**R Studbook Package To-Dos**

***General***

Update all of the package documentation

Each function should have a “help file” style page in that word document

Function List!

Draw up a data schematic diagram

I want to have a good idea of how we’re using (and modifying) the studbook data for various tasks

Make explicit comparisons with other programs

Once coded up appropriately, should be able to get results produced by other programs

Convert to an S4 based package

***Specific Functions To Write***

Handling pedigrees with unknowns

Andrea’s suggestions

PMx approach knownness vs certainty

MULTs and weighting, input a separate file

Summarize knownness

Summarize kinship, GD

“Validation” and QAQC functions

For things like two birth/hatch events for an individual

Not that we want to correct the errors in R, but there needs to be a series of functions that do QAQC stuff and spit out reports

all basic functions in poplink

demographics

genetics

to/from transfer table

***Modifications to Existing Functions***

am I including/excluding hypotheticals correctly?

SBsetup

Make sure the connection to the server works on a variety of computers…it might need to be written more generally

SBpedig

Other suites of assumptions to use regarding UNK, MULT, and WILD… I need to make this function be able to give output that matches any and every other program that zoo folks use.

inbreedingHistory

make Summary stats flexible

Also consider an export of the raw data rather than just summary stats.

infMort

Add in prorating option!! Again, want to make it so we can get values out that match what other programs produce.

Figure out if there’s a way to cut out euthanasia

litterSize

Generalize to based on other shared details (currently based on shard mom, location, date + birthing window)

litterSizeAnalysis

Do with zero-truncated model in VGAM

UDF stuff

allow multiple UDF fields via list

Infant mortality stuff…allow it to be broken down by other variables, like rearing type and institution

Code up UDF applications to all of the other functions that I haven’t yet

Improve that code with more error checks and such