



Dispersal Notes



October 2016 News Flyer

Department of Plant Pathology and Microbiology
Iowa State University

Calendar

PLPM seminar is held in 152 Science I from 3:10-4 pm.

October 18th – PLPM Seminar, Dr. Elke Brandes and Shane Kavanaugh, ISU Graduate College, Title: “Diversity awareness workshop”. Note special time: 3:10-4:45.

October 22nd – 5k fundraiser for PLPM Graduate Student Organization

October 25th – PLPM Seminar, Noor Abdelsamad, Title: “Factors affecting expression of soybean sudden death syndrome: flooding, oxygen, and ethylene”.

October 31st – PLPM Apple-Pumpkin Bakeoff: 12-1:30 pm, 240 Bessey.

November 1st – PLPM Seminar, David Cruz, Title: “Biology of soybean root rot caused by *Fusarium oxysporum* and *F. graminearum*”.

Recent Publications

Qi, Mingsheng, Link, T.I., Muller, M., Hirschburger, D., Pudake, R.N., Pedley, K.F., Braun, E., Voegelé, R.T., Baum, T.J., and Whitham, S.A. 2016. [A small cysteine-rich protein from the Asian soybean rust fungus, *Phakopsora pachyrhizi*, suppresses plant immunity.](#) PLoS Pathog 12:e1005827.

PLPM Updates

Steve Whitham (right) and other PLPM colleagues were highlighted in a recent Iowa State [press release](#) on their recent publication (link above) on the molecular interaction between Asian soybean rust and the plant immune system.



Jared Jensen (standing, center) leading Master Gardener trainees in a laboratory exercise in plant pathology on October 8th.

PLPM Updates (cont.)

Mark Gleason was among 25 attendees at the National Forum on Climate and Pests, held at the National Academy of Sciences building in Washington, DC, from October 4-6, 2016. The NFC&P, funded by a grant to the Northeast IPM Center, brought together a diverse range of disciplines to discuss issues and current research specifically related to impacts of climate change on risks associated with arthropod pests and diseases of agricultural crops and forests. Attendees included plant pathologists, entomologists, forest ecologists, climate modelers, aerobiologists, regional IPM administrators, and representatives from NSF and USDA-NIFA. An additional 100 people attended the Forum via an online link.



Attendees at the National Forum on Climate and Pests grouped around a statue of Albert Einstein on the grounds of the National Academy of Sciences building in Washington, DC.

Graduate Student Conference Experience: Muhammad Raza

I had a great experience at the annual meeting of American Phytopathological Society (APS) which held this year in Tampa, Florida from July 30th to August 3rd. I had the chance to meet several highly intelligent graduate students from different universities as well as many key leaders in my area of research. I participated in a range

of workshops, committee meetings and graduate student research presentation sessions. I also served as a moderator of a technical session on “Pathogen Detection”. In addition, I presented a poster on “Exploring the slow rusting potential of wheat genotypes against leaf and stripe rust of wheat”. In this study, I characterized 37 wheat varieties for their potential to become slowly diseased from leaf and stripe rusts, which are caused by fungi.

I analyzed disease and yield parameters and presented them with advanced visualization (biplots and heatmaps). Based on the results, I was able to identify several wheat varieties that can be used in future programs to breed disease-tolerant varieties for sustainable wheat production in Pakistan. In my opinion, the APS meeting was well organized and provided many benefits for me. I fully enjoyed the five days of events with so many interesting talks, posters and discussions on numerous advanced topics.

