

2nd Asian Forum Conference

Summary of Group Session 1: 21 January 2003

Group one's topic was "Sustainable Built Environment", which covered broad range from design and engineering of buildings to administrative and legal framework for control and promotion, and was moderated by **Mr. Ong, Singapore**.

First presentation was given by **Mr. Swarup, India**. He mainly discussed on the issues associated with private sector participation in infrastructure development for sustainable development. He pointed that the performance of publicly operated infrastructure and utilities causes problems such as inefficient operation and excessive wasteful usage, thus the governments have been convinced to seek active involvement of the private sector. He clearly classified aspects associated with private participation. To encourage private sector's involvement, he concluded that certain basic reforms such as overhauling regulatory framework and removal of barriers to foreign capital are fundamental.

Second presentation was given by **Ir. Agoes Widjanarko, Indonesia**. He illustrated how the sustainable housing and settlement development in Indonesia has been managed. He introduced three key strategies, and they are development of legal framework and institutions, development of housing finance system, and establishment of sustainable environment. He also touched unique approaches based on Tridaya (social, economy, and environmental development) concept. He emphasized importance of macro social planning, including national housing fund, efficient housing market, and secondary mortgage facility to meet this Tridaya strategy.

Mr. Fujinawa, Japan made third presentation. He described four phases of building project toward sustainable building. In design stage, computer software is introduced, as an example, for evaluation of design results from environmental and economical view points. In construction stage zero emission approach is taken for 100% recycling of construction waste. Energy saving operation of construction machinery is promoted, too. After completion, life-cycle management system for the building is introduced to use it as long as possible. He concluded that for creating a sustainable society, it is important to share a common awareness of environment issue.

In discussion session, some views were exchanged on business approach and regulatory approaches regarding environmentally sustainable buildings.

Forth presentation was given by **Mr. Kim, Korea**. He reported that remodeling rather than rebuilding will increase in Korea because of economic conditions and environmental reasons. Korean government not only mitigated legal restrictions but also initiate pilot remodeling projects to stimulate remodeling. Also, design standards for a new building have been prepared to accommodate future remodeling needs and the National Housing Fund will be used to support remodeling of public housing projects. He concluded that the government's action of both stimulating remodeling of existing building and providing design standards for new building will promote sustainable building in future.

Mr. Hirachan, Nepal gave fifth presentation. His report was regarding construction experience of Nepal's first project of Zero Energy House (ZEH). The ZEH will utilize both energy production and saving approaches, and it will efficiently use active and passive solar energy. The ZEH's electricity is generated through solar panels with photovoltaic cells as much as 6 KWH. Underground tunnel of 75m length 5m below ground level will function as natural air conditioning facility. Windmill and solar ray stove facility will also be incorporated as

alternative source of energy. Since Nepal can enjoy about 300 sunny days a year, this ZEH experiment is regarded as hopeful challenge for the future.

Final presentation of the day was given by Ms. Khin Wynn, Myanmar. She described administrative and legal framework, which manages pollution control in Myanmar. First she reported that rapid development of market-oriented industry has brought the undesirable environmental pollution problems. Then she illustrated Myanmar's legal and institutional framework from national level to city level. Her discussion on form of control covered various methods such as standard setting, permission or licenses granting, economic measures, and voluntary programs. Finally she concluded that careful attention must be needed among stakeholders such as national government, local government, NGOs, communities, the private sector and international agencies.

In discussion session some opinions and views were exchanged on regulatory vs. voluntary approach toward pollution control, and decision making criteria for developing countries between attracting foreign investment and environmental protection.

Summary of Group Session 1: 22 January 2003

8. Malaysia, Ms. Tan

Boundaries of Sustainability

Ms. Tan's paper addresses the growing concern and need to address the issue of sustainability as it will affect the future generation; the various approaches and attempts made in Malaysia on sustainable development. The paper further queried whether the boundary of sustainability should be extended to cover more than just physical sustainability covering ecological, economical and environmental aspects. She presented a short movie and graphics of a proposed 'Mubin City' project, which seeks to unite mankind by teaching people 'Way of Life'. The role of architecture to bring about 'Sustainability of Humanity' will be the foundation of the sustainability of ecology, economy, culture, etc. The role of architects to seek common values in mankind and create environments that would unite mankind may be the direction for the sustainability of the mankind.

10. Myanmar, Mr. Than Shein

Danbawza Bank Headquarters Building

Mr. Shein introduced the project, which was completed in Myanmar. The project employed appropriate technology in terms of; structure, orientation, landscaping, materials, maintenance, and cost. Special emphasis was given to the optimum use of locally available construction materials.

17. Singapore, Mr. Ong

Environmental Sustainability Issues in Singapore

Mr. Ong introduced regulating and research measures taken in Singapore in terms of environmental sustainability. They are; increasing energy efficiency standards for buildings, promotion of rooftop gardens, ISO 14000 certification for building industry, solid waste landfill, new deep tunnel sewerage system, recycled water, etc. Other studies relating to building management and improvements in the quality and productivity of building industry are introduced.

16. Republic of Korea, Mr. Yi

Papec Development

Mr. Yi discussed that the word sustainability has different concept to different culture and to sectors with the different stage of development. Sustainable design requires a change in mind-set, including recognition of the impact of every design choice on the local, regional, and global environments. It requires a new attitude about relationship between spirit and matter. The sustainable building needs to heighten environmental awareness that

we can only exist with the availability of the natural resources and with others.

20. Thailand, Mr. Kecha

Thailand's Development Towards a Sustainable Environment

Mr. Kecha introduced regulations and other measures taken in Thailand to realize development towards sustainable environment. They are; Environmental Standards, Energy Program, Energy Promotion Act, Energy Promotion Fund, Indoor Quality Standards, and Cogeneration Programs.

Discussions

Questions were raised on Singapore's regulation and incentives for sustainable building, i.e. they do not seem to have negative implications on the creativity of the designers nor impede technical innovations.

The discussion on sustainability was broadened to security and risk management issues. In the wake of 9.11, minimum design criteria such as measures to avoid instantaneous destruction was raised, but there is not much designers or contractors do. As a society, we need to deal with the fundamental issues.

Summary of Group Session 2: 21 January 2003

Dr. Wang of China talked about the chances and challenges Chinese society are and will be facing for the coming ten years.

The largest chances are related to the rapid economic growth China is experiencing. Along with this development, a great challenge is how to realize higher development not in the already developed Eastern China but in the Western side as well. The 2008 Beijing Olympic Games are representing another major chance, where more than 300 billion Yuan will be needed to build stadiums, facilities and infrastructures needed to host the Games.

To take these chances China is now advancing toward a great future by focusing on technical innovation, that will upgrade the present level of industry.

Mr. Budi of Indonesia explained about the design history of Indonesian public housing. The first public housing was built by Dutch Government, whereas Indonesian design features were incorporated to make it acceptable to Indonesian officials. This design attitude was adopted by the new Indonesian Sovereign Government after its independence. The 1960s first flat-type public housing appeared in Indonesia with a western design features such as flat roof. In these days pitched roof shape is becoming popular once again reflecting local climate and/or preference.

Mr. Elias of Malaysia illustrated to us the importance of standardization to improve the unorganized, uncontrolled or fragmented construction practices. He introduced us the specific Malaysian standards such as comprehensive standards on modular coordination system, so that the needs and worth of the owners, builders, developers and the government can be fulfilled all the time.

After these three presentations, discussions were taken place on the issues such as financing schemes for Beijing Olympic Games, Selection rules for private developers and so forth.

As for local design features, opinions were raised for its importance in actually helping value housing and building issues.

Mr. Sasaki of Japan explained about newly introduced Housing Performance Indication System and related Warranty System, and how these systems facilitate the building and insurance of Quality housing.

Mr. Ng of Singapore introduced Singapore's endeavors to promote information technologies in the field of

construction to avoid the miscommunications or defects. IT is vital to enhance the productivity or credibility on construction products, as many parties are participating in its production process.

Mr. Surapol of Thailand explained the Thai building regulation systems. There are still remaining un-completed buildings because of the burst of Thailand Real Estate Bubble. In 1997, to resolve this issue, the Thai government has drafted regulation that allows un-completed buildings to re-apply for a new permit.

Discussions taken place about the new Japanese Housing Performance Warranty System. The sales system of Malaysia, Japan and Singapore were also discussed which is appropriate build and sell system or sell and build system.

Finally opinions were changed about the management system of public housing, its pre-qualification system or selection procedure.

Summary of Group Session 2: 22 January 2003

Points were raised regarding on following 6 topics;

1. Provide housing/ shelters to the needed, 2. Quality of housing, 3. Affordable housing, 4. Sustainable housing, 5. Financial sustainability, 6. Improved housing delivering process.

13. Philippines, Mr. Ronald G. Fontamillas

Financing, Technology and Innovative Strategy for Provision of Shelter and Land Tenure Security: The Philippine Experience

+ for the huge demands of housing in the urban area they set HUDCC; policy making body, as the platform for the incorporation between the government and private sectors

11. Nepal, Mr. Shashi Bahadur Thapa

Towards Developing A Sustainable Building Planning Process in Nepal

+ guidelines for developing sustainable building plan consisted with four elements; wise use, technology, protection, and restoration. + 7 objectives for 2nd Asian Forum

21. Viet Nam, Mr. Nguyen Trong Ninh

Residential areas and housing construction program in the frequently flooded areas in Mekong River delta of Vietnam

+ Residential Areas and Housing Construction Program for period 2001-2005, providing a safe residential areas for 200.000 households

14. Philippines, Mr. J. J. Atencio

Building a nation, Sheltering a People- Recent reforms and SHDA Pledge 200.000 For the Philippine Mass Housing Sector

+ SHDA has always advocated reforms for a more sustainable housing finance +Sustainable building through “Developers Risk-Sharing Commitment” +Developers are willing to cover the risks of housing finance by undertaking collection monitoring, buy-back, and back –up guaranty

1. China, Mr. Zhu Wenqi

The Development and Prospect of Urban Housing in China

+The rapid development of housing construction and real estate industry has become the pillar industry +To speed up the research and making of Housing Law and Real Right Law, and to perfect the legal system of

housing and protect the legitimate right of housing investors and property owners

22. Viet Nam, Mr. Pham Trung Kien

How to ease housing shortage for low income people

+ The demand is really urgent for low income people, which is estimated to reach 3.2 million in 2010 all over the country. + Existing regulations and policies sometimes overlap, duplicate and even conflict.

Discussions

Questions were raised on the issues of Viet Nam's program for raising land levels in Mekong River Delta, of Philippines's SHDA financial system to driven the housing market, and of the differences in Viet Nam and China's land ownership. Particularly, the opportunities for foreign investors' participation to housing market in each countries were discussed.