

NAPB Commercial Committee 2022 Annual Report (August 2021 to July 2022).

Executive Summary:

To start, I would like to thank all the committee member volunteers for their time, efforts and enthusiasm in helping make this a successful year. Our mission is to provide a commercial plant breeding perspective to NAPB on topics and issues that help build a broader and deeper knowledge of plant breeding across the organization. To this end, over the last year the committee has focused on three primary objectives: improved outreach and connection across NAPB, sustainability in plant breeding, and plant breeders of the future. Committee meetings were held monthly with agendas sent in advance and minutes taken and approved from each meeting. Considering the busy schedules of our committee members, attendance was excellent, and workloads shared equitably. As we are all in the private sector, the NAPB Anti-Trust policy was reviewed at the first meeting to ensure all members were aware.

The committee members for 2021/2022 were:

Chair: Rick Harrison (Driscoll's)

Vice-Chair: John Gill (AgReliant Genetics)

Secretary: Liana Nice (NSIP – Nature Source Improved Plants) - selected at the first committee meeting in September 2021.

Members: J.D. Rossouw (Bayer and past Chair), Chibwe Chungu (BASF), Klaus Koehler (Corteva), Clint Steketee (Syngenta), Ben Beyer (Advanta Seeds), Brittney Jones (Bayer).

In August 2022, John Gill will take over as Chair and Lina Nice will assume the Vice-Chair position. At the July 2022 committee meeting, Chibwe Chungu was nominated and elected to fill the vacated Secretary position Rick Harrison will move to the role of Past Chair.

During the past year, the committee worked on the following key projects:

1. **Improved outreach to build alignment with other NAPB Committees.** Each member of our committee was assigned an NAPB committee with which to connect to determine how our commercial perspective could provide meaningful insights to the broader NAPB community. This work will be reviewed in our July strategy session to see if we should continue to prioritize for the coming year. Here are a few key outcomes:
 - a. Education Committee - asked for a deeper understanding of IP in Plant Breeding from an industry perspective. In response, a seminar on IP in Plant Breeding was organized 8 April 2022. Klaus Koehler (Corteva) and Alissa Eagle (Bayer) led this seminar to deepen NAPB understanding on this important topic. We hope to maintain this connection with the education committee next year with the goal to identify one educational topic that would benefit from an industry perspective.
 - b. Graduate Student Working Group – provided a clear request for a seminar on finding job and interviewing with a commercial plant breeding organization. This seminar was held on 14 April 2022. Klaus Koehler (Corteva), Chibwe Chungu (BASF) and Rick Harrison (Driscoll's) led this seminar, "The Way to My First Job". In addition to this seminar, industry internships were also advertised through this committee resulting in a much more targeted focus on graduate student applicants. We also plan to connect with this group each year for new ideas and topics.
 - c. Communications Committee – the NAPB Newsletter was highlighted as an underutilized resource. In response, our committee provided several updates on our activities which were published in the newsletter.

2. **Sustainability** – from an industry perspective, this topic consistently rises to the top of company priorities. As this may not be well understood throughout the plant breeding community, this makes this topic of particular value to NAPB and an exciting opportunity for the commercial breeding committee to provide industry perspective.
 - a. 2022 Annual Meeting: Ames, Iowa – For the last several two years, the commercial breeding committee has been given a portion of the NAPB Annual Meeting to organize a presentation on a topic of particular interest to industry. During the 2021 Annual Meeting, the committee sponsored an overview presentation on Sustainability to explain how focus on this subject can benefit a plant breeding organization. This year the committee has decided to focus on this topic again and bring clear examples of how breeding can affect change with regard to sustainability. At the 2022 Annual Meeting the commercial breeding committee will sponsor a session of presentations and panel discussion entitled: Breeding for a Sustainable Future. The four speakers / panelists will be:
 - i. VK Kishore - Bayer
 - ii. Joe Rotundo – Corteva
 - iii. Christine Diepenbrock – Univ of California, Davis
 - iv. Kevin Smith – Univ of Minnesota
3. **Plant Breeders for the Future.** This topic has been on our list of priorities for several years and will likely remain a top objective in the coming year. There are currently two approaches underway to achieve this goal.
 - a. Soft Skills Workshops. This series of outreach programs is intended to bring information to plant breeding students from a commercial breeding perspective on topics our committee feels are often missing from university curricula but are also of high value to industry and important for graduate students and aspiring plant breeding candidates to understand. It may be possible in the next year to record some of these presentations to make them available online to a broader audience.
 - i. Soft Skills Workshop – Texas A&M, 27 October 2022
 - ii. Soft Skills Workshop - Iowa State University, 17 November 2022
 - iii. Workshop in preparation – Univ of Minnesota
 - b. Plant Breeder of the Future White Paper – This has been an ongoing project of this committee for the last two years. This project was on hold over the last year, but we plan to bring this initiative forward again next year as a priority project for completion. The committee will reach out to the executive team and committee chairs for input on this topic and the desired outcome. From there a white paper will be developed. Additionally, some webinars or seminars may be developed to communicate these outcomes.

To effectively transition to the new chairmanship, our July committee meeting focuses the development of strategic ideas for the year and identifies the top priorities for the coming year.

1. **Plant Breeder of the Future**

- a. This topic has been a priority of the committee for the last several years as we are uniquely positioned to provide insight into what companies are needing in newly recruited breeders. We will work with the executive committee to determine if a white paper is still desired, and if so, what specifically they would like it to focus on. The last white papers on this topic were published around ten years ago, so an update would be beneficial.
- b. We are planning to hold at least one webinar on the topic of plant breeder of the future, although more may be possible since it is such a broad topic. We may work in collaboration with the Graduate Student Working Group on tailoring a webinar to our graduate student audience.
- c. Working scenarios have changed for most people after the pandemic, and it would be good to address these changes and how breeders can adapt while still running effective breeding programs.

Quite a few breeders work remotely now, and with that comes advantages in productivity and challenges in collaboration. Several of our committee members have experience with this and can provide insight in how to make it work. This can likely be a standalone webinar topic or can be done in conjunction with other plant breeder of the future topics.

2. Global/International Breeding and how it relates to US Breeders

- a. Gene editing has been a hot topic for the past several years, and the regulatory hurdles are complex across the world. We are planning to identify a speaker for a webinar that can address some of the complex issues surrounding acceptance of gene edited crops in Europe and in other parts of the world. Pairwise does quite a bit of work in gene editing, and KWS and Limagrain can provide perspective on the international status of gene edited crops.

3. Training Initiatives for Graduate Students

- a. As mentioned previously, there are workshops scheduled to occur at Iowa State and the University of Minnesota. The training conducted at Texas A&M was well received.

4. Maintain connections with other NAPB committees

- a. Our committee has a great relationship with the Graduate Student Working Group and the Education Committee. We worked on several webinars this past year in collaboration with them and want to build on that success this year. We will reach out to the two committees and see what initiatives they have planned for the year and how we can assist them in their goals.

5. Maintain a time slot at the 2023 Annual NAPB Meeting

- a. We plan to hold a session at the 2023 annual meeting on a topic of interest to the membership. We will work over the next several months to identify what that topic will be.