Current Research Objectives

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Research topic: Psyllid Microbiology

Primary Research Objective(s):
1) Understanding the interactions between psyllids and associated microorganisms, including the citrus greening pathogen, Candidatus Liberibacter asiaticus (Las).
2) Develop new technologies to disrupt Las transmission.

Research Goal: Reduce Las transmission in citrus using antimicrobial agents, antisense technologies, and manipulation of psyllid microbiota.

Outcomes to date: We have learned that antimicrobials used to reduce Las may also target bacteria in the psyllid (symbionts), which can reduce survival of psyllids and Las transmission. We have developed antisense molecules can be used to specifically target and disrupt symbionts and Las. In light of insecticide resistance, the technologies we are developing will be useful for preventing HLB and reducing transmission.

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