

CITRUS RESEARCH AND DEVELOPMENT FOUNDATION, INC.
Commercial Product Delivery Committee
Meeting Minutes
December 7, 2015

A meeting of the Commercial Product Delivery Committee of the Citrus Research and Development Foundation, Inc. was held on Monday, December 7, 2015 in Ben Hill Griffin Hall at the UF-IFAS, CREC, in Lake Alfred, Florida. The meeting was properly noticed and recorded. The meeting was called to order at 1:30 pm by Chairman Ben McLean. Roll was called and a quorum was present. Committee members participating were: Dr. Timothy L. Anglea; Mr. Larry Black; Mr. Joe L. Davis, Jr.; Mr. David Howard; Mr. Ricke Kress; Mr. Ben McLean; Mr. Jerry Newlin (telephone); Mr. Andy Rackley (telephone); Ms. Shannon Shepp (telephone); Mr. Tom Stopyra and Mr. Hugh W. Thompson (telephone). Committee members Dr. Jackie Burns and Mr. Peter McClure did not participate. Other participants were: Mr. Dan Botts; Dr. Harold Browning; Dr. Stephanie Slinski; Dr. James Syvertsen; and Dr. Tom Turpen.

Others attending the meeting included Dr. Lisa Conti (telephone), Dr. Jim Dukowitz (telephone); Ms. Sharon Garrett; Ms. Brandi Goller, Mr. Travis Joseph, Mr. Brian Kelley, Ms. Sandra Kelley, Ms. Mariana Mansur, Ms. Anita Martens, Mr. Laurent Martens, Ms. Audrey Nowicki, Mr. Brandon Page, Ms. Wendy Rincon, Dr. Brian Scully, and Dr. Rosa Walsh.

Mr. Kress moved to accept the minutes of the October 20, 2015 meeting. The motion was seconded by Mr. Howard and passed unanimously.

Ms. Goller introduced Ms. Mariana Mansur, recently hired to fill the Program Assistant position.

The Project Managers reviewed highlights of the quarterly report included with the meeting materials.

Mr. Botts reported on the status of the Section 18 application.

Dr. Syvertsen reported on the Rootstocks Field Day held at three Duda Grove sites on November 10th. He also reported on the Thermal Therapy Field Day demonstrations to at least sixty growers held December 3rd at Wheeler Grove sites in Lake Wales. Ongoing trials will determine the ideal temperature and length of treatment as well as influences on tree health and yields. These recommendations will differ with each manufacturer. Premier Energy representatives attended the Board meeting; Mr. Black thanked Premier for attending and for their motivation in scaling up production of thermal therapy equipment.

Dr. Turpen presented initial information on RNAi and Psyllid Shield, noting that the committee will have to work through and discuss the various options available to take in developing RNAi. RNAi can be delivered in three ways: direct spray, transgenic trees, or through CTV vectors. Evaluation by Dr. Dawson, UF, has narrowed candidates to five. The committee questioned whether to direct Dr. Turpen to continue working on a proposal to pursue further since a considerable amount of time will have to be devoted to it. Dr. Turpen provided an overview of the planning to date. A Phase I small-scale field trial is proposed to demonstrate efficacy on small trees, replicating what has been observed in greenhouse tests. Phase 2 would follow for 3-5 years to

evaluate area-wide effects and would and require a dedicated project manager due to the complexity of the trial.

Mr. Howard questioned if data from this potential small-scale trial would produce data adequate to plan the full-scale trial. Mr. Kress indicated what is learned from the initial phases would be the basis for additional steps in the future. Two breakthroughs would be to (1) identify the best candidate and (2) delivery to the plant phloem/tree. Delivery of these solutions will require full USDA and regulatory approval. It was noted that this technology will not help infected trees, as it interferes with ACP populations, but will reduce rates of infection of healthy trees.

The committee requested that efficacy data from the Dawson and Shatter labs should be shared with the committee.

With the amount of effort it would take to complete the proposal, Mr. Black questioned if the Scientific Advisory Board could assist the committee in evaluating this mid-to-long term project with a timeline of up to ten years. Other points of discussion were that the project is high risk, and the regulatory obstacles are undefined at this point.

Mr. Botts confirmed that there are companies waiting to develop their products along these lines but there is no regulatory pathway to follow at this time.

Southern Gardens is the licensee of the CTV vector, which is a component of going forward with a field trial of RNAi in field trees.

Mr. Howard made a motion to direct staff to further develop the proposal for a CTV RNAi field trial. The motion was seconded by Mr. Black. Further discussion indicated it would be February until the complete packet can be compiled. In addition, a potential commercial partner should be identified since Southern Gardens is currently the licensee of the CTV vector. The motion passed with seven favorable votes and one negative vote by Mr. Davis. Mr. Kress abstained.

Dr. Browning presented a request for \$15,194.00 in supplemental support on Project 15-030C for testing and data collection of fruit quality samples from eleven field trials. Mr. Kress moved to recommend the additional support of Project 15-030 in the amount of \$15,194. The motion was seconded by Mr. Black and passed unanimously.

The quarterly Progress Report on CPDC projects was included in the materials, and will be posted to the CRDF webpage following the meeting. Questions and comments were invited.

Dr. Browning presented an outline of the next steps resulting from the Knowledge Mapping session on HLB Tolerance or Resistance, including the implementation of a side-by-side field trial evaluation process to identify the best candidates, nominations for a candidate selection committee to be approved by the CPDC in January, and development of a proposal for field plans for presentation in February. Mr. Kress made a motion that Staff proceed with the process and nominations for the candidate selection committee, and a proposal for funding the field plans. Seconded by Mr. Black, the motion passed unanimously.

Dr. Browning informed the committee that Dr. Brian Scully, Center Director of the USDA-ARS Fort Pierce Laboratory, is willing to serve on the Commercial Product Development Committee. Mr. Kress made a motion to appoint Dr. Scully as a member of the committee. The motion was seconded by Mr. Black and passed unanimously.

Dr. Browning stated the two Project Manager positions are in process in UF, and CRDF is awaiting approval to advertise and fill the position this quarter.

New Business: Mr. Newlin discussed his conversation with Dr. Michael Rogers regarding kaolin, where he noted that one shade of red repelled psyllids more dramatically than any of the other colors. Dr. Browning indicated he would discuss with Dr. Rogers or the manufacturer to determine if further research is warranted on this.

The committee revisited the earlier motion on the Knowledge Mapping follow up plans made after conference call timed out, to be certain of a quorum. Mr. Black moved for approval for staff to further explore the Knowledge Mapping outline and to proceed with details of the process and nominations for the HLB Resistant/Tolerant Rootstock candidate selection committee, and to develop a proposal to fund the field plans outlined in his presentation. Seconded by Mr. Kress, the motion passed unanimously.

Dr. Browning said the committee will be polled for a January meeting prior to the Annual Board meeting.

With no further business, the meeting was adjourned at 4:25 pm.

Minutes submitted by Audrey Nowicki