

Land Administration Infrastructures for Sustainable Development

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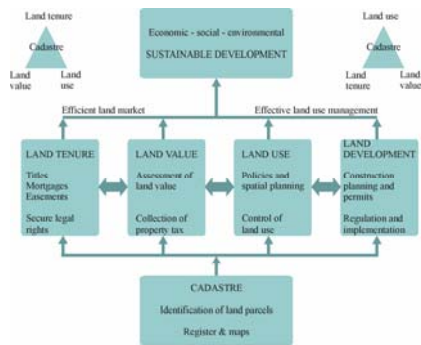
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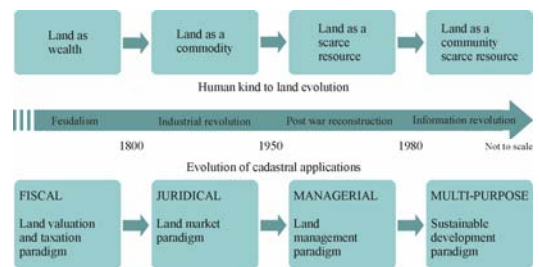
The Global Challenges

- **Technology development**
- GPS, GIS, Internet
- **Micro-economic reform**
- privatisation, decentralisation, downsizing, quality assurance
- **Globalisation**
- from local to global
- events in one part of the world impact on people in other parts of the world
- **Sustainable development**
- developments that effectively incorporate economic, social and environmental concerns in decision-making
- meet the needs of the present without compromising the ability of future generations to meet their own needs

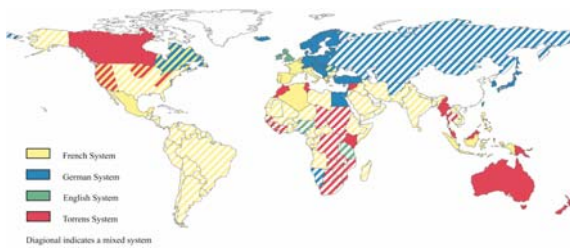
A Global Land Administration Perspective



Evolution of Western Land Administration Systems



Land Registration Systems around the World



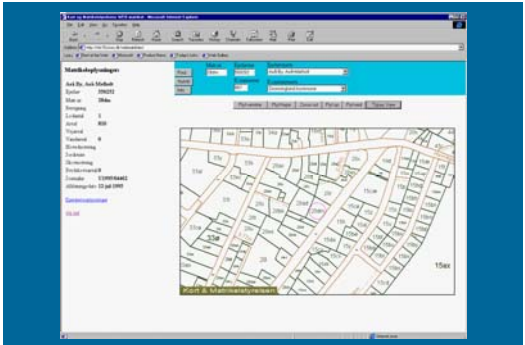
The Nordic Way...

Country	Denmark	Norway	Sweden	Finland
Area	43,000 sq. Km	324,000 sq. Km	450,000 sq. km	337,000 sq. Km
Area Population	5.2 mill	4.2 mill	8.6 mill	5.0 mill
Properties	About 1,5 mill	About 2 mill	About 3 mill	about 2 mill
National cadastral authority	National Survey and Cadastre under the Ministry of Housing	National Mapping Authority under the Ministry of Environment	National Land Survey under the Ministry of Environment	National Land Survey under the Ministry of Agriculture
Cadastral surveys	Licensed surveyors in private practice	Municipal Survey Authorities; Licensed surveyors in private practice will be introduced	State Survey Authorities at county level; and some Municipal Survey Authorities	State Survey Authorities in rural districts; and some City Survey Authorities

...The Nordic Way

Country	Denmark	Norway	Sweden	Finland
Property Register Authority (land parcels)	National Survey and Cadastre maintaining the cadastral register and the digital cadastral maps	Municipal Survey Authorities; and the National Survey Authority maintaining the GAB-register	County and Municipal Survey Authorities; and the National Land Survey maintaining the Land Data Bank System	District and City Survey Authorities and the National Land Survey maintaining the Real Estate Register
Land Register Authority (title and mortgage)	Local district courts (Ministry of Justice)	Local district courts (Ministry of Justice)	Local district courts (Ministry of Justice)	Local district courts (Ministry of Justice)
Land Information System	Interactive subsystems linked together through a Cross Reference Register	GAB – register linked with the Land Book	Land Data Bank System	Central Information System on Real Estate Data

The Web-Cadastre



Spatial Data Infrastructures

- provides mechanisms for sharing geo-referenced information

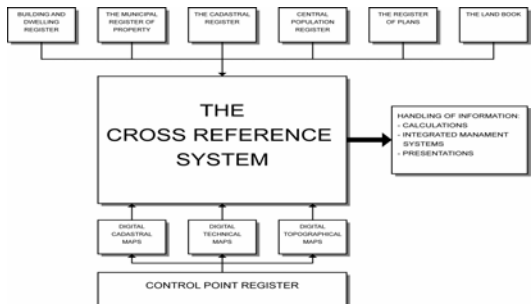
- Conceptual mechanisms
 - design of organisational concepts for data sharing and custodianship
- Political mechanisms
 - provision of an effective institutional framework and the distribution of power between the governmental levels.
 - policies for access to data
- Economic mechanisms
 - cost recovery policies
 - strategies for distribution and maintenance

- considerable benefits flow from a well developed Spatial Data Infrastructure

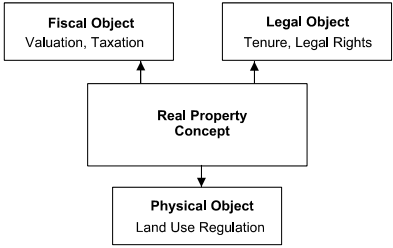
Spatial Data Infrastructure

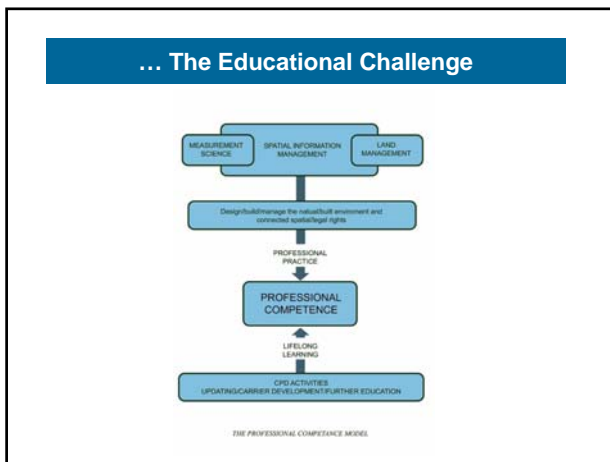
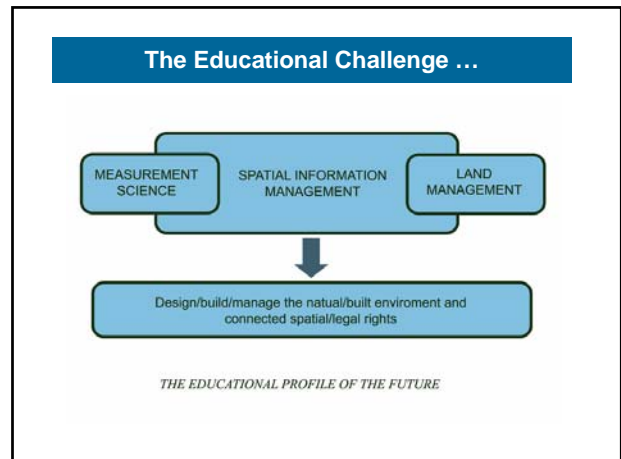
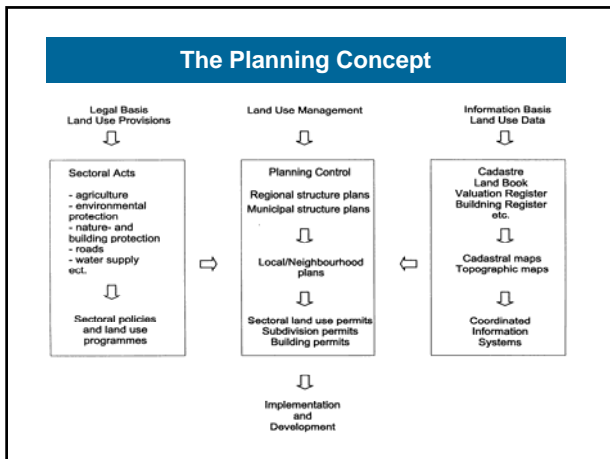


The GIS Concept



The Property Concept





Decentralisation

- not de-concentration
- relates to autonomous land-use decision-making at local level
- based on democratic ideals of local self-government

Subsidiarity

- competencies should rest with the lowest possible level of jurisdiction
 - more efficient service
 - better use of local knowledge
 - greater participation and democracy
 - increased popular consent to government
 - improved political sustainability
- particularly valid for land-use decision-making
- depends on a finely tuned relationship between national, regional and local level

Sustainability

- requires action at all jurisdictional levels
- sectoral policies must be co-ordinated
- mature governmental structures is a must

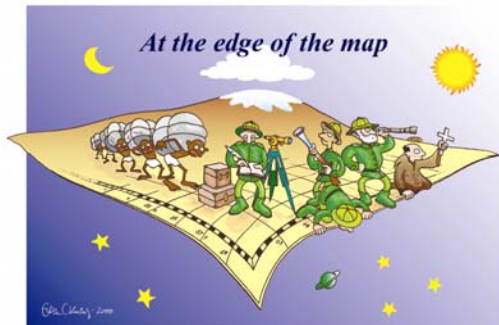
Conclusions ...

- The Bathurst Declaration established a powerful link between appropriate land administration and sustainable development
- Sustainable development is not attainable without sound land administration

... Conclusions

- This again requires support from a well developed spatial information infrastructure
- A global approach to land management depends on appropriate structures of governance
- Decentralisation may be seen as a significant key to sustainable development

At the edge of the map



Facing the new world

