Supplemental Analysis Example: Use of SAS PROC EXPORT to Produce Delimited Text File with Code to Read In Text File For Use in R

February 27, 2012

This example demonstrates use of PROC EXPORT of SAS to create a tab delimited text file. Then, we show how to read in the delimited text file in R. Although there are many other ways to do this job ("put" statements in SAS or other software, software tools such as StatTransfer or DBMS Copy), this is a very easy way to move data among packages as delimited files are generally read by any statistics package.

The R code for reading in .txt files is also included at the beginning of the Chapter 5 Analysis Examples document for R. It is repeated here.

SAS Code to Create a Tab Delimited Text File

The code below creates a text file called ncsr.txt and stores it in the path given in the outfile statement. The input data is final_ncsr in the libname d2. DBMS=TAB defines a tab delimited file with the replace option. PUTNAMES=YES requests that the names of variables are included in the output file.

R Code To Read in Text File from SAS PROC EXPORT

The R syntax below reads in the ncsr.txt file. The read.table command is used to read the file with options. The location of the file is in the path defined and a few options such as sep= "\t" (tab delimited), and status is true (T) for headers and as is in the text data file are used to correctly read the file. A data object called "ncsr" is created for subsequent use in R.

```
#read in text file created by SAS PROC EXPORT

ncsr <- read.table(file = "f:/applied_analysis_book/r/ncsr.txt", sep = "\t", header = T, as.is=T)
#use names command to obtain names of variables
names(ncsr)</pre>
```