

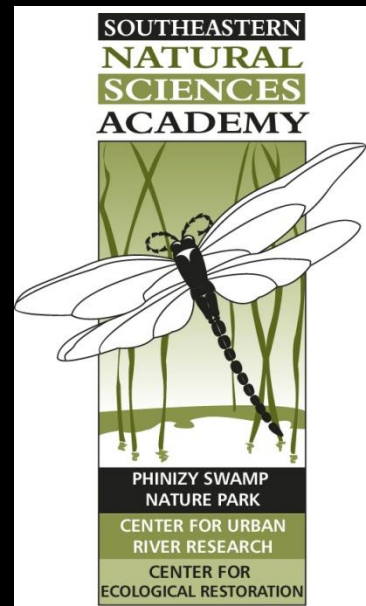
Overview of stable isotope results from a comprehensive Savannah River study

Oscar Flite¹

Gene Eidson², Jason Moak¹, Brian
Metts¹, Stephen Sefick¹

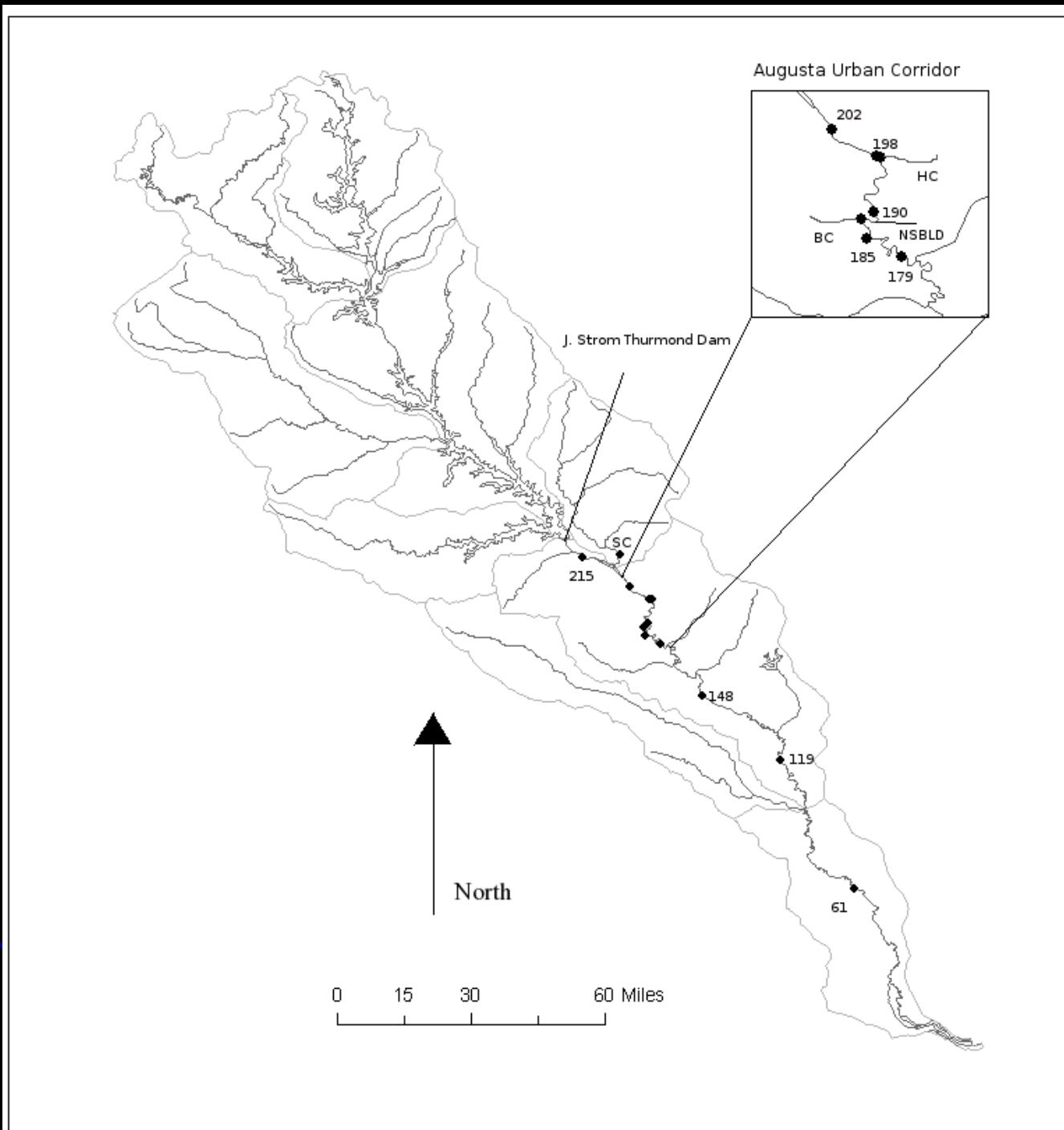
¹Southeastern Natural Sciences Academy

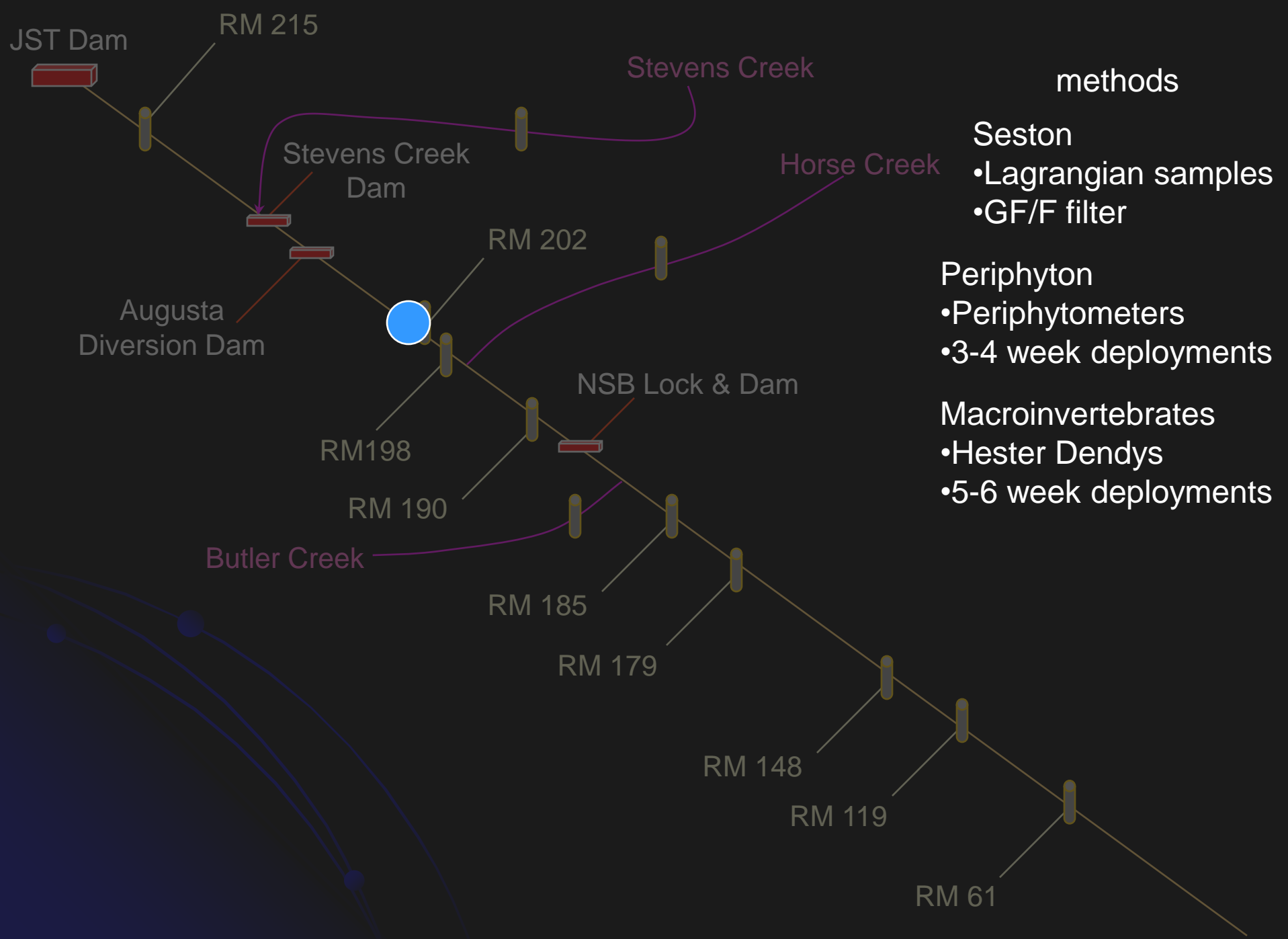
²Clemson University



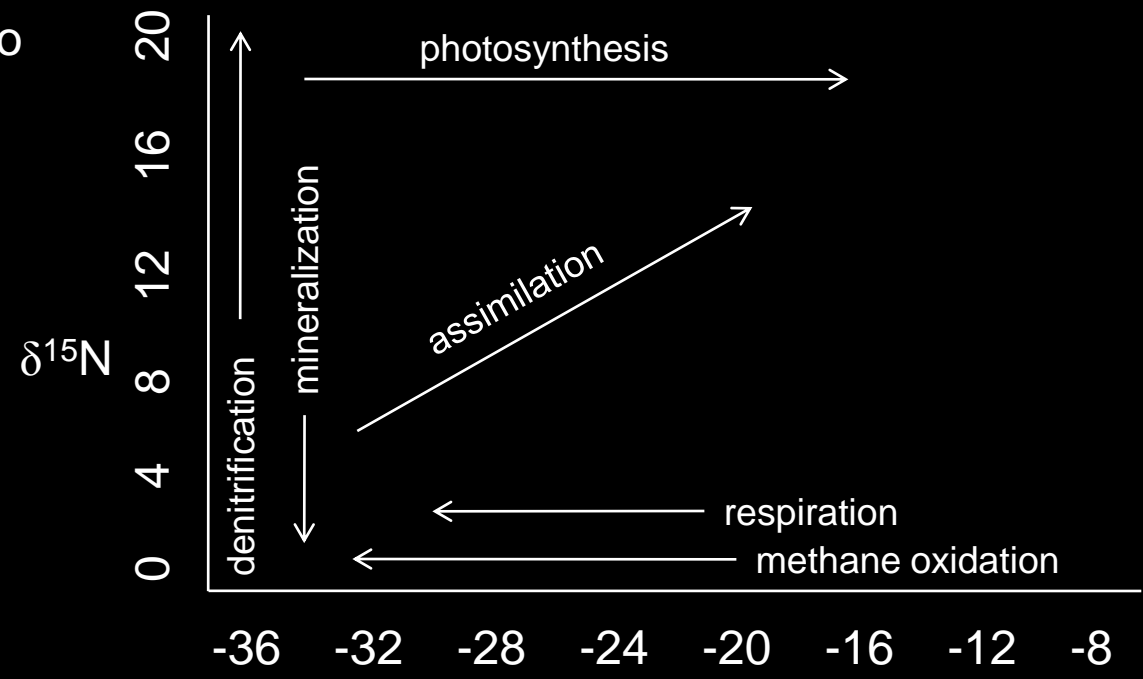
Study was conducted:

- within middle and lower SRB
- from RM 215 to RM 61
- from January 2006 through January 2008

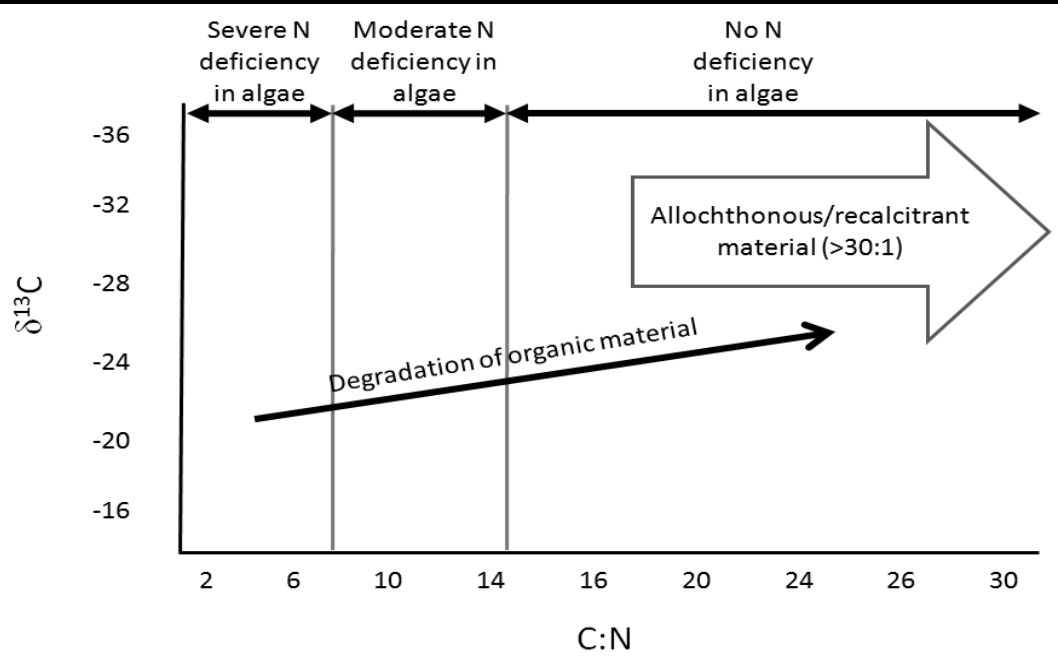




Application of stable isotopes to particulate organic matter, including algae



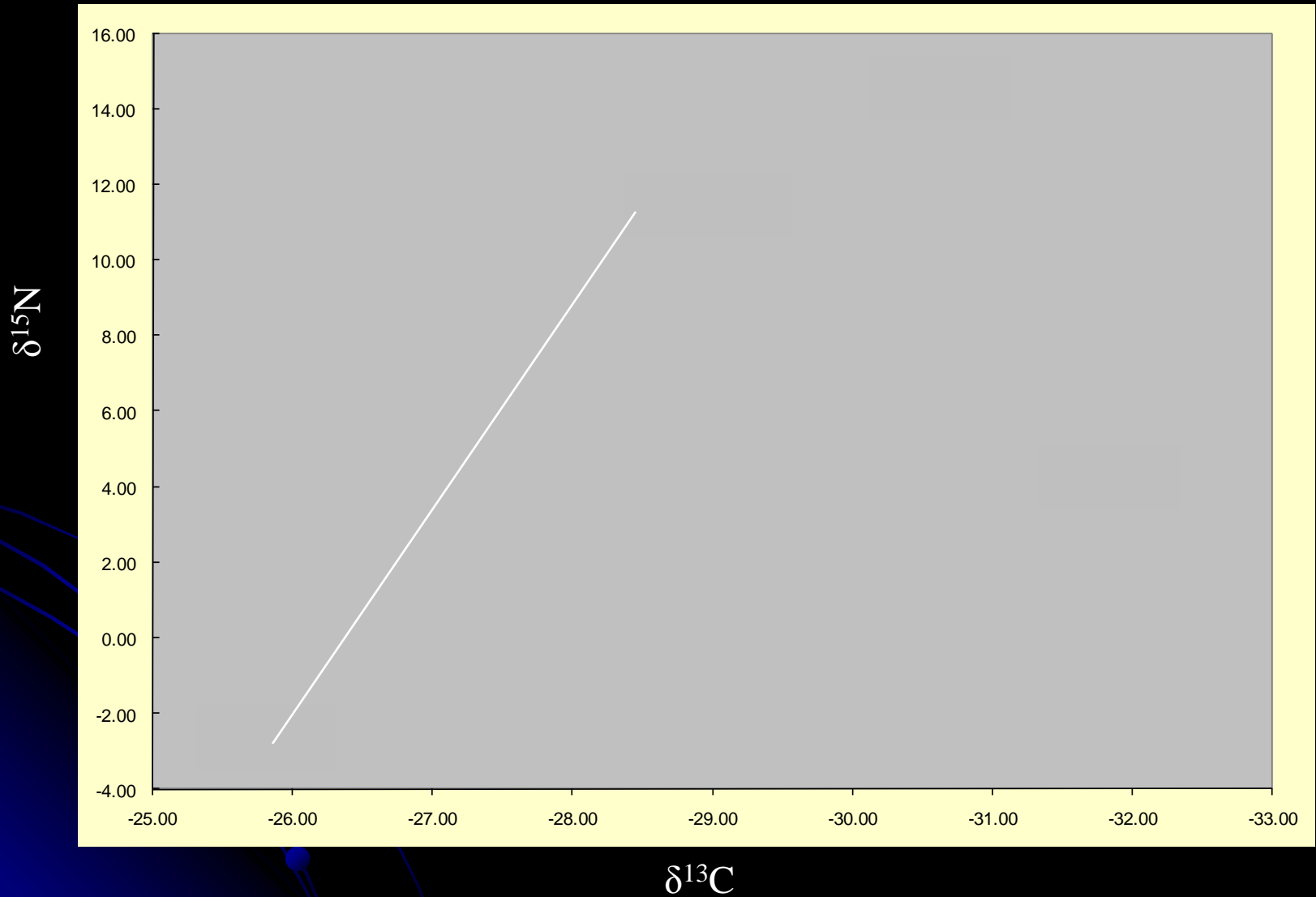
from Kendall and Doctor, 2004

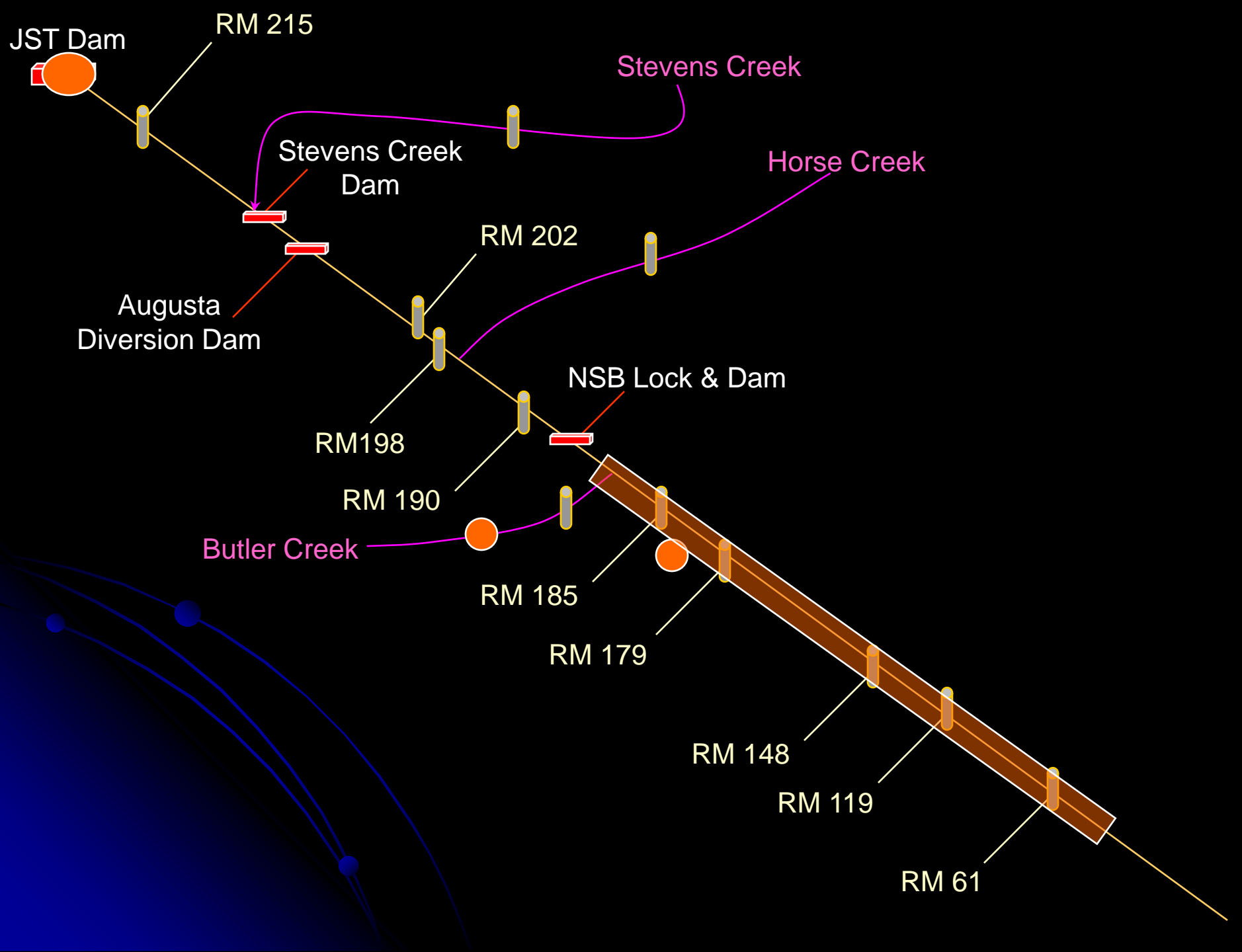


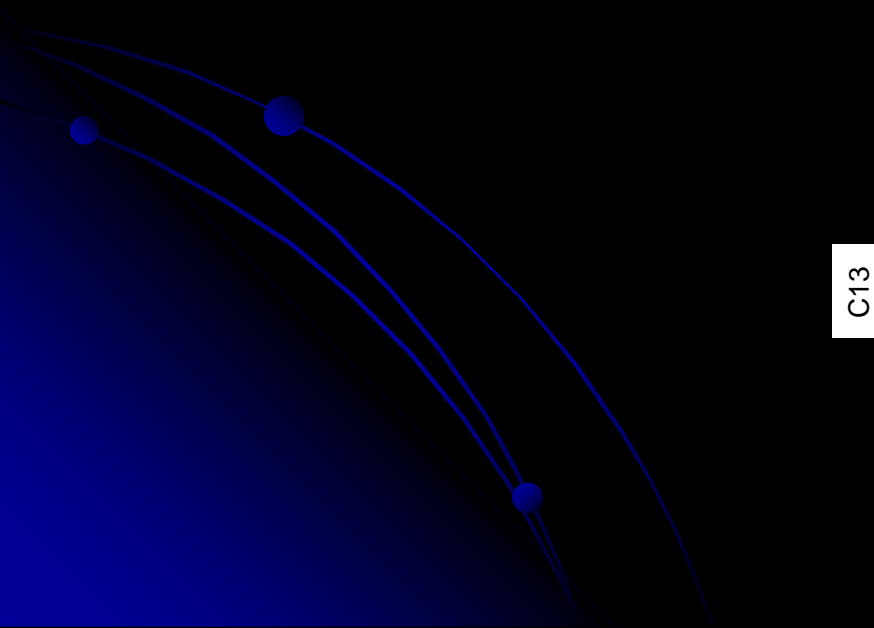
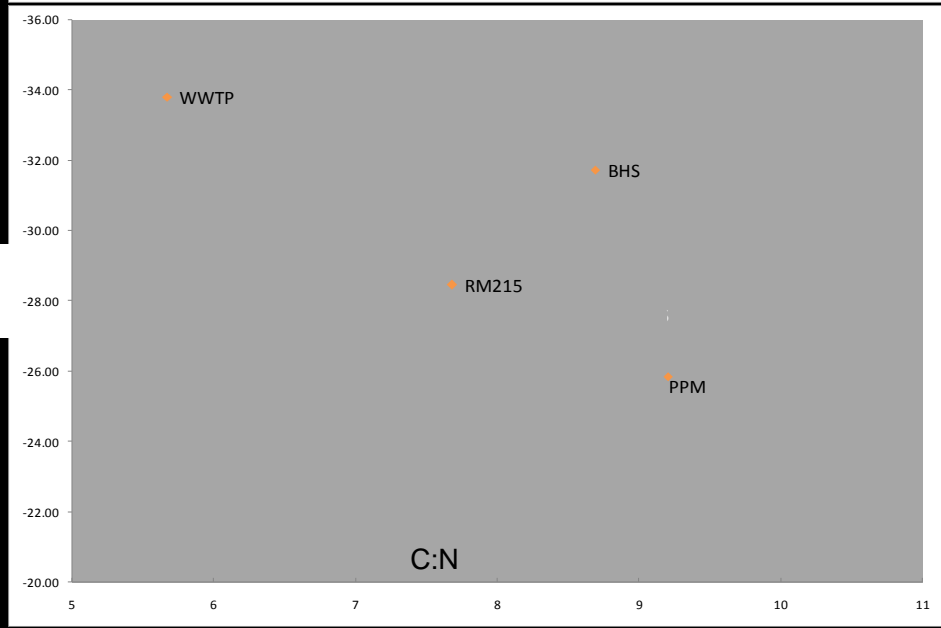
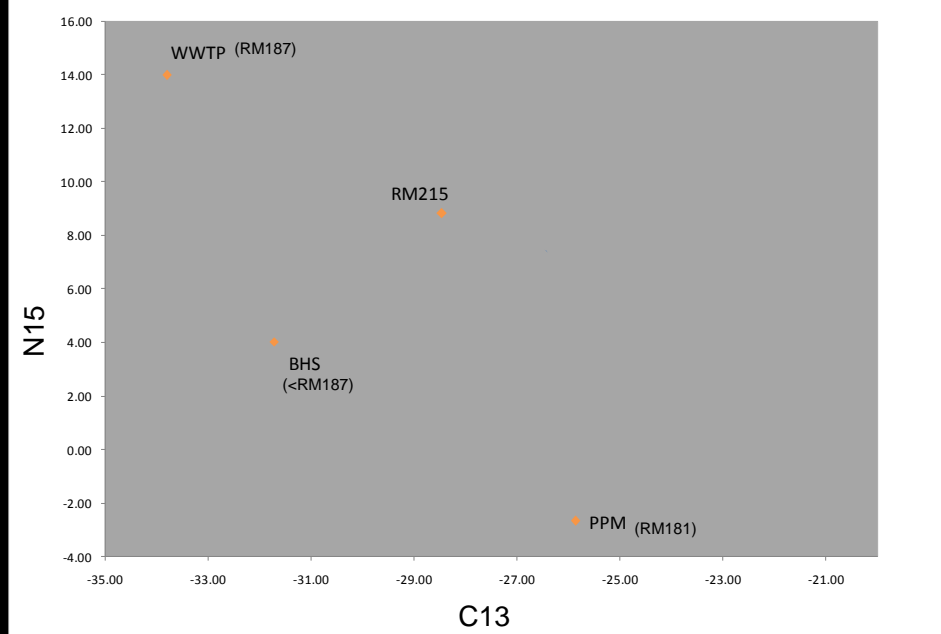
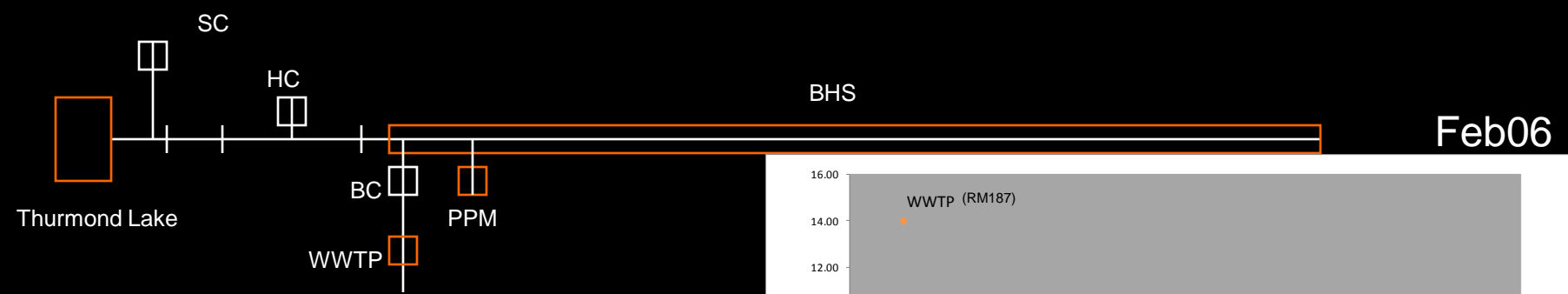
$\delta^{13}\text{C}$

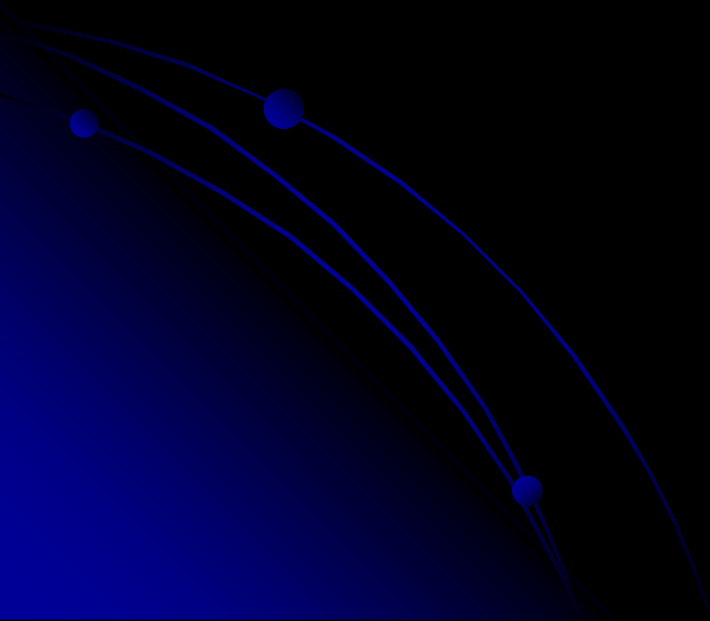
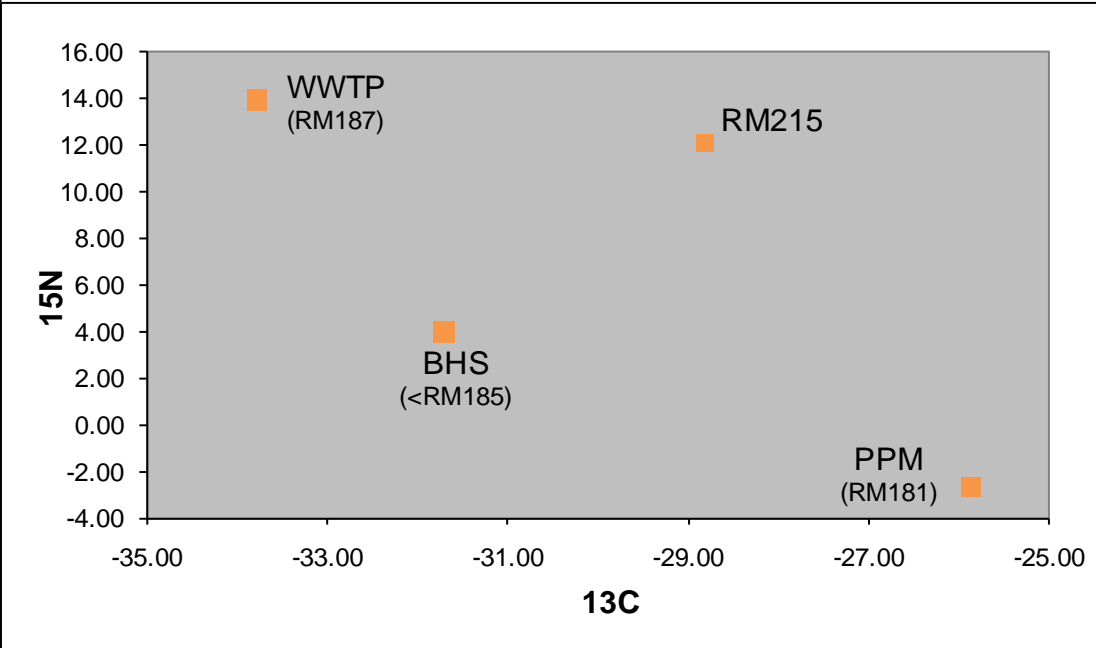
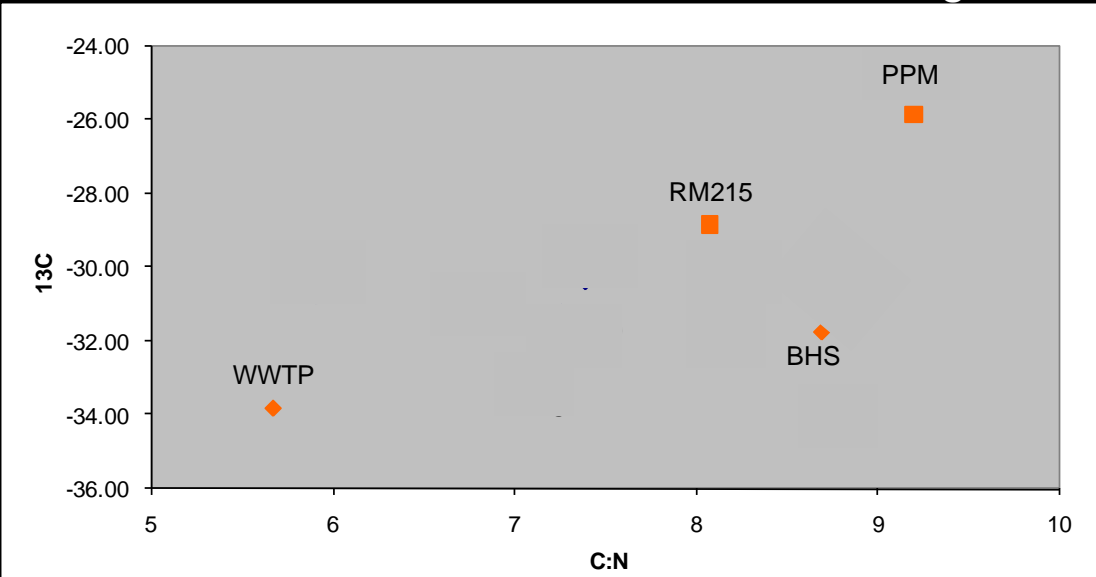
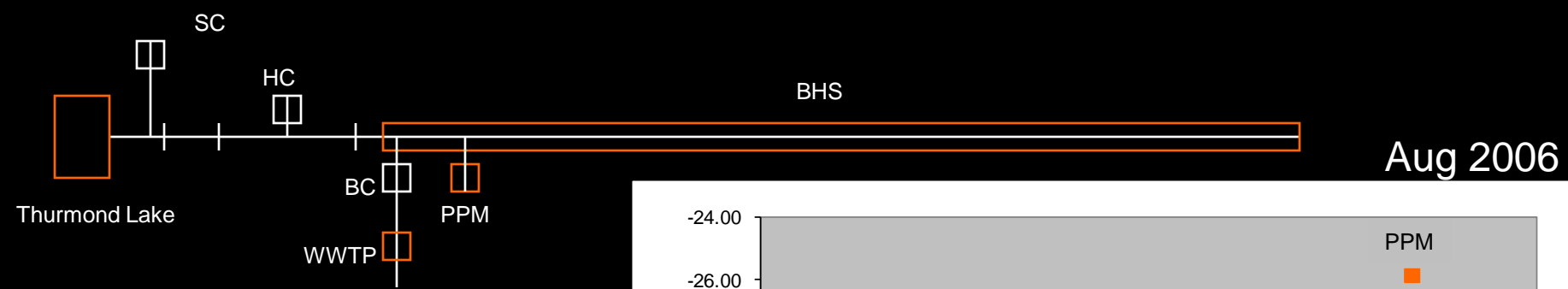
C:N

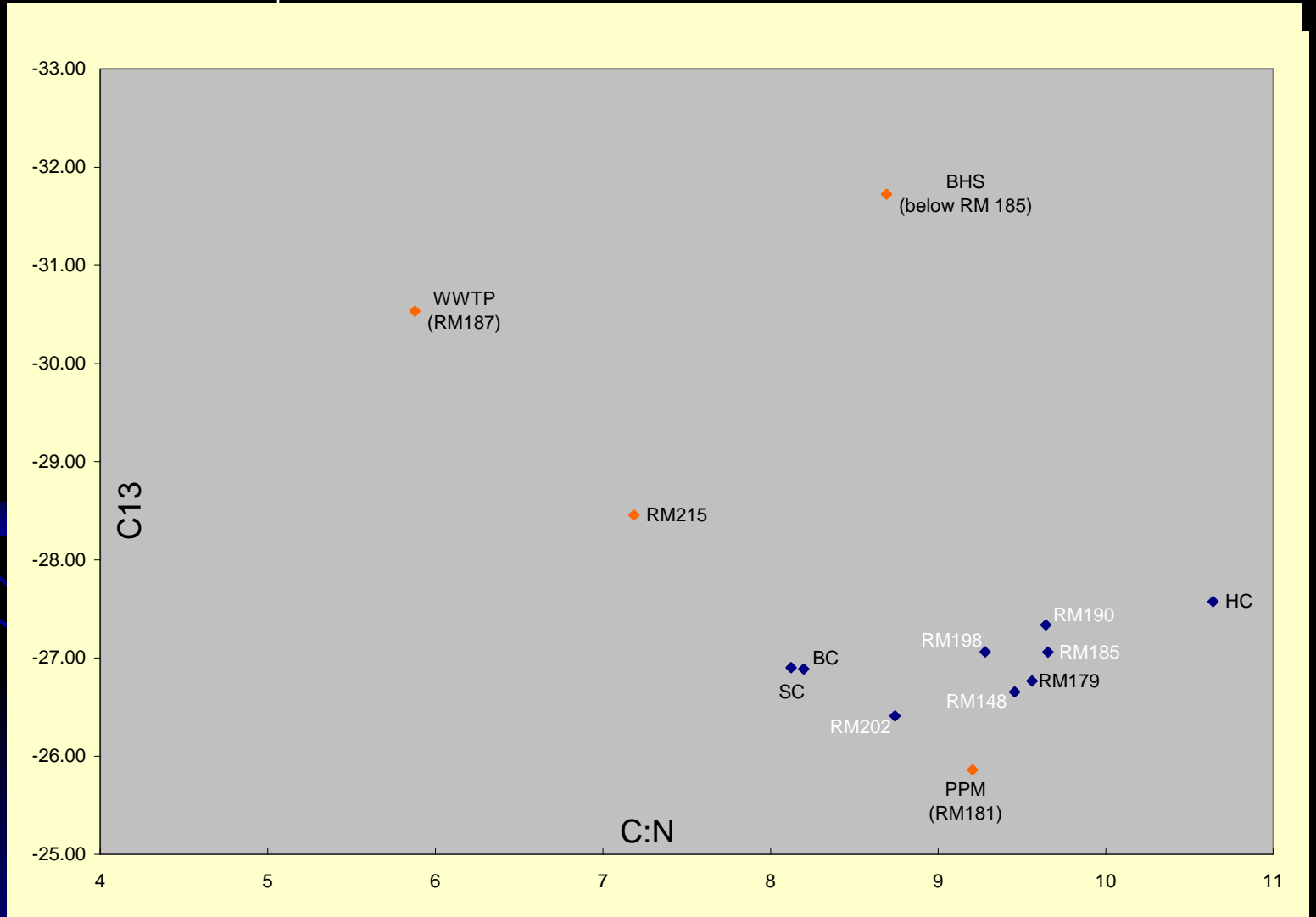
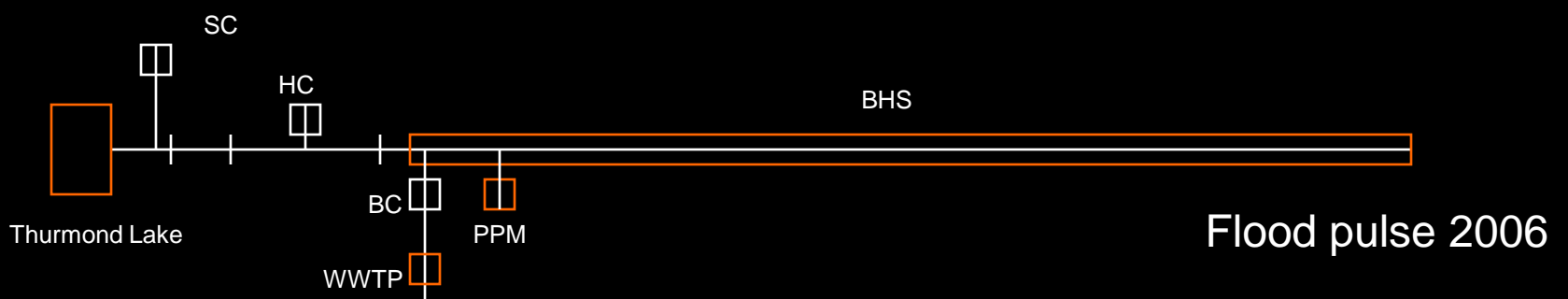
Two-source and multi-source mixing scenarios for the middle and lower Savannah basin



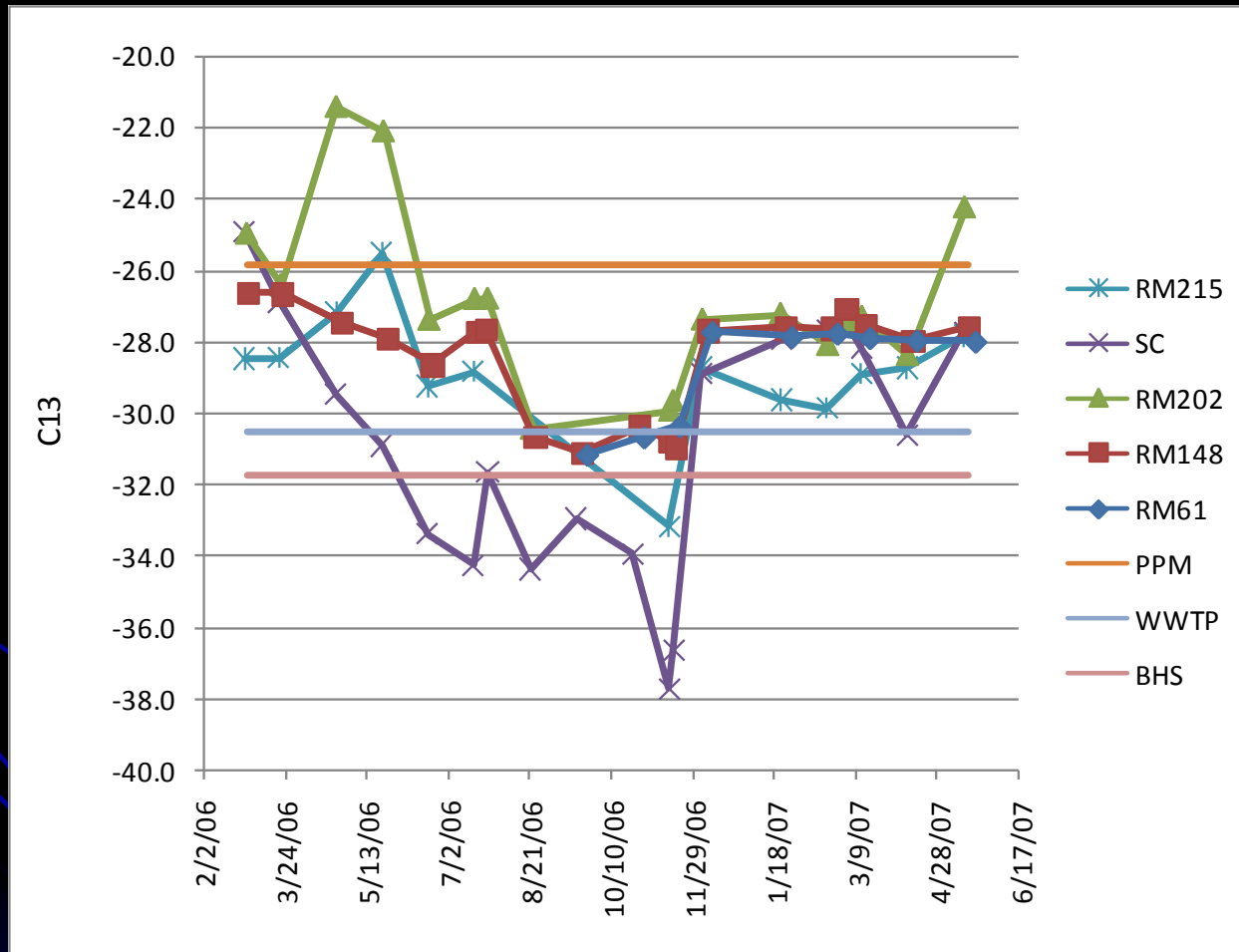




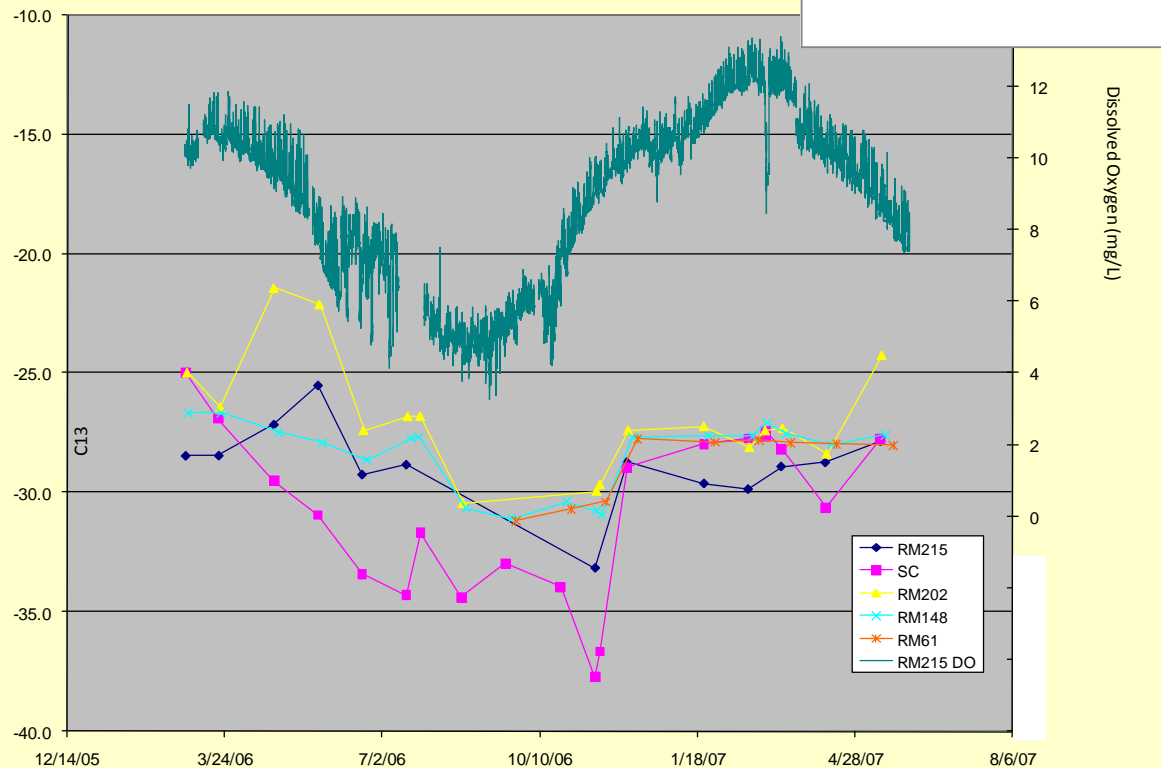
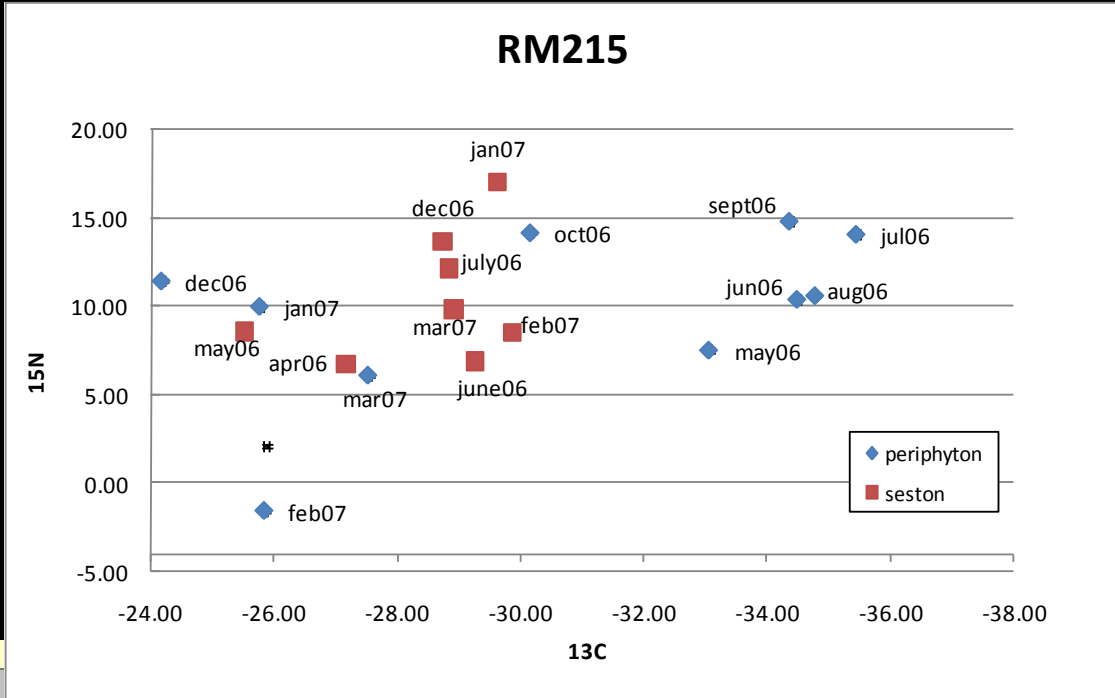




Temporal seston C13 trends



“Lake Effect”



Important considerations for further studies:

- Sample sources often
- Analyze dissolved constituents
- Implement other constituents to further define sources

18O and 2H results

