The international patterns of spatial planning system and choice of China

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Outline

- Background
- Problem and requirement of China
- International patterns of spatial planning system
- Analyze the factor of influence the spatial planning system
- Conclusions
Background: Adjustment of development model

- Speed of development to quality
- Balanced development
- Sustainable development:

![](Land_use_in_China.png)

change: the cultivated land and population

<table>
<thead>
<tr>
<th>Year</th>
<th>Cultivated Land (hundred million)</th>
<th>Population (hundred million)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1996</td>
<td>12.20</td>
<td>12.40</td>
</tr>
<tr>
<td>1997</td>
<td>12.40</td>
<td>12.80</td>
</tr>
<tr>
<td>1998</td>
<td>12.60</td>
<td>13.00</td>
</tr>
<tr>
<td>1999</td>
<td>12.80</td>
<td>13.20</td>
</tr>
<tr>
<td>2000</td>
<td>13.00</td>
<td>13.40</td>
</tr>
<tr>
<td>2001</td>
<td>13.20</td>
<td>13.60</td>
</tr>
<tr>
<td>2002</td>
<td>13.40</td>
<td>13.80</td>
</tr>
<tr>
<td>2003</td>
<td>13.60</td>
<td>14.00</td>
</tr>
<tr>
<td>2004</td>
<td>13.80</td>
<td>14.20</td>
</tr>
<tr>
<td>2005</td>
<td>14.00</td>
<td>14.40</td>
</tr>
<tr>
<td>2006</td>
<td>14.20</td>
<td>14.60</td>
</tr>
<tr>
<td>2007</td>
<td>14.40</td>
<td>14.80</td>
</tr>
</tbody>
</table>
56% of population live in rural area

44% of population lives in urban area

Ecological problem

loss water and soil loss

Land desertification
Spatial planning system in China

Problem?

- In some level, three kinds of planning
- In different level, different planning overlay in context in some degree
- Different planning have different policy, especially about fund. It is difficult to pay attention to the most important region.
Patterns of international spatial planning system

Depend on the relation of land use planning and urban planning, we summarized the following four patterns of the space planning in the typical countries.

- The vertically decomposed German pattern
- The Japanese pattern of space planning paralleled to land use planning
- The British pattern of integrated urban-rural planning
- The free style American pattern

Japan pattern of space planning paralleled to land use planning
In the UK, the framework for the spatial planning system was established by the Town and Country Planning Act of 1947. Although the current system generally dates back to the Town and Country Planning Act of 1990 and related laws, material amendments were made in 2004 and 2011 with respect to England and Wales.

Vertically decomposed German pattern

The Planning System and Planning Elke Pahl-Weber, Dietrich Henckel (Eds.)
Free style American pattern

- National Sector planning
  - Tennessee Valley planning
- State
  - Oregon land use planning
  - Hawaii 2050 Sustainability Plan
- Country and below
  - Comprehensive planning
  - Land use zoning

The factors influencing the patterns of spatial planning system

- The governmental management organization
- Economy system
- Economic development stage
- Resources and environment characteristics
Japan government

- Ministry of Internal Affairs and Communications
- Ministry of Justice
- Ministry of Foreign Affairs
- Ministry of Finance
- Ministry of Education, Culture, Sports, Science and Technology
- Ministry of Health, Labour and Welfare
- Ministry of Agriculture, Forestry and Fisheries
- Ministry of Economy, Trade and Industry
- Ministry of Land, Infrastructure, Transport and Tourism
- Ministry of the Environment
- Ministry of Defense
- Board of Audit

Factors to influence spatial planning system

<table>
<thead>
<tr>
<th>country</th>
<th>area (10 thousand km²)</th>
<th>Population (10 million)</th>
<th>Arable land (10 million)</th>
<th>Arable land Per capita (hectare)</th>
<th>Marketed degree</th>
</tr>
</thead>
<tbody>
<tr>
<td>China</td>
<td>960.0</td>
<td>12.4</td>
<td>1.29</td>
<td>1.04</td>
<td>5</td>
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<tr>
<td>Japan</td>
<td>37.8</td>
<td>1.3</td>
<td>0.05</td>
<td>0.37</td>
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<td>United Kingdom</td>
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<td>0.06</td>
<td>1.03</td>
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<td>35.7</td>
<td>0.8</td>
<td>0.12</td>
<td>1.47</td>
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<tr>
<td>United States</td>
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<td>2.6</td>
<td>1.88</td>
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Select for spatial planning system in China?

<table>
<thead>
<tr>
<th>Scenario</th>
<th>Senario1</th>
<th>Senario2</th>
<th>Senario3</th>
<th>Senario4</th>
<th>......</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>Geman model</td>
<td>UK model</td>
<td>Japan model</td>
<td>American model</td>
<td>China model</td>
</tr>
<tr>
<td>Land use planning</td>
<td>?</td>
<td>?</td>
<td>?</td>
<td>?</td>
<td>?</td>
</tr>
<tr>
<td>Core function planning</td>
<td>?</td>
<td>?</td>
<td>?</td>
<td>?</td>
<td>?</td>
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<tr>
<td>......</td>
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</tbody>
</table>

Basis for the choice of space planning system of China

- administrative system
- economic system
- economic development stage
- resource endowment
administrative system

List of Cabinet Level Agencies and Ministers

- Ministry of Foreign Affairs
- Ministry of National Defense
- State Development and Reform Commission
- Ministry of Education
- Ministry of Science & Technology
- Ministry of Industry and Information
- Ministry of Commerce
- Ministry of Culture / China Culture Network
- Ministry of Health
- National Population & Family Planning Committee
- National Auditing Agency
- People’s Bank of China
- National Nationalities Affairs Committee
- Ministry of Public Security
- Ministry of National Security
- Ministry of Supervision
- Ministry of Civil Administration
- Ministry of Justice
- Ministry of Finance
- Ministry of Human Resources and Social Security
- Ministry of National Land Resources
- Ministry of Environment Protection
- Ministry of Housing and Urban-Rural Construction
- Ministry of Transportation
- Ministry of Railway
- Ministry of Water Resources
- Ministry of Agriculture
- State Administration of Foreign Exports Affairs

The sixth organization reform in 2008 determined that the State Council is composed by 27 ministries, including the State Development and Reform Committee, the Ministry of Land Resources and Natural Resources, the Ministry of Environmental Protection, the Ministry of Housing and Urban-Rural Construction, The administrative levels are five, i.e., national level, provincial level, municipality level, county level and township level. The characteristic of administrative organization structure in China is not the structure composed by large and strong ministries, this characteristic determines the diversity in the space planning in China, meanwhile, this structure also shows the importance of enhancing the coordination of the space planning.

Reform of Chinese spatial planning system

- To establish the space planning system which aims at the leadership position of the territory land plans, under its integration, the connection between the existing plans and the territory land plans should be constructed.
- The contents of national space planning and their adaptation to the economic system and development stage
- To strengthen the technological coordination in the compilation of space planning
- To strengthen the policy coordination in the compilation of spatial planning
Conclusion

- Spatial planning system is important for balance and sustainable development.
- Government organization, economic system, economic development stage, special resource characteristics and so on influence spatial planning model in one country.
- There are multi-model spatial planning system in the world, each county has its own spatial planning system pattern.
- Spatial planning system is usually stable but also change with the reform of society and economics in a country.
- To integrate the relative planning to rebuild spatial planning system is an important mission in China.

Thanks!