

NILS Parcel Data Modeling Meeting

Denver, CO July 18-19, 2000

Final

Agenda:

Tuesday (July 18th)

- Data Modeling
 - Core group
- FGDC Cadastral Content Standards - Nancy Von Meyer
- NILS - SDS, Novalis - Tobin Parcel Consortium
- Assemble and organize information, models, and projects between ESRI and NILS
- Jordan to work with Dennis et.al on NILS data models and use cases needs.
- Nancy V and Wayne will focus on the Parcel Data Model and the Survey Model.
- Nancy V to show Wayne the Colorado Public Room

Wednesday (July 19th)

- Per Nancy Von Meyer - Framework for Wednesday's discussions
 - 830-9 FGDC Standard - Wayne Hewitt and Tim Hodson have worked with this
 - What it is?
 - How it relates to NILS/GIS
 - Survey measurement from Dennis McKay
 - Data Integration Reviews:
 - Parcel Model
 - Survey Model
 - Topology Model -Today
 - Before she leaves at 1pm Nancy Needs:
 - Who is going to do what?
 - Dates
 - 900-10 NILS - where does it plug in - Wayne Hewitt
 - New ESRI terminology (Arc GIS vs. Arc product & geoDBMS & Geography Network and Geocommunicator) - Wayne
 - Geo Data Model - distinctions between features and events
 - GIS Model etc

- 12-1 Core element definition – an initiative of FGDC Cadastral subcommittee & WGA (Western Governors Association). WG congressional resolution for next funding.
- 11-12 Leslie to talk about N ILS, Per Jordan Henk – want to have time to review the “N ILS 2000-2001” document
- After understanding the above items, we need to develop action items for the next three weeks plus, with a December 1st, 2000 deadline (Wayne and Nancy V).
- 1-2 What's next
- Look at the cadastral content standard from FGDC before tomorrow.

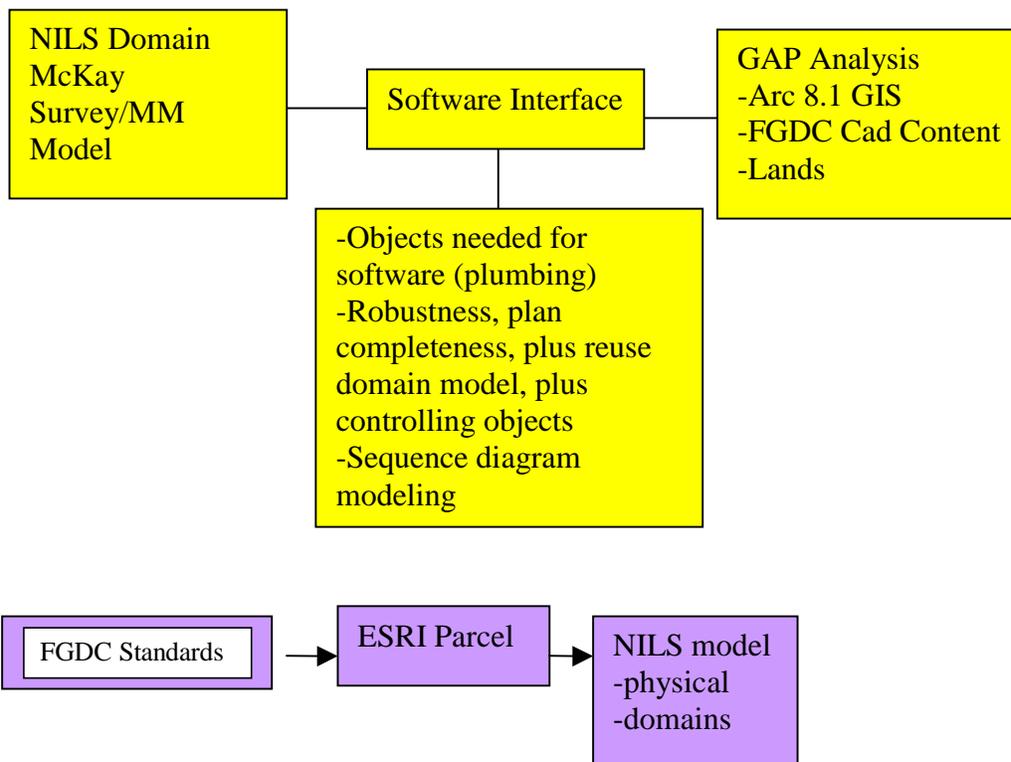
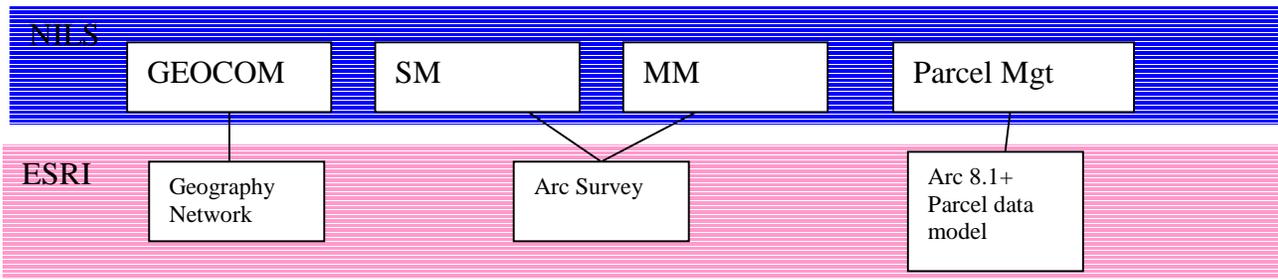
Reference Materials:

- Case Recordation Survey Type Analysis Data Integration Analysis (DIA) project – on the N ILS website
- FGDC Cadastral Content Standards – 1999 – on the FGDC website
- Arc Survey Object Model, ArcGIS Parcel Data Model, Essential Parcel Topological Relationships – Get Electronic Copies from Roy King
- “Notes on the synthesis of forms” a book written by Christopher Alexander
- “An area event management for forestry...” see ESRI website.
- “N ILS 2000-2001” document put together by Jordan Henk (have hard copy).
- Draft definitions of core data elements for spatial representation of parcels – Dennis McKay
- Measurement Management Entity Relationship Diagram (MM-ERD-R12.dxf) – Dennis McKay

Attendees:

- Jerry Sullivan – BLM Survey Measurement Management and Geocommunicator, jerry_sullivan@blm.gov
- Roy King – BLM Technical Lead N ILS, roy_king@blm.gov
- Dennis McKay– BLM Cadastral Automation, dennis_mckay@blm.gov
- David Grainger – BLM, david_grainger@ca.blm.gov
- Jordan Henk – ESRI, jhenk@esri.com
- Nancy VonMeyer – Fairview Industries, nancy@fairview-industries.com
- Don Chambers – ESRI, dchambers@esri.com
- Ann Bodine (Tu) – USFS R2 RO Parcel Management, abodine@fs.fed.us
- Wayne Hewitt – ESRI Product Specialist Parcel, whewitt@esri.com
- Jim McGinnis – USFS N ILS interface, jmcginnis@fs.fed.us
- Leslie Cone – BLM N ILS Manager, leslie_cone@blm.gov

- Virginia Pyles - BLM, Ginny_pyles@blm.gov
- Johnny Shippy(Wed), USFS, R2, jshippy@fs.fed.us



Lunchtime Presentation from Nancy VonMeyer

- Geographic Services comprise of
 - Production role (product services)
 - Publication roles (Department access (support), and general access)
 - An appropriate level of servers, software and people.

- Depending on the role(s) that a person plays, then determines the appropriate level of server, software, and people necessary to perform the activities.
- Related to FOIA, production data is not available (it is a “work in progress”), whereas publication is FOI Able.
- western governors association meeting 2000\production-publication.ppt

Tuesday Meeting Notes:

1) Jordan Henk

a) N I L S

i) Tools

(1) ESRI

(2) Custom

(3) Other COTS

ii) Data model

(1) Lands

(2) Status

(3) Case recordation and other business

b) Gap analysis

i) Build it, platforms, buy it, use it

c) Per Jordan: Jim McGinnis' - I issues

i) Resolve N I L S requirements with ESRI software release specifications with I B M contract

ii) Resolve ALP-N I L S interfacing (good fit of N I L S can be used by ALP)

(1) Assign appropriate lead & support FS Technical Staff to various N I L S activities.

d) Per Jordan: Jerry's - I issues

i) Resolve MED schedules of SM/MM/PM, sequentially vs. in parallel, interactively

ii) Land Status (is not status files)

iii) Nuts and bolts of the steps in the analysis phase - “N I L S 2000-2001” document put together by Jordan Henk (acquire document)

e) Per Jordan: Roy's I issues

i) When are we going to move from the higher level to the lower level model (work breakdown on detailed analysis)?

- ii) Legacy system interfaces (LR2000, Alaska System, ALP) with NILS.
Does it go away, does it need to be rewritten? Want to be able to “plug in” NILS into ALP etc.
 - (1) Need a data conversion plan for legacy systems – LCD (least common denominator) – what, how, resources
 - (2) Support parallel maintenance for some period
- f) Per Jordan: Dennis' Issues
 - i) MM (measurement management)
 - (1) Integration – FGDC and ArcGIS (Survey & Parcels).
 - (2) Field survey support (hardware & software)
- g) Per Jordan: David's Issues
 - i) Gap analysis Arc Survey to SM (field measurements – proprietary –not for public) & MM (record measurement – for public).
 - (1) For SM We need a standard object model for computations and geodetic reliability.
 - (2) Analysis should begin this fall. Practical data testing – **FS needs to involve someone in this.**
 - ii) Document management and workflow. E.G. SID (Source ID). See NILS 2000-2001 document (Jordan's).
 - iii) At what point do we integrate the software and data modeling? Need data to test the model. It will be an iterative process.
- h) Per Jordan: Ann's Issues
 - i) Incorporate conversion lessons of ALP into NILS
 - (1) More frequent, sooner testing of application data integration
 - (2) In status there is an exception to every rule. Most of the exceptions are kept inside of people's heads. We need to articulate business rules and exceptions for status.
 - (3) **Need to have a FS representative on the Land Survey Board.**
 - i) Jordan – per “Notes on the synthesis of form” a book written by Christopher Alexander.
 - i) Design has form and content. To resolve the changes from form to context you perform gap analysis.

Wednesday Meeting Notes:

- 1) FGDC Standard – Wayne Hewitt and Tim Hodson have worked with this
 - a. What level is the FGDC standard? Does funding come with compliancy? Nancy – there are no teeth in the FGDC to follow thru on this. Incentive is that you have to follow FGDC standards for a \$40-

50K grant (this is not much of a carrot). NSDI does require FGDC. There will be holes in the data if users are not compliant. The users will demand counties to be compliant to these standards. This is the carrot. Standard metadata is a carrot also. We want to drive people to the highest level of compliance so that there is integration at some level. This does not assure data compatibility.

- b. ACTION ITEM: Nancy V., take the material from the web page and craft a white paper describes the history and implications and intent of the cadastral standards (this is for outreach, PR).
 - c. N I L S Compliance
 - i. There are 4 levels of compliance: domain, domain/relationships with domains, full compliance (publication standard – structurally), and ?.
 - d. Jordan – N I L S is going to be a core implementation package. I t will be incorporated into ALP and BLM, etc. I t will be a core data model and some core tools to apply across the landscape.
 - i. N I L S is not only Federal. N I L S is comprised of core tools and data model to be used by BLM, FS-ALP, City, County, and private.
 - ii. The data model comes from FGDC, N I L S, ESRI .
 - iii. The tools come from N I L S, ESRI (but not all of the tools for implementation)
 - iv. SCENARIO: A successful N I L S three years from now: ideally a county that doesn't have automated processes, goes on the N I L S site and tries out the N I L S tools and data model to build their process. The county then decides to participate in the effort by publishing data in ARC IMS for others to view. I t is a win-win situation.
 - e. The FGDC cadastral sub-committee has control of that standard. This process is on the FGDC website. N I L S does not control that.
- 2) Core element definition – an initiative of FGDC Cadastral subcommittee & WGA (Western Governors Association). WGA congressional resolution for next funding.
- a. Key Dates:
 - i. Aug 19th URI SA conference users meeting (Sunday before the URI SA conference)
 - ii. December ready to press the manuscript and the data model.
- 3) Look at the cadastral content standard from FGDC before tomorrow.

4) Leslie to talk about NILS, Per Jordan Henk - want to have time to review the "NILS 2000-2001" document

5) Survey measurement from Dennis

a. The elements contained in this model are the "production" end of the database per Nancy VonMeyer's presentation (see Nancy's PowerPoint presentation). Some elements are released to the "public" level.

b. USFS - Stan French and Al Keiser have been involved in the reviews and input into Dennis' Survey Measurement Model (see below) discussion under survey model review.

c. Dennis will be communicating with Nancy V regarding his model.

6) Review

- Parcel Model - Need Johnny, Dennis (Martha Delporte) and David to input version .4 of the Parcel Data model. Wayne has a companion paper to help describe this. This needs to be complete by Sept. 29, 2000. Then reviewed by Oct. 31.

- Survey Model - Need Johnny (or Al Keyesr), Dennis and David to review Survey Object Model. Wayne has a companion paper to help describe this. This needs to be complete by Sept. 15, 2000.

- NOTE: Johnny, Dennis and I need to talk about strategies of how to introduce this to the Regional Survey folks, so that this can be shared reviewed at the next level down. Market it in a way that describes ALP as "embracing" NILS technology.

7) Leslie

a. Review of Jordan's NILS 2000-2001 document.

i. Review the document with Dennis and identify the action items that FS folks are to participate in. We are talking about the "technical" involvement of people.

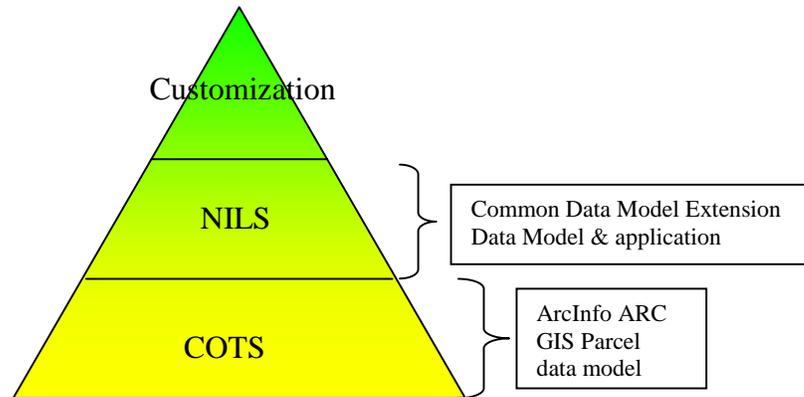
ii. Dave O'Hara needs to send the ALP data set to Roy King. As of 7/19/00 Roy did not have a copy of the data.

b. NILS is developing a "land records management application"

c. As far as GeoCom goes, NILS costs will be whatever is added above the COTS (geography network, www.geographynetwork.com) core functionality.

d. Regarding parcel modeling, the same applies.

e. →



8) Per Don, Wayne, and Jordan: - PDM

- a. NILS Gap Analysis ASAP (need to send someone with Dennis McKay or BLM counterpart to Redlands to work on this - work with Dennis Moonier to figure out who and get that taken care of).
 - b. URI SA - Aug 19, 2000+ -
 - c. 8.2 (or whatever it is called) Specifications available Oct-Dec, 2000.
- 9) Leslie wants a detailed outline that deals with dependencies, etc (to be done on Thursday).