Coffee, Donuts and GIS
April 2, 2011
Dr. John E. Harmon
Use to User GIS Network
The Founding Fathers

- Roger Tomlinson – Canadian Geographic Information System
  - Early 1960’s – The Canada Land Inventory
  - Most of Canada is owned by the government
  - What do we have and where is it?
  - What useful things might be there?
Founding Fathers, cont.

• Ian McHarg – Design with Nature
• Cartographic overlay
Harvard Lab for Computer Graphics and (later) Spatial Analysis – Howard Fisher

- Development of first commercially viable GIS software – SYMAP
- ODYSSEY – first vector GIS capable of full polygon overlay – precursor to ArcInfo

Scott Morehouse, ESRI
1980s – “Let a Hundred Blossoms of Software Bloom”

- Proliferation of companies
  - Most now gone
- Utilities and local government become major markets
- Move from main-frame to mini-computers and then later to desktop computers
- Connecticut DEP
- Competing operating systems – UNIX (flavors), DOS and OS-2
- Rise of the Windows operating systems

Sandy Prisloe
People - Software

- 1990s – reduction of choices
- Not people alone but how they interact with the software
- Avoidance of the command line
  - `ae
  - `w c:\GISData\Water
e c mains
de arc on nodes on draw
- Windows 3.0 in 1990 and ArcView 1.0 in 1993
- Viewers – Windows, Icons, Menus and Pointers. (WIMPS)
GIS People in Complex Organizations

GIS Skills Pyramid

- User
- Power User
- Professional
- Some GIS Training
- Little or No Training

Job Classes and Knowledge

- Expert
- Scientist
- Analyst
- Specialist
- Technician
- User
- “Virtual User”

Knowledge Breadth

Number of GIS Users

Depth of Expertise

Ratio
The Pyramid in the 21st Century

- **Professional**
  - GIS is almost all of what he or she does
  - May carry professional certification GISP
- **Power user**
  - GIS is a lot of what he or she does
  - Are also professionals in some other area
  - Often owners and editors of particular layers of interest, e.g.
    - Zoning layer – owned and maintained by Planning & Zoning Power user
    - Land Parcels – attribute data owned and maintained by assessor; spatial data by the GIS Professional.
    - Road layer – Public Works
- **Software Viewer**
  - Use direct GIS software with limited or no editing capabilities
  - GIS a small percentage of job
- **Web viewers**
  - Use GIS occasionally through browser
Climbing the Pyramid

- Web viewer to GIS software viewer - decide on viewer, download and install
- Training (taking what is out there for free)
  - Online tutorials
  - Webcasts/webinars
  - Blogs
- Find your power user
- Start networking

People Wrap Up

• Becoming a better viewer
  – Get some freeware, shapefiles and start to play
  – Get your own data into Google Earth
  – Join ArcGIS online and get familiar with ArcGIS Explorer (online and desktop)
  – Come to the Northeast Arc Infor Users Group (NEARC) spring meeting Tuesday May 11 at Smith College in Northampton (about 30$ and that include lunch). Mingle and see what people are doing.

• Viewer to power user?
  – Can be fun
  – Not an shallow learning curve
  – Know your organization’s power user (if there is one
  – Consider formal training

• Power user to GIS pro?
  – A rough road.