Diatoms

Cryptophytes

Green algae

Cyanobacteria

(conifers)

Would have to sieve conifer material (oven dried) through a 100 (or 32, ideally, but that would take bloody forever) micron mesh

Could inoculate the treatments with some 32 micron filtered water from lake Washington,; then i could see how bacterial action changes the FA profile of the conifer food source

Start out with the neonates, put them in individual vials

Wait a few weeks until their big enough

Aaron Galloway in freshwater bio did the bacteria+terrestrial combo treatments

He, Gordon, and eric ward made the model – the code for which I can find on the Plos website

Brooks miner tried to grow calanoids and found them to be cantankerous

Explanation of the model comes around 13:00 in the recording

To get good stable isotope turnover, you have to increase the biomass of the thing you’re studying by a factor of three or four – from an old Fry paper, Mike thinkgs

Zeros are not a problem for the mixSIR and SIAR models

Using only my small lakes (which I totally have for daphnia), I could constrain terrestrial dependence. If it’s low, the other lakes should be super low.

Read “the plos paper” to see how this stuff clusters out in PCA space

Get the deciduous trees and red alder data from Mike. Aaron should have the bacteria file that he used for his freshwater biology paper. They’re probably pretty constant from place to place.

Go up to the high lakes and collect more daphnia? Brooks might have collected daphnia from some of those. Could send an email to brooks and ask when he found daphnia in those lakes.

Calanoids bioaccumulate (burns 2011) fatty acids differently from daphnia

Red alder and deciduous-fed daphnia might be posted on the PNAS paper.

Sedge data are in Aaron’s paper in freshwater biology. He also has fragmides grass

Took a break around 38:30 in the recording.

Add bacteria to the producers list and run MixSIR on that shit!!! Also do something with w3:w6 ratio.

Show Gordon FASTAR output

Could get some sedge and coniferous litter and run a feeding experiment. Shouldn’t take more than a month

Work on hydrogen thing