



Keynote Speech

## International Conference on Science and Technology for Sustainability 2006

**Junichi Murata**

Chairman, Murata Machinery, Ltd.  
Chairman, Kyoto Chamber of Commerce and Industry  
Vice Chairman, The Japan Chamber of Commerce and Industry  
Japan

### 1. Japan's strengths and weaknesses

Since the Meiji era (1868 – 1912), and particularly during the postwar period, Japan has adopted European and U.S. technologies vigorously, modified and improved them, and developed efficient manufacturing technologies and management methods that enhance product quality. This has been underpinned by Japanese-style labor-management cooperation, enabling excellent products to be exported to the world. However, the sharp appreciation of the yen and its persistence at high levels from 1993 to 1995 doubled labor costs, prompting the shift of manufacturing to China and the hollowing-out of Japanese industry. In addition, big government in the postwar period presided over a social system protected by a diversity of regulations, giving rise to inefficiencies and high social costs, and ushering in stagnation for the Japanese economy from the beginning of the 1990s to the year 2000, a period that has come to be known as the “lost decade.” Prime Minister Koizumi, who took office in 2001, implemented deregulation and structural reform vigorously, and the yen exchange rate stabilized around ¥115 against the U.S. dollar. Amid this, companies undertook innovation of various kinds and by means of digital, labor-saving, and other technologies they injected new products into hollowed-out manufacturing zones. Japan's strength lies in the way in which, when confronted by difficulties such as oil crises and the appreciation of the yen, vigorous private-sector companies have repeatedly stepped forward and implemented innovation tenaciously.

### 2. Kyoto's strength

Kyoto was the capital of Japan for 1,100 years, and because of that it developed the discernment to distinguish what was genuine and what was not, and it nurtured artisans and techniques that generated high-quality merchandise. Those traditional techniques also gave birth to numerous world-class companies, such as Shimadzu Corporation, Kyocera, Rohm, Murata Manufacturing, Nintendo, Omron, and Nidec Corporation.

As a result of the transfer of the capital to Tokyo 138 years ago, Kyoto's household dropped suddenly from 70,000 to 50,000, and the city was in danger of going into decline, but a gift of ¥100,000 from the emperor and ¥150,000 of industrial development funds from the new government (at that time equivalent to 1.3% of the national budget) led Seimikyoku, a chemical research institute, to transfer from Osaka, and a variety of industrial facilities to be opened, such as sericulture factories and establishments for encouraging industrial development. Then in 1890 a canal from Lake Biwa was opened, and Kyoto revived as a city under the impetus of an array of pioneering projects such as the building of hydroelectric power stations and the laying-down of a streetcar network.

Owing to its inland location, Kyoto is not suitably placed as a base for mass production backed by harbors, but in spite of this it has sustained its growth by devoting itself to the production of high-quality, high-value-added goods. In addition, the city's large number of educational establishments, the University of Kyoto being a prime example, has made collaboration between companies and universities possible. This acted as the pioneer of present-day industry-academia collaboration, and has been a major driving force behind technology development in the corporate sector.

Kyoto's strong points are its historical culture of being able to distinguish the genuine article, and its tradition of having its goods produced by a private sector which pursues differentiation and added value.

### **3. A sustainable society**

In the immediate postwar era Japan lacked money, technologies, and facilities, but management and labor worked industriously in cooperation with each other, enabling incomes to double during the 1960s and thereby create a domestic market. Subsequently, the acquisition of foreign currency through exports in the 1970s finally enabled the people to gain a truly tangible feeling of the affluence they had created. From 1985 onwards the strength of the yen increased nominal wages, leading people to seek satisfaction in the flow economy, and the orientation of their consumption towards spending on food, clothing, cars, and travel was magnified, boosted by the impact of television. Tax increases were resisted and improvements to social capital lagged behind, people selfishly insisted on misconceived freedoms, and the government was unable to correct the situation. Both the nation and its people should direct themselves towards improving stock. By devoting efforts to such things as dwellings, the urban landscape, the environment, and education, people can give themselves hope for the future, the community can be shaped, and the gloom about the declining birth rate will disappear. That is what constitutes a sustainable society.

The Kyoto Chamber of Commerce and Industry is proposing a movement to ensure that urban development is conducted with an aesthetic sense, in a way that respects both the beauty of the city and the refined feelings and natures of its good citizens. It is my hope that we will enhance the city's "brand" of being a university town amid an abundance of natural beauty, history, and culture.