

Proposals Towards Reconstruction and Recovery from the Earthquake

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Hajime Sasaki

President of JATES (Japan Techno-Economics Society)

Katsumasa Shinoduka

Chairman of the Committee on Technology-based Business Management

Firstly we should like to show deep sympathy from our hearts to the people who were affected by this disaster and who lost their family or relatives. We should like also to show sincere respect to those working on the front lines of recovery and reconstruction and offer our sincere wishes for their health and safety.

We in Japan were struck by a great earthquake named “East Japan Earthquake” and suffered serious damages in the north-east region of Japan last March. We strongly believe, however, that Japan can fully recover by utilizing our bottom-up and collaborative power to the fullest. We should, however, deal with the situation calmly and keep in mind that the weakness and vulnerability of Japanese science and technology have been revealed, in spite of the fact that they have contributed to building up the country’s standing position. We now think we should proceed to improve the capability of science and technology more. It is to restore the economy based on safety and comfort, to enrich national daily life and contribute to the world’s people, after overcoming this experience and reviewing those points which we should reflect on ourselves.

On this important occasion we should like to make a few urgent proposals regarding short and mid-to-long term measures to be implemented, which are the results of discussion among member enterprises (approximately 50 firms). The following are the proposals which have emerged so far. We may continue issuing subsequent ones in the future.

## 1. Ensuring Financial Resources for reconstruction and development

It is firstly necessary to keep financial resources for reconstruction and development. While on one hand the people are obliged to rely on public funds in case of such mega disaster, on the other hand, the methods should be considered and introduced that finance in private sectors be smoothly circulated and be utilized by industry. Both will be necessary as dual wheels.

### 1-1. Public finance

Public finances should be for the reconstruction of such social infrastructure as ground recovery, housing, roads, schools, waterworks, sewage works, harbors and agricultural lands. Ideally, these funds will come from rearrangement of existing budgets and utilization from various reserve funds. It is because even in the regions outside the disaster areas, people are suffering due to reduction of production and stagnation of consumption.

### 1-2. Private finance

In order to reconstruct and develop industry, it is desirable that a smooth financing mechanism in the private sector is accelerated quickly and widely. This would include, for examples, buildings, installations, machinery, ships and so on. Prompt and smooth insurance payment and financing by private institutions should be maximally encouraged. In case of lack of money the Bank of Japan shall play its role without delay through lending money to financial institutions. The necessary measures for promoting these activities should be implemented because loans tend to become stagnant under these emergency situations with the uncertain future of business. For example, supplying interest by the government to make long-term and non-interest loans possible and making criteria of allowance accounts less strict should be considered.

## 2. Inviting Daily Eco-Life

The government of Japan has asked the people of Japan particularly in Kanto district to reduce power consumption due to the decrease of power supplying capacity. We would like to propose changing our mindset to recognize that we have been using too much electricity. By being more “eco-minded”, we can realize economization and cut power consumption by 20%. The following are our proposals to facilitate power reduction in our lives with positive mind:

### 2-1. Implementation of 2 Hours' Daylight Savings Time (DST)

In most countries situated in high latitudes, DST has been introduced to utilize the daylight hours more effectively. Even in April it is bright before 5 AM in Tokyo and before 6 AM in Okinawa. Adjusting the current time schedule two hours by introducing DST would be comfortable yet not inconvenient.

## 2-2. Reduction at Premises of Large Consumers in Kanto Area

It is reported that reduction in energy consumption will be required of large consumers during peak times in the summer season. We request that systematic and deliberate operation be introduced taking geographical conditions into account, since up to now neither the government nor industry has had to cut energy usage during peak hours at all, while both have experiences of regulations limiting total energy consumption. Industry, particularly at plants, needs to establish plans of power supply for their operations, with minimum time of supply of a certain level of power.

## 2-3. Cutting Peak Level of Power Consumption or Moving Consumption of Power to the other Time (“Peak-cut” or “Peak-shift”) at Small Consumers, Offices or Homes

We think that appealing to users “peak-cut or peak-shift” will be nearly the only effective and necessary measure at small consumers, offices or homes, since for the moment there is no other way to facilitate this. JATES will make such appeals to member companies and the families of their employees.

## 2-4. Promoting the Use of In-house Generators

We recommend that enterprises use in-house generators during the hot season. Incentives should be introduced because in-house generation is expensive.

## 2-5. Shifting Work Hours

We consider that working on weekends instead of weekdays should be recommended if possible, as a way to reduce energy usage during peak periods on weekdays.

## 2-6. Limitation of Power Use to Some Applications

We recommend that businesses voluntarily restrict the use of neon signs, reduce their operations at night, and limit the use of vending machines. Businesses should also reduce or curtail their operations during peak hours, which are in summer usually between noon and 2 PM.

## 3. More Active and Informative Public Relations to Overseas

People outside Japan tend to judge the whole situation through limited news and media. Actually a lot of misunderstandings, rumors and sufferings are appearing as though all of Japan has been damaged and bombed. We should like to ask the government to enrich PR activities, particularly regarding radioactive emissions, by preparing English versions of the results of measurements in each district, generating time-series data and displaying using visual tools. Supplying data in the form of CSV should be considered.

As the number of cases in which firms and individuals are required to provide certificates from abroad increase, when exporting or transporting goods and travelling, offices handling these affairs should be established in various places including major cities and airports or

harbors, and mechanisms for issuing certificates immediately should be introduced.

#### 4. Redevelopment of Industry

##### 4-1. Redevelopment of Industry

Industry itself needs to endeavor to provide places of employment by way of reconstruction and redevelopment of production or business. We request, on the other hand, that the central and local governments should enhance opportunities for employment by creating the markets utilizing possible political measures since huge markets were lost by these natural disasters.

We also request the central and local governments to deregulate existing judicial rules regarding businesses, employment, equipment and installations, factory locations, scales and operations, when agriculture, fishery and manufacturing industry try to resume or begin at different locations. We also request deregulation for those who are trying to continue businesses and employment: exemption from official payments and taxes, social insurance fees, and so on.

##### 4-2. Towards a “Japanese Smart Town Model”: A Proposal for Robust Towns Against Natural Disasters and Earthquakes by Japanese Technology

It is necessary to design the cities and towns by implementing measures for dealing with disasters in the course of reconstruction, taking state-of-the-art technologies and viewpoints into account. It is also desirable that the designing and process of this reconstruction be models with strong competitiveness in the world. We expect various proposals will be issued involving ideas of structures and allocations against tsunami. When considering working conditions, it may not be realistic to allocate every function on the higher places. It may be realistic to allocate working places around sea sides, important facilities of towns on the higher places and introduce some mechanism of moving quickly from the seaside to the heights without electricity. The proposed ideas may be verified, selected, elaborated and shaped to the forms of “Japanese Smart Town Model”.

We believe Japan should have confidence in its anti-earthquake technology and will improve it more, since in these disasters damage by tsunami was horrible but direct damage to buildings and construction by the earthquake seemed to be not great.

#### 5. Against the Present Tendency of Designing and Technologies

##### 5-1. Review of Technologies towards “Natural Life”

Recently we rely too heavily on electricity. We should like to review this tendency.

For example, we propose:

- reviewing heavy dependence on air-conditioning (design of buildings and vehicles utilizing natural air circulation more, review of the extension of installing air-conditioning machines to schools and others),
- escalators and other apparatus utilizing electricity,

- more utilization of energy-saving appliances,
- making use of apparatuses usable during blackouts,
- designing appliances which save energy when not in use, and
- implementation of mechanical power supply where applicable.

#### 5-2. Enhancement of Technology for Safety and Security

Though safety and cost may seem to be mutually exclusive, we recommend searching for a way of designing to secure safety under the required functions and performances, and continuing R&D towards safe and secure technologies, while striving to keep costs down.

#### 5-3. Developing Peak Power Cutting or Shifting Technologies

Though we recently lost some of our power supply, it is more important to reduce the peak power level than to decrease total power consumption. However, there currently no such methods or technologies in our power networks. We should like to promote R&D for making peak-cutting or peak-shifting possible. We also propose developing the technology to grasp visually power consumption levels, from time to time, by individuals, businesses, and regions.

The Japanese version supersedes if any questions arise.
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