



Data, Data, Everywhere but Can You Find It?

Or

The role of metadata and spatial data management in preventing wasted time, wasted effort, wasted money and lost sanity

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Hello!

- Started with PBBI (MapInfo Corporation) in 1993
- Various training roles until 2005
- Based in Windsor, U.K.
- EMEA Regional Product Management and Product Marketing since 2005 – Desktop Products
- Guess which country I am from, in case you did not notice my accent.



Agenda

- Do you or have you ever?
- Introducing Spatial Data Management
 - Some approaches to spatial data management.
 - Metadata is the key to realising the potential of your data.
- Catalogs of data
 - What is Metadata?
 - INSPIRE
 - PBBI's approach
- What about external data?
 - PBBI Geosk Marketplace
 - OS Open Data
- White papers

Do you or have you ever? ...

- Do you have lots and lots of sets of data being used in your GIS / Location Intelligence / Desktop Mapping system?
- Have you ever seen a person using a data set in an inappropriate way?
- Do you have people contacting you asking where they can find the data they need?
- Have you ever found your organisation has engaged in overlapping or duplicate data collection (or cleanup) efforts?
- Do you, or someone else, spend time and effort "policing" a data store / network volume / directory structure?
- Have you ever been surprised to find a useful set of data you didn't know someone had?
- Has your organisation ever purchased licenses for the same data in two different departments?

If you have answered "yes" to any of the previous questions than this presentation just might be relevant!

If you have not answered "yes" to any of the previous questions than your patience for the next 23 minutes will be appreciated.

Introducing Spatial Data Management

- What data is available?
- What is it useful for? Including where is it useful for?
- Who created it? Who "owns" it?
- Where did it come from?
- Where do I get it from?
- Am I allowed to use it?
- How do I access it?
- What form is it in?
- When was it created?
- Am I using the current version?
- Why was it created?

GIS Users may work with lots of data!

- Geographical names
- Geographical grid systems
- Addresses including postal regions
- Administrative units
- Transport networks
- Hydrography including water catchment areas
- Elevation including terrestrial elevation, bathymetry and coastline
- Protected sites
- Land cover
- Cadastral parcels
- Ortho-imagery
- Business locations
- Economic activity / industry sales data
- Building and housing footprints
- Soil and Geology
- Land use and land use plans
- Human health and safety
- Postal data
- Production and industrial facilities
- Agricultural and aquaculture facilities
- Population distribution
- Demographics and cluster data
- Area management / restriction / regulation zones & reporting units
- Natural risk zones
- Atmospheric conditions
- Crime statistics
- Environmental / pollution data

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Some approaches to Spatial Data Management

- There are lots of ways this may be done (with varying levels of success)
 - Don't worry about it. Just let data proliferate.
 - Organise a central network location with a defined directory structure
 - Assign a person or person's to police it.
 - Build or buy tools or utilities to aid in the above, possibly to help with searching for data.
 - Try to store everything in a relational database system that all users have access to.
 - Use a metadata cataloging and data sharing system.
 - This is becoming more viable due to a large open standards push in this direction, (including INSPIRE)

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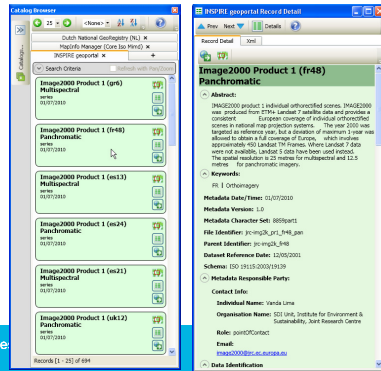
Using Data Catalogues

- Standards based approaches to describing and sharing data are becoming prevalent.
 - Metadata standards (ISO19115, et al.)
 - WMS, WFS and Tile Servers for providing access to data
 - INSPIRE is driving a lot of activity!
- Metadata is the key to realising the potential of your data!

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What is Metadata?

- Data about your data
- Description
- Vintage
- Owner
- Language
- Lineage
- Contact info / ownership
- Geographic extents
- Reference system
- Type
- and more...



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What is INSPIRE?



- INSPIRE lays down general rules to establish an infrastructure for spatial information in Europe
- It is a Law that mandates
 - The creation of **Metadata** for environmental datasets and services
 - Implementation of standard **Data Models** to facilitate interoperability
 - Publishing of services:** Discover, View, Download, Transform, Invoke for spatial data
 - (WMS, WFS, CSW)
 - Promotes **coordination** with other organisations
 - Monitoring and Reporting** on implementation of the standards and use of the data

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Who is impacted by INSPIRE?

- Organisations Directly Impacted**
- There are a set of 216 Legally Mandated Organisations (LMO's)
 - <http://inspire.jrc.ec.europa.eu/index.cfm/pageid/42/list/2>
- Examples
 - APAT – Italian Agency for Environmental Protection and for Technical Services
 - Belgian Institute for Space Aeronomy
 - INSPIRE Working Group, Romania
 - Institute of Spatial Management and Housing, Warsaw, Poland
 - International Alliance for Interoperability
 - National Land Survey of Finland
 - Spanish Directorate General for Cadastre
 - Bundesamt für Kartographie und Geodäsie (BKG)
 - France Ministère de l'Agriculture et de la Pêche
 - Office for National Statistics (UK)
 - Ordnance Survey (UK)
 - Royal Netherlands Meteorological Institute
 - Slovak Environmental agency
 - Swedish Maritime Administration
 - Turkish Ministry of Public Works and Settlement
 - Countryside Council for Wales

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Who is impacted by INSPIRE?

- Organisations Indirectly Impacted
- Referred to as Spatial Data Interest Communities (SDICS)
- Listed on INSPIRE Web site here: <http://inspire.jrc.ec.europa.eu/index.cfm/pageid/42/list/1>
- Any organisation that might wish to take advantage of the available data!
 - This can include a large number of our customers
 - For commercial customers it is not always the case that the data will be freely available!
- Commercial organisations such as PBBI, our partners and our competitors!

PBBI's approach to Spatial Data Management

- Spatial Data Management requires a dedicated solution. We are introducing MapInfo Manager
 - Web based solution, offered on-premises first
 - Usable by a data custodian or GIS person
 - Installs easily
 - Built using open standards so it will work with different systems.
 - INSPIRE compliant
 - Provides capabilities to collect the metadata
 - Bulk/automated metadata collection for as much as possible
 - Provide a catalog of data
 - Uses the OGC CSW ("Catalog Services Web") standard
 - Provide capabilities to share the data
 - Directly serve files
 - WMS and WFS on near term road map
 - Integrated with your other GIS systems
 - MI Pro users can search/view/edit the metadata and access the data directly.

MapInfo Manager is not available for sale today

- First Customer Validation Release will be in early November
- Free to use until March 1st 2011.
- Interested people can sign up to work with this release.
 - You can contact me.



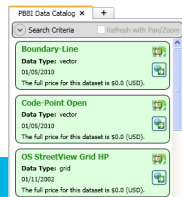
MapInfo Manager can do these things (today*)

- The ability to offer a searchable catalog of data to the whole organisation.
- The ability to easily populate this catalog with information about all of your MapInfo tables.
- The ability for MapInfo Professional users to search for the data they need and then open the tables for use within MI Pro.
- These things are done using industry standards so the solution will work with other systems.
- *As we will see, the first versions of MapInfo Manager are very much focused on MapInfo Professional users and MapInfo tables. Our longer term road map is to extend this to other sources of data.



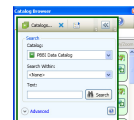
What about External Data?

- Everything we have talked about has related to cataloging your internal and known sources of data.
- The PBBI Geosk Marketplace is up and running
 - An online marketplace for data
 - Yes it is a portal that is intended to sell data to people who need it but...
 - Free data, such as the OS Open Data are also available!
 - Download cuts of the data sets as and when you need them!



PBBI Geosk Marketplace

- Accessible from the Catalog Browser within MapInfo Professional.
- Accessible directly: <http://www.pbbidata.com>
- Created in partnership with WeoGeo.



PBBI Geosk Marketplace

- This example is the OS OpenData Boundary-Line data

Select

- Whole dataset or clip to map area
- Datum/projection
- MapInfo, CSV or Shape file format

PBBI Geosk Marketplace

- Receive a confirmation letter with a link to download your data.

WEOGEO MARKET @ market.weogeo.com > DOWNLOAD READY: 13613

Your NeoGeo order is now available for download and can be accessed via the link below. As a reminder, you have 3 days to download your order, until 10/22/2010 01:03 PM EDT, at which point the file will be removed. Once downloaded, please be sure to rate the order, again using the web address below:

http://market.weogeo.com/user_download/020d5bda-e90e-1c58-9c68-b7617e26723c

Best regards,
The WeoGeo Team

ORDER SUMMARY

Order Specifications:
Request: Boundary-Line
Price: \$0.00 (USD)

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White Papers

- We have written two INSPIRE white papers:

- "Meeting the Obligations of the EU INSPIRE Directive – Considerations for Public Sector Organisations"
- "Meeting the Obligations of the EU INSPIRE Directive – Metadata – The key to realising the potential of your data"

<http://www.pbinsight.eu/uk/solutions/by-business-need/inspire/>

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Some Useful Resources

- Video Tutorials for MI Pro: <http://www.pbinsight.com/support/training/video-tutorials>
- Product Roadmaps: <http://roadmap.pbinsight.com/>
- Documentation for MI Pro: <http://www.pbinsight.com/support/product-documentation/details/mapinfo-professional>
- Download MapBasic: <http://www.pbinsight.com/support/product-downloads-for-mapbasic>
- MI Pro v10.5 eval version: <http://www.pbinsight.com/support/product-downloads-for-mapinfo-professional>

- PBBI Location Intelligence Blog: <http://l.pbiblogs.com/>
- PBBI Stratus Blog: <http://stratus.pbiblogs.com/>
- Other Documentation: <http://www.pbinsight.com/support/product-documentation/>
- Product Download Page: <http://www.pbinsight.com/support/product-downloads/>
- PBBI Geosk Marketplace: <http://www.pbibdata.com/>

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Questions!

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