WK 13 - How to Prepare Ecological Data Sets for Effective Analysis and Sharing

2:00 PM-5:00 PM

August 1st, 2010
Workshop Team

- Robert Cook, *Oak Ridge National Laboratory*
- Viv Hutchison, *US Geological Survey*
- Stephanie Hampton, *National Center for Ecological Analysis and Synthesis*
- Tammy Beaty, *Oak Ridge National Laboratory*
- William Michener, *University of New Mexico*
- Bruce Wilson, *Oak Ridge National Laboratory*
- Suresh SanthanaVannan, *Oak Ridge National Laboratory*
- Mark Schildhauer, *National Center for Ecological Analysis and Synthesis*
Workshop Goal

Provide guidance on data management practices that investigators should perform during the course of data collection to improve the usability of their data sets.
Cycles of Research – An Information View

- **Planning**
- **Review**
- **Measurements**
- **Original Observations**
- **Problem Definition**
- **Research Objectives**
- **Analysis and modeling**
- **Data Center/Archive**
- **Discover, analyze, and extract information**
- **Multi-Domain Observations**
- **Planning**

Courtesy of Raymond McCord, ORNL
Benefits of Good Data Management Practices

Short-term

- Spend less time doing data management and more time doing research
- Easier to prepare and use data for yourself
- Collaborators can readily understand and use data files

Long-term (data publication)

- Scientists outside your project can find, understand, and use your data
- You get credit for archived data products and their use in other papers
- Sponsors protect their investment
Workshop Sponsors

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Workshop Agenda

2:00 - 2:15  Workshop Introduction (Bob Cook, ORNL)
2:15 - 2:45  Fundamental Practices for Preparing Data Sets (Bob Cook, ORNL)
2:45 - 3:15  Organizing data sets for sharing
Collaboration and Data Sharing (Stefanie Hampton, NCEAS)
Organizing data sets: Participants are encouraged to bring their own data sets, which we will assist in organizing (Workshop Team)

3:15-3:30  Break

3:30 – 4:15  Introduction to Metadata (Viv Hutchison, USGS)
4:15 – 4:45  Elements of a Data Management Plan (Bill Michener, University of New Mexico)
4:45 – 5:00  Workshop Closing (Bob Cook, ORNL)