LUCAS BERGER MUNARO

<u>lbmunaro@outlook.com</u> | (217) 819-2963

EDUCATION

University of Illinois Urbana-Champaign

Jan 2021 - Present

Ph.D. in Crop Sciences

GPA: 4.0

- Dissertation: Accelerated breeding for winter wheat profitability in a wheat-soybean double-crop system
- Advisor: Dr. Jessica E. Rutkoski

São Paulo State University, Brazil

Feb 2018 - Dec 2019

Master of Science in Agronomy (Genetics and Plant Breeding)

GPA: 4.0

• Thesis: Exploring long-term variety performance trials to improve environment-specific genotype × management recommendations: A case-study for winter wheat

Federal University of Technology of Parana, Brazil

Feb 2009 - Apr 2014

Bachelor of Science in Agronomy

 Undergraduate thesis: Brazilian Spring Wheat Homogeneous Adaptation Regions can be Dissected in Major Mega environments

WORK EXPERIENCE

Department of Crop Sciences, University of Illinois Urbana-Champaign

Champaign, IL

Graduate Research Assistant

Jan 2021 - Present

- Co-inventor on five wheat varieties licensed to seed companies over the past two years
- Co-led and conducted field operations in over 15,000 yield trial plots per year in nine locations across Illinois
- Contributed to improving the wheat breeding program's strategy by increasing the quality of phenotypic data and trials and optimizing the resources for field testing. As a result, the number of test locations and plots increased
- Co-led the implementation of a UAV-based high-throughput phenotyping pipeline in the breeding program to collect longitudinal data over three locations and multiple trials
- Trained colleagues and new employees on how to operate research equipment

Department of Agronomy, Kansas State University

Manhattan, KS

Assistant Scientist

Aug 2018 - Dec 2020

- Led the evaluation of long-term variety performance trial data, resulting in better management recommendations using existing data and guiding future studies
- Assisted undergraduate and graduate students with data analysis using R language for projects that resulted in three peer-reviewed journal articles

São Paulo State University

São Paulo, Brazil

Graduate Research Assistant

Feb 2018 - Jul 2018

• Set the groundwork for Value for Cultivation and Use testing of soybean inbred lines

Coamo Agroindustrial Cooperativa

Paraná, Brazil

Agronomist

Mar 2015 - Jan 2018

- Provided technical assistance to farmers to sustainably improve the yield and profitability of corn, soybean, wheat, dry beans, and oats
- Projected grain production, grain reception, and input sales for the cooperative unit to define goals and identify possible gaps
- Collaborated with representatives from various agricultural inputs companies to organize field days, technical training, and social events for farmers

Nidera Seeds Ltda Paraná, Brazil

Soybean Breeder

Mar 2014 - Oct 2014

- Participated as a breeder in releasing one soybean variety and registering seven soybean inbred lines
- Presented new soybean inbreed lines during advancement decision meetings
- Led breeder seed production, selection within segregating populations, field evaluations, generation advancement, and disease resistance screening

Fundação MT Mato Grosso, Brazil

Intern – Soybean Breeding

Aug 2013 - Feb 2014 Assisted with seed preparation, field activities, and phenotypic selection for the soybean breeding program

Presented research results on a field day for farmers and producers

SELECTED PUBLICATIONS (3 of 10) - Refer to "Lucas Berger Munaro" on Google Scholar for more

- 1. Munaro L.B., Kolb, F., Rutkoski, J. E. Genetic trends due to 21 years of soft red winter wheat breeding in Illinois. In preparation
- 2. Munaro L.B., Hefley T.J., DeWolf E., Haley S., Fritz A.K., Zhang G., Haag L.A., Schlegel A.J., Edwards J.T., Marburger D., Alderman P., Jones-Diamond S.M., Johnson J., Lingenfelser J.E., Unêda-Trevisoli S.H., Lollato R.P. 2020. Exploring long-term variety performance trials to improve environment-specific genotype × management recommendations: A case-study for winter wheat. Field Crops Research, 255 https://doi.org/10.1016/j.fcr.2020.107848
- 3. Munaro L.B., Benin G., Marchioro V.S., De Assis Franco F.; Silva R.R.; Lemes da Silva C., Beche E. 2014. Brazilian Spring Wheat Homogeneous Adaptation Regions can be Dissected in Major Mega environments. Crop **Science**, 54, 1374 https://doi.org/10.2135/cropsci2013.06.0365

GERMPLASM RELEASES & REGISTRATIONS

- 1. Benin G., et al. Wheat: UTF 25. Patent number: 21806.000111/2019, SNPC-MAPA, Brazil, 2019
- 2. Mattei G., et al. Soybean: NS6828IPRO. Patent number: 21806000151/2016, SNPC-MAPA, Brazil. 2016
- 3. Mattei G., et al. Soybean: XI591303IPRO, XI591305IPRO, XI591310IPRO, XI591311IPRO, XI621302IPRO, XI681303IPRO, XI641372RR. Registration numbers: 32997, 32996, 32995, 32998, 32992, 32999, 32994, RNC-MAPA, Brazil, 2014

HONORS AND AWARDS

- NAPB Borlaug Scholar class of 2024, National Association for Plant Breeding (NAPB)
- Richard H. & Elizabeth C. Hageman Endowed Graduate Research Fellowship, Department of Crop Sciences, University of Illinois Urbana-Champaign, Champaign, IL, 2024 - (\$ 33,295.20)
- Jonathan Baldwin Turner Graduate Fellowship, Department of Crop Sciences, University of Illinois Urbana-**Champaign**, Champaign, IL, 2023 - (\$ 22,500.00)
- First Place Award in the 2019 Graduate Student Poster Competition Exploring G x E x M Synergies; American Society of Agronomy - Wheat Initiative Agronomists Community. 2019 ASA-CSSA-SSSA International **Annual Meeting**, San Antonio, TX - (\$ 300.00)
- Young Plant Breeding Award at 7th National Brazilian Congress of Plant Breeding, Uberlândia, MG, Brazil, 2013 - (R\$ 700.00)

LANGUAGES

Portuguese (Native); English (Fluent); R software (Advanced)

ORGANIZATIONAL INVOLVEMENT

- President of the UIUC Crop Sciences Graduate Students Organization, 2023-2024
- Networking Chair of the UIUC Crop Sciences Graduate Students Organization, 2022-2023
- Member of the 2022, 2023, and 2024 UIUC Plant Science Symposium organizing committee
- Participant of the Corteva DELTA symposium, Indianapolis 2023
- Participant of the Bayer University Mentoring Program (B4U), cohort 2023
- Member of the WheatCAP consortium