

## California Walnut Board

101 Parkshore Drive, Suite 250  
Folsom, CA 95630-4726  
(916) 932-7070  
(916) 932-7071 Fax  
info@walnuts.org  
*An Equal Opportunity Employer and Provider*



# CALIFORNIA WALNUT BOARD

## RESEARCH COMMITTEE MEETING MINUTES March 6, 2012

The CWB Research Committee held a meeting on Tuesday, March 6, 2012 at the California Farm Bureau Federation in Sacramento, CA. Chairperson Jerry Moore called the committee meeting to order at 10:03 a.m. Ms. Steindorf called the roll and a quorum was established. The following committee members were present:

Jerry Moore, Chairperson  
Bob Driver, Vice-Chairperson  
David Keyawa  
Bert Crane (arrived at 11:15 a.m.)  
Lynn Morgan  
Todd Ramos  
Bill Tos

Also present were Dr. David Ramos, CWB Research Director; and CWB staff members Dennis Balint and Dana Steindorf.

The first order of business was the approval of the meeting minutes from January 27, 2012. Mr. Todd Ramos made a motion to approve the minutes as mailed. Ms. Morgan seconded the motion and it carried unanimously.

Chairperson Moore moved on to the next agenda item, Report of the February 27, 2012, PRAC Working Group Chairs Meeting. Dr. Ramos stated that he and Chairperson Moore met with the working group chairs at UC Davis to follow up on the direction of the Committee that the Research Director meet with the chairs to help evaluate projects and discuss the general coordination and synergies of their discipline. The Committee had further suggested that three grower or industry leaders be part of PRAC with a self-appointed chair.

Dr. Ramos stated that some of the ideas that were suggested at the meeting included restructuring the main PRAC membership since several of the current members are non-active participants, a new make-up of the working groups to include co-chairs for each group, Bruce Lampinen as UC liaison for walnuts, and eliminate the UCRAC advisory committee and use only PRAC. Dr. Ramos asked if the Committee thinks there should be additional members of the working groups appointed, or just have the chairs and co-chairs appointed by this Committee. Mr. Driver stated that we need to keep PRAC tight with less bureaucracy.

Chairperson Moore stated that at the meeting with Dr. Ramos and the working group chairs, they came up with suggestions for the co-chairs: Entomology Chair is Joe Grant, suggested Steve Wulfert as co-chair; Orchard Management Chair is Rick Buchner, suggested Brent Barton as co-chair; Genetic

Improvement Chair is Janine Hasey and she already has Bill Carriere as co-chair; and Plant Pathology Chair is Dan Kluepfel, suggested Tom Burchell as co-chair.

The Committee discussed whether having a PCA (Steve Wulfert) as a working group co-chair is a good idea. Mr. Driver commented that PCA are a more vital contact point for growers than farm advisors. Mr. Balint expressed his concern that we would be introducing two new fields of interest to the working groups – nursery and PCA. Mr. Driver stated that it makes sense to include nurseries, especially in the areas of plant propagation and genetics. Mr. Tos commented that there is a difference between including people on committees, or inviting them as a guest to talk, versus appointing them as a co-chair; we may be sending them a signal that we are expecting them to play a larger role. Dr. Ramos stated that at the discussion at the meeting a week ago, it was clear that having an industry-type co-chair was very important to the working group chairs. He also commented that Steve Wulfert and Tom Burchell are not ordinary PCAs and nurserymen in relation to PRAC; Mr. Wulfert has been very involved in the industry, driving the implementation of the mating disruption trials. Mr. Balint stated that the reason for the co-chair concept was to have someone with interest at the meeting and be engaged; he believes that those people will be at the meeting anyway, so appointing them co-chair and giving them a title is not necessary.

Dr. Ramos commented that the original concept was that co-chairs of PRAC working groups would make up PRAC. He believes it is important for those industry representatives from each working group participate in PRAC even if it takes co-chairmanship to give them that designation. The PRAC working group chairs would argue that the additional dimension to the working group is important. Mr. Driver stated that he would not argue with the structure since it seems to work for the current Genetic Improvement working group with the relationship between the chair, Janine Hasey, and the co-chair, Bill Carriere.

Dr. Ramos asked the Committee to review the flow chart that Joe Grant has developed. On the flow chart, the Committee will see that the PRAC will review proposals before they go to Committee level (replacing the UCRAC). The working group chairs feel it is important to have industry people involved in PRAC. Mr. Balint stated that the CWB rules for appointing committees dictate that the people come from the CWB or CWC memberships. Dr. Ramos stated that, following the Committee's recommendation, PRAC will take the role that the UCRAC, under the management of Bruce Lampinen, has been doing for years – reviewing proposals and make recommendations after the Walnut Research Conference. Chairperson Moore commented that the consensus at the recent meeting from the working group chairs is that they want co-chairs who are not from the Research Committee. The Committee then discussed the comparison between the PRAC and the CWC's Scientific Advisory Council; Mr. Driver commented that the difference between the PRAC and the SAC is that the SAC is made up of researchers from all over the world, whereas the PRAC is made up of UC people. He believes it would be better balanced for the PRAC working groups to include a grower or industry member as co-chair.

Mr. Tos made a motion that the Committee adopt the concept of PRAC having a total of nine members with two co-chairs for each working group plus Bruce Lampinen. The two co-chairs for each working group shall be a UC member/researcher and a walnut grower. The Committee shall give Chairperson Moore the authority to appoint the grower co-chairs of the working groups. Ms. Morgan seconded the motion and it carried unanimously.

The next item on the agenda was Status Report: Walnut Breeding Program and Geneticist/Breeder Position. Dr. Ramos stated that the breeding program recently underwent its five-year review and the program is in better shape than it was several years ago, which he believes can be attributed to Chuck Leslie. The internal review committee found that the biggest problem Mr. Leslie faces is being able to prioritize; so far he is keeping the program manageable. Dr. Kluepfel, a member of the review committee is going to set up a working group for the rootstock program which will relieve Mr. Leslie of that responsibility. Also, the review committee believes it is essential that we get a department faculty academic leader for the program; Mr. Leslie needs someone at that level to give him support with budgeting, managing personnel, and departmental affairs that relate to the program.

Dr. Ramos commented that when Gale McGranahan stepped down, UC was paying her full salary; when she left, that academic position was eliminated. Mr. Leslie's salary is paid for totally by the industry which will not change. However, it is critical that we get someone at a higher scientific level of

expertise and is a faculty member who will oversee, direct and coordinate the program. The Plant Sciences department is the largest at the college; the dean has indicated that over the next 3-5 years, he will give the department ten positions and has already allocated three positions in the past few months.

The Committee discussed the breeding program endowment that the CWB started in 1995 and what those funds go towards. Dr. Ramos explained that the Federal and States marketing orders have an exemption for commodity groups to not pay overhead to UC for their contributions to research. This is unheard of for other agencies that conduct research through UC; most have to pay around 40% overhead. One-hundred percent of the money that the CWB contributes goes to the scientists.

Dr. Ramos commented that the breeding program endowment is one of the most important things this industry has ever done; Mr. Leslie has told him that it encouraged him to accept a career appointment in a non-secure position. Dr. Ramos suggested, now that this industry is healthy, that the Committee could send a signal of commitment to the UC department chair by upping the amount of the endowment. The Committee discussed how much to add to the endowment and over what period of time (all at once or over a number of years). The original endowment of \$1 million was funded over five years. The Committee discussed an accelerated payment plan of 2-4 years, depending on the consideration of the Budget & Personnel Committee.

After further discussion, Mr. Tos made a motion to add \$1,000,000 to the endowment (for a total endowment of \$2,000,000) with funding over two years, but no more than four years. The Committee directed the Executive Director to present this to the Budget & Personnel Committee for consideration at their May 1, 2012 meeting. The Committee also recommends no substantive changes to the endowment. Ms. Morgan seconded the motion and it carried unanimously.

The next agenda item was Continuity of Extension Service Positions. Dr. Ramos commented that there are continuing questions about how we stack up in terms of the farm advisor and extension specialist ranks. He has had some informal meetings with his counterparts in the almond and pistachio industries to share thoughts about the critical positions to each of them. Most of the farm advisors have overlap in crop responsibilities, especially between the walnut and almond crops. Dr. Ramos stated that if there are places where the industries share the priorities for a position that is vacant, we may have a little more leverage. He distributed a spreadsheet showing the geographic locations of several farm advisors and specialists along with the time frames anticipated until retirement. The Committee discussed some of the local walnut farm advisors and concerns over the pending retirements/vacancies; Dr. Ramos mentioned the possibility of assigning interns to shadow the farm advisors to develop interest in the positions.

Chairperson Moore asked Dr. Ramos to begin discussion about the next agenda item, Review and Decisions of FY 2011/2012 Research Proposals. Dr. Ramos stated that the Committee, at earlier meetings, approved projects totaling \$286,009. The total budget available for 2011/2012 is \$1,036,000; the remainder available to be allocated is \$749,991. Dr. Ramos distributed the recommendations and comments from the RAC committee and a document listing his own funding recommendations for the Committee based on research needs and priorities. His funding recommendations total \$749,701, within the amount still to be allocated.

The Committee then went through each project and made funding recommendations as follows:

		<b><u>Budget Request:</u></b>
<b><u>PLANT PATHOLOGY/NEMATODOLOGY</u></b>		
<b>1.</b>	<b>Epidemiology and Management of Walnut Blight – 12 CWB 1</b>	
	Adaskaveg (Renewal 1 of 4)	53,500

The Committee approved this project at the budget amount requested.

2. **Walnut Blight Control Using Integrated Pest Management Techniques – 11 CWB 10**  
 Buchner (Continuing 2 of 2) 15,865

Based on the recommendation from Dr. Ramos, the Committee approved this project at a reduced budget amount of \$13,865.

3. **Managing Anthracnose Blight and Botryosphaeria and Phomopsis Cankers in Walnut and Interaction with Walnut Scale – 12 CWB 2**  
 Michailides (New 1 of 3) 43,860

The Committee approved this project at a reduced budget amount of \$39,000 as recommended by Dr. Ramos.

4. **Studies on Thousand Cankers Disease of Walnut in California – 12 CWB 3**  
 Bostock/Seybold (New 1 of 2) 41,204

The Committee did not fund this project.

5. **Etiology and Management of Crown and Root Rots of Walnut – 11 CWB 6**  
 Browne (Continuing 2 of 4) 23,500

The Committee previously approved this project as part of the USDA-SCRI rootstock proposal.

6. **Generation and Evaluation of Juglans microcarpa Hybrids and Paradox Rootstock Selections for Crown Gall Resistance – 11 CWB 7**  
 Kluepfel (Continuing 2 of 4) 27,000

The Committee previously approved this project as part of the USDA-SCRI rootstock proposal.

7. **Genomic and Horticultural Approaches to Manage Blackline Disease in Walnuts – 11 CWB 8**  
 Sudarshana/Rowhani (Continuing 2 of 4) 25,000

The Committee agreed to fund this project.

8. **Methyl Bromide Alternatives – 11 CWB 9**  
 McKenry (Continuing 2 of 2) 24,000

The Committee previously approved this project as part of the USDA-SCRI rootstock proposal.

**GENETIC IMPROVEMENT**

9. **Walnut Improvement Program – 92 WMB 2**  
 Leslie (Ongoing with Review) 297,235

The Committee agreed to fund this project.

- 10. Structural and Functional Analysis of Walnut Phenolics – 12 CWB 4**  
 Dandekar (New 1 of 3) 68,904

The Committee did not fund this project.

- 11. Regeneration Systems for Pyramiding Disease Resistance into Walnut Rootstocks – 11 CWB 3**  
 Dandekar/Preece/Tricoli (Continuing 2 of 4) 64,000

The Committee previously approved this project as part of the USDA-SCRI rootstock proposal.

- 12. Crown Gall Resistant Walnut Rootstocks: Analysis of the Graft Union for Transmission of Genetic and Biological Materials – 11 CWB 4**  
 Dandekar/Tricoli (Continuing 2 of 2) 60,404

The Committee previously approved this project at their September 12, 2011 meeting.

- 13. Clonal Propagation of Walnut Rootstock Genotypes for Genetic Improvement – 11 CWB 5**  
 Leslie/Preece (Continuing 2 of 4) 79,228

The Committee previously approved this project as part of the USDA-SCRI rootstock proposal.

**ORCHARD MANAGEMENT**

- 14. Local Applied Walnut Research and Extension Activities – 11 CWB 15**  
 Kelley Anderson (Ongoing with Review) 18,000

Dr. Ramos explained that this project provides support directly to six walnut farm advisors throughout the state. The Committee agreed to fund this project.

- 15. Walnut Orchard Management: Pilot Projects, Field Testing, Adaptive Research and Problem Solving by CE Farm Advisors and Specialists – 92 WMB 1**  
 Lampinen (Ongoing with Review) 47,007

The Committee agreed to fund this project.

- 16. Refining the Relationship between Canopy Light Interception and Yield in Walnut – 09 CWB 1**  
 Lampinen (Continuing 4 of 4) 34,033

The Committee agreed to fund this project.

- 17. Root Growth Dynamics and Constraints on Aboveground Growth and Yield of Walnuts – 11 CWB 14**  
 Lampinen (Continuing 2 of 3) 42,707

The Committee agreed to fund this project.

- 18. Evaluation of New Herbicides for control of Glyphosate-Resistant Weeds in Young Walnut Orchards – 12 CWB 5**  
 Hanson (New 1 of 1) 20,141

The Committee did not fund this project.

**ENTOMOLOGY**

- 19. Biology and Control of Walnut Husk Fly Using Reduced Risk Products – 12 CWB 6**  
 Van Steenwyck (New 1 of 3) 40,104

The Committee agreed to fund this project.

- 20. Pheromone-Based Codling Moth and Navel Orangeworm Management in Walnuts – 10 CWB 2**  
 Pickel/Grant (Continuing 3 of 3) 38,000

The Committee agreed to fund this project.

- 21. Reducing Program Costs and Increasing Efficacy of Pheromone Mating Disruption of Codling Moth in Walnuts – 12 CWB 7**  
 Welter (Renewal 1 of 1) 49,400

The Committee agreed to fund this project.

- 22. Navel Orangeworm in Southern Central Valley Walnuts: Source, Seasonal Abundance, and Impact of Mating Disruption – 12 CWB 8**  
 Burks (New 1 of 3) 30,000

The Committee agreed to fund this project.

- 23. Selective Pesticides and Biological Control in Walnut Pest Management – 11 CWB 20**  
 Mills (Continuing 2 of 3) 21,850

The Committee agreed to fund this project.

- 24. Maintaining UCIPM Pest Management Guidelines for Walnuts – 12 CWB 9**  
 Kassim (New 1 of 5) 4,121

The Committee did not fund this project.

The Committee then discussed timelines for project results, especially in the genetic improvement projects. Dr. Ramos suggested that the three key genomics researchers get together with the Committee and give a progress report. After the Committee finds out where the researchers are in the timeline, we can conduct a handler survey to determine the traits that they would like to see in new varieties. The Committee agreed that such a meeting would be useful and tentatively scheduled it for June.

Mr. Driver made a motion to approve the following projects at the budget amounts requested unless otherwise noted: #1, 2 (at \$13,865), 3 (at \$39,000), 7, 9, 14, 15, 16, 17, 19, 20, 21, 22 and 23 for a total of \$749,701. Projects #5, 6, 8, 11, 12, and 13 were also approved at earlier meetings for a total of

\$286,009. The total budget amount of all projects and consulting contracts approved by the Committee for 2011/2012 came to \$1,035,710. Mr. Tos seconded the motion and it carried unanimously.

The next item on the agenda was the Recommendation to the Board for Research Funding for 2012/2013. The Committee discussed the current research budget and projections for the coming year. Mr. Balint stated that the endowment and the research budget for projects will be listed as two separate line items on the Board budget.

Ms. Morgan made a motion to recommend to the Budget & Personnel Committee a 2012/2013 research budget of \$1,100,000. Mr. Driver seconded the motion and the motion carried with one vote against.

The time and place of the next meeting will be at the discretion of the Chairperson and staff; Dr. Ramos stated that he would try to schedule a Committee meeting to include the genomics researchers, as discussed earlier, sometime after the crack-out which is in May. An executive session was not necessary. Hearing no further business, Chairperson Moore adjourned the meeting at 4:20 p.m.