Aims of Week 1 classes:

Introduce the course (Document online, video from CO) Introduce the students to each other (tree measuring, group work)

VIDEOS Introduction to Data Exploration in Biology

Recorded 20 min talks from each of the flavour set leaders on the role large scale data analysis plays in their field with plenty of examples. Recorded 20 min talk from course face about the aims and structure of the course Recorded 20 min talk from someone on Database sources, regulation and protection

CLASS 1 Field exercise

Working in groups of 3? measure DBH of trees on KB campus Which trees? Ones I can ID hopefully

Data entry and comparison of error between groups

Direct entry of data Need to find out how they will have done this in first year Produce summary statistics (pd.describe) and graphs (pd.DataFrame.hist).

Compare between groups Need to find an easy way to aggregate the data in class

CLASS 2

Reading in data from a file

reminder of strings, dataframes
Reading data in - specifying type, adding column names
Checking data type (objects, floats, integers), the index
Changing data types
Changing colum names
Finding the errors which are messing up your read in - checking is utf (hexdump?)
Dealing with missing data