



# Florida Citrus Advanced Technology Program

QUARTERLY & FINAL REPORTS: Control of Citrus Greening, Canker & Emerging Diseases of Citrus

**Instructions** Complete the fields based on your project specs. When finished, save the form to your local disk using a unique name. Then, go to <http://research.fcprac.com>, and log in with your user name and password using Researcher Login in the lower left. Find this project title and click on **Submit a Report**. Update your profile information if needed, then upload this report as directed.

2009-2010 REPORT		CATEGORY (drop-down)	TODAY'S DATE (m/d/yr)
<input checked="" type="radio"/> <i>Quarterly Report</i> <input type="radio"/> <i>Annual Report</i> <input type="radio"/> <i>Final</i>		Other	1/15/11
<b>WHAT IS THE "HEADLINE" FOR THIS REPORT</b> (e.g. a one-sentence "newspaper headline" describing what you accomplished)			
Recovering of Citrus germplasm from Florida			
<b>TITLE and CONTACT INFORMATION</b>			
<i>Proposal Title</i> Recovery of Citrus Germplasm from Florida			
<i>Principal Investigator</i> Richard Lee		<i>PI Last Name</i> LEE	
<i>Email</i> Richard.Lee@ars.usda.gov		<i>FDACS Contract Number</i> Lee-119	
<i>Phone</i> 951-827-4399		<i>Project Duration (years)</i> 3 <i>Year of Project</i> 2	
<i>Organization</i> USDA ARS NCGRCD, Riverside		<i>Total Direct Funds (current year)</i> \$36,970.00	
<b>REPORT UPDATE</b> (650 words; provide details about your headline)			
<p>The purpose of this project is to preserve citrus germplasm in Florida that is threatened by loss due to huanglongbing (HLB) and citrus canker. Using input from stakeholders and scientists, a priority list has been made of citrus germplasm in Florida which need to be recovered. At Ft. Pierce, over 50 unique accessions collected from around the world for the citrus breeding program and believed to be present only in the USDA ARS citrus breeding program have been propagated in a secure greenhouse and are being used for therapy for recovery. Several accessions have been received by the USDA ARS Repository, Riverside, CA and are in final stages of therapy/indexing for release from quarantine. Support from this project this year will be going to the Co-PIs in the Florida Germplasm Introduction Program and the USDA ARS, Ft. Pierce to help expedite the therapy of the germplasm. The USDA ARS Repository, from other sources of funds, has been able to purchase two growth chambers for thermotherapy use, a better microscope for shoot tip grafting, and to upgrade the greenhouse cooling/heating system to better extend the time period in which cool temperature biological indexing may be performed. This will improve the ability to perform the required biological indexes for release from quarantine following preliminary therapy of the targeted accession in Florida. Research is continuing on the use of antibiotics and/or cool temperature treatments to eliminate HLB from budwood, with citrus stubborn and tomato psyllid yellows being used and model systems in California and HLB in Florida. In cooperation with USDA ARS, Ft. Collins, CO, the use of cryotherapy to eliminate HLB is being explored.</p>			