

CURRICULUM VITAE

HUNG KIM DOAN

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EDUCATION

- 2018 Ph.D. Plant Pathology – University of California, Davis, CA
Advisor: Dr. Johan H.J. Leveau
- 2014 M.S. Plant Pathology – University of California, Davis, CA
Advisor: Dr. R. Mike Davis
- 2011 B.S. Biochemistry and Molecular Biology– University of California, Davis, CA

ACADEMIC/PROFESSIONAL APPOINTMENTS

- 2014-Current Graduate Student Researcher, Leveau Lab– UC Davis, CA
- 2012-Current Mentor for AggieMentors (EnvironMentor)– UC Davis, CA
- 2012-Current Directors of Plant Disease Clinic– UC Davis, CA
- 2012-2014 Graduate Student Researcher, Davis Lab– UC Davis, CA
- 2014 Visiting Student Researcher, Kenya Agricultural Research Institute—Kenya
- 2011-2012 Junior Specialist, Davis and Leveau Labs – UC Davis, CA
- 2011 Undergraduate Research Assistant, Davis and Leveau Labs– UC Davis, CA
- 2009 Conservatory Intern, Botanical Conservatory– UC Davis, CA

PROFESSIONAL SERVICES

- 2016-Current Vice Chair, Phyllosphere Committee–American Phytopathological Society
- 2015-Current Member, Plant Pathology Outreach Committee – UC Davis, CA
- 2015-Current Member, Plant Pathology Multimedia Committee – UC Davis, CA
- 2013-Current Member, Virology Committee–American Phytopathological Society
- 2013-Current Member, Mycology Committee–American Phytopathological Society
- 2013-Current Member, Extension Committee–American Phytopathological Society
- 2012-Current Member, Graduate Student Committee–American Phytopathological Society
- 2014-15 President, Plant Pathology Graduate Students – UC Davis, CA
- 2014-15 Member, Plant Pathology Graduate Student Affairs Committee – UC Davis, CA
- 2013-15 Member, Plant Pathology Retreat Committee – UC Davis, CA
- 2013-15 Representative, Graduate Student Association – UC Davis, CA

EDITING/REVIEWS

Ad-hoc reviewer *Plant Disease* (since 2014), *UC Nursery and Floriculture Alliance newsletter* (since 2015), *Springer-Agronomy for Sustainable Development* (since 2016), *Elsevier-Pedosphere* (since 2016)

TEACHING APPOINTMENTS

(* indicates unofficial, NGCSS=National Garden Clubs Study School)

2016 Associate Instructor PLP 135 Mushroom Identification— UC Davis, CA
Associate Instructor PLP 40 Mushroom Cultivation – UC Davis, CA
Contract Instructor UC Davis Extension-UC Davis, CA

2015 *Co-Instructor PLP 298 Seminar, Life after Grad School-Insights from Industry – UC Davis, CA (Established and organized a new seminar for graduate students, postdocs, and staffs.)

2012-14 Guest lecture, PLP 298: Advanced Plant Pathology Laboratory for Dr. M. Davis, on Mycological techniques to detect plant pathogens.

2014 *Instructor PLP 135 Mushroom Identification – UC Davis, CA

2014-15 Teaching Assistant PLP 40 Mushroom Cultivation – UC Davis, CA

2013-15 *Teaching Assistant PLP135 Mushroom Identification – UC Davis, CA

2013 Instructor, Mushroom Cultivation—NGCSS 24

2013 Instructor, Introduction to Plant Classification and Identification—NGCSS 24

2013 Instructor, Introduction to Plant Breeding—NGCSS 24

PROFESSIONAL AFFILIATIONS

2012-Current American Phytopathological Society (APS)
2012-Current Mycological Society of America (MSA)
2012-Current North American Mycological Society (NAMS)

COMMUNITY ACTIVITIES AND OUTREACH

2012-Current Plant Disease Clinic, Director and Primary Diagnostician —Davis, CA.
Organized and coordinate eight annual plant disease clinics. Diagnosed plant diseases for home gardeners, Extensions Staffs, Master Gardeners, state and local government, agricultural and horticultural producers (e.g. farmer and nursery owners), and agricultural and horticultural professionals (e.g. Agricultural Pest Control Adviser and arborists)

2012-Current Sheldon High School eMentor—Elk Grove, CA.
Mentored (2 students) through emails.

- 2011-Current Davis Village Harvest, Volunteer —Davis, CA. Harvested and separated various fruits and vegetables from residential, orchard, and farm for local food bank.
- 2011-Current UC Davis Picnic Day, Volunteer —Davis, CA. Displayed plant pathogens under microscope and answered questions about plant pathogens for the department of plant pathology
- 2010-Current H.E.L.P Club, Coordinator and Head Cook —Davis, CA. Organized, coordinated, and cooked weekly for 40-50 low income guests.
- 2015 UC Davis Picnic Day, Coordinator—Davis, CA. Organized and coordinated the department of plant pathology booth.
- 2011-13 Davis Community Meals, Volunteer —Davis, CA. Prepared food for the homeless. Made food and clothes appointments with local food and clothes banks. Filed medical records and translated documents for low income families.
- 2011-12 Plant Disease Clinic, Volunteer —Davis, CA. Help diagnose plant diseases at plant clinics.
- 2012 Sacred Heart Community Service, Volunteer—San Jose CA. Packed and handed out food and clothes for the needy. Translate paperwork for clients.

GRANTS

(* indicates principal or co-principal investigator. 1) Provided the initial idea, 2) Developed research design and hypotheses, 3) Authorship of grant application, 4) Developed and/or managed budget, 5) Managed personnel and project activities.)

RECEIVED

2016

Pathogen characterization of Two *Fusarium* Species, \$27,500. *Doan, H.K., Miyao, E.M, *Gordon, T.R., and *Davis, R.M. California Tomato Research Institute, Inc.

2015

Pathogen characterization of *Fusarium* wilt and *Fusarium* crown and root rot in California, \$45,000. *Doan, H.K., Miyao, E.M, *Gordon, T.R., and *Davis, R.M. California Tomato Research Institute, Inc.

Seed Transmission and Seed Treatment of *Fusarium oxysporum* f. sp. *lycopersici*, \$15,000. *Doan, H.K., Miyao, E.M, *Gordon, T.R., and *Davis, R.M. California Tomato Research Institute, Inc.

GIFTS

2016

PhytoGen Seed Company, LLC. for *Fusarium* and *Verticillium* wilt of cotton research, \$10,000. *Doan, H.K. and *Davis, R.M.

2015

PhytoGen Seed Company, LLC. for Verticillium wilt of cotton research, \$10,000.
*Doan, H.K. and *Davis, R.M.

Syngenta Crop Protection for Fusarium wilt of tomato research, \$6,500.
*Doan, H.K. and *Davis, R.M.

2014

PhytoGen Seed Company, LLC. for Fusarium wilt of cotton research, \$10,000.
*Doan, H.K. and *Davis, R.M.

PROPOSAL NOT FUNDED

2014

The presence and implications of *cryptic* RNA viruses in *Magnaporthe oryzae*.
*Doan, H.K., Davis, R.M., and Falk, B.W. UC Rice Research Advisory Committee.
Requested \$45,000.

AWARDS, HONORS, AND FELLOWSHIPS

2016

UC Davis Chancellor's Civic Engagement Awards
President's Volunteer Service Award
UC Davis Outstanding Community Service Award
Aggiementor Mentor Award
St. Martin's Outreach Grant

2015

Storkan-Hanes-McCaslin Foundation Awards
Aggiementor Mentor Award
St. Martin's Outreach Grant

2014

Dennis H. Hall Award
Erna and Orville Thompson Travel Award
Henry A. Jastro Graduate Research Award
California Space grant Consortium Scholarship
Horticulture CRSP Trellis Fellowship
Richard Gabrielson Student Travel Award
St. Martin's Outreach Grant
Golden International Agricultural Fellowship
Graduate Research Mentorship Fellowship
Aggiementor Mentor Award

Sara M. White Scholarship
Julie A. West Scholarship

2013

Milton D. And Mary M. Miller Plant Science Award
Ellamae Fehrer Scholarship
Henry A. Jastro Graduate Research Award
Erna and Orville Thompson Travel Award
Horticulture CRSP Trellis Fund Award
St. Martin's Outreach Grant

PATENTS/PATENT APPLICATIONS

1. Leveau, J.L. and **Doan, H.K.** Synergy-based Biocontrol of Plant Pathogens. University of California, US patent, 20,150,135,371 (2015).

PUBLICATIONS

1. **Doan, H. K.**, Davis, R. M., Sartori, F. F., and Marcum, D.B. 2014. First Report of a *Pythiogeton* sp. Causing Root and Basal Stalk Rot of Wild Rice in California. Plant Disease 98:851.
2. **Doan, H. K.**, Zhang, S., and Davis, R.M. 2013. Development and Evaluation of AmplifyRP® Acceler8™ Assay for the Detection of *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Cotton. Plant Health Progress: doi:10.1094/PHP-RS-13-0115.
3. **Doan, H.K.** and Davis, R.M. 2014. Evaluation of Fusarium wilt resistance in Upland Cotton Germplasm Lines J. Cotton Sci. 18:430-434.
4. **Doan, H.K.** and Leveau, J.H.J. 2015. Artificial Surfaces in Phyllosphere Microbiology. Phytopathology: PHYTO02150050RVW.
5. Leveau J.H.J. and **Doan, H.K.** 2015. Synergy-based Biocontrol of Plant Pathogens. University of California, US patent, 20,150,135,371
6. **Doan, H. K.** and Davis, R.M. 2015. Efficacy of Seed Treatments on Viability of *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Infected Cotton Seed. Crop Protection 78: 178–184.
7. Crutcher, F. K., **Doan, H. K.**, Bell, A. A., Davis, R.M., Stipanovic, R. D., Nichols, R. L., and Liu, Jinggao. 2015. Evaluation of methods to detect the cotton wilt pathogen *Fusarium oxysporum* f. sp. *vasinfectum* race 4. Eur J Plant Pathol (in press)

8. Cumeras, R., Pasamontes, A., Aksenov, A., Cianchetta, A., **Doan, H.**, Davis, R., and Davis, C. 2016. Identification of mycotoxin fungi metabolites from inside *Gallus gallus* domesticus eggshells by non-invasively detecting volatile organic compounds (VOCs). *Metabolomics* (in press)
9. **Doan, H. K.**, Perez, K., Slaughter, D. C., and Davis, R.M. 2015. Survey of Molds in California Processing Tomatoes. *J Food Sci* (in press)

PUBLICATION IN PREPARATION

1. **Doan, H.K.** and Davis, R.M. 2015. Isolation and characterization of *Lysobacter* species as potential biocontrol agents against phytopathogenic fungi and oomycetes. *Journal of Biological Control*
2. **Doan, H. K.** and Davis, R.M. 2015. *Pythiogeton manoomin*, a new species causing root and basal stalk rot of wild rice in the United States. *Mycologia*.
3. **Doan, H. K.**, Miyao, E.M., Vallad, G.E., and Davis, R.M. 2015. Characterizing Fusarium Diseases of Tomato. *Plant Disease*.
4. **Doan, H. K.** and Davis, R.M. 2015. *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Infected Cotton. *Plant Disease*.

BOOK CHAPTER/COMPENDIUM

1. *Fusarium wilt of cotton* (**H. K. Doan** and R. M. Davis), *Compendium of Cotton Diseases and Pests, 3rd ed.* edited by C. S. Rothrock, T. L. Kirkpatrick, and J. E. Woodward (American Phytopathological Society, St. Paul, MN).

PRESENTATIONS/PUBLISHED ABSTRACTS

(* indicates presenter (oral) and + indicates published abstract)

1. ***+Doan, H.K.**, Maharaj, N.N., Kelly, K.N., Miyao, E.M., Davis, R.M., and Leveau, J.H. 2015. Antifungal properties of California *Collimonas* isolates and their use in synergy-based biocontrol of Fusarium wilt of tomato. Oral presentation at: 2016 Society of Industrial Microbiology and Biotechnology-4th Recent Advance in Microbial Control, San Diego, CA. 9-12 Oct. 2016. Society of Industrial Microbiology and Biotechnology, Fairfax, VA
2. ***+Doan, H.K.**, Maharaj, N.N., Miyao, E.M., Davis, R.M., and Leveau, J.H. 2015. Antifungal properties of California *Collimonas* isolates and their use in synergy-based biocontrol of Fusarium wilt of tomato. Oral presentation at: 2015 APS Annual Meeting, Pasadena, CA. 1-5 Aug. 2015. American Phytopathological Society, St. Paul, MN

3. *+Cumeras, R., Pasamontes, A., Aksenov, A., Cianchetta, A., **Doan, H.**, Davis, R., and Davis, C. Detection of fungal metabolites using non-invasive techniques from *Gallus gallus* domesticus eggs. Oral presentation at: 11th Annual International Conference of the Metabolomics Society, Davis, CA, 29-2 June-July. 2015. The Metabolomics Society, Massachusetts, USA.
4. *+**Doan, H.K.** and Davis, R.M. 2015. Evaluation of Fusarium Wilt Resistance in Upland Germplasm Lines. Oral presentation at: In Proc. Beltwide Cotton Prod. Res. Conf., San Antonio, TX. 5-7 Jan. 2015. Natl. Cotton Counc. Am., Memphis, TN.
5. *+**Doan, H.K.** and Davis, R.M. 2015. Efficacy of Hot Water and Fungicide Treatments on Viability of *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Infected Cotton Seed. Oral presentation at: In Proc. Beltwide Cotton Prod. Res. Conf., San Antonio, TX. 5-7 Jan. 2015. Natl. Cotton Counc. Am., Memphis, TN.
6. *+**Doan, H.K.** and Davis, R.M. 2014. Efficacy of Hot Water and Fungicide Treatments on Viability of *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Infected Cotton Seed. Oral presentation at: 2014 APS-CPS Joint Meeting, Minneapolis, MN. 9-13 Aug. 2014. American Phytopathological Society, St. Paul, MN.
7. *+Stamova, L., Davis, R.M., and **Doan, H. K.** Resistance to Fusarium Crown and Root Rot. Oral presentation at: XVIIIth EUCARPIA Meeting of the Tomato Working Group, Avignon, France, 22-25 Apr. 2014. INRA Science & Impact, France.
8. *+**Doan, H.K.** and Davis, R.M. 2014. Fusarium Wilt of Cotton. Oral presentation at: Department of Plant Pathology Thesis Defense Seminar, Davis, CA. 21 Apr. 2014. University of California, Davis.
9. *+**Doan, H.K.** and Davis, R.M. 2014. Efficacy of Hot Water and Fungicide Treatments on Viability of *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Infected Cotton Seed. Oral presentation at: 60th Annual Conference on Soilborne Plant Pathogens, San Rafael, CA. 11-13 Mar. 2014. Washington State University, Pullman, WA.
10. *+**Doan, H.K.** and Davis, R.M. 2014. Efficacy of Hot Water and Fungicide Treatments on Viability of *Fusarium oxysporum* f. sp. *vasinfectum* race 4 in Infected Cotton Seed. Oral presentation at: In Proc. Beltwide Cotton Prod. Res. Conf., New Orleans, LA. 6-8 Jan. 2014. Natl. Cotton Counc. Am., Memphis, TN.
11. *+**Doan, H.K.** and Davis, R.M. 2013. Hot Water Treatments for Disinfesting Cottonseed of *Fusarium Oxysporum* f. sp. *Vasinfectum*. Oral presentation at: In Proc. Beltwide Cotton Prod. Res. Conf., San Antonio, TX. 7-10 Jan. 2013. Natl. Cotton Counc. Am., Memphis, TN.

WORKSHOPS AND EXTENSIONS

(* indicates presenter (oral) and + indicates organizer)

1. ***+Doan, H.K.**, Miyao, G., Gordon, T., and **+Davis, R.M.** 2015. Fusarium Disease of Tomato. Vegetable Crop Pest Management Research Update, Five Points, CA. 9 Dec. 2016. University of California, Agriculture and Natural Resources.
2. ***+Doan, H.K.**, and ***+Miyao, G.** Diseases of Processing Tomato. TS&L Mid-season processing tomato trial. Dixon, CA. 12 Aug. 2015. TS&L Seed, Woodland, CA.
3. ***+Doan, H.K.**, ***+O'Leary, M.**, and **+Davis, R.M.** 2015. Detection of Plant Pathogen using Lateral Flow Devices and Recombinase Polymerase Amplification. Pest Management and Environmental Horticulture Program Teams Meeting, Davis, CA. 8-10 Apr. 2015. University of California, Agriculture and Natural Resources.
4. ***+Doan, H.K.** and **Davis, R.M.** 2014. Development and Evaluation of AmplifyRP Acceler8 Diagnostic Assay for the Detection of *Fusarium oxysporum* f. sp. *vasinfectum* Race 4 in Cotton Oral presentation at: Cotton Research Update Meeting / UC Cotton Workgroup Meeting, Tulare, CA. 11 Nov. 2014. University of California, Cooperative Extension.
5. ***+Doan, H.K.** and **Davis, R.M.** 2014. Mushrooms of Mendocino County. Oral presentation at: Mushroom and Wine festival, Hopland, CA. 16 Sept. 2014. University of California, Agriculture and Natural Resources.
6. ***+Doan, H.K.**, **+Perez, K.**, and **+Davis, R.M.** 2014. Mushroom Cultivation. Sacramento Area Mushroomers Club, Davis, CA. 30 Apr. 2014. Sacramento Area Mushroomers, Davis, CA.
7. ***+Doan, H.K.**, **Davis, R.M.**, and **Falk, B.W.** 2014. The Presence and Implications of Viruses in the Rice Blast Fungus. Oral presentation at: Rice Research Board Meeting, Davis, CA. 12 Feb. 2014. The California Rice Commission, Arbuckle, CA.
8. ***+Doan, H.K.** and **Davis, R.M.** 2013. Current Status on Hot Water Treatments of FOV race 4 in Infected Cotton Seed and Fusarium Resistant Cotton Screening. Oral presentation at: Cotton Research Update Meeting / UC Cotton Workgroup Meeting, Five Points, CA. 11 Nov. 2013. University of California, Cooperative Extension.
9. ***+Doan, H.K.**, ***+Perez, K.**, and ***+Davis, R.M.** 2013. Rice Blast (*Magnaporthe grisea*) Seed Testing. California Crop Improvement Association, Davis, CA. 1 Nov. 2013. University of California, Davis.

10. ***+Doan, H.K.** and +Davis, R.M. 2013. Fusarium Wilt of Cotton Testing. California Crop Improvement Association, Davis, CA. 24 Jun. 2013. University of California, Davis.
11. ***+Doan, H.K.**, +Perez, K., and ***+Davis, R.M.** 2012. Mushroom Cultivation. Sacramento Area Mushroomers Club, Davis, CA. 21 Apr. 2012. Sacramento Area Mushroomers, Davis, CA.

UNDERGRADUTE INTERNS

- 2015 (10) Shirley Lau, Thomas Nasr, Jan Rosario, Fong Xiong, Sampson Li, Saurabh Todi, John Desoto, Sandra Vu, Mainou Thao, and Silvia Mendoza-Villalovos— UC Davis.
- 2014 (3) Firoozeh Arjmand (2014-15), John Doan (2014-15), and Joara Pereira — UC Davis.
- 2013 (6) Foua Xiong (2013-15), Nhu Do (2013-16), Yun Xie (2013-14), Caitlin Ethridge (2013-2014), Yan Zhuo (2013-2014), and Arthur Jiang— UC Davis.
- 2012 (3) Rebecca Duncan, Hannah Guletz (2012-13), and Tiffany Hu (2013-13), — UC Davis.
- 2011 (1) Kelley Paugh (2011-12)—UC Davis.

HIGHSCHOOL MENTEE

- 2015-16(1) Teevyah Yuva Raju— Mira Loma High School, Sacramento, CA.
 “Drought Impact on Soilborne Fungal Pathogen of Tomato.” First place in the EnvironMentor State Fair in California. First place at the 2016 EnvironMentor National Fair in Washington D.C.
- Cindy Truong—Sheldon High School eMentor, Elk Grove, CA
- 2014-15 (1) Bailey Humes—Woodland High School, Woodland, CA. “Microbial Community of Artificial and Organic Leaves.” Third place in the EnvironMentor State Fair in California. Presented at the 2015 EnvironMentor National Fair in Washington D.C.
- 2013-14 (2) Janell Puccio and Maria Diaz—Woodland High School, Woodland, CA.
 “Microbial Community Associated with Dog and Environment”. Honorable Mention
- Brandon Lao—Sheldon High School eMentor, Elk Grove, CA