The fMRI Procedure Last updated: March 22, 2004

As many of you know, we are in the initial stages of developing an imaging database to archive our MRI data. We hope that this will allow for easy tracking of experiments and sharing of data within the Rotman and ultimately as part of the fMRI Data Center in Dartmouth College. Our efforts to reorganize the fMRI database and fMRI data management on our servers require the development of fMRI data policies to facilitate this transition. Please note that these policies may change as the database is developed. If you have suggestions, please let us know (apacurar@rotman-baycrest.on.ca;)

A. Booking Slots for Sunnybrook Scanner

At the moment we are not formally assigning slots, although if scanner demand increases in future we may have to do so.

Register and book your scanner slot at http://www.swchsc.on.ca/~mrigrp/sked/

Please contact Dr. Cheryl Grady for policy questions.

B. Transfer of Data from Sunnybrook to Rotman Institute

B.1 The location of the Raw fMRI data

The MRI technician will upload the raw fMRI data from the scanner system onto <u>\\ivar\rotman</u>. The network drive (<u>\\ivar\rotman</u>) is mapped as drive F: on Ibis computer (Rotman's new Windows computer in the Sunnybrook fMRI suite).

B.2 Login Information to Ibis

Login on Ibis as: Username: guest; Password: guest

B.3 The location of the Stimuli presentation program

Under the My Documents folder there are subfolders named after each lab. In each Lab folder there are subfolders for the postdocs/gradstudents/RAs. If you do not have a folder create one for yourself in your Lab folder. The Lab folder name will be the name of the primary scientist investigator for that research.

The stimuli presentation program should be uploaded to your folder. The presentation program will run from your directory.

NB: All data found on <u>Shuttlecraft</u> has been moved to \my documents\shuttlecraft on Ibis. Please look through this folder and move the files that you own to the appropriate ***_lab folders.

NB: <u>*No data*</u> should be placed on the Ibis hard disk outside of \my documents***_lab folders, because any such data may be deleted at any time without warning.

B.4 Burning Raw fMRI data on DVDs/CDs

Once you have successfully completed a scanning session at Sunnybrook, send an email with the name(s) of the authors(s) of the study, the session identifier and the scanning protocol name to the Image Analysts (apacurar@rotman-baycrest.on.ca and mmalloy@rotman-baycrest.on.ca).

Imaging Analyst will collect the data from Sunnybrook once a week (each Tuesday afternoon) and will archived raw fMRI data on long term storage devices.

NB: This information is critical to help set up the appropriate entries in the database and to allocate space for your study on our computer network.

C. Uploading data on Rotman servers

Only the Image Analysts can do uploading raw data on the Rotman network. Duplication of raw data is not recommended.

D. Documenting the Research Study

D.1 In addition to archiving imaging data, we are trying to create a library of experimental protocols for the Rotman to save time in the development of experiments. To this end, the author(s) of a study should provide the Image Analysts a copy the stimulus presentation program used in the study plus a brief description of the presentation study. The Image Analysts will archive the programs on CD for future reference.

D.2 The author(s) of the study should document each fMRI session. After the fMRI session has been registered in the fMRI Rotman database, primary ownership of the data will be granted to the author(s) of the study. Until the fMRI database interface is built, please fill out the fMRI Session form (see http://125.100.1.67/imggroup/Doc_files/fMRI_scanning_form.doc) and email the form to the Image Analysts (apacurar@rotman-baycrest.on.ca)

E. Back up fMRI data.

E.1 The raw data for each scan will be archived automatically on long-term devices (DVD).

E.2 Every two weeks an email will be sent to the Imaging Group asking for requests to back up preprocessed and/or analyzed fMRI data on long-term storage devices. A backup request form must be completed prior to data being backed up. The author(s) of the study are responsible for filling this form out.

For each scan there will be 3 steps:

- 1. Back up raw data (automatic).
- 2. Back up preprocessed data (by request).
- 3. Back up analyzed data (by request).

We suggest keeping preprocessed data separate from analyzed data. Once the preprocessing steps are completed, preprocessed data can be stored on long-term devices and different analysis can then be carried out.