# **Environmental Protection in China 1986-1996**

Information Office of the State Council The People's Republic of China

# Foreword

China is a developing country. Now it is confronted with the dual task of developing the economy and protecting the environment. Proceeding from its national conditions, China has, in the process of promoting its overall modernization program, made environmental protection one of its basic national policies, regarded the realization of sustainable development as an important strategy and carried out throughout the country large-scale measures for pollution prevention and control as well as ecological environment protection. Over the 18 years since its adoption of reform and opening to the outside world, China's gross national product (GNP) has achieved a sustained annual growth of around 10 percent, while its environmental quality has basically steered clear of the outcome of corresponding deterioration. Practice has proved that the principle adopted by China of effecting coordinated development between the economy, the society and the environment has been effective.

As a member of the international community, China, while making great efforts to

protect its own environment, has taken an active part in international environmental affairs, striven to promote international cooperation in the field of environmental protection, and earnestly fulfilled its international obligations. All these have given full expression to the sincerity and determination of the Chinese government and people to protect the global environment.

What efforts has China made to protect its own environment? What is the situation of environmental protection in China? On the occasion of the annual World Environment Day, which falls on June 5, here is a brief account:

# I. The Choice of Implementing a Sustainable Development Strategy

China's modernization drive has been launched in the following conditions: The country has a large population base, its per-capita average of natural resources is low, and its economic development as well as scientific and technological level remain quite backward. Along with the growth of China's population, the development of the economy and the continuous improvement of the people's consumption level since the 1970s, the pressure on resources, which were already in rather short supply, and on the fragile environment has become greater and greater. Which road of development to choose has turned out, historically, to be an issue of paramount importance to the survival of the Chinese people as well as their posterity.

The Chinese government has paid great attention to the environmental issues arising from the country's population growth and economic development, and has made protecting the environment an important aspect of the improvement of the people's living standards and quality of life. In order to promote coordinated development between the economy, the society and the environment, China enacted and implemented a series of principles, policies, laws and measures for environmental protection in the 1980s.

-- Making environmental protection one of China's basic national policies. The prevention and control of environmental pollution and ecological destruction and the rational exploitation and utilization of natural resources are of vital importance to the country's overall interests and long-term development. The Chinese government is unswervingly carrying out the basic national policy of environmental protection.

-- Formulating the guiding principles of simultaneous planning, simultaneous implementation and simultaneous development for economic construction, urban and rural construction and environmental construction, and combining the economic returns with social effects and environmental benefits; and carrying out the three major policies of ``prevention first and combining prevention with control,'' ``making the causer of pollution responsible for treating it'' and ``intensifying environmental management.''

-- Promulgating and putting into effect laws and regulations regarding environmental protection and placing environmental protection on a legal footing, continuously improving the statutes concerning the environment, formulating strict law-enforcement procedures and increasing the intensity of law enforcement so as to ensure the effective implementation of the environmental laws and regulations. -- Persisting in incorporating environmental protection into the plans for national economic and social development, introducing to it macro regulation and management under state guidance, and gradually increasing environmental protection input so as to give simultaneous consideration to environmental protection and other undertakings and ensure their coordinated development.

-- Establishing and improving environmental protection organizations under governments at all levels, forming a rather complete environmental control system, and bringing into full play the governments' role in environmental supervision and administration.

-- Accelerating progress in environmental science and technology. Strengthening research into basic theories, organizing the tackling of key scientific and technological problems, developing and popularizing prac"itical technology for environmental pollution prevention and control, fostering the growth of environmental protection industries, and giving initial shape to an environmental protection scientific research system.

-- Carrying out environmental publicity and education to enhance the whole nation's awareness of the environment. Widely conducting environmental publicity work, gradually popularizing environmental education in secondary and primary schools, developing on-the-job education in environ"imen tal protection and vocational education, and training specialized personnel in environmental science and technology as well as environmental administration.

-- Promoting international cooperation in the field of environmental protection. Actively expanding exchanges and cooperation concerning the environment and development with other countries and international organizations, earnestly implementing international environmental conventions, and seeking scope for China's role in global environmental affairs.

Since the beginning of the 1990s the international community and various countries have made an important step forward in exploring solutions to problems of the environment and development. The United Nations Conference on Environment and Development, held in June 1992, made sustainable development the strategy for common development in the future, and this won wide acclaim from the governments of all countries represented at the conference.

In August 1992, shortly after that conference, the Chinese government put forward ten major measures China was to adopt to enhance its environment and development, clearly pointing out that the road of sustainable development was a logical choice for China now and in the future. In March 1994 the Chinese government approved and promulgated China's Agenda 21 -- White Paper on China's Population, Environment, and Development in the 21st Century. This document, proceeding from the country's specific national conditions in these three respects, put forward China's overall strategy, measures and program of action for sustainable development. The various departments and localities also worked out their respective plans of action to implement the strategy for sustainable development.

At its Fourth Session in March 1996 China's Eighth National People's Congress examined and adopted the Ninth Five-Year Plan of the People's Republic of China for National Economic and Social Development and the Outline of the Long-Term Target for the Year 2010. Both the Plan and Outline take sustainable development as an important strategy for modernization, thus making it possible for the implementation of the strategy of sustainable development in the course of China's economic construction and social development.

# II. Improving the Legal and Administrative Systems Step by Step

#### China pays great attention to environmental legislative work and has now established an environmental statutory framework that takes the Constitution of the People's Republic of China as the foundation and the Environmental Protection Law of the People's Republic of China as the main body.

The Constitution of the People's Republic of China stipulates, ``The state protects and improves the living environment and the ecological environment, and prevents and remedies pollution and other public hazards,'' and ``The state ensures the rational use of natural resources and protects rare animals and plants. The appropriation or damage of natural resources by any organization or individual by whatever means is prohib"iited.''

The Environmental Protection Law of the People's Republic of China is the cardinal law for environmental protection in China. The law has established the basic principle for coordinated development between economic construction, social progress and environmental protection, and defined the rights and duties of governments at all levels, all units and individuals as regards environmental protection.

China has enacted and promulgated many special laws on environmental protection as well as laws on natural resources related to environmental protection. They include the Law on the Prevention and Control of Water Pollution, Law on the Prevention and Control of Air Pollution, Law on the Prevention and Control of Environmental Pollution by Solid Wastes, Marine Environment Protection Law, Forestry Law, Grassland Law, Fisheries Law, Mineral Resources Law, Land Administration Law, Water Resources Law, Law on the Protection of Wild Animals, Law on Water and Soil Conservation, and Agriculture Law.

The Chinese government has also enacted more than 30 administrative decrees regarding environmental protection, including the Regulations for the Prevention and Control of Noise Pollution, Regulations on Nature Reserves, Regulations on the Prevention of and Protection Against Radiation from Radio Isotopes and Radioactive Device, Regulations on the Safe Administration of Chemicals and Other Dangerous Materials, Provisional Regulations on the Prevention and Control of Water Pollution in the Huaihe River Drainage Area, Regulations Governing Environmental Protection Administration in Offshore Oil Exploration and Development, Regulations on the Control of Marine Wastes Dumping, Regulations for the Implementation of the Protection of Terrestrial Wildlife, Pro‴ivisional Regulations on the Administration of National Parks, Regulations on the Protection of Basic Farmland, and Regulations on Urban Afforestation. In addition, departments concerned have also issued a number of administrative rules and decrees on environmental protection.

To implement the state's environmental protection laws and regulations, people's congresses and people's governments at local levels, proceeding from specific conditions in their own areas, have enacted and promulgated more than 600 local laws on environmental protection.

Environmental standards are an important component of China's environmental statutory framework. They include environmental quality standards, pollutant discharge or emission standards, basic environmental criteria, criteria for samples, and criteria for methodology. The environmental quality standards and pollutant discharge or emission standards are divided into state standards and local standards. By the end of 1995, China had promulgated state environmental quality standards and pollutant discharge on 364 items. As stipulated in Chinese law, the environmental quality standards and pollutant discharge standards and pollutant discharge standards and pollutant discharge standards and same compulsory standards, and those who violate these compulsory environmental standards must bear the corresponding legal responsibility.

In the process of establishing and improving the environmental statutory framework, China attaches equal importance to environmental law enforcement and environmental legislation. For four years in a row, China has conducted nationwide checks on the enforcement of environmental legislation to seriously deal with acts of polluting and damaging the environment and severely punish environmental law violations. China pays great attention to supervision exercised by the people and media over law-breaking activities regarding the environment -- it has opened channels for the masses of people

to report on environmental problems and adopted measures for the media to expose environmental law-breaking activities.

But it should be pointed out that China's environmental legislative work needs to be further improved. For instance, some areas still remain uncovered, some contents are yet to be amended or revised and there are still the phenomena of not fully observing or enforcing laws. Therefore, to make continuous efforts to strengthen environmental legislative work remains an important strategic task.

China attaches equal importance to the establishment of an environmental administrative system. It has established a system in which the National People's Congress enacts the laws, governments at different levels take responsibility for their enforcement, the administrative departments in charge of environmental protection exercise overall supervision and administration and the various departments concerned exercise supervision and administration according to the stipulations of the law.

The National People's Congress has established an Environment and Resources Protection Committee, whose work it is to organize the formulation and examination of drafted laws related to environmental and resources protection and prepare the necessary reports, exercise supervision over the enforcement of laws governing environmental and resources protection, put forward motions related to the issue of environmental and resources protection, and conduct exchanges with parliaments in other countries in the field of environmental and resources protection. The people's congresses of some provinces and cities have also established corresponding environmental and resources protection organizations.

The Environmental Protection Committee under the State Council is made up of leaders of various related ministries under the State Council. It is the State Council's consultancy and coordination agency for environmental protection work. Its major tasks are studying and examining the principles, policies and measures relating to coordinative development of the country's economy and environmental protection, giving guidance to and coordinating efforts in tackling major environmental problems, exercising supervision over and conducting checks on the implementation of the environmental protection laws and regulations by various localities and departments, and promoting the development of environmental protection undertakings throughout the country. The people's governments at the provincial, city and county levels have also established corresponding environmental protection

The National Environmental Protection Agency is the competent environmental protection administration agency under the State Council, whose task it is

to exercise overall supervision and administration over the country's environ"imen tal protection work. The people's governments at the provincial, city and county levels have also successively established environmental protection administration departments to carry out overall supervision and administration of the environ"imen tal protection work in their localities. At present, there are nationwide more than 2,500 environmental protection administration departments above the county level with a total staff of 88,000 engaged in environmental administration, monitoring, inspection and control, statistics collection, scientific research, pub"ilicity and education.

Environmental protection organizations have also been established in comprehensive administration departments, resources administration departments and industrial departments under governments at various levels to take charge of related environmental and resources protection work. Most of China's large and medium-sized enterprises have also set up environmental protection organizations responsible for their own anti-pollution work and the promotion of cleaner production. At present, the total number of various types of environmental protection workers employed by the various departments and enterprises exceeds 200,000.

### III. The Prevention and Control of Industrial Pollution and the

### Comprehensive Improvement of the Urban Environment

#### The Chinese government regards prevention and control of industrial pollution as the focal point of environmental protection. Thanks to unremitting efforts over the past 20-odd years, China has made great progress in this regard.

-- Changes in the strategy for the prevention and control of industrial pollution have been effected. In the 1970s efforts to prevent and control industrial pollution in China mainly concentrated on the control of point sources. In the 1980s China carried out prevention and control of industrial pollution in a comprehensive way through the readjustment of irrational industrial distribution, the overall industrial structure and the product mix in combination with technical transformation, strengthened environmental management and other policies and measures. In the course of founding the socialist market economic system in the 1990s China has changed its traditional development road. In guiding concept for the prevention and control of industrial pollution, ``three changes'' have been decided upon, i.e., regarding basic strategy, China will gradually change its strategy of

end-of-pipe pollution control into pollution control during the whole process of industrial production; with respect to the control of pollutant discharge, concentration control will be replaced by a combination of the control of concentration and that of total quantity; and with regard to pollution control methods, focus on the control of scattered point sources will be replaced by a combination of centralized and scattered controls.

-- Policy and legislation for preventing and controlling industrial pollution have taken initial shape as a coherent system. In order to effectively prevent and control industrial pollution, the Chinese government has drawn up three major policies for environmental protection, i.e., ``putting prevention first and combining prevention with control, '``making the causer of pollution responsible for treating it' and ``intensifying environmental management.'' In addition, it has drawn up the policy on the comprehensive utilization of resources, the policy on preventing and controlling industrial pollution in combination with technical transformation, the policy on over"iall improvement of the urban environment, the policy on environmental protection technology, and the policy on environmental protection industries. The laws and regulations on environmental protection that have been promulgated include explicit provisions on the prevention and control of industrial pollution. Local governments at all levels have worked out local policies on the prevention and control of industrial pollution in accordance with their actual conditions.

-- Enterprise environment supervision and management have been reinforced. The Chinese government has promoted the enforcement of the environmental impact assessment system and the ``three-at-the-same-time'' system (i.e., facilities for preventing and controlling environmental pollution and destruction shall be planned, constructed and put into use at the same time as the main production projects). These steps have played remarkable roles in controlling new pollution sources. The nation's environmental impact assessment rate of construction projects above the county level and the implementation rate of the three-at-the-same-time'' system have reached, respectively, 60.8 percent and 87.3 percent. By the end of 1995, 480 cities and 77,000 enterprises had made pollution discharge declarations and registrations; 240 cities had issued a total of 16,000 pollutant discharge licences to 14,000 enterprises. Since 1979 China has collected 24.7 billion yuan in pollutant discharge fees.

-- Measures for preventing and controlling industrial pollution have gradually been perfected. First, China has completed a great number of pollution-control projects through the readjustment of the industrial structure and product mix, and promoted clean production through technical transformation. Chemical, metallurgical, light, machine-building, power and construction materials industries have actively adopted clean production,

speeded up technical transformation and firmly eliminated a large amount of equipment and products characterized by heavy pollution and high consumption of energy and materials. Consequently, industrial production has increased for several years running, the discharge of pollutants has declined steadily and the economic returns of enterprises have gone up year by year. The Jilin Chemical Industrial Company is an old enterprise, but for many years it has relied on progress in science and technology to carry out technical transformation of its production equipment which used to cause a serious waste of resources and produced a large amount of pollution. As a result, it has fundamentally eliminated pollution from various chemicals. Second, in combination with the comprehensive improvement of the urban environment and regional reconstruction, a number of enterprises featured by heavy pollution have been closed down, moved away or otherwise put under control, thus alleviating the trend of pollution in some regions. The Beijing Municipal Government closed down the heavily polluting south section of the Special Steel Factory of the Capital Iron and Steel Company, eliminating a large pollution source in the city proper. Shanghai has strengthened the prevention and control of pollution in the upper reaches of the Suzhou and Huangpu rivers and in major urban districts, so that pollution in some of the districts has been brought under control. Third, the dynamics of setting deadlines for eliminating pollution have been reinforced. Since 1978 the Chinese government has announced two groups of scheduled pollution-control projects, totaling 367, and local governments have designated 220,000 pollution-control projects, which have basically been completed. Fourth, the prevention and control of pollution is developing toward regional and river valley comprehensive improvement. Since the late 1980s the Chinese government has adopted measures to comprehensively alleviate air pollution in Benxi and Baotou cities, and water pollution in the Baiyangdian Lake and Huaihe River drainage basins. In 1995 the Chinese government promulgated the Pro"ivisional Regulations on the Prevention and Control of Water Pollution in the Huaihe River Drainage Area, and the work is being actively carried out in accordance with the plan. Fifth, efforts have been stepped up to save energy and reduce consumption. The capability to treat waste gas, waste water and industrial residue (the ``three wastes'') has been enhanced and the comprehensive utilization rate of these materials has been increased. During the Eighth Five-Year Plan period (1991-95) energy consumption for every ten thousand yuan worth of the gross domestic product (GDP) decreased from 5.3 tons of the standard coal in 1990 to 3.94 tons in 1995, saving a grand total of 358 million tons of the standard coal, or an annual averge economization rate of 5.8 percent. In 1995 the waste water treatment rate of the industrial enterprises above the county level all over the country reached 76.8 percent; the smoke and dust removal rate of waste gas from burning fuel, 88.2 percent; waste gas purification rate from production processes, 68.9 percent; and the comprehensive utilization rate of industrial solid waste, 43 percent. Output value attained through the comprehensive utilization of the industrial ``three wastes'' came to 19 billion yuan. Starting in 1983, Li Shuang"iliang, a retired worker of the Taiyuan Iron and Steel Company, and 20 other retired workers spent 10 years removing a huge slag heap, thus eliminating a serious, long-standing pollution source of the Taiyuan Iron and Steel Company. The slag was utilized in a comprehensive way, with 900,000 tons of waste iron and steel worth 160 million yuan recovered.

China is a country with coal as its main energy source. Seventy percent of the smoke and dust in the air and 90 percent of the sulfur dioxide emission come from burning coal. As a result, the cities with concentrated industries and populations suffer from serious air pollution. Acid rain has occurred, and the situation has gone from bad to worse in some regions and cities. The Chinese government has adopted some measures, such as developing clean coal technology and clean-combustion technology, and collecting sulfur dioxide emission fees, to control acid rain. A long-term study by Chinese experts on the issue of acid rain proves that the precursors of acid rain generated from the emission source in Chinese mainland are mainly transported within Chinese territory, and the acid rain is mainly in the areas south of the Yangtze River, in regions east of the Qinghai-Tibet Plateau, and in the Sichuan Basin.

Like other developing countries, China's per capita energy consumption level and the emitted sulfur dioxide are much lower than the world average level at present, and it will remain so by the end of this century. According to the Framework Convention on Climatic Changes, China is under no specific obligation to limit the emission of carbon dioxide. However, mindful of its responsibility for protection of the global climate, China follows the principle of attaching equal importance to economization on energy and expansion of the energy industry, striving to raise its energy utilization efficiency and to readjust its energy structure. While appropriately developing nuclear power, China spares no effort to develop hydroelectric power and to strengthen research into and exploitation of geothermal power, solar energy, wind energy, oceanic energy and other new energy sources, so as to reduce the green-house gas emission.

Since the initiation of the policies of reform and opening to the outside world, China's GNP has quadrupled, but the growth of the emission of pollutants is clearly slower than the economic growth. Some environmental quality indices of some regions and cities have basically remained stable, and some localities have made improvements to a certain extent. In spite of this, China's industrialization is still in the primary stage of development, with a low level of modernized management. Its industrial distribution and structure need to be further readjusted. With comparatively backward equipment and production technology, the pre″ivention and control of industrial pollution remain an arduous task of environmental protection in China.

The Chinese government has always considered the cities as key points in environmental protection work. In the past 10-odd years China has speeded up urbanization. In 1980 the urban population in China totaled 191.4 million, a figure which rose to 351.71 million in 1995. In 1980 China had 223 administratively designated cities, which went up to 640 in 1995. The urbanization level increased from 19.39 percent in 1980 to 28.85 percent in 1995. Just like other countries, the issue of environmental pollution has also appeared in the course of China's urbanization. Therefore the Chinese government has adopted effective measures to control environmental pollution and done its best to improve the quality of the urban environment.

-- Drawing up overall city plans and readjusting the layout of urban functions. By the end of 1995 each of the 640 cities in China had worked out its own overall city plan. So had each of the 31, 559 administratively designated towns. In accordance with the Law on City Planning, while working out an overall city plan, the city must include in the plan details of environmental protection, such as protecting and improving the city's ecological environment, and preventing and controlling pollution and other public hazards. In light of the requirements of the overall planning, many cities, while transforming the old areas and developing new ones, have, in accordance with the city's function zoning, readjusted the industrial layout, strengthened the prevention and control of industrial pollution, changed the situation in which factories and residents share the same areas, controlled urban environmental pollution caused by production and in people's daily lives, and constructed a large number of residential quarters with reasonable layout and complete social services. In addition, China has designated 52 key environmental protection cities, and put 99 leading national-level historical and cultural cities under special protection.

-- Strengthening the construction of infrastructure and improving the capability to prevent and control pollution. At present, 68.4 percent of urban residents in China use gas for fuel and heating; the centralized disposal rate of urban sewage is 20 percent; the innocurity rate of urban garbage and fecal disposal is 45.4 percent; and the afforestation rate is 23.8 percent. In 1994 Beijing invested 15.13 billion yuan in the construction of urban infrastructure, of which over five billion yuan was used to construct environmental improvement facilities. It built the Gaobeidian Sewage Treatment Plant, with a daily handling capacity of 500,000 tons, and the large-scale Datun Garbage Transfer Station and Ahsuwei sanitary landll, thus greatly improving Beijing's environment overall.

-- Comprehensive improvement of the urban environment and improving the quality of the urban environment. Since 1989 the Chinese government has promoted the urban environment comprehensive improvement examination system throughout the country. The state and the governments at the provincial level have carried out examinations in 37 key cities and other 330-plus cities. The implementation of this system has enhanced the sense of responsibility of leaders at all levels for urban environmental protection, and such examinations have been included in the governments' work agendas. Hence a management system and operation mechanism for the comprehensive improvement of the urban environment under the unified leadership of mayors, carried out by different departments according to their respective divisions of responsibility and actively participated in by the broad masses of the people have taken initial shape. All cities in China have increased their investment in environmental improvement and speeded up relevant construction. Obvious results have been achieved. By 1995 China had constructed 11,333 sq km of smoke-and-dust control zones, and 1,800 sq km of up-to-standard noise-control zones, and increased public lawns by 490 million square meters. A large number of urban waterways, such as the Zhongdong River in Hangzhou, the Funan River in Chengdu, the Haihe River in Tianjin, the Suzhou River in Shanghai, the Qinhuai River in Nanjing and the Haohe River in Nantong, have been cleaned up on a large scale. Hence, the urban water environment has been improved.

Thanks to comprehensive urban environmental improvement and ecological construction, Benxi City in Liaoning Province has cleared up 21 ``smoke dragons,'' 17 polluted springs and two mounds of industrial residue which were notorious sources of pollution. It has also constructed a round-the-city forest park with an area of 220 sq km. Consequently, Benxi, which used to be known as one of ``the cities on earth which could not be seen from a satellite'' because of air pollution, has made a remarkable improvement in its environment.

### IV. Territorial Control and Rural Environmental Protection

Territorial control forms part of China's work in implementing the sustainable development strategy. Since the start of the reform and opening-up era, the Chinese government has carried out territorial control on a large scale.

-- New progress has been made in territorial control planning. In this work the Chinese government has formulated a sequence of national, trans-provincial and key-regional territorial control plans, such as the National Program for Overall Land Use Planning, the National Program for Afforestation, the National Plan for Marine Development, the National Program for Water and Soil Conservation, the Comprehensive Plan for China's Seven Major River Valleys, the Plan for Economic Development in the Three Gorges Area, the Economic Plan for the Yangtze River Delta and Areas Along the River, Key Points of the Economic Plan for Northwestern Areas, and the Resources Development and Environment Protection Plan for the Juncture of Shanxi, Shaanxi and Inner Mongolia. Some provinces and cities have also drawn up or revised local territorial control plans and the overall plan for land use. By the end of 1995 the overall plan for land use had been 60 percent completed at the provincial level, 69 percent at the city (prefectural) level and 63 percent at the county level.

-- Many achievements have been made in research on territorial control. To help formulate the Ninth Five-Year Plan for National Economic and Social Development and the Outline of the Long-Term Target for the Year 2010, the Chinese government, proceeding from realizing coordination and sustainable development of the economy, society, population, resources and environment, has organized research on vital issues such as the development of territorial resources and environmental control, the overall plan for the national territory, and how well mineral resources can satisfy the demands of the national economy. It has also completed the Major Issues on the Development of National Territorial Resources and Environmental Control During 1996-2010 and other research reports on special subjects. The government has laid down the overall framework of optimizing the development and control of territorial resources, the regional development strategy and distribution of territorial resources exploitation, as well as the targets and measures of territorial control and environmental protection.

Notable successes have been attained in the harnessing of main rivers and lakes. Since the foundation of New China in 1949 the Chinese government has taken comprehensive exploitation and control of major rivers and lakes, with emphasis on the prevention and control of flood and waterlogging, as an important task of water conservancy construction. During the Eighth Five-Year Plan period, on the middle and lower reaches of the Yangtze River, the lower reaches of the Yellow River, and on the Huaihe, Haihe, Songhua and Liaohe rivers and Lake Taihu, the main dikes were heightened and reinforced, waterways were cleaned up, and flood diversion projects were built. The construction of a group of key projects for water control and other uses were completed or started. To compensate for lack of water resources in northern areas, the Chinese government vigorously promoted the planning and construction of water-diversion projects between different drainage basins. In November 1995 it sponsored an overall feasibility study of the middle, eastern and western lines projects for diverting water from south to north. The Three Gorges Project is a gigantic, trans-century project for harnessing and developing the Yangtze River. When it is completed, floods on the upper reaches will be effectively controlled and areas on the middle and lower reaches will be able to improve their anti-flood capability, thus lessening the harmful effects on the ecological environment. Hydroelectricity, which will be the energy discharged by the project, causes much less pollution than coal-burning power plants. The government has organized experts to work out the Report on the Impact of the Three Gorges Project on the Ecology and Environment, and Countermeasures, and has approved the Environmental Impact Statement of the Three Gorges Project. The government will adopt a sequence of measures to minimize the unfavorable effects on the ecology and the environment that could be caused by the Three Gorges Project.

-- Land preservation, exploitation and control have been promoted on a full scale. In order to put cultivated land under proper protection, basic farmland preservation areas have been delimited all over the country, in accordance with the Regulations on the Protection of Basic Farmland. By the end of 1995, 2,100 units at the county level had finished the work, with well over 70 percent of farmland put under effectual protection. Planned management of the land to be used for construction has been strengthened, putting the total area and makeup of such land under proper control. Random occupation of farmland has been curbed to some extent. In 1995, farmland used for construction was 20.8 percent less than the previous year. In recent years, the government has formulated the Key Points of National Planning for Desertication Control During 1991-2000 to speed up the desertification prevention and control project. It is planned that 6.667 million hectares of desertified land will be treated over ten years. The development of 20 key counties, nine experimental areas and 22 demonstration bases of the national desertification prevention and control project has been brought into line with the development plan of the national economy. During the Eighth Five-Year Plan period 3.759 million hectares of desertified land were tackled in a comprehensive way. The Chinese government also devotes much attention to water and soil conservation. It has effectively prevented soil erosion and improved the ecological environment and agricultural conditions. At present, 25 key soil erosion control areas have been established at the national level. Water and soil conservation projects are carried out in seven big river valleys. In more than 10,000 small river valleys with serious soil erosion, problems concerning mountains, rivers, farmland and forests are tackled in a comprehensive way. Soil erosion has been checked in a total area of 67 million hectares, and a great number of water and soil conservation projects have been completed, making eroded soil decrease by 1.1 billion tons every year and water conservation capacity increase by 18 billion cubic meters. In the comprehensive soil erosion control area in the Loess Plateau, a total of 15 million hectares of land have been treated -- 30 percent of the soil

erosion area -- with over 300 million tons less silt flowing into the Yellow River every year. Since the publication of the Regulations on Land Reclamation, most of the provinces and cities have worked out procedures for implementation of these regulations and some dozen provinces and autonomous regions have put into effect procedures for raising funds for land reclamation and for the use and administration of these funds. As a result, remarkable progress has been made in the country's reclamation of discarded land. From 1987 to 1995 a total of about 3.5 million hectares of land were reclaimed, among which 600,000 hectares had been waste land. In 1989 the experimental work of land reclamation was carried out in major mineral-producing provinces. In 1995 construction of three national-level reclamation demonstration zones was started in sunken areas of coalfields, while the national reclamation technical standards were stipulated. Tongshan County in Jiangsu Province invested 56 million yuan to reclaim 6,600 hectares of land, basically balancing land reclamation with land use.

-- The ability to combat natural disasters has been improved. The Chinese people have accumulated abundant experience in their protracted struggles against natural disasters, in which they laid down principles like ``putting prevention first and combining prevention and control,'' and ``combining pre"ivention and rescue.'' A working system has been primarily established to avert all kinds of natural disasters, and a contingent of experienced scientists and researchers of various disciplines has been organized and monitoring stations and networks for main natural disasters have taken initial shape.

China has traditionally been an agricultural country. In developing agricultural production, the government attaches great importance to rural environmental protection.

-- Achievements have been made in eco-agriculture. The government has taken the development of eco-agriculture as an important means to realize the coordinated development of the environment and the economy. At present, the 50 eco-agricultural experimental counties designated by the state are playing positive and exemplary roles in the country, spurring development of eco-agriculture in 10 prefectures and over 100 counties. According to statistics, the total output of grain of the experimental counties has increased by 15 percent, output per mu by upwards of 10 percent, and the income per capita is 12 percent higher than the average level of the surrounding areas. The practice of eco-agriculture has brought about striking improvements in the agricultural ecological environment -- barren hills greened, forest acreage greatly raised, soil erosion controlled to some extent, organic matter content of the soil increased, and the ability of the agricultural ecological system to ward off natural disasters improved. In the meantime, in order to promote regional sustainable development, construction of some 100 ecological demonstration areas, mainly at the county level, has been started in an all-round way.

-- Further development of rural energy construction. Energy construction in rural areas is an important measure for protecting and improving the rural ecological environment. In 1991 comprehensive energy construction in rural areas was started in 100 counties. As a result, a capacity equivalent to 10.8 million tons more of standard coal was added every year and 11.37 million tons were saved. In 1995 fuel-saving stoves, methane, solar, wind and geothermal energy sources and small hydropower stations began to develop and were popularized in rural areas throughout the country. In this way, annually 80 million tons of standard coal equivalent can be saved and additionally produced. Methane-generating pits for agricultural use were dug to benefit 5.69 million households and fuel-saving stoves were in use in 170 million households.

-- Pollution prevention and control in township enterprises have been strengthened. Township enterprises are a strong mainstay of the Chinese rural economy and an important sector of the national economy. Because of their rapid development, the environmental problems they caused attracted the serious attention of the Chinese government and people. In the past decade, environmental management and pollution prevention and control in township enterprises have made some progress. In areas along the eastern coast, the technical and equipment levels of township enterprises have been gradually raised. Centralized pollution control has been carried out, along with construction of small towns, township enterprises zones and economic development zones. All these steps have seen certain outcomes. Zhangjiagang City in Jiangsu Province is spurring its economy to develop rapidly while paying due attention to prevention of environmental pollution by township enterprises. It has thus realized a coordinated development of both the environment and the economy. In the central and western areas township enterprises have been actively guided, aided and supervised to prevent environmental pollution spreading. It should be pointed out that environmental protection in areas of township enterprises is still an arduous task, and that the government will keep guiding them to develop in a healthy way, preventing and alleviating environmental pollution through reinforced environmental management.

-- Development of green and organic foods is welcomed. In order to meet the people's increasing demands for high-quality food, and to protect agricultural natural resources and the ecological environment, relevant departments began in 1990 to develop ``green food,'' featuring pollution-free, safe, high-quality and nutritious contents. By the end of 1995 a total of 568 sorts of green food had been developed, many of them becoming well-known products. Since the start of the development of green food, 1.13 million

hectares of land have been well protected. In 1995 a government department published the Procedures on the Administration of Organic (Natural) Food Labelling. Organic (natural) food unpolluted by chemical fertilizers and farm chemicals has now appeared in China.

### V. Protection of the Ecological Environment and Biodiversity

The Chinese government regards ecological environmental protection as the focal point of its environmental protection work. Through protracted efforts the country has made outstanding achievements in the protection and nurturing of the ecological environment.

-- Achievements have been made in afforestation. Since the 1950s the Chinese government has organized large-scale tree planting activities and stepped up efforts for the fostering, protection and management of forest resources and consequently has made great progress in rational utilization of forest resources. Since the reform and opening up the afforestation efforts have been quickened, with the quantity increased annually and the quality improved continuously, thus basically eliminating the deficit in forest reserves which had existed for a long period, while the growth of forests has begun to exceed consumption. As a result, the era of increase both in forest acreage and reserve has dawned on the country. Currently, China's forest area totals 134 million hectares, which brings the country's forest cover up to 13.92 percent. Artificial afforestation covers 33.79 million hectares. Volunteers have contributed a total of 4.4 billion person-times to planting 23 billion trees. Once-barren mountains suitable for tree planting in 12 provinces and autonomous regions are now clothed with greenery.

The government has paid special attention to the construction of forest ecological projects. Since 1978 China has established ten forest ecological projects, with a scheduled afforestation area of 120 million hectares -- aimed mainly at protecting and improving the natural eco-environment and realizing the sustainable use of natural resources. These projects are: the ``three norths'' shelterbelts (the western area of Northeast, and the northern parts of North and Northwest China), the shelterbelts along the upper and middle reaches of the Yangtze River, the coastal shelterbelts, the plain farmland shelterbelts, the Taihang Mountains afforestation project, the anti-desertification project, the shelterbelts for comprehensive control in the Huaihe River and Taihu Lake basins, the shelterbelts for comprehensive control in the Liaohe River basin, and the shelterbelts along the middle reaches of

the Yellow River. Currently, the ``three norths'' shelterbelts project has finished its first and second phases, resulting in a newly afforested area of 18.51 million hectares and increasing the forest cover from 5.05 to 8.2 percent. This project has turned more than 40,000 sq km of barren land into green land and more than 1.3 million hectares of desert land into farmland, pastures and orchards. Twelve percent of the total desertified land has been worked on, and 10 percent of it has been brought under control, more than 11 million hectares of farmland have been protected by forest networks, while 8.93 million hectares of grassland have been restored, resulting in a 20-odd percent increase in grass output. The agricultural eco-environment in one third of the counties covered by the ``three norths'' project has entered a benign circle. The shelterbelts project along the upper and middle reaches of the Yangtze River has yielded a total of more than 5.46 million hectares of newly planted forest in seven years. A grand total of 1.6 million hectares of forest has appeared since coastal shelterbelts project was launched in an all-round way in 1991, which basically covers the 18,000-kilometer-long coastline. A total of 769 counties or cities covered by the plain farmland shelterbelts have reached their tree-planting goals, accounting for 84 percent of the total 918 counties in the plain areas. The Taihang Mountains afforestation project has already produced a total of 1.02 million hectares of afforested area since it was launched in 1994. The above large-scale eco-system construction projects have gradually improved the eco-environment in a considerable number of areas.

-- Grassland construction has made progress in the phasal sense. The protection and management of grassland resources is reinforced by governments at all levels in line with the Grassland Law, and activities such as unauthorized reclamation, excessive digging and overgrazing are forbidden. With the combined efforts of the state, the collective and individ"iuals, grassland construction and control over grassland desertification and deterioration have been strengthened. According to statistics, the total area of artificially sown grass and improved meadows has reached 11.757 million hectares, and that of fenced meadows, 8.333 million hectares. The 49 key comprehensive demonstration projects for grassland stockbreeding constructed by the state have made great achievements. By the end of 1994 a total of 5.638 million hectares of artificially sown grass had been completed, which has blazed a new trail for developing animal husbandry and ecological environmental protection in the areas with arid and desertified land and those with serious soil erosion.

-- Marine environmental protection has been strengthened. Marine environmental protection is a major component of China's environmental protection efforts, as the country has a vast maritime territory. A series of laws and regulations concerning marine environmental protection has been published, and a nationwide marine environment monitoring network has been set up. Coastal waters have been divided up into zones for administration and effective environmental management is practiced for offshore construction projects, offshore petroleum exploitation and wastes disposal so that marine pollution and resources destruction are taken well in hand, and efforts have been made to prevent ``red tide'' and protect offshore fishery resources. By the end of 1995 14 national-level marine nature reserves had been set up. The water quality in most of China's maritime zones and the surrounding ecological environment have been basically kept in good condition.

The Chinese government has for a long time made unremitting efforts for biodiversity conservation, formulating the China Program for Nature Conservation and China's Action Plan for the Conservation of Biodiversi"ity, containing the policy, strategy and key fields and priority projects for biodiversity conservation.

China has adopted the on-site conservation and off-site preservation methods to protect biodiversity. Currently, there are 612 national-level rare and endangered species of flora and fauna listed as key protection species, including 258 species of wild animals and 354 species of plants. Artificial reproduction has been successfully implemented for more than 60 species of rare and endangered wild animals, and through propagation, such species as David's deer, wild horse and saiga tatarica have been re-introduced.

Establishing nature reserves is the most effective method for the in situ conservation of wild plants and animals. By the end of 1995 799 nature reserves of rather diversified types, covering a total area of 71.85 million hectares (or 7.19 percent of China's territory) had been established in China. There are 99 national-level reserves, of which ten -- Jilin's Changbai Mountains, Sichuan's Wolong, Guizhou's Fanjing Mountains, Hubei's Shennongjia, Fujian's Wuyi Mountains, Xinjiang's Mt. Bogda, Guangdong's Dinghu Mountains, Inner Mongolia's Xilingol, Jiangsu's Yancheng and Yunnan's Xishuangbanna -- have been listed in the International Network of Men and Biosphere Reserves. Another six nature reserves -- Zhalong in Heilongjiang, Xianghai in Jilin, Boyang Lake in Jiangxi, East Dongting Lake in Hunan, Bird Island in Qinghai and Dongzhai Harbor in Hainan -- have been included in the list of the world's important wetlands. At present, a total of 512 historic and scenic sites has been designated, of which 119 are at the national level, 256 at the provincial level and 137 at the city or county level, covering a total area of 9.6 million hectares. Forest parks total 710, of which 248 are at the national level. Scenic spots at Huangshan Mountain, Wulingyuan, Jiuzhaigou and Huanglong are listed as parts of the world natural and cultural heritage by the United Nations Educational, Scientific and Cultural Organization. The establishment of nature reserves has put a number of representative and typical natural eco-systems with scientific research value as well as rare and endangered species under effective protection.

Establishing zoological gardens, botanical gardens and various artificial breeding centers is an effective method for off-site preservation of various species of wild animals and plants. By the end of 1995 China had set up 175 zoological gardens and zoological exhibition sites in public parks, 227 artificial breeding centers for wild animals, more than 60 large botanical gardens and 255 wild plant gene and cell banks to ensure the continuation of rare and endangered species of plants and animals, including the giant panda, Chinese alligator, Chinese sturgeon, white-flag dolphin, Manchurian tiger, crested ibis, Cathay silver fir, dovetree, Cycas revoluta and camellia chrysantha tuyama. In addition, China has established some dozen specimen centers, one gene bank and two cell banks for wild animals, which have helped genetic polymorphism research and preservation work. The medicinal use of and trade in rhinoceros horn and tigerbone are strictly prohibited by the government, and the illegal hunting of rare wild animals is severely punished by law.

The government has placed much stress on the preservation of the genetic materials from domestic animals and fowls, as well as germ plasma resources from crops. There are 596 species of livestock and poultry in China, of which over 70 percent are native species. The government has appropriated special funds for preservation of some endangered or sharply diminishing species of livestock and poultry and established a germ plasma gene bank for livestock forage grass. China had initially formed a preservation system for germ plasma resources from crops, including one national germ plasma bank for long-term preservation and a duplicate one, 23 local germ plasma banks for mid-term preservation, and 25 national germ plasma nurseries, of which two are for test-tube culture. The germ plasma resources of most agricultural plants in China are preserved, including 330,000 specimens of germ plasma for various species of crops, of which 300,000 have duplicates.

The government also attaches great importance to the environmental protection of the Tibet Autonomous Region. The environmental quality in Tibet today has been kept in an excellent condition. The atmospheric environment there has attained the state's first-level quality and the water quality of major rivers and lakes is also higher than the national standard for the surface waters environmental quality. Forests and grasslands are under effective preservation. The forest area in Tibet totals 7.17 million hectares and the stumpage, 2.084 billion cubic meters. The total grassland area amounts to 82.07 million hectares, of which 70.77 million hectares are usable. With an elevation of 4,700 meters, Namco Lake has become a natural habitat for rare water birds like swans, egrets and sand birds. Viewed overall, however, many problems still exist -- the shortage of the forest area, grassland degradation, soil erosion, desertification and difficulties in the protection of rare and endangered species of wild animals and plants. Thus, the further strengthening of the preservation of the ecological environment and biodiversity remains an important task for the Chinese government to tackle.

# VI. Environmental Science and Technology, and Environmental Publicity

and Education

Through adopting the strategy of ``relying on science and education to rejuvenate the nation," China has made certain achievements in actively accelerating the development of environmental science and technology, as follows:

-- The research spectrum of environmental science and technology has been steadily broadened. Research into environmental science and technology in China began in the 1970s. As an important part of scientific and technological work, it is put in a position of importance by the government. For some major environmental research subjects the Chinese government has formulated corresponding research programs and plans for environmental protection while organizing forces to tackle key scientific and technological problems. Besides, China has expanded its research into comprehensive prevention and control of regional environmental pollution, environmental background values and environmental capacity, pollution control technology and global environmental problems. As a result, the country has made substantial scientific and technological achievements in some research areas, such as the comprehensive prevention and control of Beijing's environmental pollution, the capacity of the atmospheric environment, the background value and environmental capacity of the nation's major soils, acid deposition and its impact and control, the forecasting and monitoring of the influence of the changes in the global climate and corresponding countermeasures, the depollution of coal, and the control of air pollution. China has also developed research in such fields as regional environ"imen tal impact assessment, environmental management and environmental economy, environmental monitoring technology and equipment, the protection of natural ecology, and the relationship between the environment and people's health. This provides scientific basis and technological support for environmental management, the prevention and control of pollution, and ecological protection.

-- The numbers of research institutes and personnel engaged in environmental protection have been steadily increased. By the end of 1995 some 390 scientific research bodies engaged in environmental protection had been established nationwide, staffed by more than 20,000 research and managerial personnel. A comprehensive scientific research system composed of the Chinese Academy of Sciences, competent departments of different trades, colleges and universities, and the environmental protection departments is basically in place.

-- Work regarding the screening, evaluation and popularization of the optimum and practical technology for environmental protection has been organized. The popularization of the optimum and practical technology is an important measure to expedite the transformation of environmental scientific and technological achievements into the capability of actual pollution prevention and control. During the Eighth Five-Year Plan period, 1, 316 kinds of practical technology were recommended nationwide, and 438 of them were appraised as the optimum items of practical technology. Among them, 385 kinds have been put into use in 140,000 units, resulting in reduced emission of the ``three wastes'' and excellent economic returns.

-- The development of the environmental protection industry has been fostered. This newly emerging industry involves the development of technology, manufacturing of products, circulation of commodities, utilization of resources, provision of information, and undertaking of contracted projects. China gives priority to the development of the environmental protection industry, with the guidelines of ``actively fostering, adjusting the structure, relying on science and technology, improving quality, orienting to the market and providing excellent services.'' Preferential policies are given to investment, prices, taxes, etc., to encourage the development of the environmental protection industry. A general survey of the nation's environmental protection industry, the results of which were made public in May 1996, shows that there are 8,651 units engaged in the environmental protection industry, which is staffed by 1.882 million people and boasts 45.011 billion yuan worth of fixed assets, an annual output value of 31.148 billion yuan and 4.091 billion yuan in profits.

-- The development of environmental labels has entered the stage of implementation. In March 1993 China began to carry out a plan for environment labelling. By April 1996 the environmental label certification work had been developed in 11 categories of products, and 35 kinds of products from 21 enterprises had been awarded environmental labels. As the environmentally-labelled products enter millions of households the environmental label will exert a growing influence in society. The Chinese government regards it a strategic task to actively develop environmental publicity and education and to raise the nation's consciousness about the importance of environmental protection.

-- China strives to popularize environmental protection knowledge among the people and raise their consciousness about environmental protection and gradually to cultivate fine environmental ethics and codes of conduct. As early as in the 1970s, popular science textbooks on environmental protection were compiled or translated into Chinese to widely introduce environmental protection knowledge and enlighten the people on such knowledge. Since the 1980s large-scale publicity activities have been organized all over the country every year on World Environment Day, Tree Planting Day, Love the Birds Week, etc. In recent years the Chinese media has been further promoting publicity and reports on environmental protection. Virtually all newspapers, radio and TV stations frequently offer environmental protection programs, and, in particular, the media pays special attention to severely polluted areas and units. Since 1993 the media's ``China Trans-century Environmental Protection Inspection Campaign,'' centered on news about environmental law enforcement, has aroused a nationwide responce and accelerated the solution to a number of major environmental problems. Meanwhile, the various provinces and cities have also developed such activities. In the past three years, 1,500 journalists from 750 news units have participated in these activities, engendering more than 10,000 news articles. Of these, television news items alone accounted for 1,600.

In 1983 China established the first national-level professional newspaper on environmental protection in the world -- the China Environment News, with an annual circulation of nearly 300,000 copies. In 1980 the China Environmental Science Press was established. By 1995 it had published over five million copies of books of 860 titles on the environment. Since 1990 the China Environment Yearbook has been published, and its English version also published since 1994. Besides, there are more than 30 local environmental newspapers and several hundred professional periodicals.

The Chinese government encourages the whole of society to participate in environmental publicity and education activities. In recent years the environmental protection departments, educational departments, cultural departments, news units, organizations for women and youth, scientific associations and academic societies have all developed their own environmental publicity and educational activities, highlighted by the following aspects:

-- Higher education has provided a great number of scientific, technological and managerial personnel for environ"imen tal protection work. A total of 140 colleges and universities, including Beijing University, Qinghua University, the People's University of China, Beijing Normal University, Nanjing University, Tongji University and Wuhan University, all have departments of or majors in environmental studies, with a total of 206 units having the authority of awarding bachelor's degrees. Approved by the Academic Degrees Committee under the State Council, there are 223 units granting master's degrees in 51 majors concerning the environment, 77 units granting doctorates in 39 majors, and several postdoctorate positions. Furthermore, more than 40 specialized secondary schools and over 100 vocational high schools also offer environmental courses. Over the past 20 years, large numbers of specialists trained by China's professional environmental education have become a significant force in the environmental protection field.

-- On-the-job training has enhanced the quality of environmental managerial personnel. In 1981 the Environmental Administrative Personnel Training College was established for the purpose of offering on-the-job training, continuing education and academic-level education to administrative personnel in the environmental protection departments throughout the country. By the end of 1995 over 5,200 trainees had completed courses there. These skill-enhanced trainees are playing an important role in promoting the nation's environmental protection work. Moreover, proceeding from the actual needs, various types of environmental training classes and symposiums have been held by various localities and departments concerned. Statistics show that over the past decade, more than 10,000 training classes have been held attended by over 400, 000 persons.

-- Basic environmental education has cultivated and enhanced young people's environmental consciousness. In recent years, environmental education has been offered in high schools, primary schools and kindergartens throughout the country to cultivate the children's loving-the-nature quality and sense of responsibility for environmental protection.

China is a populous country with underdeveloped education and the nation's consciousness about the environment remains to be further enhanced. Therefore, it will be a long-term, arduous task to do well in environmental publicity and education in China.

# VII. Taking Vigorous Action to Promote International Cooperation in

#### **Environmental Protection**

China consistently holds that economic development should be coordinated with environmental protection; protection of the environment is a common task

for mankind, but the economically developed countries should take more responsibility in this respect. It always maintains that the strengthening of international cooperation should be based on respecting national sovereignty, the protection of the environment and the spurring of development can not be done without peace and stability in the world, and both practical interests of various countries and long-term interests of the world should be considered in handling environmental problems.

While a series of measures for solving its own environmental problems are being taken China has participated, actively and in a practical manner, in international cooperation in the environmental protection field and made sustained efforts to promote global environmental protection as a common task of mankind.

China supports and actively participates in the environmental activities launched by the UN organizations. China has been a member state of the successive UN Environment Program Governing Council and fruitful cooperation has been carried out between China and the UNEP. In 1979 China joined the UNEP's ``Global Environment Monitoring System,'' ``International Registry of Potentially Toxic Chemicals' and ``International Environmental Information System.'' In 1987 a head-office for research and training in international desertification control was established by the UNEP in Lanzhou, capital of northwest China's Gansu Province. China has passed its experiences and techniques on controlling desertification and building ecological agriculture on to many countries through the UNEP. By 1996 a total of 18 units or persons in China had won the ``Global 500'' title awarded by the UNEP. Good cooperative relationships have been forged between China and the UN Development Program, the World Bank, the Asian Development Bank and other international organizations. At present, an effective mode of cooperation for the use and management of multilateral funds of the Montreal Protocol on Substances That Deplete the Ozone Layer and the Global Environmental Facility as well as loans from the World Bank and the Asian Development Bank has been established. This has played an active role in promoting prevention and control of China's pollution and in improving environmental management ability. China is a member of the UN Committee on Sustainable Development, set up in 1993, and has played a constructive role in this high-level political forum on the global environment and development. China has kept a close cooperative relationship with the UN Economic and Social Commission for Asia and the Pacific and other relevant organizations, and has made contributions to environmental causes and the development of the Asian and Pacific regions through participating in the Northeast Asia environmental cooperation, the Northwest Pacific Action Plan, and the Regional Coordinating Unit for the East Asian Seas Action Plan.

China has actively developed bilateral cooperation in the field of environmental protection. Over the past ten-odd years China has successively signed bilateral environmental protection cooperation agreements and memorandums of understanding with the United States, the Democratic People's Republic of Korea, Canada, India, the Republic of Korea, Japan, Mongolia, Russia, Germany, Australia, Ukraine, Finland, Norway, Denmark, and the Netherlands. Exchanges and cooperation have been carried out in environmental planning and management, global environment problems, pollution control and pre"ivention, protection of forests and wild animals and plants, marine environment, climate change, air pollution, acid rain and sewage disposal and important achievements have been made in these respects. China has also taken part in the Global Learning and Observation to Benefit the Environment, as proposed by the United States.

In order to promote further international cooperation in the environment and development field, China set up the China Council for International Cooperation on Environment and Development in April 1992, composed of more than 40 leading specialists and well-known public figures from China and other countries, to be responsible for submitting propo"isals and advisory opinions to the Chinese government. The Council has put forward valuable concrete proposals on energy and the environment, biodiversity protection, ecological agriculture, resources accounting and the pricing system, public participation and the implementation of the environment laws and regulations, which have aroused the attention and response of the Chinese government.

China took an active part in the preparations for and in attending the UN Conference on Environment and Development. It made great efforts for the smooth convening of the Conference. China has taken part in all the preparatory meetings of the Conference and played a constructive role in discussions and negotiations concerning international environment conventions. In June 1991 the Ministerial Conference of Developing Countries on Environment and Development, proposed by China and held in Beijing, was participated in by 41 developing countries, and the Beijing Declaration published by it set forth the principled stand of the developing countries on environment and development, making substantial contributions to the preparation of the UN Conference. In line with the requirements of the first meeting of the Preparatory Committee for the UN Conference on Environment and Development, China worked out the Report on the Environment and Development of the People's Republic of China, which gave an overall exposition on the current situation of China's environment and development, put forward strategic measures for coordinated development of China's environment and economy and set forth China's principled stand on the problems of the global environment, which have received favorable comments from the international community. In June 1992 Song Jian, state councilor and director of the Environmental Protection Commission of the State Council, led a delegation from the Chinese government to the UN Conference on Environment and Development. China's Premier Li Peng was present at the summit meeting of the Conference and made an important speech proposing the strengthening of international cooperation in the field of environment and development, winning positive comments from the international community. On behalf of the Chinese government, Li Peng took the lead in signing the United Nations Framework Convention on Climate Change and the Convention on Biological Diver"isity, exerting a positive influence on the meeting.

Since 1979 China has signed a series of international environmental conventions and agreements, including the Convention on International Trade in Endangered Species of Wild Fauna and Flora, International Convention for the Regulation of Whaling, Vienna Convention for the Protection of the Ozone Layer, Basel Convention on Control of Transboundary Movements of Hazardous Wastes and Their Disposal, Montreal Protocol on Substances That Deplete the Ozone Layer (revised version), Framework Convention on Climate Change, Convention on Biological Diversity, Convention on Combating Desertification, Convention on Wetlands of International Importance Especially as Waterfowl Habitat, and 1972 London Convention.

China always conscientiously carries out its responsibilities for international environmental conventions and agreements which it has signed, approved or joined. Under the guidance of China's Agenda 21, in order to conscientiously undertake its promised duties China has worked out some important documents and state programs or action plans, including the 21st Century Agenda on Environmental Protection, Action Plan for the Conservation of Biodiversity, Action Plan for Forestry in the 21st Century Agenda, and the 21st Century Marine Agenda. The Chinese government approved the State Plan for Gradually Eliminating Sub"istances That Deplete the Ozone Layer which put forward a plan and policy framework for eliminating controlled materials as well as measures for controlling or banning the production and extensive use of substances which deplete the ozone layer. In July 1994, with the support of the UN Development Program, the Chinese government successfully held in Beijing the High-level International Round-Table Conference on Agenda 21, which contributed to the promotion of the nation's sustainable development. To provide legal basis for preventing environmental pollution by the importation of wastes, in November 1995 China published the Emergency Announcement on Strictly Controlling Trans-Boundary Movement of Wastes to China, and in March 1996 it published the Provisional Regulations on Environmental Protection and Management of Wastes' Importation.

#### June 1996, Beijing