How to Write Quality Metadata
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Steps to Creating Quality Metadata

- Organize your information
  - Did you write a project abstract to obtain funding for your proposal? Re-use it in your metadata!
  - Did you use a lab notebook or other notes during the data development process that define measurements and other parameters?
  - Do you have the contact information for colleagues you worked with?
  - What about citations for other data sources you used in your project?
- Write your metadata using a metadata tool
- Review for accuracy and completeness
- Have someone else read your record
- Revise the record, based on comments from your reviewer
- Review once more before you publish

Tips for Writing Quality Metadata

- Do not use jargon
- Define technical terms and acronyms:
  - CA, LA, GPS, GIS : what do these mean?
- Clearly state data limitations
  - E.g., data set omissions, completeness of data
  - Express considerations for appropriate re-use of the data
- Use "none" or "unknown" meaningfully
  - None usually means that you knew about data and nothing existed (e.g., a "0" cubic feet per second discharge value)
  - Unknown means that you don't know whether that data existed or not (e.g., a null value)

Titles, Titles, Titles…

- Titles are critical in helping readers find your data
  - While individuals are searching for the most appropriate data sets, they are most likely going to use the title as the first criteria to determine if a dataset meets their needs.
  - Treat the title as the opportunity to sell your dataset.
- A complete title includes: What, Where, When, Who, and Scale
- An informative title includes: topic, timeliness of the data, specific information about place and geography

Be specific and quantify when you can!

- The goal of a metadata record is to give the user enough information to know if they can use the data without contacting the dataset owner.
  - Vague: We checked our work and it looks complete.
  - Specific: We checked our work using a random sample of 5 monitoring sites reviewed by 2 different people. We determined our work to be 95% complete based on these visual inspections.

Use descriptive and clear writing

Fully qualify geographic locations

Use a thesaurus for keywords whenever possible and select them wisely.

Remember: a computer will read your metadata

- Do not use symbols that could be misinterpreted: Examples: ! @ # % { } | / \ < > ~
- Don't use tabs, indents, or line feeds/carriage returns
- When copying and pasting from other sources, use a text editor (e.g., Notepad) to eliminate hidden characters

<u>**Summary**</u>

Review your final product:

Does the documentation present all the information needed to use or reuse the data?

Remember: a well-written title and good keywords are critical in data discovery

Adapted from: DataONE Education Module: How to Write Good Quality Metadata.
http://www.dataone.org/sites/all/documents/L08_WriteQualityMetadata.pptx