Implementation of State Centric Data Within the StreamNet Project By Doug Reece 04/10/97

I contacted the Steering Committee members from each of the four state agencies to get their opinion on state specific data and how it could be made available through the StreamNet project. I simply wanted to find out if there was data that these states wanted to make available through the project and if so, what mechanism is preferred.

I will summarize my conversations with each steering committee member I talked with and hopefully represent their position accurately:

First of all, it appears that each state has data that is not regionally standard yet would be valuable to the agency if it could be made more easily accessible.

Jerome

Jerome would like to make available data that was collected as part of the PNRS as well as detailed data being collected to for the StreamNet regional database. These are datasets that are not regionally consistent but would be valuable to Idaho if they could be made available, preferable through a web interface like the StreamNet web query interface.

Ray

Ray said that there was state specific data scattered throughout the agency that would be useful to Oregon. The format of this data varies from database files to spreadsheets. They currently have an FTP site that provides a mechanism to retrieve these files and suggested that similar method could be implemented for the region.

I also talked with Brent Forsberg about ORIS. ORIS is currently available for download, but he did not see StreamNet putting any effort into making that data accessible through a web interface, although he thought it would be good if someone did.

Dick

Dick identified some data, particularly fishery information that relates to Canada as something that is not necessarily useful to other states but is important to Washington. He foresaw initially making this data available through FTP via the web, but would eventually like to have a web base query system to access the data.

Janet

The MRIS application was dramatically enhanced in the early 90's and is currently available through download off the web. Apparently work has started on converting this to a web based system, although I don't believe StreamNet is paying for it.

Implementation Options

1. Related Data Catalog

One of the easiest things we could do initially is to provide a Related Data Catalog similar to the Map Catalog. This would simply be an archive of related but non-standard/non-compatible datasets. They could be stored in a zip or tar format and be made available for download. The exchange format for this would simply be the file, perhaps keywords, and sufficient documentation in an RTF or HTML format.

This could implemented in a couple weeks of work and could provide another beneficial service to the region.

2. State specific query systems

Since each state, except for Oregon, expressed a desire to have StreamNet assistance with state specific StreamNet related query systems I will describe two methods this could be accomplished.

Method 1: State specific interfaces based at state sites.

In this method, the interface would be housed locally at the state but could be accessible through a link from the regional system.

How this might work: Say a user is looking at a summary of Redd Counts on a particular stream in Idaho. A hotlink could be made available that would let the user view additional detailed data that is actually stored at IDFG. The hotlink would be a URL pointing to the address of the IDFG query page with parameters for the query.

Method 2: State specific interfaces are based at PSMFC.

In this method, the interface would be housed at PSMFC but could be accessible from state intranets.

This would work like Method 1 but the user would never leave the PSMFC domain.

The pros and cons of Method 1:

- Pro: The interfaces could directly access the data being used to feed the exchange format.
- Pro: Changes locally are would be immediately available.
- Pro: Each state responsible for their own specific needs—doesn't bog down regional personnel.
- Pro: Potentially better response time for agency personnel (this is dependent on several factors so is not necessarily true).
- Con: Could lead to inconsistent user interfaces and programming standards which might make the StreamNet interface look less coherent and less maintainable in the future.

The pros and cons of Method 2:

- Pro: Help ensure consistent look-and-feel and other programming standards.
- Pro: Could make use of PSMFC resources and personnel for state specific solutions.
- Con: Would require the Regional Data Manager to manage and maintain all the various state specific datasets and provide an exchange format for all data sources.
- Con: Potentially a longer response time to make changes.

The cons of Method 1 could be overcome if a single regional person either developed or supervised the development each state system.

The cons of Method 2 could be overcome if each state was responsible for developed their own system, except rather than housing the application locally, they would house it at PSMFC adhering to PSFMC programming standards.