

**EOPD-210 and NCAC16 Meeting**  
**January 30, 2023 8:30 AM**  
**Houston, TX**

Attendees: David Jones (U NE), Garey Fox (NC state), Katie Miglaccio (U FL), Mike Montross (U KY), Mari Chinn (OK State), Patti Smith (TX A&M), Lindsay Anderson (Cornell), Lalit Verma (U AR), Mark Wilkins (KS State U), Oladrian Fasina (Auburn), Hua Zhao (U MN), Troy Runge (U WI), Fadi Fathallah (UC Davis), Nate Mosier (Purdue) Leon Schumacher (ND State), Muthu Muthukumarappan (SD State), Alex Thomasson (MS State), Bill Tollner (U GA), Julie Carrier (U TN), Scott Shearer (OH State), Peter Livingston (Cal Poly), Brad Marks (MI State U), Amy Kalita (IA State U), Viacheslav Adamchuk (McGill)

**Meeting started at 8:40 am**

1- Approval of minutes for the EOPD-210 meeting in Houston on 7/18/2022  
 Garey Fox proposed, Lalit Verma seconded. Motion passed unanimously.

2- Multistate project review  
**Review Assignments:**

Current Proj # (Temp #)	Renewal or Midterm (R/M)	Title	Project/Proposal Homepage (Ctrl+Click to follow link)	Reviewers
NC1213	M	Sources and fate of ammonia across the landscape	<a href="https://www.nimss.org/projects/18780">https://www.nimss.org/projects/18780</a>	Julie Carrier Ronaldo Maghirang
NC1023	M	Engineering for food safety and quality	<a href="https://www.nimss.org/projects/18685">https://www.nimss.org/projects/18685</a>	Nathan Mosier Mark Wilkins
NC1210	M	Frontiers in On-Farm Experimentation	<a href="https://www.nimss.org/projects/18712">https://www.nimss.org/projects/18712</a>	Scott Shearer Patti Smith
NCERA197	M	Agricultural Safety and Health Research	<a href="https://www.nimss.org/projects/18703">https://www.nimss.org/projects/18703</a>	Katie Miglaccio Fadi Fathallah
S-1075	R	Science&Engineering for Biobased Economy		David Jones Lindsay Anderson

Reviewers will enter in NIMSS their comments before February 15, 2023.

General comments – some of the projects have very good leadership from the administrative advisors, however there is inconsistency in how the administrative advisors are providing guidance to projects and chairs of the projects. There is a need to provide consistent communication within the group and have more top down leadership.

Recommend that next meeting be held in Washington with USDA and other granting agencies. Or maybe coordinate our meeting with associate deans of research. Follow up with Hongda Chen or Steve Thomasson. It would be very beneficial to work with USDA regarding the multi-state projects.

### 3- Costa Rica Meeting

David Jones gave an account of the Costa Rica meeting that was held last October Energy resilience and sustainability, which was organized by ASABE. Travel was difficult for many as it was in the middle of the semester. Remote access was very good. The local partner was very important to success of meeting. Our peer institutions in Latin America would like more ways to partner with US institutions. One avenue could be to invite Latin America (and other geographical locations) institutions to EOPD-210 meeting, both at annual meeting and during winter. Participants were interested in student mobility between institutions. There is a need for more formal ties with other international partners, for example from previously ASABE-organized conferences in Africa and India.

David Jones made motion to develop a mechanism and advocate to ASABE to invite global partners/academic leaders to all EOPD-210 meetings, Mark Wilkins second. Discussion methods to improve CBS, African mechanization, industry partners. There are numerous other organizations that we could work with (example CGIR, EuroAgEng. NSF and other groups working on proposal related to research coordination). The Modernization of African Agriculture Conference in October 2023 may be a good opportunity to work with African academic leaders. A possibility could be to hold a global engagement meeting in conjunction with the African conference. Having a project manager that would help with international opportunities and bring in other societies would be a mechanism. It was noticed that the new ASABE Engage platform only works with ASABE members.

Discussion on inviting partners outside of ASABE to EOPD-210. Renewing partnership with EuroAgEng. Follow up with Darrin Dollinger to figure out mechanics. Will pursue action to invite academic leaders across globe.

Action step – Do we have virtual option at ASABE Annual Meeting (AIM), other meetings not a concern, have other option besides use of the Engage platform. We must find a way to let non ASABE members join EOPD-210. Motion passed unanimously.

#### 4-ASABE President

Keith Tinsley, President of ASABE by Zoom. He discussed the quality of programs. He thinks that ASABE is heading in a good direction, but he needs to work on revenue model of society, as dues have shrunk; if there is a poor attendance at annual meeting this results in weak finances. Need to work on revenue sources with development opportunities. How to improve engagement with faculty in our department. Sponsorship of CBS (Circular Bioeconomy Systems) day.

#### 5-Ecological Engineering

David Jones – ecological engineering accreditation American Ecological Engineering Society (AEES) wants ABET program criteria. AEES is not part of ABET and would like to partner with ASABE (EOPD-204) and American Academy of Environmental Engineers and Scientists (AEES). Working on PEV selection. Earliest is 2024-2025 evaluation cycle. Have opportunity to have additional voices in the discussion. Multiple groups yet to oversee. American Society of Civil Engineering (ASCE) is not heavily involved. Six to 12 programs are interested in creating ecological engineering degrees/programs/concentrations. Each university will need to work within the cadre of their existing civil/environmental degrees/programs/concentrations. Discussion of biological engineering criteria would cover ecological engineering. For example, ecological engineering could be just a concentration within biological. Some concern this could be started and then split off from ASABE centric departments. A discussion as to how to navigate the on-boarding of ecological engineering with ASCE.

#### 6-Student Rally Leadership Networking Program

Julie Carrier – A pathway to increase ASABE membership and attendance at AIM is to link the regional student rallies together and to provide a bridge for AIM attendance. ASABE Initiative Funds in 2021 and 2022 were given to facilitate travel from CA/NV, Midwest and SEC student leadership to AIM; this was done in hope of capturing enthusiasm from rallies to carry over to AIM. The long-term goal is to have all five districts hold meetings and have them meet at AIM. In 2021, through ASABE Initiative Funds, CA/NV and Midwest student leadership attended the 2022 SEC Student Rally that was held at VA Tech; then CA/NV, Midwest and SEC student leadership attended AIM in Houston. This was a success as CA/NV, Midwest and SEC student leadership discovered the importance of AIM. However, we cannot draw indefinitely on ASABE Initiative Funds, we must find funding mechanisms to help fledgling student groups and student leaders to AIM.

Carrier motion to send two student leaders to the preceeding AIM meeting when they are hosting rally the following year based on funding and student availability. Katie seconded. Vote, all in favor

Need to keep focus on ASM and regional differences – OK go to FL? Would also be good to have business meeting virtually. Other ways to engage students, problems with internships.

#### 7-Survey on Student Voting

David Jones – should students be allowed to be voting members? Failed previously a new survey is going out from ASABE in February. Going to non-student members. Change the survey that is

was very close and we would like to understand the needs and feelings of the society. Does the survey need list abstain?

#### 8-Garey Fox – journal update

Need to find person to serve on editor in chief oversight committee. Garey term over in 2 years. Starting to plan transition. 50 days is the average review time. Current acceptance ratio 50%. About 500 manuscripts submitted per year. Machinery Systems had the most manuscript submissions. The name of the new access ASABE journal is *Journal of Natural Resources and Agricultural Ecosystems*, which has a flat open access charge of \$2100. Would like journal to have an impact factor in 2-3 range.

Some notes of discussion: Some programs do not view MDPI journals in high regard; ASABE reviewer certification CPD will be held in AIM again; and free ASABE literature review service, focused on most recent articles.

#### 9-Department Updates

MI State U – enrollment issues, freshmen class back to pre-pandemic, due to in person recruiting. Dean search for Ag, interim take the job. Both deans are big advocates. Three new assistant professors started.

Cal Poly – enrollment low during covid, back up to standard numbers. Pool of engineers increased 65%, ag mech 35%. Hard to find lecturers, had one switch to assistant prof.

McGill – Two new food and bioprocess assistant professors, construction of renewed facilities, accreditation year.

U NE hired new dept head, two tenure track positions (both irrigation), food manufacturing engineer, have not fully recovered on enrollment, losing faculty/hard to retain, worried about surviving post pandemic (funding, incentive-based budgeting). AIM in Omaha hope to have people come Saturday. 103<sup>rd</sup> anniversary of NE Tractor test. Tours on Saturday, research farms.

NC State - searching for two deans. Enrollment pretty good, but flat. Growth on engineering tech. COE capped enrollment 1500 students. Now 1750. Change budget model, problem in recurring \$. New faculty in robotics and AI position (open to all departments).

U FL– rally everyone invited. 100-year anniversary will be on zoom, various talks. DSAT crop model coming up. April 17-19 AI in ag conference. AI initiative at UF, any institution can visit. Student numbers are enrollment.

U KY – enrollment down. First year engineering and biomedical engineering part of reason. Constantly changing budget issues. ABET review this fall.

OK State – ABET review in fall, AST program in 2021 up to 19 students, engineering students in biosystems moving over to AST. High admits, no ACT score required. Hired water quality, machine systems. Two positions open now (irrigation and water management). New offices and labs. New frontiers building. Looking for new dean.

TX A&M – new department head. New dean of Ag. Student numbers fell during covid 134 Ag mech 125 engineering (3 year), 90 graduate students. 3 open positions, irrigation, cotton, arid hydrology. Probably 2 more coming.

Cornell – numbers stable biological and environmental. Both programs ABET reviewed. 4 new faculty. New dean, new chair.

U AR – new hires in top leadership positions. Hiring water faculty position associate professor. Faculty stable. Dr. Sadaka passed away in car accident. Lalit stepping down July 31. In 2014 program was moved to engineering. Extension and experiment station still in Ag. Two joint positions with food science. Enrollment was down, 2014 biomedical program caused 60% drop.

KS State U – Three undergrad programs, ag tech (60), environmental (40), and biological systems (14). Biological is down with environmental and biomed programs. Engineering up some. New president. 25 to 38 grad students in last couple of years.

Auburn – back to pre-covid levels. New president. Steve Taylor interim dean. Increased grad enrollment, around 40. New faculty doing AI and robotics.

U MN – 6 months into job. Ag engineering and biobased products. 30 engineering students and 20 students in non-engineering graduate (sustainability) this year. High retention, 70% receive scholarship from program. Decreased engineering enrollment. 50 graduate students, University focusing on sustainability. Looking for robotics and sensors faculty.

U WI – enrollment at campus great, COA is down 250 down to 150. New programs data science, environmental. Got two new faculty in 2022 and 1 in water management. Had six retirements in last 5 years. New administration. More focus on student tuition. Struggle with staff recruitment.

IA State U – 600 undergrads, 80 graduate. Down from 820. Stable incoming class. Four majors, with 11 options. Technology pathway for bio people. Two new tenure tracks. Two more hires. Two major gifts (1 million and 5 million). New facilities off highway chassis dynamometer, Kent Feed Mill and Grain Science.

UC Davis – 2<sup>nd</sup> year, enrollment steady, back to 2019. New major Ag and Environment technologies 131 applicants, only 31 admitted 15 came. 2 assistant professor positions (biotechnical and food). 50 million gifts related to robotics, AI, food and plant sciences. COE engineering makerspace 20,000 ft<sup>2</sup>.

Purdue – change in leadership, campus enrollment growing (mostly engineering and computer science), 12<sup>th</sup> year of frozen tuition, 400 to 360 undergrads mostly recovered. Probably due to new building. Continue challenge in ag engineering. Two open faculty searches. Most recent ones related to machine learning/AI.

SDSU – new college deans, two new assistant professors, one new one in process, stable undergrad, grad increased slightly.

NDSU – new president, COE dean, four new faculty, still one on going, numbers slipped. Ten students 2020, 21 now. 40 grad students, agreement with two-year programs. Rural students more likely to go to two-year program. Precision livestock initiative. Move into new offices.

MS State – numbers are down. Is it demography or covid. 10-15% drop. Biomed still biggest, 300, Ag Mech 100, Biological 25-30. Changing to biosystems to differentiate from biomed. 18 faculty 10 new in last 2.5 years. Staff problems, not enough \$. Some curriculum changes to have 2 emphasis areas (biomaterials and sensors) and biosystems (autonomous systems, natural resources and environment). Distance ed might change with budget.

U GA – went from bio and ag department to college of engineering. Got rid of extension during transition. 3 schools in COE (biological/chemical, computer and electrical, and environment civil mechanical and agriculture). Mechanical and civil is huge and gets resources. 34 ag students. Lost hatch and multistate dollars. Survey coming out in next couple of months.

OH State U – new administration, big engineering student number decrease, 370 engineering down to 130-140. CSM still very good and Ag Mech. 55 grad students. Hiring 8 faculty members. Professional practice positions. Livestock and food science, biological engineering. College pulled faculty lines. Hope to be at 29-31 faculty members. Voyager nano racks, starlab

U TN – Budget allocation model budget. Hired new faculty. New mechatronics/AI. ABET visit in fall 2023. upcoming. Stable enrollment, environmental engineering might change it.

Discussion on GRE and ACT tests in AIM. Most schools are test optional. Some are moving back. Further discussion at AIM.

No bylaws for the committee. So, adding external partners could be feasible.

**Meeting ended 2:30 pm**