



8045 East Chapman Ave. • Orange, CA 92869-4512
(714) 628-4900 • Fax: (714) 628-4723 • sccollege.edu

Orange Education Center
1465 N. Batavia Street • Orange, CA 92867-3504
(714) 628-5900 • Fax: (714) 628-5909 • sccollege.edu

What happens here matters.

2019-2020

**Master Technical Advisory Committee Meeting
February 21, 2020**

AGENDA

Networking & Breakfast 7:30 a.m. - 8:00 a.m.
General Session 8:00 a.m. – 8:30 a.m.
Breakouts by Discipline 8:30 a.m. - 10:00 a.m.

GENERAL SESSION PROGRAM

Welcome

- Elizabeth Arteaga, Interim Dean, Business & Career Education

College President

- John C. Hernandez, Ph.D., President

Strong Workforce Program/Perkins Briefing

- Job Placement/Development
- Internships
- Collaboration

Announcements:

- SCC Community Science Night, March 13, 2020
- SCC Golf Tournament-Oak Creek Golf Club, April 30, 2020

Breakouts by Discipline

- American Sign Language: E-304
- **Biotechnology: E-206**
- Code Enforcement: E-305
- Cosmetology: E-203
- Education: E-205
- Public Administration: E-306
- Public Works: E-203
- Water Utility Science: E-308
- Continuing Education (Non-Credit): E-203

PRESIDENT: John C. Hernandez, Ph.D.

RANCHO SANTIAGO COMMUNITY COLLEGE DISTRICT BOARD OF TRUSTEES: Claudia C. Alvarez • Arianna P. Barrios • John R. Hanna • Zeke Hernandez
Lawrence "Larry" R. Labrado • Nelida Mendoza • Phillip E. Yarbrough

CHANCELLOR: Marvin Martinez



OC Biotechnology Advisory Board Meeting Minutes

OCBE Regional Meeting
Santiago Canyon College

Friday, February 21, 2020
7:30 AM – 10:00 AM

Opening

The meeting was called to order at 8:30AM

OC Biotech Education Partnership Representatives

Faculty: Dr. Spiros Dimitratos, Dr. Denise Foley, Charles Jang, Emalee Mackenzie, Victor Pham, Dr. Kathy Takahashi, Dr. Jo Wen Wu
Staff: Danielle Alarid, Soraida Leal, Arturo Salazar, Jonaé Varela

Attendees:

David Bañuelas, Dr. Suzanne Bohlson, Evan Bonnand, Alexandra Ferreri, Claudio Gallegos, Raine Hambly, Chelcia Harrison-Brown, Dr. Richard Hartmann, Jocelin Jimenez, Dr. Wendie Johnston, Karin Koch, Sara Kong, Lorna Larson, Cody Mendoza, Leila Mozaffari, Cindy Noorani, Dr. Terri Quenzer, Dr. Ganesh Raman, Scott Reindl, Farah Shabazi, Laurie Smith, Angela Williams, Ashley Zaragoza

New Business

- I. **Introduction** - Dr. Denise Foley
 - a. Introduced all attendees to the OCBE Advisory Board meeting
 - b. All attendees gave an introduction, title, affiliation

- II. **Program Overview** - Dr. Spiros Dimitratos
 - a. OCBE has three stackable Certificates (Biotech Lab Skills, Biomanufacturing, Lab Technician) and AS
 - b. Question to the Board: **What do you consider the most important lab skills for your company?**
 - i. *Industry replies:* pipetting, bioreactors, upstream manufacturing, downstream manufacturing, safety/OSHA standards, lab documentation, lab equipment (GC, spectrometers, environmental testing)
 - ii. *Industry highest recommendations:* excellent work ethic, enthusiasm for the internship/job, large blocks of time (4 hours minimum per day) for internship/job

- III. **Skills Training** – Dr. Kathy Takahashi
 - a. OCBE teaches basic skills and advanced skills, including quality control, proteins, nucleic acids, and tissue culture techniques.
 - b. OCBE purchased specialized equipment, including DNA sequencer, automated plate pourer
 - c. Question to the Board: **How many students (max) would you recommend training at one time on complex equipment?**
 - i. *Industry replies:* Small group rotations with machines, data analysis and other relevant tasks; Virtual simulation models; training with old equipment.
 - ii. *Industry highest recommendations:*
 1. qPCR: 4 students maximum
 2. Tissue culture: 2 students is ideal per 4 foot hoods, with 3 maximum.

- IV. **Enrollment Pipeline** – Dr. Jo Wu
- a. Biotechnology dual enrollment classes are taught at 10 local high schools
 - b. Manufacturing supply chain project reaches 50 schools, 80 teachers, 8000 students per year
 - i. Biotech lab course learns manufacturing, troubleshooting, quality control
 - ii. Middle schools and high schools gain access to free lab reagents and equipment
- V. **Student Outcomes** – Dr. Jo Wu
- a. OCBE students work and transfer to Mira Costa College and many 4-year universities
 - b. Question to the Board: **What makes a candidate stand out for employment?**
 - i. *Industry replies:* Strong work ethic, ability to listen and learn, understanding industry vocabulary, functional ability to operate equipment, HPLC experience, bioreactor experience, GMP, SOP, GCMS, aseptic technique, better job seeking and interview skills
 - ii. *Industry highest recommendations:* Knowledge of lab vocabulary, excitement about job, interview skills
- VI. **Internships and Job Placement** – Jonaé Varela
- a. Sixty-nine OCBE students have been placed in internship or job opportunities, with 80% in academia and 20% in industry-related positions.
 - b. OCBE Industry contact: Jonaé Varela, Phone: 714-564-6659, Email: varela_jonae@sac.edu
 - c. Question to the Board: **How can we create a better platform for industry-internship partnerships?**
 - i. *Industry replies:* summer internships are best for students since they usually have more time, larger blocks of time 4 hrs+ for any given day, more accommodating college class times to fit industry needs, having interns start in summer and continue into the fall semester to get familiar with facility, explain internship benefit to company, work with local agencies that have established partnerships to build a pipeline for internship/job placement in biotech industry
 - ii. *Industry highest recommendations:* Improvement in students' job-seeking skills - including professional emails, resume, cover letter, individual interview, and panel interview. Industry representative commented that they have received unprofessional resumes, cover letters, and emails from community college students indicating the need to better prepare students for this key step in job and internship placement.
 - iii. Resolution: Our OCBE Job Developer will continue to work with our population of biotech students to ensure adequate preparation for applications and interviews.
- VII. **Partnerships** – Emalee Mackenzie
- a. Question to the Board: **How can your company become engaged in our partnerships?**
 - i. *Industry replies:* industry tours could be an option to see a “day in the life” of a staff member, faculty trainings at local biotech companies to learn new techniques, skype/zoom meeting with industry staff member, phone call meetings, partnering with staffing agencies, and partnering with established government funded agencies that are paying the company to host an intern (with up to 50% reimbursement to host company)
 - ii. *Industry highest recommendations:* Work with local agencies to create connections and pipelines for internship and employment.
- VIII. Conclusion
- a. Dr. Jo Wen Wu concluded the meeting by thanking everyone for attendance, support and valuable input.

Closing

The meeting ended at 9:52 AM.