**Meeting Isla 01/04/20**

* Writing loops/ iterative pipes
  + Group to loop in pipes
  + Have clean dataframe beforehand (extra)
  + i=1 not necessary but good to specify
  + use same package as Shane is using (betapart)
  + try put start/end year in loop
* NAs in accessibility and hpd datasets
  + Make buffer for all
    - (just one more cell around)
    - Average (watch out with NA elements)
    - Increase buffer and see when there is no NAs
    - Decide on which one to include in main text and appendix
    - Reasonable to have buffer for all as indication that larger area of accessibility is more representative of what is actually going on
* Model
  + Fixed effect duration
    - If no effect, no need to visualise
    - If effect, categorical value
    - Center on zero (+ try out what happens if not)
  + Find out difference between : and \*
  + Fixed and random effects
    - Random effect removes variation due to the thing
    - Need for minimum 3 levels, ideally 5
    - Have HPD as its own fixed effect
    - Fixed effect only have 1 slope/intercept; RE can vary
    - If taxa random effect: influence of taxa on acc and hpd and their relation to tt (vs direct effect taxa on tt)
    - Difficult to nest cell and Study ID random effects (see levels)
    - If no convergence, drop them first
    - Reason for random effect inclusion STUDY\_ID methods
    - Ideally let taxa random effect vary by both acc and hpd (equally important?)
    - Split into two models (one with acc, other with hpd; but interaction also interesting)
      * Look at both datasets and understand them better
      * Different research question?
      * Resource extraction: high acc, but low hpd
    - Syntax random effects (acc|taxa + 1|call + 1|STUDY\_ID)
  + Can use default priors but look them up for writing up
  + Cite statistical packages that are part of analysis only (eg. Brms, but not ggplot)
  + Find out number of cores of my laptop