

Lab Documentation Policy 5/12/2003

I.) Work in progress:

The Notebook should be the central reference that defines and documents experiments clearly. On the day of an experiment, be sure to include:

Time of Day

Experimental Procedures (These can be specified by reference to a standard operating procedure (S.O.P.) recorded in your notebook; see below.)

Clearly identified location of stored data (Videotape ID, directory path name, and file name conventions, etc.)

Possibly important external parameters: Room Temperature, Humidity, etc.

* Individual experimental runs and the standard operating procedure (S.O.P)---The procedure of individual experiment should be described clearly. In some cases, you can instead describe the difference with respect to a previously established S.O.P., which should be defined in detail and indexed at the front of your notebook.

* Analysis programs used to analyze the data. If these are performed later, make a note in the analysis of the page on which the experiment itself is described.

* Figures generated during the course of analysis should include the date of the run and other relevant material.

Electronic files and computing codes --We intend to give individuals the maximal freedom of managing their files and directories. However, there are a few guidelines to be observed:

(1) All filenames (including the extension) should not exceed 30 characters. (Problems may arise in making CD backups if otherwise.) Avoid blank spaces; use underline instead.

(2) Please keep **all electronic files except computing codes** in the directory(-ies) named after individual's Windows user name. Make subdirectories in such a way that files belonging to different categories in the following are NOT mixed:

Computing results

Writings / Presentations .. etc.

Personal files (electronic paper collections, mails...etc.)

Image or other data files

* Backups of data files and analysis is the responsibility of the experimenter. *Hard drives are not backup devices* - large data sets should not stay on hard drives for any extended period. Following analysis, data should be backed up (using CD's or DVD's) and deleted, leaving only the final results, if needed.

(3) If you wish some of your working files to be backed up daily, please build at least two directories in our network under your name. Store files that DO require daily backup (e.g.

analyses in progress, generally not more than a few hundreds MB) in one directory, e.g. \jctsai. Place other files that DO NOT require daily backup (especially Large files such as images or temporary files generated by analysis) in a different directory such as \jctsai_L), and inform our system manager as to the directory requiring daily backup..

(3) **Computing codes** written by individuals:

* We store all user-defined IDL codes under the directory shared by all lab members:

Z:\rsi\IDL53\userlibs\userlinks\XXXX

and individuals are required to keep the program or subroutines they write (or modify) under the directories named after the users (XXXX). Whenever possible, file names should **begin with the author's initial** (e.g. \gvoth\gv_runner.pro , \jctsai\jc_sample.pro). *IDL does NOT distinguish different versions of programs that have the same file name.*

* **Computing codes should be self-documenting.** The following information should be included as comment lines at the beginning of each program:

Author and Date

Purpose and a short description of the main program, and other subroutines it calls

Explanation of each significant variable name

CD's, DVD's, Backup Tapes, Videotapes should be maintained on a regular basis and clearly labeled with:

Your Initials

Experiment Name / Date

Notebook and Page(s) documenting the run.

Keep a record of these media in your notebook. (The back of the notebook is a good place for this.)

Hardware/Electronics

There should be no magic boxes. LABEL CLEARLY

Labels should include both function and input/output, and if necessary, intended experiment. If possible, put a circuit diagram inside the box. If applicable, include a reference to location of detailed design/description.

Suppliers

Suppliers of important materials (chemicals, glass, mesh, etc.) should be clearly documented in notebooks and relevant project documentation.

Literature (catalogues/advertisements) are filed in H107 and noted on the general listing in the front of the drawer.

Newly Purchased Equipment

File manuals alphabetically by manufacturer in the appropriate drawers in H107,

Test the equipment as prescribed in the manual before use.

Attach a sticker identifying the equipment with this lab.

Attach capital equipment ID stickers (red numbered stickers) when provided.
Registration/Warranty cards should be sent in (with Jerry Gollub's name)

Articles

We encourage individuals to build an electronic library of the pdf files accessible by others. (See Gollub-trakker\\e:\gvoth\lit\Author\ as one example.) Hard copies of all relevant/important papers should be either filed with lab references, or kept together by project. (It is useful to keep an additional annotated bibliography of articles you have read.)

II.) At the end of a lab member's work with the group, the following tasks must be completed:

(note that it is best to do these things all along).

a. Directories are to be organized; data and programs should be properly backed up. Backup and README files should be provided as appropriate. Items that are not needed for work in progress should then be deleted.

b. A *Documentation File Folder* is to be prepared including the following:

Names of computers/directories containing your files. (the directories themselves must have readme files giving further information about how to find things.)

List of your major programs and what they do.

Information on tape/CD backups, indicating the name of each tape, etc. If you have been maintaining this information as indicated above then make a copy of the above and include it here.

c. The *Lab Notebook* is to be completed, and a **table of contents** inserted in the beginning of each one listing items that may be useful in the future. The notebook is to be examined by Jerry before being judged complete.

d. Organize all papers that have been collected for your work. Discuss with Jerry materials you wish to take with you.

e. **Label the CDs clearly** with your name and preferably with its directory. **Print out at least one hard copy of the manuscripts** you write and keep them with your lab notebook.