF-related projects being proposed for GEF and/or ADB Board Approval	as of Nov 2006	5	2	71.4

ADB = Asian Development Bank, PRC = People's Republic of China, GEF = Global Environment Facility.

<sup>a</sup> Excluding project preparatory technical assistance.

<sup>b</sup> Excluding project development facility-B.

Source: ADB Environment and Social Safeguard Division, GEF.

<sup>1</sup> GEF is an international financial entity that provides grants and concessional funds to address global environmental issues, by financing the incremental costs of making planned projects friendly to the global environment, funding regional approaches to environmental problems, and helping developing countries to meet the objectives of international environmental conventions and other environmental treaties or agreements.

<sup>2</sup> Defined as those projects which were approved by the GEF Council, endorsed by the GEF Chief Executive Office, cancelled after approval or endorsement, or completed.

<sup>3</sup> This excludes the ADB-approved project preparatory technical assistance (PPTA) for the development of the GEF proposal into a loan.

<sup>4</sup> ADB. 1999. *Technical Assistance to the People's Republic of China for the Yunnan Comprehensive Agricultural Development and Biodiversity Conservation*. Manila (TA 3372-PRC, for \$1.3 million, approved on 23 December). This technical assistance only reached the PPTA stage.

Table 2: ADB-GEF Activities Involving the People's Republic of China (1999–2005)

Loan/ ADTA/ RETA No.	Country	Project Name	Type	GEF Focal Area	Date of GEF Council Approval/ CEO Endorse- ment	Date of ADB Approval	Date of Comple- tion	ADB Loan/ Grant Amount (\$ '000)	GEF Grant (\$ '000)	Status
<b>A. Approved by ADB</b>								<b>108,220</b>	<b>32,151</b>	
1818	PRC	Wind Power Development	FSP	Climate change	1-Nov-02	20-Dec-00	13-Feb-04	58,000	12,000	Loan 1818 was terminated before effectivity, without any disbursements, due to insufficient repayment guarantee from lower-than-expected wind power tariff levels, and the borrower's view that foreign financing for the windfarms will be too costly.
1924	PRC	Efficient Utilization of Agricultural Wastes	FSP	Climate change	30-May-02	22-Oct-02	30-Jun-08	33,120	6,361	Loan 1924 is ongoing.
6069	Greater Mekong Subregion	National Performance Assessment and Subregional Strategic Environment Framework	MSP	Multi-focal areas	1-Nov-02	11-Dec-02	30-Jun-07	800	800	Activities had been completed but the United Nations Environment Programme requested for RETA extension to allow for the editing and publication of outputs.
6068	PRC, Mongolia	Prevention and Control of Dust and Sandstorms in Northeast Asia	MSP	Multi-focal areas	1-Nov-02	11-Dec-02	25-Apr-06	500	500	RETA 6068 was closed in April 2006 and its TCR was prepared in May 2006.
4358	PRC	PRC-GEF Partnership on Land Degradation in Dryland Ecosystems: Project 1 - Capacity Building to Combat Land Degradation	FSP	Multi-focal areas	25-May-04	28-Jun-04	4-Aug-07	800	350	First project under a \$1.5 billion 10-year GEF program, ADTA 4358 is ADB's first "hybrid" project, financed by grants but prepared and administered through loan procedures to give government maximum responsibility. It is scheduled to close in August 2007. ADB leads this program, with the Country Programming Framework being approved by GEF in October 2002 with assistance from ADB ADTA 3657. The framework involves 2 phases and 3 multilateral agencies (ADB, WB and IFAD).
2157	PRC	Sanjiang Plain Wetlands Management	FSP	Biodiver- sity	7-Feb-05	14-Mar-05	31-Dec-10	15,000	12,140	Loan 2157 is ongoing.
<b>B. Cancelled, Withdrawn or Dropped</b>										
	PRC	Yunnan Comprehensive Agricultural Development and Biodiversity Conservation Project	FSP	Biodiver- sity						TA 3372 failed to develop into a loan proposal because borrower could not find a suitable financial intermediary to onlend ADB funds.
<b>C. Not yet Approved by ADB and/or GEF</b>										
	Regional (Central Asia)	Central Asian Countries Initiative for Land Management (CACILM)	FSP	Land degrada- tion						Preparatory work ongoing, with GEF approval of PDF-B in January 2005 and RETA 6236 preparatory activities approved by ADB in March 2005. The Country Programming Framework had been approved by GEF in August 2006.
	PRC	Ningxia/Yinchuan Integrated Ecosystem Management Project	FSP	Multi-focal areas						Being prepared as Project 2 of ADB under the PRC-GEF Partnership on Land Degradation in Dryland Ecosystems. GEF approved the PDF-B proposal in July 2005, while preparatory activities under PPTA 4640 was approved by ADB in August 2005, status is ongoing.
<b>D. Proposals</b>										
	PRC	Integrated Ecosystem Restoration and Biodiversity Conservation of the Baiyangdian Lake Catchment	FSP							Technically cleared but the PDF-B had been withheld due to the lack of funds.
	PRC	Shaanxi-Qinling Mountains IEM Project	FSP							Project originally proposed by UNEP, but later subsumed upon PRC request into a redesigned joint ADB/UNEP concept proposal.
	PRC	Dryland Farming in Northern Region	FSP							Technically cleared but not yet approved.
	Regional	Support for Establishing a Regional Monitoring and Early Warning Network for DSS in NE Asia	MSP							Recommended for GEF CEO approval but not yet approved due to lack of GEF-3 funds.

ADB = Asian Development Bank, ADTA = advisory technical assistance, CEO = Chief Executive Officer, FSP = full-sized project, GEF = Global Environment Facility, IFAD = International Fund for Agricultural Development, MSP = medium-sized project, RETA = regional technical assistance, TCR = technical assistance completion report, WB = World Bank.  
Source: Asian Development Bank database.

2. **Relevance.** ADB-GEF cofinanced activities in the PRC are relevant but not highly relevant because of design and ownership issues, especially in the case of earlier proposals that were poorly received by the Government. The PPTA for Yunnan Comprehensive Agricultural and Biodiversity Conservation Project (footnote 4) was supplemented by a GEF project development facility-B worth \$350,000. The ADB component of the proposed loan aimed to support high-value crop cultivation through contract farming, while the GEF component sought to establish a protected area in the northwest region and to promote agro-biodiversity. The resulting loan proposal was dropped at the Government's request, because of the lack of a financial intermediary within the PRC willing to onlend ADB funds. However, both the Government and the GEF retained interest in the biodiversity component.

3. The biggest GEF-PRC project was the \$58-million loan for the Wind Power Development Project,<sup>5</sup> with \$12-million GEF cofinancing. Despite its tremendous environmental benefits, the basic concept behind the loan ran counter to the Government's policy of cost recovery. Wind power is considered more costly than conventional energy sources, thus requiring provincial power companies to charge higher-than-usual tariffs. Since it was not possible to pass on the additional cost of wind power to consumers, the loan was terminated prior to effectivity upon the Government's request.

4. The other three loans (including the advisory technical assistance on capacity building under the Partnership on Land Degradation in Dryland Ecosystems,<sup>6</sup> which was a hybrid loan) and two RETAs were deemed consistent with the Government, ADB, and GEF strategies. Two of these, the Prevention and Control of Dust and Sandstorms in Northeast Asia<sup>7</sup> and the capacity building hybrid loan (footnote 6) sought to address land degradation and the worsening desertification in northeast Asia. The Prevention and Control of Dust and Sandstorms in Northeast Asia was rated relevant but not highly relevant, because the design focused more on addressing symptoms of the problem rather than the causes. Nevertheless, the approach is still consistent with the Government and ADB strategies. ADB initiated this effort by supporting the preparation of a programmatic approach to land degradation through the earlier technical assistance on PRC-GEF Partnership on Land Degradation in Dryland Ecosystems.<sup>8</sup> The resulting PRC-GEF Partnership on Land Degradation in Dryland Ecosystems program is a 10-year, three-phase plan (with \$1.5 billion for the three phases) to help the Government strengthen its enabling environment, improve operational arrangements, establish a monitoring and evaluation system, and implement pilot demonstration projects. ADB

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<sup>5</sup> ADB. 2000. *Report and Recommendation of the President to the Board of Directors on a Proposed Loan to the People's Republic of China for the Wind Power Development Project*. Manila (Loan 1818-PRC, for \$58 million, approved on 20 December).

<sup>6</sup> ADB. 2004. *Financial Arrangement for a Proposed Global Environment Facility Grant and Asian Development Bank Technical Assistance Grant to the People's Republic of China for the Capacity Building to Combat Land Degradation Project*. Manila (TA 4358-PRC, for \$1 million, approved on 28 June).

<sup>7</sup> ADB. 2002. *Technical Assistance for Prevention and Control of Dust and Sandstorms in Northeast Asia*. Manila (TA 6068-REG, for \$1 million, approved on 11 December).

<sup>8</sup> ADB. 2001. *Technical Assistance to the People's Republic of China for the PRC-GEF Partnership on Land Degradation in Dryland Ecosystems*. Manila (TA 3657-PRC, for \$1.15 million, approved on 25 May). This TA was approved outside GEF financing.

secured approval for the capacity building hybrid loan as the first project under the Partnership. This project is helping six PRC provinces prepare strategic plans for land degradation control, review policy and regulatory conditions, and support capacity for future investments.<sup>9</sup> The country assistance program evaluation team assessed this technical assistance as a highly relevant follow-up to earlier ADB efforts on land degradation.

5. **Effectiveness.** The GEF-cofinanced activities were effective. The promotion of biomass technology<sup>10</sup> under agricultural wastes project<sup>11</sup> has allowed each project household to save 1.2 tons of firewood each year (equivalent to 0.22 hectare of forest protection per household), use 15.6 tons of sludge that otherwise would have been thrown away, reduce smoke pollution from cooking with wood, minimize the transmission of blood fluke disease (caused by the burning of animal waste), and increase the productive time of women. The Shanxi provincial government compared ADB activities under this project to those of government programs and found ADB's initiative to be more effective because of the larger investments, greater focus on women's involvement, availability of GEF funds, and potential for long-term final support through the certified emission reduction system. However, because of stringent beneficiary selection criteria and the provision of the subloans on a reimbursable basis, there was built-in bias toward involving better-off households. Thus, while environmental benefits were delivered, the poverty reduction impact may not have been substantial. In the absence of an operational monitoring and beneficiary assessment system for the project, ADB has had to rely mainly on anecdotal evidence.

6. To a lesser extent, the dust and sandstorms RETA (footnote 7) was also effective. Although its outcomes were not sufficiently ambitious, it did achieve its expected outputs: facilitating meetings for stakeholders within the PRC and other Northeast Asian countries, and with associated United Nations agencies; preparing a program to establish a regional monitoring and early warning network for dust and sandstorms; and outlining an investment strategy. Subsequent to this RETA (though not directly related to it), bilateral agreements are being developed between the PRC and Japan, the Republic of Korea, and Mongolia to support the monitoring stations. However, the RETA did not establish an operational capacity for the regional cooperation mechanism to coordinate interventions and mobilize support of stakeholders for combating dust and sandstorms beyond TA completion, as expected in the TA framework. The monitoring or early warning system being proposed also did not add much value to those provided by existing weather satellites.

7. On the other hand, the capacity building hybrid loan on land degradation and previous ADB TAs supporting the Partnership were highly effective. The Partnership is

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<sup>9</sup> ADB. 2006. *Special Evaluation Study on the Performance of Selected GEF Projects and ADB's Role in the Joint Process Evaluation*. Manila (draft).

<sup>10</sup> To produce cleaner biogas for cooking and lighting by promoting the use of biogas digesters and biogas and gasification plants.

<sup>11</sup> ADB. 2002. *Report and Recommendation of the President to the Board of Directors on a Proposed Loan to the People's Republic of China for the Efficient Utilization of Agricultural Wastes Project*. Manila (Loan 1924-PRC, for \$33.1 million, approved on 22 October).

GEF's first long-term program for land degradation as well as the first time the integrated ecosystem management approach<sup>12</sup> has been applied in the PRC. Not only are the six project provinces major sources of dust storms, they also cover 30 important ecosystems, and land degradation prevention there would contribute to great environmental benefits. Through phase 1 activities,<sup>13</sup> government officials and staff now recognize that land degradation cannot be addressed by any one sector, law, policy, or technology. The ensuing establishment of a highly functional management system, spanning several sectors, disciplines, and regions, with a complete set of implementation measures, therefore represents an excellent model for emulation or extension. The Partnership has also evolved as a global coordinator of land degradation prevention and control by conducting broad cooperation and exchange between government sectors at all levels and at least 14 international partners,<sup>14</sup> on financing, fund utilization, project implementation experience, and various technologies and methods to conserve soil and water. It is too early to assess the efficacy of the project on the Sanjiang Plain Wetlands Management.

8. **Efficiency.** These GEF-cofinanced activities are assessed efficient. The dust and sandstorms RETA (footnote 7) may be considered highly efficient, as most project activities have been implemented according to plan and generated savings, despite involving four countries and four key agencies, and incurring delays due to the severe acute respiratory syndrome outbreak. The implementation of the capacity building project on land degradation (footnote 6) may be less efficient because of its hybrid nature, which constrained ADB from hiring individual consultants. The Government estimated that the recruitment of consulting firms under this TA delayed mobilization by 3 to 5 months. The firm that was contracted then viewed ADB as its client, which reduced its accountability to the executing agency.<sup>15</sup> Since this TA was concerned with planning, coordination, and reporting, the location of the project officer in Manila instead of in Beijing placed the ADB-financed activities at a disadvantage. Similarly, the training conducted under the agricultural wastes project (footnote 11) may be less efficient because of poor targeting,<sup>16</sup> timing,<sup>17</sup> and the rote of delivery of some training. ADB was also not very responsive to the Government's initial request to devote more funds for capacity building over consulting services,<sup>18</sup> leading to extensive discussions and delays in the implementation of the credit

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<sup>12</sup> Integrated ecosystem management (IEM) is defined as a holistic approach to addressing the links between ecosystem functions and services (like carbon uptake, watershed protection, etc.) and social, economic, and production systems. Thus, IEM recognizes that people and natural resources are inextricably linked.

<sup>13</sup> These focused on converting IEM policy into provincial strategic frameworks and IEM guidelines at the central and provincial levels, putting into place an IEM-based legal action plan, and identifying demonstration projects in six priority provinces in the western region.

<sup>14</sup> Including World Bank, Food Agriculture Organization, United Nations Environment Programme, United Nations Development Programme, Kreditanstalt für Wiederaufbau, International Fund for Agricultural Development, United Nations Industrial Development Organization, European Union, Japan International Cooperation Agency, Australian Agency for International Development, Canadian International Development Agency, Conservation International, The Nature Conservancy, World Wildlife Fund, etc.

<sup>15</sup> This posed difficulties when the consultants' opinions differed from those of the project manager's, or when the executing agency perceived that they could have hired domestic consultants of a higher quality.

<sup>16</sup> While digester operation is almost completely managed by women, only 20% of the trainees were women.

<sup>17</sup> Coming months before or after the biogas digesters had been physically completed.

<sup>18</sup> The Government had made the request during loan negotiations, which ADB did not support. As a temporary measure, parties agreed to augment the training fund by reducing the contingency fund, with the understanding

fund. Since the Sanjiang Plain Wetlands Protection Project became effective only in December 2005, there are not enough activities to assess.

9. **Sustainability.** The outputs generated by the dust and sandstorms RETA (footnote 7), particularly the investment strategy, could not be implemented without further support and therefore, its sustainability is less likely. In addition, varying incentives for the different countries,<sup>19</sup> which have a range of financial capabilities, do not encourage equal participation in the RETA activities, thus requiring continued external support. Moreover, since the RETA did not establish a direct link between the dust and sandstorms effect and the land degradation cause, the approach should not be viewed as a long-term solution.

10. **New Proposals.** Of the seven proposals currently being developed by ADB for GEF cofinancing, five involve the PRC. In fact, GEF is becoming a very important source of cofinancing for programmed loans in the agriculture and natural resources sector of ADB in the PRC, as four of the five loans in the pipeline for 2007 have GEF components. The Government has noted delays in getting GEF approval for these proposed projects<sup>20</sup> and suggested that ADB explore other possible sources of cofinancing whenever possible.

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that the consultants' services category will not be fully utilized, thus serving as the effective buffer for the project. Only then did the PRC become willing to sign off on the GEF Financing Agreement between ADB and World Bank.

<sup>19</sup> Upstream or source countries are the PRC and Mongolia, while the downstream countries are Japan and Republic of Korea.

<sup>20</sup> In September 2005, the GEF adopted a new system for allocating resources to countries based on the country's potential to generate global environmental benefits (in terms of biodiversity and climate change issues) as well as its capacity to implement GEF projects. As a result, the GEF Secretariat required those proposals that were pipelined for GEF approval to be resubmitted for consideration using the revised criteria.