Asian Energy Demand and Competition*

Dr. Tsutomu Toichi Senior Managing Director and CKO

Good morning, distinguished guests, ladies and gentlemen. It's a great honor for me to be here today. First of all, I would like to congratulate the International Institute of Strategic Studies (IISS) on its 50th anniversary. My brief presentation is focused on the long-term energy prospect of Asia and its implication for security. Let's me start to briefly overview the energy supply/demand outlook in Asia.

According to the forecast by our institute, the world's primary energy demand will increase by 1.6 times between 2005 and 2030. On the other hand, energy demand of Asia will increase twice, reflecting population increases and high economic growth. It is projected that China and India will account for 27% and 12% of the global energy demand in 2030, respectively. In terms of energy supply mix in Asia, coal and oil will continue to be the most dominant sources and use of natural gas, especially LNG, will expand substantially for power generation and household use. As a result, approximately 90% of the increase in energy demand in Asia will be supplied by fossil fuels.

Under these circumstances, the energy supply-demand structure in Asia has become increasingly fragile. Japan and Korea have conventionally imported nearly all of their fossil fuels, and now the dependence on imports of oil to China and India have already reached 50% and 70%, respectively. We predict that Japan's oil import will continue to decline in the long run. In contrast, China's import is to increase from 3.4 million b/d in 2006 to 12 million b/d in 2030 more than triple, due to rapid development of motorization and the stagnation of domestic oil production. As a result, China will become the biggest oil importing country in Asia around 2010, exceeding Japan. In case of India and other Asian countries including Thailand, Indonesia and Vietnam, their oil

^{*}This speech was addressed at the IISS-JIIA Tokyo Conference on "Asia's Strategic Challenges: In Search of a Common Agenda" held in Tokyo on June 3, 2008.

imports are also expected to increase rapidly in coming years. I think that this prospect will have not only the huge impact on the international oil market, but also the important implication for security in Asia.

In this respect, I would like to briefly touch on the oil traffic issue. According to our projection, oil traffic through the Strait of Malacca will grow from 12 million b/d in 2004 to 21 million b/d in 2030, because major oil supply to Asia will come from the Middle East and Africa,. Therefore, the number of very large crude carriers (VLCCs) passing through the Strait will increase from 4,200 vessels per year in 2004 to 6,700 vessels per year in 2030. For that reason, the securing of safe passage through the Strait of Malacca is an extremely important issue for the stable supply of energy to Asian countries.

Next I would like to touch on geopolitical aspects of energy in Asia. With energy shortages becoming more serious, China is promoting the oil and gas development overseas as a national strategy. In the Middle East, Africa, Russia, Kazakhstan and other regions throughout the world, the Chinese government and national oil companies are working as one to secure energy resources. In particular, China embarked on oil resource development in Sudan during the early 1990s, and today, Sudan has become the location of China's largest overseas oil development project.

The Chinese government employs various means to acquire oil and gas resources including, for example, providing economic assistance or offering packages with combined road, port, and other social infrastructure development and sometimes even weapons export and military aid. This way that China goes about securing resources could even be called a mercantilist approach. That is, without going through market transactions the state moves to the fore and attempts to physically lock in overseas oil and gas resources.

This growing resource nationalism on the part of consuming countries like China distorts the rules of international resource development and has ended up fueling resource nationalism in resource-rich countries like Russia. Now, the oil and gas exploration and development business is becoming a kind of "national business", which has given even the oil majors a very strong sense of crisis.

On top of this, it is noteworthy that the Shanghai Cooperation Organization (SCO) is

expected to play an important role in the energy sector as regional cooperation on the Eurasian continent. The participants in the SCO are in a mutually complementary relationship with Russia, Kazakhstan, Iran, and Turkmenistan, all major producers of oil, gas, uranium, and other resources, and China and India, both major consuming countries, on the other hand. This context is why another name for the SCO is the "energy club."

As far as nuclear energy is concerned, there is worldwide recognition that it is indispensable to solving the problems of energy security and global warming. China and India, which have serious power shortages, are making all-out efforts to push the development of nuclear power generation forward. Southeast Asian countries, which are facing the prolonging of high crude oil prices and rapidly increasing demand for electricity, are announcing construction plans for nuclear power plants. The problem is, however, that concerns are growing over the proliferation of nuclear weapons as nuclear power generation spreads to more countries. In particular, the issue of how to restrict uranium enrichment, a nuclear fuel cycle technology, and technology for reprocessing spent fuel to peaceful uses has become a major problem. The issue of how to realize peaceful use of nuclear energy while ensuring nonproliferation has become an important world challenge.

Finally I would like to emphasize the importance of regional cooperation in Asia to cope with energy and climate securities. It has become increasingly difficult for each country to solve its energy security as well as global warming risks on its own. Therefore we should strengthen international cooperation within Asia-Pacific region. While it is inevitable for each country to pursue its national interests, at the same time efforts are needed to avoid an undue scramble for resources by improving energy security for the Asian region as a whole.

In this context, I can point out the effectiveness of international cooperation among Asian countries relating to the excellent energy-saving technologies and system available in developed countries. According to our analysis, Asia's primary energy demand in 2030 could be reduced by 1.1 billion tons of oil equivalent or 17% of the demand by disseminating advanced technologies to Asian countries. This energy savings is equivalent to about two times of Japan's current total energy demand.

I would like to emphasize that potential of energy conservation, especially coal and oil,

IEEJ: June 2008

is very large in both China and India through enhancing energy efficiency. This means

that GHG emissions could be drastically reduced as a result, contributing greatly to the

fight against global warming. Therefore Japan-China cooperation in the energy

conservation and environment is one of the most important areas to promote a

"mutually beneficial relationship based on common strategic interests". In this respect,

the recent visit to Japan by Chinese President Hu Jintao is expected to strengthen

mutual trust and cooperation between two countries.

In summary, I would like to re-emphasize the importance of regional cooperation in

the Asia-Pacific region. It's a hard reality that Japan is competing with China and India

to secure energy resources oversea, but as common energy importers, cooperation with

these countries in energy conservation, oil stockpiling, the development of alternative

energies, and other areas will lead to mutual benefits. Such regional cooperation will

improve energy security worldwide and also help restrain greenhouse gas emissions

from Asia, which are expected to rise sharply in the future.

Contact: report@tky.ieej.or.jp

4