

30

Regional Cooperation in the Field of Environmental Law in Asia

Naoyuki Sakumoto and Hidenori Inoue

INTRODUCTION

The active promotion of cooperation within the Asian region in the field of the environment is essential. This is made clear by the fact that, first of all, as the environmental problems of the countries of the region come to transcend national borders, the scale of environmental damage is also expanding. Moreover, both at present and in the future, individual countries will not be able to adequately address environmental problems on their own.

Often called “the engine pulling the world economy,” the economy of the Asian region has drawn worldwide attention. The flow of people, goods and capital continues to accelerate. The internationalization of the regional economy has spread beyond the Asian newly industrializing economies (NIEs) and the members of the Association of South East Asian Nations (ASEAN) to encompass Russia and China as well as the socialist countries of Indochina. This is now adding to the vigor of the economic cooperation among the members of the Asia-Pacific Economic Cooperation (APEC) group. It is also an expression of the vitality of the regional economy as a whole and the dynamism of the ongoing industrialization process. But as this rapid economic development proceeds, damage to the environment has spread across national frontiers. Furthermore, the possibility of such damage extending beyond the region or reaching a global scale has greatly increased.

Therefore, any understanding of environmental problems within the region that is confined to the particular conditions of a specific country or city will not be adequate to the task of achieving a “sustainable development” based on prevention and foresight.

The awareness of the countries of Asia regarding sustainable development has continued to grow since the recent convening of the United Nations Conference on Environment and Development (UNCED, Rio de Janeiro, 3-14 June 1992). Furthermore, environmental cooperation between neighboring countries has continued to progress. However, when viewed against the standards embodied in Agenda 21, adopted at the Rio Conference, it cannot be said that the state of regional environmental cooperation is altogether adequate. In fact, serious issues concerning the region’s future development remain to be addressed.

In what follows, we discuss the necessity of building a framework for environmental cooperation in the region, including the current state of environmental problems in East Asia and the region as a whole; the current state of regional cooperation; and the challenges and outlook.

I. THE ISSUES IN PERSPECTIVE

1. Environmental Problems in Perspective

The environmental issues of the Asian region have the following characteristics. First, environmental problems that had not been seen until recently have begun to appear extensively and in a similar manner in a number of countries. These problems have stemmed from trends relating to rapid economic internationalization, population changes, energy usage, and so on.¹ Second, because the countries of Asia are in close geographical proximity, environmental problems can easily transgress national borders. And yet, this crossing of borders is not only a matter of natural conditions, but is also occurring through human intervention and legitimately. Moreover, environmental problems continue to grow in both scale and complexity. For instance, there has recently been an alarming increase in the number of highly dangerous situations arising from, e.g., hazardous emissions discharged from high-technology facilities or the dumping of radioactive wastes. Third, the harmful impact of Asia's environmental problems upon the global environment cannot be ignored. Indeed, they are matters of international concern.

Asia is home to a number of international rivers and straits, migratory animals and fragile natural ecosystems. This fact highlights both the region's vulnerability and the importance of regional cooperation. In the international Strait of Malacca, for instance, an oil spill resulting when a ship ran aground spread to the shores in any coastal countries. There have also been instances in which the use of international rivers or the coastal exploitation of natural resources has resulted in environmental damage expanding from one country to others. Also, as in the case of migratory birds, there are times when environmental protection objectives cannot be achieved through the efforts of a single country. At present, cross-border pollution arising from large-scale economic activities such as the use of nuclear power plants, the discharge of harmful waste, the exploitation of submarine mineral resources have increased the likelihood that such damage will occur.

2. Issues concerning Regional Cooperation

East Asia has witnessed a degree of cooperation of an ad hoc nature in the field of the environment, but countries have yet to conclude regional agreements. There is no adequate system for cooperation in the field of environmental law in the region. Were a cooperative system concerning the environment to be established that would enable discussions on environmental policy with and among China, South Korea, Russia, the Democratic People's Republic of Korea and others to progress, the environmental situation in East Asia would undoubtedly improve. Furthermore, there is an urgent need to create a system under which such "little dragons" as Taiwan, Macao and Hong Kong, whose positions under international law are somewhat weak, may participate as interested parties.

On the other hand, progress in regional cooperation in Southeast and South Asia can be clearly discerned. For instance, regional institutions have been established, regional agreements have been concluded and a variety of environmental programs are under way. These will be discussed in more detail below.

At the present stage, there are few measures in place to deal with the rapid internationalization of the regional economies and the outbreak of environmental problems. It is of vital necessity that regional cooperation based upon sustainable development be extended throughout the region and that coordination in this field be put into practice. At the global

level, cooperation has been undertaken concerning such issues as protection of the ozone layer, global warming and conservation of tropical rain forests. It is necessary that this kind of approach be actively incorporated into regional cooperation activities within Asia.

In the world of today, environmental problems do not respect national borders. Simply placing blame upon the countries where environmental deterioration first originates will not amount to an effective solution. Rather, it is essential that the whole range of environmental problems be tackled through cooperative efforts at both regional and global levels. To this end, information exchange and collaborative research will be necessary, as will the establishment of active cooperative relations to facilitate both the prevention of environmental problems and the fashioning of effective responses when they do occur.

3. Prerequisites for Regional Cooperation

In what follows, several preconditions for undertaking regional cooperation activities are discussed.

Both the commonality of environmental problems and increased awareness as regards effective responses to them are necessary for achieving regional cooperation.² Judging from the international influence on the region, the situation with regard to each government's environmental efforts, and the general state of environmental training and education, the level of environmental awareness in the region can be said to be quite high. For instance, as is made clear by such representative cases as the Bhopal chemical plant disaster and the nuclear accident at Chernobyl, there is a great concern with large-scale environmental problems. Furthermore, the countries of the region have generally reached the stage whereby, for the most part, environmental law has been adopted and administrative organs responsible for environment-related issues have been established. It thus may be said that the domestic legislation and administrative conditions necessary for undertaking regional cooperation are, by and large, in place.³ This is one positive factor for the strengthening of regional cooperation.

It should also be noted that how the concept of environment is understood and the issues over which there is most concern varies somewhat among the countries of the region.

As the United Nations Declaration on the Human Environment, adopted in Stockholm in 1972, makes clear, a uniform understanding of the concept of environment has not been achieved either between developed and developing countries or among the developing countries themselves. And this gap has not diminished since that time. Within Asia, where significant differences in environmental, economic, political and socio-cultural conditions abound, there is also variation in the ways by which the environment and the natural world are perceived and in the values associated with them.

And then there are differences in the environmental problems with which each country is principally concerned. In East Asia and within the ASEAN group, for instance, a number of countries are seriously concerned with waste disposal and pollution associated with the discharge of hazardous wastes. In South Asia, where the combined effects of poverty, population pressures and natural disasters can too easily lead to large-scale human suffering, there is a keen interest in improving infrastructure. There are also countries such as Bangladesh, where damage caused by rising water levels resulting from climatic warming trends is seen as a grave issue. As this suggests, the degree of concern with global environmental problems also varies. Singapore, meanwhile, is seeking to utilize the environment as a setting for recreation and leisure facilities. As these examples illustrate, it is not possible to treat the various environmental situations facing the countries of Asia as a uniform environmental problem.

II. THE CURRENT STATE OF REGIONAL COOPERATION

Below, we discuss the current state of regional cooperation in the environmental field, first in the East Asian region and then in the other regions of Asia.

1. The East Asian Region

As a regional agreement has not yet been concluded in East Asia, cooperative efforts have principally been of a bilateral nature. Our discussion here will focus, for the most part, upon the bilateral activities of Japan with other countries of the region.

a. Japan and China

(1) Measures against acid rain

The problem of acid rain in China is of deep concern to neighboring countries such as Japan and South Korea, as well as to the world as a whole. SO_x released from Chinese thermoelectric power plants and other sources can be carried by air currents to Japan.⁴ Since 1992, the Chinese government has resolved to make the prevention of acid rain a priority policy objective, while Japan has agreed to cooperate with China in the field of environmental protection. Concrete measures taken include the establishment of the Sino-Japanese Friendship Environmental Conservation Center. In promoting comprehensive measures related to pollution control technology, including that related to environmental problems of a global scale, the Center has supported projects to address the issue of acid rain⁵ and related air pollution problems, water pollution control efforts, and energy assistance as a component of waste disposal measures, exemplifying a "green aid" approach.⁶

(2) Environmental protection provisions

Safeguarding the environment through the incorporation of environmental protection provisions within loan agreements is another noteworthy approach. As components of the third-phase ¥700 billion resource development loan provided by the Japanese Import-Export Bank from 1992, the Chinese and Japanese governments agreed that Chinese authorities would undertake prior assessments of the impact of development activities on the environment and indicate the countermeasures they would take. The two governments also agreed to set up a consultative organ through which the environmental effects of development activities could be periodically assessed following commencement of project operations.⁷

(3) Environmental agreement

The signing of an environmental accord between the two countries is currently under consideration. In order to cope with environmental problems such as acid rain that cross national boundaries, the pact would provide for the establishment of joint committees for each problem area, bringing together technical specialists to exchange information and examine such issues.⁸

(4) Protection of migratory birds

With effect from 8 June 1981, the two governments have concluded the "Agreement between the Governments of Japan and the People's Republic of China on the Protection of Migratory Birds and their Habitat." By prohibiting the capture of migratory birds and the

collection of their eggs, this accord aims to protect species of birds whose migratory routes include the two countries and those which face the threat of extinction. Some 227 species of fowl are protected under the pact, including spoonbills, white-fronted geese, lesser white-fronted geese, whooping swans and mallards.

(5) Scientific and technical cooperation

On 12 August 1978, the "Agreement between the Governments of Japan and the People's Republic of China on Cooperation in the Field of Science and Technology" was signed. The agreement provides for "the advancement and promotion of cooperation between the two governments in the field of science and technology based on the principles of equality and reciprocity."

b. Japan and South Korea

(1) Scientific and technical cooperation

In December 1985, Japan and South Korea signed the "Agreement between the Governments of Japan and South Korea on Cooperation in the Field of Science and Technology." This agreement, which includes provisions for cooperation in the fields of health and environment, calls for "the promotion of cooperation between the two governments in the field of science and technology based on equality and mutual benefit" (Article 1, 2(c)).

(2) Environmental agreement

The Republic of Korea has also become concerned with the environmental deterioration that has accompanied by its economic development. To address issues related to cross-border pollution, the Republic has positively pursued the concluding of an environmental agreement with Japan.⁹

c. Japan and Russia

(1) Agreement on environmental cooperation

On 18 April 1991, Japan and the former Soviet Union concluded the "Agreement between Japan and the Soviet Union on Cooperation in the Field of Environmental Protection."

The two governments agreed to "promote cooperation in the field of environmental protection based on the principles of equality, reciprocity and mutual benefit" (Article 1). To monitor its implementation, the accord provides for the establishment of a joint committee on environmental protection (Article 3, 1). A wide range of issues are covered under the agreement. Being considered at present are issues such as the prevention of air and water pollution; disposal of hazardous wastes; improvement of the urban environment; protection of ecosystems and biological diversity; prevention of global warming; research on the effects of human lifestyles and natural processes on the climate; protection of the ozone layer; and research on the health, biological and genetic consequences of environmental deterioration, as well as other fields related to environmental protection or improvement that may be decided upon in the future.

(2) Scientific and technical cooperation

Japan and the former Soviet Union initialed the "Agreement on Scientific and Technical Cooperation between the Government of Japan and the Union of Soviet

Socialist Republics" on 10 October 1973. This pact served as the framework for the "Agreement on Cooperation in the Field of Peaceful Uses of Nuclear Energy between the Government of Japan and the Union of Soviet Socialist Republics," concluded on 18 April 1991.¹⁰ This agreement calls for "efforts to promote" cooperation, "based on the principle of reciprocity," in areas related to the peaceful uses of nuclear energy, such as the treatment and disposal of radioactive wastes (Article 1). Cooperation includes the exchange of general as well as scientific and technical information, communication among experts and joint research (Article 2).

(3) Protection of migratory birds

The "Agreement between the Governments of Japan and the Union of Soviet Socialist Republics on Protection of Migratory Birds and Endangered Bird Species and their Habitats," aiming at the protection of migratory species and species threatened with extinction, prohibits the capture of migratory birds and the collection of their eggs. The white stork, the mandarin duck, the Japanese (Manchurian) crane and the rufous turtledove are among the 287 species this accord seeks to protect.

(4) Prohibiting the dumping of radioactive wastes

The recent ocean dumping of radioactive wastes by Russia has become a major international problem. The dumping of such liquefied material has, in fact, been taking place.¹¹

In the economic declaration adopted at the 1993 Tokyo Summit, the leaders of seven major industrialized countries affirmed that "the ocean dumping of radioactive waste is a cause of serious concern on a worldwide scale, and especially as regards the effects on the environment of nearby countries." At the same time, in order to further examine the problem, they agreed to consult closely, through the joint work of Japan and Russia.¹² The establishment of a framework for Russian-Japanese cooperation in this area is urgently required in order to resolve this problem.

d. The Republic of Korea and Russia

Cooperation between South Korea and Russia in the field of the environment began only recently. In 1991, the two countries signed a friendship accord, Articles 7 and 12 of which refer only in general terms to cooperation in environmental protection. However, the problem of the ocean dumping of radioactive waste by Russia, mentioned above, is surely an issue that South Korea cannot afford to ignore.

e. The Republic of Korea and China

China and South Korea are expected to conclude an agreement on environmental cooperation in the near future. According to the 22 October 1993 edition of the *Nihon Keizai Shimbun* (Japan Economic Journal), a draft agreement in this area has already been prepared by the government of South Korea. The agreement would include provisions concerning the establishment of joint committees for environmental protection, as well as measures to promote the protection of air and water quality.

2. Southeast Asia, South Asia and the South Pacific Region

a. Forms of environmental cooperation

Forms of environmental cooperation in these regions can be broadly classified into formal and informal types. Formal cooperation involves that between central or local governments. This includes both cooperative activities that are undertaken under the auspices of regional organizations and those which are not. Informal cooperation may involve environmental non-governmental organizations (NGOs), citizens' groups or academic institutions and scholars.

The sub-regional programs promoted by such international organizations as the United Nations Environment Program (UNEP) and the Economic and Social Commission for Asia and the Pacific (ESCAP) exemplify the formal type of environmental cooperation in the region. These include ASEAN Senior Officials on the Environment (ASOEN), South Asia Cooperative Environmental Programme (SACEP), South Pacific Regional Environmental Programme (SPREP), the Lower Mekong Basin Development Environment Programme (LMBDEP) and the Coordinating Body for South-east Asian Seas (COBSEA).¹³ The major programs among these will be discussed in the following section.

The Malaysia-Singapore Joint Committee on Environment, a bilateral arrangement set up in January 1991, is one example of the type of cooperation undertaken outside of any pre-existing regional structure. This committee holds consultations concerning air pollution resulting from factory and automobile emissions, cross-border pollution occurring around the Singapore Strait, environmental standards and the management of hazardous substances. The Indonesia-Singapore Joint Committee on Environment, established between the two countries in November 1991, is similarly constituted.¹⁴

Also worthy of note is the environmental cooperation first launched in the 1970s among the coastal states of Indonesia, Malaysia and Singapore to ensure maritime safety within the international Strait of Malacca. Japan has cooperated with the group's activities by providing financial and technical support. With the recent recurrence of extensive environmental damage resulting from oil spills from supertankers in the Strait, some new movements have been seen: these include a meeting of the countries concerned which was convened in Indonesia to strengthen cooperation and support for the prevention of oil spills; and the establishment of a revolving fund to finance oil spill prevention activities. At present, Japan is examining the OSPAR program in an effort to strengthen ASEAN support of the cooperative activities.¹⁵

In addition, Japan is supporting the efforts of the countries of this region through, for example, cooperation with the establishment of "environmental centers," such as Thailand's Environmental Research and Training Center and the Environmental Management Center in Indonesia, as well as through "green aid" to such countries as Thailand and the Philippines. Cooperation in the environmental field has also been forthcoming from international financial organizations such as the Asian Development Bank and the World Bank.

Non-governmental cooperation from NGOs, corporations and academic institutions is also playing an important role within the region. International conferences of environmental NGOs, and the exchange of opinions among scholars and academic institutions are among some of the varied forms that this cooperation takes.

b. Environmental programs and their activities

Below, we describe the activities of three sub-regional programs in environmental cooperation being implemented in Southeast Asia, South Asia and the Pacific region, respectively.

(1) ASEAN Senior Officials on the Environment (ASOEN)

At the July 1989 ministerial meeting of ASEAN member States, the ASEAN Group of Experts (AEGE) was elevated in status to a permanent committee reporting directly to the ASEAN standing committee, to become what is now ASOEN. This was a reflection of the concern of countries of the ASEAN region regarding environmental protection. ASOEN aims to promote regional policy planning and regional environmental programs. Environmental cooperation in the region was launched in 1977, with UNEP support for the first ASEAN Environmental Program (ASEP I). The AEGE Committee reports to the ASEAN Committee on Science and Technology (COST). It has been meeting periodically since its meeting in Jakarta in December 1978.

Aiming to address the priority issues of the ASEAN group in the field of environmental cooperation, ASEP has undertaken the planning and design of various types of projects. The first ASEP program covered the five-year period from 1978 through 1982, with the second program covering the years 1983-1987 and the third running from 1988 through 1992. The third program was implemented as an action program, in which the following matters were included as a policy guideline: tackling the priority environmental cooperation issues; undertaking first stage integration of domestic and regional development policies; strengthening systemic frameworks for environmental protection at national and regional levels; promoting transfer of technology; exchanging knowledge and experience concerning environmental management; and promoting cooperation with international organizations and countries outside of ASEAN in order to address environmental problems on a global scale.

In addition to the above, a number of declarations and agreements on environmental matters have been adopted in the ASEAN region. These include ASEAN's 1981 "Manila Declaration on the ASEAN Environment," the "ASEAN Declaration on Heritage Parks and Reserves," issued in 1984; ASEAN's 1984 "Bangkok Declaration on the ASEAN Environment"; the Agreement on the Conservation of Nature and Natural Resources," adopted in 1985; and the 1987 "Jakarta Resolution on Sustainable Development."

(2) South Asia Cooperative Environmental Programme (SACEP)

The SACEP program includes the following member countries: Afghanistan, Bangladesh, Bhutan, India, Iran, Maldives, Nepal, Pakistan and Sri Lanka.

In spite of the financial and systemic difficulties, SACEP is vigorously pursuing environmental protection activities. For example, among the range of transnational environmental problems the program seeks to address are those concerning procedures for environmental impact assessments, environmental standards, enactment of environmental legislation, protection of the ecosystems of mountainous areas, and conservation of forestry resources. A Regional Seas Programme South Asian Seas is being coordinated by SACEP and UNEP. In the field of environmental law, there are plans for issuing a report on environmental law in the region, sponsoring conferences for middle-level policy makers, and setting up an advisory service for the drafting of legislation. The establishment of

an environmental education center is among the activities under way in the education field.

(3) South Pacific Regional Environmental Programme (SPREP)

Founded in 1982, SPREP includes the following member countries and territories: American Samoa, the Cook Islands, Fiji, French Polynesia, Guam, Kiribati, Nauru, New Caledonia, Niue, Norfolk Island, Papua New Guinea, Pitcairn Island, the Solomon Islands, Trust Territory of the Pacific Islands, Tuvalu, Tokelau Islands, Tonga, Vanuatu, Wallis, Western Samoa and Futuna. Four organizations—the South Pacific Commission, the South Pacific Bureau for Economic Cooperation, ESCAP and UNEP administer the SPREP Secretariat, located in Noumea. The Association of South Pacific Environmental Associations, which was established in 1986, promotes the exchange of information and has become an advisory body for SPREP on scientific matters. In order to secure a firm financial base, the establishment of an environmental trust fund is under review.

The principal objectives of SPREP revolve around protection of the ocean and coastal environments. The South Pacific Declaration on Natural Resources and Environment laid emphasis upon the need for management of natural fishery resources within sustainable limits and the conservation of natural resources for the benefit of future generations. An action plan has been drawn up to pursue these objectives.

3. The State of Environmental Cooperation within Asia as a Whole

Viewed from an international perspective, environmental cooperation in the Asian region is both energetic and distinctive. At the United Nations Conference on Environment and Development, held Rio de Janeiro in 1992, Singapore's Tommy Koh, who served as chair of both the preparatory committee and the conference itself, received international recognition for his capabilities. In addition, a number of international declarations on the environment generated from within the region were directed to the conference.¹⁶

Among the noteworthy products of the cooperation taking place in the Asian region, ESCAP presented to the United Nations Conference on Environment and Development the "Ministerial Declaration of the Asian and Pacific Region."¹⁷ This followed from the adoption at the Asian and Pacific Environment Ministers' Conference, held in Bangkok in 1990, of the report on the "1990 State of the Environment in Asia and the Pacific," "the Asian and Pacific Region Ministerial Declaration on an Environmentally Sound and Sustainable Development," and "the Asian and Pacific Regional Strategy for Environmentally Sound and Sustainable Development," prepared for presentation to the global conference.

The Ministerial Declaration is aimed at promoting policy making concerning a regional strategy as well as its early implementation. The Declaration affirms the need for Asian and Pacific countries to adopt an integrated approach to environment and development issues. From Article 14 onward, concrete initiatives are also proposed. The ministers emphasized their support for ESCAP's activities in environmental cooperation at the regional level, stating that, "having considered the regional and national strategies," they "welcome the important and continuing activities of ESCAP in strengthening regional strategies for an environmentally sound and sustainable development" (Article 24).

The above-mentioned activities, however, are directed at ESCAP and ASEAN and not at the Asian region as a whole. This issue is discussed below.

III. ISSUES AND PROSPECTS FOR REGIONAL COOPERATION

1. Agenda 21 and Regional Cooperation

A large number of issues are expected to be addressed through regional cooperation in the future. Agenda 21, a product of the deliberations at the Rio Conference on Environment and Development, emphasizes the need for regional cooperation (Agenda 21, sections 38 and 39). This is especially reflected in Section 38, entitled "improvement of international organizations." Under the item on "regional and sub-regional cooperation and its implementation," the document refers to human resource development, the integration of environmental concerns into development policy, and environmental cooperation across national boundaries for sustainable development. Of particular note is the call for achieving regional-level integration of environmental concerns at the stage of development policy formulation.

2. Regional Cooperation in the ASEAN Region and the Consensus Method

The adoption of the "Kuala Lumpur Declaration on Environment and Development" at the Nineteenth Meeting of Environment Ministers in 1990, which was also presented to the 1992 UNCED, was an event of notable importance in the region. At the ministers' meeting, the ASOEN structure was established. Furthermore, the conference adopted modifications to the third ASEAN Environmental Program (ASEP III) to correspond with the functions of ASOEN. Issues delegated to the latter for examination included: harmonization of ASEAN environmental quality standards; the drafting of a common plan for the monitoring of pollution resulting from accidents at sea; the handling of cross-border pollution problems; implementation of cooperative activities for the conservation of biological diversity; evaluation of the economic aspects of environment and resource management; and the promotion of environmental education and raising of environmental awareness within the region. To facilitate its work, six working groups have been established within ASOEN to cover the following areas: nature conservation, protection of seas and oceans, cross-border pollution, environmental management, environmental information, and environmental awareness.

A pressing issue for the ASOEN member countries has been whether or not to ratify international treaties on the environment, as there have been concerns expressed that ratification of such agreements may hinder economic growth in the ASEAN region. Rather, the argument has been presented that it is more important for the ASEAN countries to strengthen environmental cooperation among themselves and to develop a common resilient position on global environmental problems.¹⁸

Meanwhile, the attached schedule to the 1985 "Convention on the Conservation of Nature and Natural Resources" has still not been complemented.¹⁹ Missing its most important element, the treaty is thus without any practical effect. In the case of ASEAN, the organization itself has not yet reached the level of consolidation of other international organizations.²⁰ There have been numerous declarations, resolutions and other such diplomatic statements of intention aiming to promote actual regional cooperation in this region. This type of "soft law" no doubt adds to the sources of discussion on regional cooperation. Brought closer to a form of legal cooperation, this "bottom up" regional cooperation, based on a consensus method, is likely to be effective. This is expressive of the rich diversity of the region, and the direction cooperation takes in this sort of case. The virtue of this kind of consensus method is that it makes possible the building of common ground and does not leave concerned parties outside of the scope of agreements.

3. Future Issues and Prospects for Regional Cooperation

In this section, we will address issues pertaining to the promotion of environmental cooperation in Asia in the future. Heretofore, sub-regional environmental cooperation has been premised on the existence of organizations for regional cooperation, characterized by financial and administrative support from international organizations such as UNEP or ESCAP. In building a framework for regional cooperation in the future, however, the following points should be borne in mind.

a. The expansion of the covered region

First, the region as a whole should be targeted for cooperative activities. To do this, the political and economic character of the region must be considered.

One element of this lies in the fact that, despite the collapse of the Cold War structure, there are areas where the effects of that era's international politics are still being felt. Taiwan, Macao and Hong Kong have not been accorded a status under international law. A framework under which these areas can be incorporated must be established. This is related not only to the problem of concluding regional agreements, but also has consequences with regard to the forging of international agreements on such issues as the cross-border movement of hazardous wastes and the preservation of rare species. Along with socialist countries such as the Democratic People's Republic of Korea and the socialist states of Indochina, countries with various political systems, including Russia, China and others, must also be included.

Another factor which cannot be ignored is the region's economic dynamism. With China and Russia vigorously seeking to introduce market elements into their economies, and the newly industrializing economies continuing their economic expansion, not to mention socialist countries such as Viet Nam and Myanmar, the economic trends in the region must not be left out of consideration.

b. The expansion of the target areas

Discussions should be held on expanding the target areas for cooperation provision. The importance of cooperative activities extends beyond financial and technical cooperation for pollution control to such areas as pollution prevention measures, management and conservation of ecosystems, and safety surrounding the use of nuclear power. Furthermore, from the point of view of sustainable development, it is essential to incorporate a viewpoint giving "consideration of the environment and regional cooperation" in all regional activities, from APEC and other international economic activities to those involving aid, investment and trade.

c. Establishment of regional organizations

There is a need for the establishment of structures for regional cooperation. While it is possible to temporarily entrust the administration of such activities to existing international organizations that focus on economic issues, such as APEC, the establishment of an international organization capable of making independent judgments concerning environmental management in the region is much preferable. The coordination of activities between regional and sub-regional levels, and between existing structures and new structures, is also necessary.

These issues should be examined together with the establishment of dispute resolution mechanisms and training organizations.

d. Conclusion of regional agreements

In Asia as a whole, as well as in East Asia, regional agreements on environment, excepting certain individual cases, have yet to be concluded. In general and in particular fields in which cooperation should be undertaken, there is a need for the adoption of regional agreements. The Ramsar Convention, an international treaty aimed at protecting wetlands, particularly as waterfowl habitats, has generated much discussion among Asia countries, where many important wetlands are located. There are still, however, some countries in the region that have not yet become parties to the treaty.

e. Review of the role of developed countries (international organizations) and newly industrializing countries

In the Asian region, a certain number of newly industrializing countries have begun to provide assistance to developing countries. They may have much to offer developing countries in terms of the development of appropriate technology and their own experiences with environmental problems.

At the same time, requests for support from Asia's single industrialized country, Japan—which may also be called a forerunner in terms of pollution problems—have been running high. Japan is being called upon to provide support in fields beyond those of financial and technical cooperation. At the recent UNCED, Japan pledged to provide between ¥900 billion and ¥1 trillion over the next several years in assistance for environmental cooperation activities. Moreover, the general guideline for Official Development Aid announced in 1992 set forth both the Asian region and the field of the environment as priority areas. The Asian Development Bank, the region's chief international financial organization, also has an important role to play in this regard.

Exemplifying Japan's role in this area, the Ministry of International Trade and Industry has decided upon a system of assistance whereby it will lease environmental quality control equipment to developing countries. From 1993, desulfurization and other pollution control equipment will be furnished to China and to countries of ASEAN. Through such leasing arrangements, Japan maintains responsibility for the design and installation of the equipment, and may thereby increase the efficiency of its assistance.²¹ In addition, the Environment Agency plans to include in its third phase acid rain survey (FY1993-1997) items concerning the impact of acid rain gas drifting from China and South Korea on the acid rain problem in Japan. Cooperation with the other countries of East Asia in the establishment of a system for monitoring, research and exchange of information on the acid rain problem has been incorporated as a priority issue in the Agency's policy agenda.²²

f. Popular participation in environmental problems

A number of countries of the Asian region are welcoming in a new era of political democratization. Emerging from the shadows of oppressive political regimes, citizens of these countries are gradually beginning to discuss environmental problems from the standpoint of human rights. The outbreak of disputes over pollution issues in Asian countries is also

becoming more international, while the opportunities for democratic participation in environmental problems is increasing rapidly.

As suggested by the slogan, "Think globally, act locally," the origin of environmental pollution in many cases lies in the thinking and behavior of individuals. This implies that the quickest route to a solution to environmental problems lies in raising the awareness of environmental concerns across the whole population. Therefore, ever more vigorous efforts should be made to promote environmental awareness, education on issues related to the environment, and public access to environmental information. Finally, discussions should be held at the regional level concerning the establishment of an ombudsman system; the promotion of citizens' participation in the environmental assessment process, which the countries of Asia have generally been slow to recognize; and the institution of legal systems to handle disputes over pollution and questions of relief for victims of pollution.

Notes

1. Yoshihiro Nomura and Naoyuki Sakumoto, eds., *Environmental Law in Developing Countries: East Asia*.
2. *Environmental Awareness and the Handling of Pollution Disputes*, a report on a comprehensive survey on environmental problems in developing countries, Institute of Developing Economies. discusses the matter country by county and includes reports on China, Taiwan, Indonesia and Thailand.
3. For details, see the reference cited in note 1, *op cit*.
4. *Nihon Keizai Shimbun*, 18 April 1992, evening edition. In a meeting between Chinese Vice Prime Minister and the Japanese Minister of International Trade and Industry, the Chinese government acknowledged for the first time that sulfuric acid discharged from Chinese thermoelectric power plants was reaching Japan through air current.
5. *Mainichi Shimbun*, 23 October 1991.
6. *Yomiuri Shimbun*, 17 March 1993, morning edition.
7. *Nihon Keizai Shimbun*, 20 February 1992, evening edition.
8. *Ibid.*, 4 April 1992, evening edition.
9. *Ibid.*
10. *Genshiryoku Sangyo Shimbun*, 25 April 1991.
11. *Nihon Keizai Shimbun*, 18 October 1993.
12. *Ibid.*, 13 October 1993. On 12 November 1993, a blanket prohibition of the ocean dumping of low-level radioactive waste was adopted at the London Convention, with Russia abstaining.
13. State of the Environment 1990, ESCAP; Shigemoto Kajiwara, "The Trend of Regional Cooperation," "The Global Environment and Politics," *Koza: Global Environment.*, Chuo Hoki, pp. 199-216.
14. See, respectively, *Environmental Quality Report*, Malaysia, 1991, p. 178; and Annual Report, 1991, Singapore, p. 35.
15. Chia Lin Sien, "Protecting the Marine Environment of ASEAN from the Ship-generated Oil Pollution and Japan's Contribution to the Region," to be published in 1994 in *Monographs of Visiting Research Fellows*, Institute of Developing Economies.
16. See the Beijing Declaration, the Langkawi Declaration and the Kuala Lumpur Declaration.
17. Economic and Social Commission for Asia and the Pacific, "The Asian and Pacific Input to the United Nations Conference on Environment and Development," 1991, New York.
18. ASEAN Secretariat, *Annual Report of the ASEAN Standing Committee*, 1990-1991.

19. See Naoyuki Sakumoto, *Regional Cooperation in the Field of Environmental Law in the ASEAN Region*, in Nobuyuki Yasuda, ed., *Various Aspects of ASEAN Law*, Institute of Developing Economies, 1987.
20. See Shinya Murase, "ASEAN and International Law: The Framework for Intraregional Cooperation and the Form of Laws," and N. Sakumoto, *op cit.*
21. *Nihon Keizai Shimbun*, 22 June 1992.
22. *Ibid.*