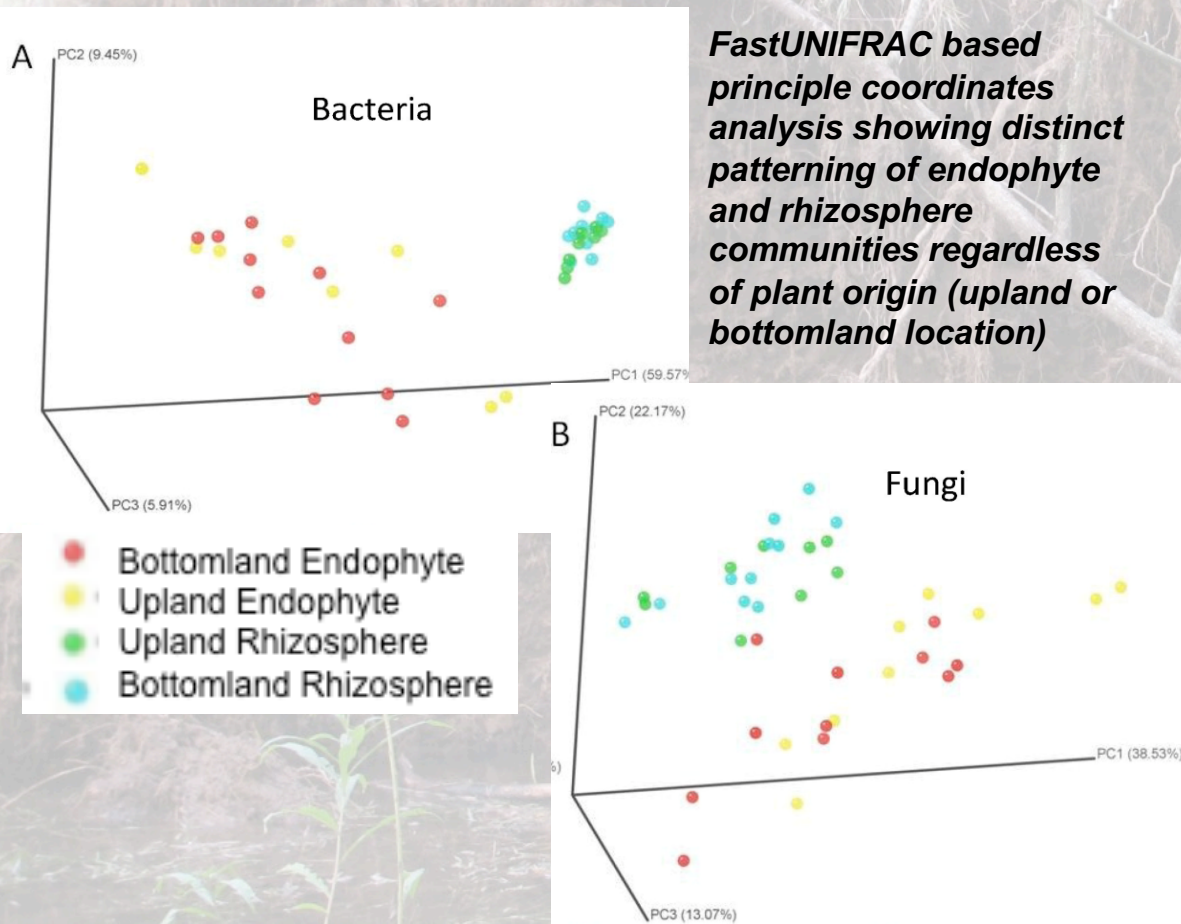


***Populus deltoides* harbors distinct microbial communities within the endosphere and rhizosphere**

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• The root-rhizosphere interface is the nexus of a variety of associations between bacteria, fungi and the host plant and is critical to the health and sustainability of the plant and its ecosystem. *Populus* spp. provide an ideal model for understanding these interactions.



• We undertook the first comprehensive molecular survey of *Populus* associated microbes in a natural system to explore the diversity and composition of both bacterial and fungal root endophyte and rhizosphere communities.

• Our findings demonstrate that native root endophytic communities are variable, but distinct assemblages rather than opportunistic subsets of the rhizosphere

Gottel, NR, HF Castro, M Kerley, ZK Yang, DA Pelletier, M Podar, T Karpinets E Uberbacher, GA Tuskan, R Vilgalys, MJ Doktycz, CW Schadt. (2011). *Populus deltoides* roots harbor distinct microbial communities within the endosphere and rhizosphere across contrasting soil types. *Appl. Environ. Microbiol.*, In Press