

CURRICULUM VITAE

Rong Di

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Appointments

2017-Present	Associate Research Professor , Department of Plant Biology, School of Environmental and Biological Sciences, Rutgers University, New Brunswick, NJ
2011-2017	Assistant Research Professor , Department of Plant Biology and Pathology, School of Environmental and Biological Sciences, Rutgers University, New Brunswick, NJ
2014-Present	Adjunct Professor , Hainan University, Hainan, China
2003-2011	Assistant Research Professor , Biotechnology Center for Agriculture and the Environment, School of Environmental and Biological Sciences, Rutgers University, New Brunswick, NJ
1997- 2002	Research Associate , Biotechnology Center for Agriculture and the Environment, School of Environmental and Biological Sciences, Rutgers University, New Brunswick, NJ
1992-1996	Postdoctoral Scholar , Dept. of Plant Pathology, and Dept. of Agronomy, University of Kentucky, Lexington, KY
1986-1992	Graduate Research Assistant , Dept. of Plant Pathology, Iowa State University, Ames, IA
1983-1985	Assistant Lecturer , Dept. of Plant Protection, South China College of Tropical Crops (SCCTC), Hainan, P. R. China

Education

Ph.D.	1992	Plant Virology, Iowa State University, Iowa (Advisor: W Allen Miller)
M.S.	1989	Plant Virology, Iowa State University, Iowa (Advisor: John Hill)
B.S.	1983	Plant Protection, South China College of Tropical Crops, Hainan, P.R. China

Honors and Awards

1985 Selected as the only one among 45 graduates in the Dept. of Plant Protection from SCCTC China to study abroad. Awarded a two-year scholarship by the Chinese Department of Agriculture to study for a M.S. degree in plant virology.

2005, 2007, 2009, 2015, 2017 Rutgers Faculty Compensation Program awards.

Patents

- Di, R.** (100% contribution) Jan. 26, 2017. Compositions and methods for inducing resistance to soybean cyst nematode via RNAi. WO 2017/015621 A1.
- Di, R.** (85% contribution) and Tumer, N. E. June 17, 2014. Methods of treating hepatitis C virus. Patent # US8,753,642 B2.
- Tumer, N.E. and **R. Di** (85% contribution). Sept. 27, 2011. Transgenic plants expressing L3 delta proteins are resistant to trichothecene fungal toxins. Patent # US8,026,410 B2.
- Tumer, N. E. and **R. Di** (85% contribution). Nov. 25, 2010. Nontoxic Shiga-like toxin mutant compositions and methods. U.S. Application #60/978,280. Patent # US2010/0298238 A1.
- Tumer, N. E. and **R. Di** (50% contribution). Jan. 5, 2006. Transgenic tobacco plants expressing truncated proteins L3 and pokeweed antiviral protein are resistant to trichothecene fungal toxins. Patent # US2006/0005271 A1.
- Tumer, N. E., T. Leustek, **R. Di** (50% contribution), M. Lee and J. Kim. Nov. 23, 2004. Method for selecting transformed plant cells using ethionine and cystathionine gamma synthase as the selection agent and marker gene. U.S. Patent #6,821,781 B1.

Discovery disclosures submitted

- Di, R.** April 2013. Screening acetylcholine esterase inhibitors using A β transgenic *C. elegans*
- Di, R.** April 2013. Alkaloids from *Lycoris* plant inhibit acetylcholine esterase gene expression and promote cholinergic health in human A β -expressing transgenic *C. elegans*
- Di, R.** (90% contribution), K. Matthews, K. Yam and E. Lam. May 2009. Plant antimicrobial peptides: produced from transgenic and transplastomic potato, used as food preservatives

Chapters in published books

- Di, R.** and N. E. Tumer. 2015. Pokeweed antiviral protein: Its cytotoxicity mechanism and applications in plant disease resistance. *Toxins* (Special Issue) 7(3):755-772; doi:10.3390/toxins7030755. B. Magun and J. D. Robertus, eds. (Di: corresponding; initiation; 100% writing, 85% editing)
- Ma, L., R. Gu, L. Tang, Z. Chen, **R. Di** and C. Long. 2015. Important poisonous plants in Tibetan ethnomedicine. *Toxins* (Special Issue) 7:138-155; doi:10.3390/toxins7010138. B. Magun and J. D. Robertus, eds. (Di: 50% editing)
- Di, R.** 2007. Increasing the methional content in potato through biotechnology. pp 185-193 in *Biotechnology in flavor production*. D. Havkin-Frenkel, and F. Belanger, eds. (Di: by invitation; 100% writing and editing)
- Tumer, N. E., K. Hudak, **R. Di**, C. Coetzer, P. Wang and O. Zoubenko. 1999. Pokeweed antiviral protein and its applications. pp 139-158 in *Current topics in microbiology and immunology Vol.240. Plant biotechnology: new products and applications*. J. Hammond, P. McGarvey, and V. Yusibov, eds.

(Di: 15% writing and editing)

Published journal articles

46. **Di, R.**, L. Li and E. Davis. 2017. Transgenic soybean plants with root-expressing siRNAs specific to *HgRPS23* gene are resistant to *Heterodera glycines*. *Int. J. Agr. Res. Crop Sci.* 1 (2):1-8.
(Di: initiation; 100% writing, 90% editing)
45. Graf, B. L., S. Kamat, K. Cheong, S. Komarnytsky, M. Driscoll and **R. Di**. 2017. Phytoecdysteroid-enriched quinoa seed leachate enhances healthspan and mitochondrial metabolism in *Caenorhabditis elegans*. *J. Func. Foods* 37:1-7. DOI: 10.1016/j.jff.2017.07.016
(Di: 33% initiation; 50% editing)
44. **Di, R.**, M. S. Vakkalanka, C. Onumpai, H. Chau, A. K. White, R. A. Rastall, K. Yam and A. T. Hotchkiss, Jr. 2017. Orange pectic oligosaccharides inhibit *Escherichia coli* O157:H7 adhesion and reduce Shiga toxin cytotoxicity in HT29 cells. *Food Chem.* 227:245-254.
(Di: 50% initiation; 75% writing and editing)
43. **Di, R.**, Q. Huang, M. Stulberg, L. Zhao and L. Levy. 2016. Detection of plant quarantine pathogen *Ralstonia solanacearum* r3b2 with portable POKKIT and BLITZ systems. *J. Basic and Applied Pl. Sci. (J. Plant Health)* 1(1):103-111.
(Di: initiation; 100% writing, 85% editing)
42. **Di, R.** 2016. Complete genome sequence of pokeweed mosaic virus-New Jersey isolate and its comparison to PkMV-MD and PkMV-PA. *Genome Announcements* 4(5):e00929-16. DOI:10.1128/genomeA.00929-16.
(Di: corresponding; 100% initiation, writing and editing)
41. Xie, L., Y. Liu, H. Wang, W. Liu, **R. Di**, W. Miao, F. Zheng. 2016. Characteristics of harpinXoo induced hypersensitive responses in non-host plant, tobacco. *J. Plant Biochem. Biotech.* DOI:10.1007/s13562-016-0363-9.
(Di: 50% writing, 85% editing)
40. Wang, S., Z. Li, S. Li, **R. Di**, C.-T. Ho and G. Yang. 2016. Ribosome-inactivating proteins (RIPs) and their important health promoting property. *RSC Advances* 6: 46794-46805. DOI:10.1039/c6ra02946a.
(Di: 50% editing)
39. Huang, M., L. Fu, X. Sun, **R. Di** and J. Zhang. 2016. Rapid and highly efficient callus induction and plant regeneration in the starch-rich duckweed strains of *Landoltia punctata*. *Acta Physiologiae Plantarum* 38:122-136. DOI:10.1007/s11738-016-2142-6.
(Di: 30% editing)
38. Endraiyani, V., R. D. Ludescher, **R. Di**, M. V. Karwe. 2016. Total phenolics and antioxidant capacity of cocoa pulp: processing and storage study. *J. Food Proc. Preserv.* DOI:10.1111/jfpp.13029.
(Di: 30% editing)
37. Gan, L., **R. Di**, Y. Chao, L. Han, X. Chen, S. Yin. 2016. *De novo* transcriptome analysis for Kentucky bluegrass dwarf mutants induced by space mutation. *PLoSOne* 11(3): e0151768. DOI:10.1371/journal.pone.0151768.
(Di: 50% writing, 50% editing)

36. Li, X., Z. Bi, **R. Di**, P. Liang, Q. He, W. Liu, W. Miao and F. Zheng. 2016. Identification of powdery mildew responsive genes in *Hevea brasiliensis* through mRNA differential display. *Int. J. Mol. Sci.* 17:181-197. DOI:10.3390/ijms17020181. (Di: 50% writing, 85% editing)
35. Hintz, T., K. K. Matthews and **R. Di**. 2015. The use of plant antimicrobial compounds for food preservation. *BioMed Research International*, vol. 2015. DOI:10.1155/2015/246264. (Di: corresponding; initiation; 33% editing)
34. Sun, Y., P. Liang, Q. He, W. Liu, **R. Di**, W. Miao and F. Zheng. 2015. Cloning and expression of the pathogenicity genes of *O. heveae*. *J. of Pl. Path. Microbiol.* S1:001; DOI: 10.4172/2157-7471.S1-001. (Di: 50% writing, 50% editing)
33. Wang, L., M. Xing, **R. Di** and Y. Luo. 2015. Isolation, identification and antifungal Activities of *Streptomyces aureovorticillatus* HN6. *J. of Pl. Path. Microbiol.* 6:281-285. DOI: 10.4172/2157-7471.1000281. (Di: 30% writing, 50% editing)
32. Hotchkiss, A., A. Nunez, G. Strahan, H. Chau, A. White, J. Marais, K. Hom, M. Vakkalanka, **R. Di**, K. Yam, C. Khoo. 2015. Cranberry xyloglucan structure and inhibition of *Escherichia coli* adhesion to epithelial cells. *J. Agri. Food Chem.* 63:5622–5633. DOI:10.1021/acs.jafc.5b00730. (Di: 10% writing and editing)
31. **Di, R.** and N. E. Tumer. 2015. Pokeweed antiviral protein: Its cytotoxicity mechanism and applications in plant disease resistance. *Toxins* 7(3):755-772; DOI:10.3390/toxins7030755. (Di: corresponding; initiation; 100% writing, 85% editing)
30. Ma, L., R. Gu, L. Tang, Z. Chen, **R. Di** and C. Long. 2015. Important poisonous plants in Tibetan ethnomedicine. *Toxins* 7:138-155. DOI:10.3390/toxins7010138. (Di: 50% editing)
29. Yu, X., B. Cui, M. Ruan, W. Wen, S. Wang, **R. Di** and M. Peng. 2014. Cloning and characterization of *GbGI*, a DELLA-like gene from cotton (*Gossypium barbadense*). *Plant Growth Regulation* 75:235-244. DOI:10.1007/s10725-014-9947-3. (Di: 50% writing, 50% editing)
28. **Di, R.**, L. Zhao and L. Levy. 2014. Detection of quarantine pathogens with bio-layer interferometry-based BLITZ system. *Phytopath.* 104(Suppl. 3):S3.32. (Di: corresponding; initiation; 100% writing and editing)
27. **Di, R.** and N. E. Tumer. 2014. The N-terminal 99 amino acids of yeast ribosomal protein L3 inhibits the cytotoxicity of pokeweed antiviral protein in *Saccharomyces cerevisiae*. *Toxins* 6:1349-1361. DOI: 10.3390/toxins6041349. (Di: corresponding; initiation; 100% writing, 80% editing)
26. **Di, R.**, L. Zhao and L. Levy. 2013. Detection of plant quarantine pathogens using surface plasmon resonance technology. *Acta Phytopath. Sinica* 43(Suppl.):279. (Di: corresponding; initiation; 100% writing and editing)
25. Zhao, L., L. Levy and **R. Di**. 2013. Detection of *Ralstonia solanacearum* using portable surface plasmon resonance technology. *Phytopath.* 103(Suppl. 2):S2.167. (Di: corresponding; initiation; 100% writing and editing)

24. Khan, I. J., **R. Di**, P. Patel and V. Nanda. 2013. Evaluating pH-induced gastrointestinal aggregation of *Arachis hypogaea* 1 fragments as potential components of peanut allergy. *J. Agri. Food Chem.* 61:8430-8435.
(Di: 25% editing)
23. Xin, L.-J., R. Yamujala, Y.-H. Wang, H. Wang, W.-H. Wu, M. A. Lawton, C.-L. Long and **R. Di**. 2013. Acetylcholinesterase-inhibiting alkaloids from *Lycoris radiata* delay Paralysis of amyloid beta-expressing transgenic *C. elegans* CL4176. *PLoS One* 8(5):e63874. DOI:10.1371/journal.pone.0063874.
(Di: corresponding; initiation; 100% writing, 80% editing)
22. Wu, W.-H., **R. Di** and K. Matthews. 2013. Antibacterial mode of action of Ib-AMP1 against *Escherichia coli* O157:H7. *Probiotics and Antimicrobial Proteins*. DOI: 10.1007/s12602-013-9127-1.
(Di: 50% initiation; 33% writing and editing)
21. Ouimet, M. A., J. Griffin, A. L. Carbone-Howell, W.-H. Wu, N. D. Stebbins, **R. Di** and K. E. Uhrich. 2013. Biodegradable Ferulic Acid-containing Poly(anhydride-ester): Degradation products with controlled release and sustained antioxidant activity. *Biomacromolecules* 14(3):854-861. DOI:10.1021/bm3018998.
(Di: 10% initiation; 10% writing and editing)
20. Tan, Y. N., K. R. Matthews, **R. Di** and Mohd Khan Ayob. 2012. Comparative antibacterial mode of action of purified alcalase- and tryptic-hydrolyzed palm kernel cake proteins on the food-borne pathogen *Bacillus cereus*. *Food Control* 31:53-58.
(Di: 10% writing and editing)
19. Tan, Y. N., K. R. Matthews, **R. Di** and M. K. Ayob. 2012. Bacteriostatic mode of action of trypsin-hydrolyzed palm kernel expeller peptide against *Bacillus cereus*. *Probiotics and Antimicrobial Proteins* 4:59-65.
(Di: 10% writing and editing)
18. **Di, R.** 2011. Using surface plasmon resonance (SPR) technology to detect quarantine plant pathogens. *Phytopath.* 101:S215.
(Di: corresponding; initiation; 100% writing and editing)
17. **Di, R.**, M.-T. Huang and C.-T. Ho. 2011. Anti-inflammatory activities of mogrosides from *Momordica grosvenori* in murine macrophages and a murine ear edema model. *J. Agri. Food Chem.* 59:7474-7481.
(Di: corresponding; initiation; 100% writing, 95% editing)
16. Pang, Y.-P., J. G. Park, S. Wang, A. Vummenthala, R. K. Mishra, J. E. McLaughlin, **R. Di**, J. N. Kahn, N. E. Tumer, L. Janosi, J. Davis and C. B. Millard. 2011. Small-molecule inhibitor leads of ribosome-inactivating proteins developed using the doorstep approach. *PLoS One* 6(3): e17883. DOI:10.1371/journal.pone.0017883.
(Di: 10% initiation, writing and editing)
15. **Di, R.**, E. Kyu, V. Shete, H. Saidasan, P. C. Kahn and N. E. Tumer. 2011. Identification of amino acids critical for the cytotoxicity of Shiga toxins 1 and 2 in *Saccharomyces cerevisiae*. *Toxicon* 57:525-539.
(Di: initiation; 100% writing, 80% editing)
14. **Di, R.**, A. Blechl, R. Dill-Macky, A. Tortora and N. E. Tumer. 2010. Expression of a truncated form of yeast ribosomal protein L3 in transgenic wheat improves resistance to *Fusarium* head blight. *Plant Science* 178:374-380. (submitted and accepted in 2009).

- (Di: 100% writing, 75% editing)
13. **Di, R.** and N.E. Tumer. 2010. Real-time reverse transcription PCR detection of viable Shiga toxin-producing *Escherichia coli* O157:H7 in food. *J. Food Safety* 30:51-66. (submitted and accepted in 2008).
(Di: initiation; 100% writing and 80% editing)
 12. **Di, R.**, A. Blechl, R. Dill-Macky, A. Tortora and N. E. Tumer. 2007. Expression of the N-terminal 99 amino acids of yeast ribosomal protein L3 in transgenic wheat confers resistance to *Fusarium* head blight. *Mol. Plant Breeding* 5:283.
(Di: 100% writing, 80% editing)
 11. **Di, R.** and N. E. Tumer. 2005. Expression of a truncated form of ribosomal protein L3 confers resistance to pokeweed antiviral protein and the *Fusarium* mycotoxin deoxynivalenol. *Mol. Plant Microbe Inter.* 18:762-770.
(Di: 100% writing, 80% editing)
 10. Parikh, B. A., U. Baykal, **R. Di** and N. E. Tumer. 2005. Evidence for retro-translocation of pokeweed antiviral protein from endoplasmic reticulum into cytosol and separation of its activity on ribosomes from its activity on capped RNA. *Biochem.* 44:2478-2490.
(Di: 25% writing, 10% editing)
 9. Hudak, K. A., B. A. Parikh, **R. Di**, M. Baricevic, M. Santana, M. Seskar and N. E. Tumer. 2004. Generation of pokeweed antiviral protein mutations in *Saccharomyces cerevisiae*: evidence that ribosome depurination is not sufficient for cytotoxicity. *Nucleic acids Res.* 32:4244-4256.
(Di: 50% initiation; 30% writing, 25% editing)
 8. **Di, R.**, J. Kim, M. N. Martin, T. Leustek, J. Jhoo, C.-T. Ho and N. Tumer. 2003. Enhancement of the primary flavor compound methional in potato by increasing the level of soluble methionine. *J. Agri. Food Chem.* 51:5695-5702.
(Di: initiation; 100% writing, 75% editing)
 7. **Di, R.**, C.-C. Hu and S. A. Ghabrial. 1999. Complete nucleotide sequence of bean pod mottle virus and its comparisons with other comoviruses. *Virus Genes* 18(2):129-137.
(Di: initiation; 100% writing, 75% editing)
 6. Trick, H. N., R. D. Dinkins, E. R. Santarem, **R. Di**, V. Samoylov, C. A. Meurer, D. R. Walker, W. A. Parrott, J. J. Finer and G. B. Collins. 1997. Recent advances in Soybean transformation. *Plant Tiss. Cult. Biotech.* 3:9-26.
(Di: 25% writing and editing)
 5. **Di, R.**, G. B. Collins and S. A. Ghabrial. 1996. Production of transgenic soybean lines expressing the bean pod mottle virus coat protein precursor gene. *Plant Cell Rep.* 15:746-750.
(Di: 50% initiation; 100% writing, 80% editing)
 4. **Di, R.**, S. P. Dinesh-Kumar and W. A. Miller. 1993. Translational frameshifting by barley yellow dwarf virus RNA (PAV serotype) in *Escherichia coli* and in cell-free extracts. *Mol. Plant Microbe Inter.* 6(4):444-452.
(Di: 80% writing, 50% editing)
 3. **Di, R.**, J. H. Hill and R. A. Van Deusen. 1993. Antigenic signature analysis reflects differences among plant virus isolates. *J. of Virol. Methods*, 42:281-292.
(Di: 100% writing, 75% editing)

2. **Di, R.**, J. H. Hill and A. H. Epstein. 1990. Double-stranded RNA associated with the rose rosette disease of multiflora rose. *Plant Disease* 74:56-58.
(Di: 50% initiation; 100% writing, 75% editing)
1. Huang, C., **R. Di** and Y. Ma. 1988. Transmission of black pepper mosaic disease. *Chinese J. of Tropical Crops* 9:121-125.
(Di: initiation; 50% writing and editing)

Manuscripts in preparation

- Di, R.**, L. Wang and Y. Luo. Draft genome sequence of *Streptomyces auteovorticillatus* HN6, an antagonistic isolate against *Fusarium oxysporum* f. sp. *cubense* race 4.
Genome Announcements
(Di: 50% initiation; 100% writing and editing)
- Di, R.**, J. P. Munafo Jr, S. Komarnytsky and T. J. Gianfagna. Effect of Easter Lily (*Lilium longiflorum* Thunb.) steroidal glycosides on wound healing gene expression in human fibroblast cells.
(Di: 50% initiation; 50% writing and editing)
- Hong, L., C. Long, M. A. Lawton and **R. Di**. Amyloid b-induced pathological behaviors are suppressed by *Lycoris* spp. extracts in transgenic *Caenorhabditis elegans* (CL 2355).
(Di: initiation; 50% editing)

Manuscripts in preparation (results only)

- Dominic, R. D., A. Dionne, W.-H. Wu, K. Matthews and **R. Di**. Potato snakin-1 inhibits *E. coli* O157:H7 replication *in vitro* and the bacterial uptake into transgenic Arabidopsis plants
- Di, R.** Anti-inflammatory activities of mogrosides from *Momordica grosvenori* in human U937 macrophage cells.
- Di, R.** and N. E. Tumer. Effect of pokeweed antiviral protein on HCV internal ribosome entry site.

Invited presentations

- Di, R.** Oct. 31, 2016. "Detection of *Ralstonia solanacearum* r3b2 by the portable BLITZ and POCKIT systems", 9th Tripartite Meeting, Oct. 30 to Nov. 2, 2016, Maresias, Brazil.
- Di, R.** Aug. 5, 2016. "From Plant Pathogens to Human Health", Dept. of Horticulture, Yungnam University, South Korea.
- Di, R.** Aug. 8, 2016. "Genetic engineering plants for disease resistance and stress tolerance", Citrus Research Institute, Rural Development Administrative, South Korea.
- Di, R.** Aug. 9, 2016. "Genetic engineering plants" and "Molecular mechanisms of natural products for human health", National Institute of Horticultural and Herbal Sciences, Rural Development Administrative, South Korea.
- Di, R.** 2015. An honorary presentation, "From Plant Pathogens to Human Health", Dept. of Plant Pathology and Microbiology, March, 10, 2015, Iowa State University, Ames, IA, USA.
- Di, R.** 2013. (1) Application of biotechnology in detecting quarantine plant pathogens; (2) Detection of quarantine pathogen *Ralstonia solanacearum* R3b2

using surface plasmon resonance technology. International Symposium on Quarantine and Identification Technology of Seed-borne Diseases, Aug. 31-Sept. 3, 2013, Shanghai, China.

Di, R. 2011. Detection of plant pathogens using surface plasmon resonance technology. APS-IPPC Joint Meeting, Aug. 6-10, 2011, Hawaii, HI, USA.

Di, R. 2009. New drugs against hepatitis C virus from pokeweed. Microbiology at Rutgers Third Annual Mini-Symposium, Jan. 29-30, 2009, New Brunswick, NJ, USA.

Oral presentations in conferences

Di, R. July 21, 2015. Genetic engineering soybean for resistance to soybean cyst nematode. Annual Meeting of Chinese Society for Plant Pathology.

(Di: 100% contribution)

Di, R. and C. Long. 2015. Using amyloid beta-expressing transgenic *C. elegans* CL4176 to screen acetylcholinesterase-inhibiting alkaloids from *Lycoris radiata* to treat Alzheimer's disease. 13th Annual National Symposium on Medicinal Plants and Phytomedicine, Fuzhou, China, July 2015. Page 23 in the Proceedings.

Di, R. and M. A. Lawton. 2015. Mechanism of deoxynivalenol (DON) toxicity in *C. elegans* and genetic engineering plants for *Fusarium* head blight resistance. Annual meeting of the USDA-NIFA Multistate Project "Mycotoxins: Biosecurity, Food Safety and Biofuels Byproducts NC1183", Oct. 9, 2015, Lexington, KY.

Di, R., H. Zhang and M. A. Lawton. 2014. Mechanisms of deoxynivalenol toxicity in *C. elegans*. 8th Tripartite Workshop for Sustainable Technology Innovations, Nov. 14-16, 2014, Rutgers, NJ.

(Di: initiation; 100% preparation and 90% editing)

Di, R., L. Zhao and L. Levy. 2013. Detection of plant quarantine pathogens using surface plasmon resonance technology. ICPP conference, Aug. 25-30, 2013, Beijing, China.

Di, R. and N.E. Tumer. 2008. Inhibition of HCV IRES by pokeweed antiviral protein non-toxic mutants. XIV International Congress of Virology, Aug. 10-15, 2008, Istanbul, Turkey.

Di, R., V. Shete and N. E. Tumer. 2006. Inhibition of the cytotoxicity of Shiga-like toxins in *Saccharomyces cerevisiae*. For the NIAID region II center of excellence for biodefense and emerging infectious disease research conference, Third Annual Retreat, Oct. 29-31, 2006, Bolton Landing, NY.

Di, R. and N. E. Tumer. 2005. Expression of a truncated form of ribosomal protein L3 confers resistance to pokeweed antiviral protein. ASV 24th Annual Meeting, June 18-22, 2005, University Park, PA. In Proceedings of ASV 24th Annual Meeting, Session of "Plant virus II. Interaction with the host". p.127.

Di, R., K. Hudak, M. Santana, M. Baricevic, M. Seskar and N. Tumer. 2002. Characterization of pokeweed antiviral protein mutations in *Saccharomyces cerevisiae*: Dissociation of cytotoxicity from depurination of ribosomal RNA. ASV 21st Annual Meeting, July 20-24, 2002, Lexington, KY. In Proceedings of ASV 21st Annual Meeting. p.108.

Tumer, N. E., **R. Di,** K. Hudak and O. Zoubenko. 1999. Broad spectrum pathogen resistance by expression of nontoxic forms of pokeweed antiviral protein. ICGEB China Workshop on Plant Biotechnology, May 19-22, 1999, Beijing, China. In

- Proceedings of ICGEB China Workshop on Plant Biotechnology. p.149. (oral presentation by N. E. Tumer).
- Di, R.**, J. Kim, T. Leustek and N. E. Tumer. 1999. Increased production of methionine in potato plants by genetic engineering. ICGEB China Workshop on Plant Biotechnology, May 19-22, 1999, Beijing, China. In Proceedings of ICGEB China Workshop on Plant Biotechnology. p.153.
- Paul, C. P., S. P. Dinesh-Kumar, V. Brault, **R. Di**, S. Wang and W. A. Miller. 1993. Control signals for ribosomal frameshifting in barley yellow dwarf virus. IXth International Congress of Virology, Glasgow, Scotland, Aug. 8-13, 1993. In Proceedings of IXth International Congress of Virology. p.328. (oral presentation by W. A. Miller).
- Di, R.**, G. B. Collins and S. A. Ghabrial. 1993. Transformation of soybean with bean pod mottle virus coat proteins-precursor gene using the biolistic method. APS Annual Meeting, Nov. 6-10, 1993, Nashville, TN. *Phytopathology* 83:1374.
- Di, R.**, V. Brault, S. P. Dinesh-Kumar and W. A. Miller. 1992. Control of translational frameshifting by barley yellow dwarf virus RNA. APS Annual Meeting, Aug. 8-12, 1992, Portland, OR. *Phytopathology* 82 abstract.

Poster presentations in conferences

- Di, R.** and S. Bonos. 2017. CRISPR-gene editing of creeping bentgrass to improve stress tolerance and disease resistance. 26th Annual Rutgers Turfgrass Symposium, Jan. 13, 2017. Page 35 in the Proceedings.
(Di: initiation; 100% preparation)
- Di, R.** and S. Bonos. 2016. Gene editing of creeping bentgrass to improve stress tolerance and disease resistance. 25th Annual Rutgers Turfgrass Symposium, Mar. 18, 2016. Page 52 in the Proceedings.
(Di: initiation; 100% preparation)
- Zhao, H., K. Y. Cheong, S. Li, C.-T. Ho, M. A. Lawton and **R. Di**. 2015. Citrus peel polymethoxyflavones reduce intestinal fat deposition in *Caenorhabditis elegans*. Lipids and Metabolic Diseases, An Inaugural Symposium of the New Jersey Institute for Food, Nutrition, and Health, Rutgers, Nov. 5, 2015.
(Di: initiation; 50% preparation and editing)
- Di, R.**, L. Zhao and L. Levy. 2014. Detection of quarantine pathogens with bio-layer interferometry-based BLITZ system. 2014 APS Meeting, Minneapolis, MN.
(Di: initiation; 100% preparation)
- Zhao L., L. Levy and **R. Di**. 2013. Detection of *Ralstonia solanacearum* using portable surface plasmon resonance technology. 2013 APS-MSA Joint Meeting, Austin, TX.
(Di: initiation; 100% preparation)
- Conicella, A. and **R. Di**. May 2012. Expression of thermostable α -amylase in higher plants for the production of bioethanol. 7th Annual Tripartite Meeting of the Americas, Columbus, OH.
(Di: initiation; 100% preparation)
- Di, R.**, A. Conicella and E. Lam. June 2010. Expressing cellulosic biomass degrading enzymes in bacterial cells and tobacco plants. 1st International Summer Symposium on Biofuels and Bioenergy, Rutgers.

- Di, R.** and N. E. Tumer. Feb. 2008. Inhibition of the cytotoxicity of Shiga-like toxins in *Saccharomyces cerevisiae*. 2nd Annual Microbiology at Rutgers University Mini-Symposium.
- Di, R.**, V. Shete and N. E. Tumer. Oct. 2007. Inhibition of the cytotoxicity of Shiga-like toxins in *Saccharomyces cerevisiae*. Biotech Center 20th Anniversary Symposium.
- Di, R.** and N. E. Tumer. Jan. 2007. A sensitive and specific real-time PCR assay for the detection of Shiga toxin-producing *Escherichia coli* O157:H7 in food. 1st Annual Microbiology at Rutgers University Mini-Symposium.
- Di, R.**, A. Blechl, R. Dill-Macky, A. Tortora and N. E. Tumer. 2006. Expression of a truncated form of ribosomal protein L3 in transgenic wheat confers resistance to deoxynivalenol and *Fusarium* head blight. In Proceedings of 2006 National Fusarium Head Blight Forum.
- Di, R.** and N. E. Tumer. 2006. A sensitive and specific real-time PCR assay for the detection of Shiga toxin-producing *Escherichia coli* O157:H7 in food. For NERCE/BEID and NBC (Northeast Biodefense Center) third Annual Retreat.
- Di, R.** and N. E. Tumer. 2004. Expression of the yeast L3 and the pokeweed antiviral protein genes confers resistance to trichothecene mycotoxins. For the 2004 New York Area Plant Molecular Biology Meeting, New Brunswick, NJ.
- Di, R.** and N. E. Tumer. 2003. Expression of the yeast L3 and the pokeweed antiviral protein genes confers resistance to trichothecene mycotoxins. In Proceedings of 2003 National Fusarium Head Blight Forum. p.13.
- Di, R.** and G. B. Collins. 1996. *Agrobacterium* mediated transformation of soybean embryonic axes. In Proceedings of 6th Biennial Conference Molecular and Cellular Biology of the Soybean. p.36.
- Dinesh-Kumar, S. P., V. Brault, **R. Di** and W. A. Miller. 1992. Translational control of barley yellow dwarf virus. In Proceedings of ASV 11th Annual Meeting .
- Di, R.**, V. Brault, S. P. Dinesh-Kumar and W. A. Miller. 1991. Translation control of barley yellow dwarf virus. *Phytopathology* 81: (abstract).
- Brault, V., **R. Di** and W. A. Miller. 1991. BYDV sequence causes translational frameshifting in oat cells. In Proceedings of 20th Annual Meetings of Keystone Symposia on Molecular & Cellular Biology, supplement 15A.
- Brault, V., **R. Di** and W. A. Miller. 1991. A BYDV sequence causes translational frameshifting in *E. coli* and oat cells. In Proceedings of ISU Life Sciences Symposium.
- Miller, W. A., **R. Di** and S. P. Dinesh-Kumar. 1990. Frameshifting and internal initiation in translation of barley yellow dwarf virus RNA. In Proceedings of VIIIth International Congress of Virology. p.53.
- Di, R.**, J. H. Hill and R. A. Van Deusen. 1990. Relationships among serotypes of cowpea severe mosaic virus as determined by signature analysis. In Proceedings of the 1990 Joint Annual Meeting of the American Phytopathological Society and the Canadian Phytopathological Society.
- R. Di** and W. A. Miller. 1990. Frameshift in translation of BYDV RNA. In Proceedings of the 1990 Joint Annual Meeting of the American Phytopathological Society and the Canadian Phytopathological Society.

Oral and poster presentations in CAFT, Rutgers University

CAFT (Center for Advanced Food Technology), Rutgers University sponsors multidisciplinary, university-wide, fundamental research of relevance to the Food Industry. Twice a year, both oral and poster presentations for the research projects are given in conferences attended by CAFT member company representatives.

July 2009-2012, Cluster for health promotion of foods

Di, R. Study the molecular mechanisms of anti-inflammatory activities of mogrosides (glycosides) from the fruit of *Momordica grosvenori* Luohanguo.

July 2006-June 2009, Cluster for health promotion of foods

Di, R., C.-T. Ho and M.-T. Huang. Anti-inflammatory and anticarcinogenic activities of mogrosides (glycosides) from the fruit of *Momordica grosvenori* Luohanguo.

July 2006-Present, Cluster for food safety and security

Di, R. and N. E. Tumer. Detection of Shiga-like toxins produced by *E. coli* O157:H7 in foods using a surface plasmon resonance biosensor.

July 2004-June 2006, Cluster for food safety and security

Di, R. and N. E. Tumer. A real-time PCR assay for detection of a food pathogen.

July 2001-June 2003, Cluster for health promotion of foods

Di, R. and N. E. Tumer. Production of phytoestrogen genistein in potato and tomato by genetic engineering.

July 1998-June 2000, Cluster for flavor science applications in foods

Di, R. and N. E. Tumer. Enhancement of flavor precursors in potato by genetic engineering.

Seminars within Rutgers

Di, R., Jan. 11, 2008, RNA club, Rutgers
Shiga toxins and ribosomal protein L3

Di, R., Nov. 17, 2006, Seminar in the Dept. of Plant Science and Pathology, Rutgers
New insights into the interaction between ribosomal protein L3 and toxins pokeweed antiviral protein and deoxynivalenol

Di, R., Oct. 13, 2006, Dept. of Food Science, Rutgers
Real-time PCR detection of *E. coli* O157:H7 in food

Di, R., Nov. 18, 2005, RNA club, Rutgers
A truncated form of yeast L3 eliminates ribosome depurination when expressed together with pokeweed antiviral protein and confers resistance to trichothecene fungal toxins

Di, R., Oct. 15, 2004, RNA Club, Rutgers
Ribosomal protein L3 and resistance to trichothecene mycotoxins.

Presentations outside Rutgers

Di, R., Oct. 8, 2016, A Seminar Series for the Community at Lenape High School, NJ, “Transgenic Plants and Plant Biotechnology”.

Di, R., March 13, 2013, Lehman College, “Study the molecular mechanisms of anti-inflammatory and other health beneficial activities of plant extracts in mammalian cells, mouse model and *C. elegans*”

Di, R., June 2009, Institute of Tropical Bioscience and Biotechnology/Chinese Academy of Tropical Agricultural Science, “Inhibition of hepatitis C virus by pokeweed antiviral protein”

Di, R., June 2008, Institute of Tropical Bioscience and Biotechnology/Chinese Academy of Tropical Agricultural Science, “Shiga toxins and ribosomal protein L3”

Di, R., June, 2005, Fujian Agriculture University, Fuzhou, Fujian, China, “A truncated form of yeast L3 eliminates ribosome depurination when expressed together with pokeweed antiviral protein and confers resistance to trichothecene fungal toxins”

Di, R., Oct. 2003, South China University of Tropical Agriculture, Haikou, Hainan, China, “Pokeweed Antiviral Protein (PAP): Dissection of Disease Resistance by Microarray Analysis and Functional Genomics”

Di, R., Aug. 2002, South China University of Tropical Agriculture, Haikou, Hainan, China; (1) Enhancement of potato flavor by genetic engineering; (2) Production of genistein in potato and tomato

Current grants

M. Lawton (PI) and **R. Di (Co-PI)**

USDA Multistate, “Mycotoxins: Biosecurity, Food Safety and Biofuels Byproducts” (NC129, NC1025), \$25,000, 10/15/2015-9/30/2020.

P. Falkowski (PI), O. Levitan (Co-PI), D. Bhattacharya (Co-PI), **R. Di (Co-PI)** and M. Lawton (Co-PI)

NSF-EAGER, “Elucidating retrograde signal transduction processes in a marine diatom”, \$298,400, 10/1/2015-9/30/2017.

R. Di (PI, as the international collaborator) and W. Miao (PI, Hainan University, China)

Hainan Provincial Council of Science and Technology, Hainan, China, “CRISPR-gene editing of rubber tree to improve powdery mildew disease resistance”, 600,000 RMB, 1/1/2016-12/31/2017.

Grant-in-aid, gift

R. Di, Institute of Tropical Bioscience and Biotechnology, Chinese Academy of Tropical Agricultural Science, Hainan, China, \$9,985, 11/5/2015.

Previous grants

R. Di (PI) and S. Bonos (Co-PI)

Rutgers Turfgrass Research Program, “Gene editing of creeping bentgrass to improve stress tolerance and disease resistance”, \$16,000, 3/1/2015-12/31/2016.

E. Lam (PI), **R. Di (Co-PI)** and B. Huang (Co-PI)

Rutgers Turfgrass Research Program, “Exploration of the grass BI-1 ortholog as a quantitative biomarker for drought tolerance improvement”, \$8,000, 3/1/2015-12/31/2015.

R. Di (PI)

NJAES HATCH fund, “Improvement of crop disease resistance and stress tolerance by CRISPR/Cas gene editing”, \$5,000, 12/1/2014-11/30/2015.

R. Di (PI) and L. Levy (Co-PI)

USDA Farm Bill, “Evaluation of surface plasmon resonance (SPR) for the detection of quarantine plant pathogens and use of a portable SPR device (*SPIRIT*) in field labs”, \$454,594, 7/1/2010-9/29/2015.

R. Di (PI) and D. Kobayashi (Co-PI)

Rutgers, SEBS, Instructional Computing Fund (ICF), “Digitization for Plant Microscopy Instructions at Rutgers University”, \$4174.06, 2014-2015. The fund was used to purchase one stereo dissecting microscope, one stereo microscope with high resolution digital camera, an inverted microscope and a desktop computer to digitize the microscopic teaching in our teaching laboratory in Rm104 Foran Hall.

R. Di (PI) and L. Levy (Co-PI)

USDA-APHIS Science Fellows Program, “Evaluation of surface plasmon resonance (SPR) for the detection of quarantine plant pathogens and use of a portable SPR device (*SPIRIT*) in field labs”, \$200,000, 10/1/2010-9/30/2014.

R. Di (PI)

CAFT/Rutgers, “Study the molecular mechanisms of anti-inflammatory activities of mogrosides (glycosides) from the fruit of *Momordica grosvenori* Luohanguo”, \$45,000, 7/1/2009-6/30/2012.

R. Di (PI)

New Jersey Soybean Board, “RNAi-mediated resistance of transgenic soybean to soybean cyst nematode”. \$10,000, 7/1/2010-6/30/2012.

M. Karwe (PI), R. D. Ludescher (Co-PI), C.-T. Ho (Co-PI) and **R. Di (Co-PI)**

CAFT/Rutgers, “Effect of thermal processing and high hydrostatic pressure processing (HHPP) on the antioxidant capacity of muscadine grape, blueberry, and cranberry juices”, \$45,000, 7/1/2009-6/30/2012.

Nanda, V. (PI), **R. Di (Co-PI)**, A. Laouar (Co-PI), R. Ludescher (Co-PI) and P. Lobel (Co-PI).

NIH-NIAID, “Structure-based engineering of allergens to enhance digestibility”. \$429,000, 4/1/2010-3/31/2012.

R. Di (PI), B. Clarke (Co-PI) and J. White (Co-PI).

Rutgers, SEBS, Instructional Computing Fund (ICF), “Digitization of Microscopy for Undergraduate and Graduate Instruction in Plant Biology at Rutgers University”, \$3,449.27 plus \$200 matching fund from PBP department. Nov. 2011. The fund was used to purchase one stereo dissecting microscope, one compound microscope, two Dino-

Lite digital cameras (DinoEye) and a laptop computer to digitize the microscopic teaching in our teaching laboratory in Rm194 Foran Hall.

N. E. Tumer (PI) and **R. Di** (Co-PI, initiating the idea).

Rutgers Vice President Instrument Fund, “Acquisition of ITC₂₀₀ for the SEBS Core Facility”. \$115,920. Nov. 2011.

R. Di (PI), C.-T. Ho (Co-PI) and M.-T. Huang (Co-PI)

CAFT, Rutgers University, “Anti-inflammatory and anticarcinogenic activities of mogrosides (glycosides) from the fruit of *Momordica grosvenori* Luohanguo”, \$39,000, 7/1/2006-6/30/2009.

R. Di (PI) and N. E. Tumer

NIH, “Effect of pokeweed antiviral protein on hepatitis C virus IRES”, \$154,000, 1/15/2006-12/31/2008.

N. E. Tumer, **R. Di (Co-PI)** and W. Cohick

NIH, “Identification of the ribosomal target of Shiga-like toxins”, \$385,000, 4/1/2006-3/31/2008.

N. E. Tumer and **R. Di (Co-PI)**

USDA, “Modification of the ribosomal target to enhance resistance to trichothecene Mycotoxins”, \$313,270, 5/1/2002 – 4/31/2008.

N. E. Tumer (PI) and **R. Di (Co-PI)**

CAFT, Rutgers University, “Detection of Shiga-like toxins produced by *E. coli* O157:H7 in foods using a surface plasma resonance biosensor”, \$42,000, 7/1/2006-6/30/2009.

N. E. Tumer (PI) and **R. Di (Co-PI)**

CAFT, Rutgers University, “A real-time PCR assay for detection of a food pathogen”, \$28,000, 7/1/2004-6/31/2006.

R. Di (Advisor) and N. E. Tumer (Co-Advisor)

Rutgers Undergraduate Research Fellows Program, “Effects of pokeweed antiviral protein on hepatitis C virus internal ribosome entry site”, (for John Ruppert, Junior, biotechnology major), \$1500, 7/1/2004-6/30/2005.

R. Di (PI) and N. E. Tumer (Co-PI)

CAFT, Rutgers University, “Production of phytoestrogen genistein in potato and tomato”, \$28,000, 7/1/2001-6/31/2003.

Scientific journal editorial board

Since December 2012, an Editorial Board Member for International Journal of Food Science.

Since March 2014, an Editorial Board Member for Journal of Plant Health.

Editorial reviewing manuscripts

4/12/2016, Punyasiri et al. Genetic variation of flavonols quercetin, myricetin and kaempferol in the Sri Lankan tea (*Camellia sinensis* L.) and their health-promoting aspects. *Int. J. Food Sci.*

7/25/2014, Ogunraku *et al.* Water extractable phytochemicals from peppers (*Capsicum* Spp) inhibit acetylcholinesterase and butyrylcholinesterase activities and pro-oxidants induced lipid peroxidation in rat brain in vitro. *Int. J. Food Sci.*

6/13/2014, Concha-Meyer *et al.* *Listeria monocytogenes* survival in the presence of malic acid, lactic acid or blueberry extract. *Int. J. Food Sci.*

3/7/2014, Bukhari *et al.* Evaluation of efficacy of lactic acid as coagulant in the preparation of Kaladhi: A hard and dry cheese. *Int. J. Food Sci.*
2/11/2014, Gameda *et al.* Effect of essential oils on *Aspergillus* spore germination, growth and mycotoxin production: a potential source of botanical food preservative. *Int. J. Food Sci.*

Reviewing manuscripts

8/10/2016, Lin *et al.* CAP20, a perilipin-like gene, affects functional appressoria formation in *Colletotrichum gloeosporioides*. *Lett. Appl. Microb.*
8/9/2016, Zhou *et al.* Transgenic citrus expressing synthesized cecropin B genes in the phloem exhibits decreased susceptibility to Huanglongbing. *Plant Mol. Biol.*
7/27/2016, Zhu *et al.* Over-expression of pokeweed antiviral protein increases plant systemic resistance against Tobacco mosaic virus infection in *Nicotiana benthamiana*. *J. Plant Biol.*
6/6/2016, Zhou *et al.* The Characterization of three glucosyltransferase genes in tartary buckwheat and their expression after cold stress. *J. Agri. Food Chem.*
3/3/2016, No given authors. Determination of principles volatile compounds of nanocapsuled coconut shell-liquid smoke for food biopreservative. *J. Adv. in Food Sci. & Tech.*
10/3/2015, Islam and Yun. Characterization of nine Mlo family genes and analysis of their expression against pathogen infections in *Vitis flexuosa*. *Euphytica.*
9/30/2015, Wang *et al.* Hyper-production of a beta-glucanase Exg1 promotes the bioconversion of mogrosides in *Saccharomyces cerevisiae* mutants defective in mannoprotein deposition. *J. Agri. Food Chem.*
7/6/2015, Park *et al.* Triterpene and flavonoid biosynthesis and metabolic profiling of hairy roots, adventitious roots, and seedling roots of *Astragalus membranaceus*. *J. Agri. Food Chem.*
5/12/2015, Kumar *et al.* Soybean root transformation optimization by *Agrobacterium rhizogenes* for bioassays with nematodes and RT-qPCR reference gene validation. *Plant Cell Rep.*
4/19/2015, Slavokhotova *et al.* Prediction of *Leymus arenarius* (*L.*) antimicrobial peptides based on denovo transcriptome assembly. *Plant Mol. Biol.*
3/17/2015, Fan *et al.* Characterization, expression profiles of galactinol synthase family genes in response to abiotic stresses from *Manihot esculenta* Crantz. *Int. J. Mol. Sci.*
12/15/2014, Choi *et al.* Structural insights into how the lateral ribosomal stalk plays a role in recruiting the ribosome-inactivating proteins to the eukaryotic ribosomes". *Toxins.*
10/29/2014, Lin *et al.* Pheophytin a Inhibits Inflammation via Suppression of 9 LPS-Induced Nitric Oxide Synthase-2, Prostaglandin E2, and 10 Interleukin-1 β of Macrophages. *Int. J. Mol. Sci.*
4/27/2014, Sgambelluri *et al.* Metabolic profiling of amatoxins and phallotoxins in the genus *Lepiota* by liquid chromatography-mass spectrometry. *Toxins.*
1/6/2014, Cakir and Tumer. Arabidopsis Bax inhibitor-1 inhibits apoptotic-like cell death induced by pokeweed antiviral protein in *Saccharomyces cerevisiae*. *PLoSOne.*
12/20/2013, Cuang *et al.* A novel highly active recombinant glutaredoxin from *Chlorella* 1 sorokiniana T89. *J. Agri. Food Chem.*

11/25/2013, Lee *et al.* Suppression of inducible nitric oxide synthase expression by 8 nyasol and broussonin A, two phenolics from *Anemarrhena 9 asphodeloides*, through NF- κ B transcriptional regulation in vitro 10 and in vivo. *Int. J. Mol. Sci.*

8/6/2013, Tuan *et al.* Riboflavin accumulation and molecular characterization of cDNAs encoding bifunctional GTP cyclohydrolase II/3,4-dihydroxy-2-butanone 4-phosphate synthase, lumazine synthase, and riboflavin synthase in *Lycium chinense*. *J. Agri. Food Chem.*

8/6/2013, Merwas *et al.* Reliable alternative immuno-chromatographical detection method of Shigatoxin producing *Escherichia coli* O157:H7 in raw milk. *J. Food Safety.*

7/25/2013, Wang *et al.* Antioxidant and anti-inflammatory activities of crude extracts of *Acanthopanax trifoliatum* (L) Merr, an ilicifolius vegetable.). *J. Agri. Food Chem.*

4/2/2013, Kim *et al.* MYB Transcription Factors Regulate Glucosinolate Biosynthesis in Different Organs of Chinese cabbage (*Brassica rapa* ssp. *pekinensis*). *J. Agri. Food Chem.*

3/21/2013, Thang *et al.* Chemical constituents from the leaves of *Annona reticulata* and 7 their iNOS inhibiting activity. *Molecules.*

2/8/2013, Yuan *et al.* Effects of genetically modified T2A-1 rice on the GI health of rats after 90-day supplement. *Scientific Reports.*

1/16/2013, Zhu *et al.* Glucosinolate accumulation and its involved gene expression in pak choi (*Brassica rapa* L. ssp. *chinensis* var. *communis* (N. Tsen & S.H. Lee) Hanelt) plants in response to insecticide application. *J Agri. Food Chem.*

11/16/2012, Kim *et al.* Molecular cloning and characterization of triterpene biosynthetic genes and triterpene accumulation in *Panax ginseng*. *J. Agri. Food Chem.*

11/14/2012, Phukon *et al.* Unusual occurrence of *Staphylococcus warneri* as endophyte in fresh fruits along with usual *Bacillus* spp. *J. Food Safety.*

10/26/2012, Zeitler *et al.* Production of a de-novo designed antimicrobial peptide in *Nicotiana benthamiana*. *Plant Molecular Biology.*

10/10/2012, Gyawali *et al.* Survival and changes in cell morphology of *Escherichia coli* O157:H7 in the presence of caffeine. *J. Food Safety.*

9/9/2012, Hunyadi *et al.* Chlorogenic acid and rutine play a major role in the in vivo anti-diabetic activity of morus alba leaf extract on type II diabetic rats. *PLoS One.*

6/20/2012, Yang *et al.* Wogonoside displays anti-inflammatory effects through modulating inflammatory mediator expression using RAW264.7 cells. *Journal of Agricultural and Food Chemistry.*

3/5/2012, Yong *et al.* A monoclonal sandwich ELISA to detect *Escherichia coli* O157:H7 strains in green tea. *International Journal of Food Science & Technology.*

1/21/2012, Yin *et al.* Characterization of Mannanase from a Novel Mannanase-Producing Bacterium. *Journal of Agricultural and Food Chemistry.*

1/6/2012, Sang *et al.* Apoplastic location of harpin protein Hpa1Xoo induces apoplastic generation and cytoplasmic translocation of H₂O₂ required for pathogen resistance in *Arabidopsis*. *Plant Molecular Biology.*

12/8/2011, Guo *et al.* Secretion and Activity of an Antimicrobial peptide Cecropin D expressed in *Pichia pastoris*. *Journal of Agricultural and Food Chemistry.*

11/11/2011, Bin *et al.* Isolation, characterization and anti-quorum sensing activities of *Auricularia auticula* melanin. *Journal of Food Safety.*

9/1/2011, Lee *et al.* Critical Role of Peroxisome Proliferator Activated Receptor- δ on Body Fat Reduction in C57BL/6J and Human Apolipoprotein E2 Transgenic Mice Fed Delipidated Soybean. *Journal of Agricultural and Food Chemistry*.

7/22/2011, Hsiao *et al.* Functional characterization of *copA* gene encoding multicopper oxidase in *Xanthomonas campestris* pv. *Campestris*. *Journal of Agricultural and Food Chemistry*.

6/16/2011, Cheng *et al.* Cloning of a novel L-amino acid oxidase from *Trichoderma harzianum* ETS 323 and bioactivity analysis of overexpressed L-amino acid oxidase. *Journal of Agricultural and Food Chemistry*.

4/1/2011, Bae *et al.* Application of supercritical carbon dioxide for microorganism reductions in fresh pork. *Journal of Food Safety*.

2/8/2011, Park *et al.* Differential expression of anthocyanin biosynthetic genes and anthocyanin accumulation in tartary buckwheat cultivars 'Hokkai T8' and 'Hokkai T10'. *Journal of Agricultural and Food Chemistry*.

1/2/11, Yang *et al.* A novel L-amino acid oxidase from *Trichoderma harzianum* ETS 323 associated with antagonism of *Rhizoctonia solani*. *Journal of Agricultural and Food Chemistry*.

11/16/10, Kant *et al.* Transgenic corn plants with modified ribosomal protein L3 show decreased ear rot disease after inoculation with *Fusarium graminearum*. *Plant Cell Report*.

10/23/10, Medina *et al.* Effects of sugar addition on Luria Bertani (LB) media on *Escherichia coli* O157:H7. *Journal of Agricultural and Food Chemistry*.

9/29/10, Park *et al.* Differential expression of anthocyanin biosynthetic genes and anthocyanin accumulation in tartary buckwheat cultivars 'Hokkai T8' and 'Hokkai T10'. *Journal of Agricultural and Food Chemistry*.

7/8/2010, Chen *et al.* Study on the fragmentation of recombinant endochitinase during expression in *Escherichia coli*. *Journal of Agricultural and Food Chemistry*.

4/4/2010, Wang *et al.* Development and application of a loop-mediated isothermal amplification method on rapid detection *Escherichia coli* O157 strains from food samples. *Journal of Food Safety*.

3/11/2010, Cao *et al.* Transformation of pokeweed antiviral protein gene (PacPAP) from *Phytolacca acinosa* into cucumber. *Plant Breeding*.

11/20/2009, Brewster and Jeffrey. Evaluation of bacterial growth in water-in-oil emulsions for simultaneous enrichment of multiple pathogens. *Journal of Food Safety*.

10/24/09, Sitohy *et al.* Anti-viral action of methylated β -lactoglobulin on the human influenza virus A subtype H3N2. *Journal of Agricultural and Food Chemistry*.

4/8/09, Wu *et al.* Chemotype-dependent metabolic response to methyl jasmonate elicitation in *Artemisia annua*. *Journal of Agricultural and Food Chemistry*.

3/22/09, Li *et al.* Improved in real-time PCR detection of *Listeria monocytogenes* in meat based on locked nucleic acids. *Journal of Food Safety*.

3/18/09, Wang *et al.* Burdock fructooligosaccharide induces resistance to tobacco mosaic virus in tobacco seedlings. *Phytopathology*.

9/24/08, Hu *et al.* Antibody-mediated prevention of *Fusarium* mycotoxins in field. *International Journal of Molecular Sciences*.

7/31/08, Wang *et al.* Development and evaluation of a loop-mediated isothermal amplification (LAMP) method for detecting *Listeria monocytogens* in raw milk. Journal of Food Safety.

Teaching courses

Spring, 2015-2016, Plant Tissue Culture (and Engineering) 11:776:452, undergraduate course, 3 credits.

Spring, 2009-2011, 2013, 2014, 2016, Plant Biosecurity Issues and Technologies 11:776:405, undergraduate and graduate course as part of the Plant Biosecurity Certificate Program, 3 credits. <http://plantbiopath.rutgers.edu/synopses/11-776-405syllabus.pdf>

Spring, 2011-2012, Portals to Academic Study success 11:015:103 02, undergraduate Course, 1 credit.

Fall, 2016, Methods and Applications in Molecular Biology 11:126:427, undergraduate course. I co-taught this course with Dr. Wendie Cohick and Dr. Michael Lawton, giving 1/3 classroom lectures and teaching one of the three laboratory sections, 4 credits.

Fall, 2012-2014, Methods and Applications in Molecular Biology 11:126:427, undergraduate course. I co-taught this course with Dr. Wendie Cohick, giving 1/2 classroom lectures and teaching two of the three laboratory sections, 4 credits.

Fall, 2007-2011, Methods in Recombinant DNA Technology 11:126:427, undergraduate course. I co-taught this course with Drs. Wendie Cohick and Barbara Zilinskas, giving 1/3 classroom lectures and teaching one laboratory section, 4 credits.

Fall, 2009-2014, General Plant Pathology Laboratory 11:770:311, undergraduate course, 1 credit.

Spring, 2003-2016, Issues and Concepts in Biotechnology 11:126:110, undergraduate course, 1.5 credit. Each year I gave the guest lecture on “Plant Biotechnology”.

Spring, 2008, 2009, 2011, Introduction to Scientific Research 06:556:130, undergraduate course, 3 credits. I gave the guest lecture entitled “How to keep a lab notebook and how I started some of my research projects”.

Summer 2007, Governor School of Engineering and Technology for high school students from New Jersey. I co-organized the biology section of the summer school with Dr. Raul Machado, taught the students to run real-time PCR for the detection of *E. coli* O157:H7 in foods, arranged a field trip to Violet Packing LLC.

Fall 2003, Introduction to Plant Biology 16:765:501, graduate course, 3 credits. I was an assistant instructor, co-organized the course with Dr. Michael Lawton, arranged guest speakers and graded student papers.

I also gave two lectures, one was on writing a research proposal, the other one was a scientific article presentation.

Fall 2002, Introduction to Plant Biology 16:765:501, graduate course, 3 credits.

I was an assistant instructor, co-organized the course with Dr. William Meyer and Dr. Nilgun Tumer, arranged guest speakers and graded student papers.

Fall 2001, Introduction to Plant Biology 16:765:501, graduate course, 3 credits.

I was an assistant instructor, co-organized the course with Dr. Nilgun Tumer, arranged guest speakers and graded student papers.

Postdoctoral associate supervised

2010-2012 Issac John Khan, Structure-based engineering of allergens to enhance digestibility (NIH grant, Di: Co-PI)

2011-2012 Iris Camehl, Engineering barley for resistance to Fusarium head blight (Co-advisor)

Graduate student supervised

Fall 2013- Yee Chen Low, Ph. D in Plant Biology
Present Study FHB disease resistance mechanisms in *Brachypodium* and Arabidopsis (Advisor)

Fall 2013- Andoyo Ndengu, M.S. in Plant Biology (non-matriculated)
Present Study the anti-diabetic effect of glycosides in *C. elegans* (Advisor)

Fall 2015- Andreia Prata Vieira, Ph. D in Plant Biology (joint program with USP)
Fall 2016 Construction of plant models for functional study of sugarcane *thi1* gene variant (Co-advisor)

Fall 2015- Liya Hong, Ph. D Ethnobotany (visiting student from Minzu University of
Fall 2016 China
Anti-Alzheimer activities from *Lycoris* spp. extracts in *C. elegans* (Co-advisor)

Spring 2015 Vi Khanh Dao, M.S. in Food Science
The synergistic effect of chitosan on photosensitization of *Staphylococcus aureus* and *Escherichia coli* O157:H7 by sodium copper chlorophyllin (committee member)
(graduated in Spring 2015)

Spring 2015- George Condon, Ph.D in Entomology

- Present Ecological engineering for pest management of *Ostrinia nubilalis* Hübner (Lepidoptera: Crambidae) in New Jersey peppers (Committee member)
- Fall 2013- Spring 2016 Lin Ji, M.S. in Food Science
Effects of different drying and pasteurization methods on color, phenolics, and antioxidant activity of Luo Han Guo (*Siraitia grosvenorii*) drink (Committee member)
(graduated in Spring 2016)
- Fall 2014 Yang Jin Jung, Ph. D in Food Science
Extended-spectrum β -lactamase gene transfer under various conditions that *Klebsiella pneumoniae* of food origin can encounter in clinical and food production settings (Committee member)
(graduated in Fall 2014)
- Fall 2011- Spring 2015 Ying Wang, M.S. in Food Science
Characterization and application of carrot anti-freeze protein in keeping bacterial cell viability under low temperature (Committee member)
(graduated in Spring 2015)
- Summ. 2013- Dec. 2013 Badal Shah, MBS-Drug Discovery track
Study the anti-diabetic effect of steroidal glycosides from *Lilium longiflorum* in *C. elegans* (Advisor)
(graduated in Spring 2014)
- Fall 2013- Spring 2014 Kristie L. Butler, M.S. in Animal Science
Role of BCL-2 proteins in stress-induced apoptosis in a non-transformed mammary epithelial cell line. (Committee member)
(graduated in Spring 2014)
- 2012- May 2013 Ritupriya Yamujala, MBS in Genomics and Biotechnology
Study acetylcholine esterase inhibitors from *Lycoris* plant in *C. elegans* (Advisor)
(graduated in Spring 2013)
- Fall 2009- May 2013 Wen-Hsuan Wu, Ph.D in Food Science
Plant antimicrobial peptides against food pathogens (Co-advisor)
(graduated in Fall 2012)
- Fall 2012 Tana Hintz, M.S. in Food Science
The use of plant antimicrobial compounds for food preservation

- (Professor panel for the Plan B thesis)
 (Committee member)
 (graduated in Fall 2012.)
- Spring 2011- Malathi Sr Vakkalanka, M.S. in Food Science
 May 2014 Antihesion effects of pectic oligosaccharide on *E. coli* O157:H7
 (Committee member)
 (graduated in Spring 2014)
- Fall 2011- Lijuan Xin, M.S. (international student from Minzu University of China)
 Spring 2012 Studies on chemical constituents of three traditional medicinal plants and
 the bioactivities of alkaloids from *Lycoris radiate*
 (Co-advisor)
 (graduated in Spring 2012)
- Fall 2009- Siddhi Thakkar, M.S. in Food Science
 2012 Effect of thermal processing and high hydrostatic pressure processing
 (HHPP) on the antioxidant capacity of muscadine grape
 (Committee member)
 (graduated in Spring 2012)
- Spring 2009- Matthew W. Bickerton, M.S. in Entomology
 Summer 2011 Conservation of natural enemies of European corn borer (*Ostrinia
 nubilalis* Hubner) (Lepidoptera: Crambidae) in bell peppers
 (Committee member)
 (graduated in Spring 2011)
- Fall 2009- Vidya Endraiyani, M.S. in Food Science
 Spring 2011 Effect of thermal processing and high hydrostatic pressure processing
 (HHPP) on the antioxidant capacity of cacao pulp
 (Committee member)
 (graduated in Spring 2011)
- Spring 2009- Yu-Ching Guo, Ph. D in Food Science
 2010 Effects of inotilone on inflammation and inflammation-associated
 tumorigenesis
 (Committee member)
 (graduated in Fall 2011)
- Spring 2007- Eric Kyu, M.S. program in Microbiology and Molecular Genetics
 Fall 2009 Mechanisms of toxicity of Shiga-like toxins in *S. cerevisiae*
 (Advisor)
 (graduated in Fall 2009)
- Fall 2002- Marianne Baricevic, Ph.D program in Microbiology and Molecular
 Spring 2008 Genetics

Mechanisms of toxicity of ricin A chain in *S. cerevisiae*
(Committee member)
(graduated in Spring 2008)

Spring 2005- Varsha Shete, M.S. program in Food Sciences
Fall 2008 Characterization of Shiga-like toxin 1 in yeast cells
(Co-advisor)
(graduated in Fall 2008)

Fall 2004 Cindy Pielach, rotating Ph. D student.
Production of transgenic potato plants using ethionine as the selection
marker
(Advisor)

Undergraduate student research supervised

Spring 2016- Denia Cai Shi, Biotechnology, GH Cook General Honor Program
Present CRISPR-gene editing of Arabidopsis and grape to improve downy mildew
resistance; studying the anti-cancer activity of citrus pectic
oligosaccharides in *C. elegans*

Fall 2016- Sreshta Ravikumar, Biotechnology, GH Cook General Honor, Aresty
Present CRISPR-gene editing of barley to improve FHB resistance

Spring 2017- Xiaomeng Ma, Biochemistry
Present Mechanism of Shiga toxin cytotoxicity in *C. elegans*

Spring 2016- Caroline Morales, Molecular Biology and Biochemistry
Spring 2017 Anti-diabetes properties of orange POS in *C. elegans*
(graduated in Spring 2017)

Fall 2016- Samantha Shen, Biotechnology
Spring 2017 Production of transgenic Brachypodium expressing Arabidopsis Bax
inhibitor for drought tolerance

Spring 2016 Divya Shrivastava, Biotechnology
Anti-cancer properties of asparagus compounds in *C. elegans*
Transformation of duckweed
(graduated in Spring 2016)

Fall 2015 Zachary Aboff, Molecular Biology and Biochemistry
(Aresty Research Assistant)
Anti-cancer effect of asparagus saponins in *C. elegans*

Spring 2014- Kuanyu Cheong, Plant Science and Biotechnology, GHC Honor program
Spring 2016 Engineering barley for FHB resistance
Study the mechanisms of Shiga toxins in *C. elegans*

- (graduated in Spring 2016)
- Fall 2014- Richard Darryl Dominic, Plant Science
Spring 2016 Antimicrobial peptide in plants to resist uptake of *E. coli* O157:H7
(graduated in Spring 2016)
- Spring 2013- Erika Kruse, Genetics
Spring 2014 Genetic engineering tomato to produce genistein
(graduated in Spring 2014; entered into Washington State University Ph. D program in Fall 2014)
- Fall 2012- Alexandria Dionne, Biotechnology
Spring 2014 Transformation of starch converting and cellulose degrading enzymes into *Nicotiana tabacum* and *Brachypodium distachyon*, as an attempt to propagate self-degrading second-generation biofuel crops
Molecular analysis of *Arabidopsis thaliana* expressing snakin-1 to engineer resistance to *Escherichia coli* O157:H7 uptake
(graduated in Spring 2014)
- Spring 2013- Jordan Serville, Biotechnology
Fall 2014 Genetic engineering antimicrobial peptide genes into plants
(graduated in Fall 2014)
- Summer 2011 David Giroux, Biotechnology
-Spring 2013 Aresty Summer Research, Research Credit, GH Cook Honor
Genetic engineering of grasses for biofuel
(graduated in Spring 2014)
- Fall 2012 Joshua Roden, Biotechnology
Tissue culture and transformation of potato and cassava
(graduated in Spring 2014)
- Summ. 2009- Alexander Conicella, Molecular Biology and Microbiology
Spring 2012 Aresty Summer Student, then research program
Biofuel research
(graduated with the highest honor thesis in MBM in Spring 2012; entered into Ph. D program at Brown University in Fall 2012)
- Fall 2011- Marissa Letinski, Food Science
Spring 2012 Aresty RA
Engineering potato to express plant antimicrobial peptide
- Fall 2011 Ike Nnyamah, Biotechnology
Molecular detection of *E. coli* O157:H7 using SPR imaging
(graduated in Spring 2014)

- Spring 2011 Bhumika Patel, Biotechnology
Production of transgenic potato expressing plant antimicrobial peptides
- Spring 2009 Joshua Song, Cook General Honors Program, tutorial II
Plant biotechnology
- Fall 2008 Joshua Song, Cook General Honors Program, tutorial I
Plant biotechnology
- Fall 2005-
Fall 2008 Andrew Tortora, sophomore to senior, Biology
Expression of yeast ribosomal protein L3 in transgenic wheat plants confers resistance to *Fusarium* trichothecene mycotoxins
- Fall 2005 Craig Pritch, senior, Biotechnology major.
The effect of PAP on HCV IRES
- Fall 2002-
Spring 2005 John Ruppert, sophomore to senior, Biotechnology, Cook General Honors Program, Honors Tutorial I to VI.
Translation inhibition of HCV IRES by PAP mutants
(graduated in May, 2005; entered Ph. D program in the Graduate Program of Ecology at Rutgers University in Fall 2005; graduated)
- Summer 2003 Eric Kyu, Biotechnology major.
-Spring 2004 Pokeweed antiviral protein induced plant viral and fungal resistance mediated through the lipoxigenase gene
Introduction of soybean isoflavone synthase and genistein into potato and tomato by genetic engineering
Mechanisms of disease resistance induced by pokeweed antiviral protein in *Nicotiana benthamiana*
(graduated in May, 2004; joined Genewiz company in New Brunswick, NJ, 2004-2006)
- Fall 2003 Hussain Darbar, junior, Biochemistry major.
Interaction of pokeweed antiviral protein with yeast ribosomal protein L3
(graduated in Spring 2004)
- Fall 2002 Tina Tahiliani, junior, Biotechnology and Economics major
Production of isoflavone genistein in non-legume's, namely tomato to add health benefits
- Spring 2002 Rocio Ricaldi, senior, Biotechnology major.
Rice transformation and regeneration for disease resistance by genetic engineering

High school student research supervised

Summer 2015 Cynthia Chen. Anti-cancer effect of asparagus saponins in *C. elegans*

- Summer 2014 Andrew Goldwasser. Anti-diabetes effect of plant extracts in *C. elegans*
(came to Rutgers in Fall 2014 to major in Biotechnology)
- Summer 2011 Edward Kong. Inhibition of *E. coli* O157:H7 uptake from soil by
transgenic *Arabidopsis* plants expressing antimicrobial peptide
(went to Yale University in 2013 to major in Biomedical Engineering)
- Summer 2009 Sandra Korn. Creation of transgenic and transplastomic plants expressing
cellulosic biomass degrading enzymes to facilitate bioethanol production
- Summer 2005 Darnesh Boucard, a SEED program student (by American Chemical
Society to train economically disadvantaged minority high school students)
Identification of transgenic wheat plants expressing yeast ribosomal
protein L3
Darnesh's poster won the 2nd prize in the Project SEED student's research
symposium.

Services within Rutgers

(1) November 2016

I become one of the members in the Plant Biology Graduate Admission Committee.

(2) 2008-Present

I am the Director of the Plant Biosecurity Certificate Program

(http://catalogs.rutgers.edu/generated/nb-ug_current/pg861.html)

(3) Fall 2015-Present

I am an upper class advisor for students in the Biotechnology Major in SEBS/Rutgers.

(4) 2010-2015

I am the advisor for freshman students in the Biotechnology Major in SEBS/Rutgers.

(5) Nov. 2013-present

I am a co-coordinator for the MBS-Global Agriculture concentration.

I helped the signing of the MOU between Rutgers and two Chinese universities, China
Agricultural University and Nanjing Agricultural University in 2014-2015.

(6) Member of graduate programs

Since 2008, Full member of the Food Science Program

Since 2012, Full member of the Plant Biology Program

Since 2012, Full member of the Microbiology and Molecular Genetics Program

(7) Apr. 29, 2014

I volunteered to be on the panel for the GMO debate in a public forum in Mount Laurel.

(8) 2009-2013

I was one of the international liaisons for the NSF-funded IGERT Biofuels at Rutgers,
coordinating the collaboration between Rutgers and the following Chinese institutes: the
Institute of Tropical Bioscience and Biotechnology/Chinese Academy of Tropical

Agricultural Science, Hainan, China; Kunming Botanical Institute/Chinese Academy of Sciences; Guangxi Academy of Sciences.

(9) April 2011

I facilitated the communications between Rutgers and the following universities and institutes in China for the trip that Dean Goodman and I and Ms. Lauren Randolph (Director, Study Abroad) participated in (May 1 to May 13): Beijing University of Agriculture, China Agricultural University, Beijing Institute of Genomics/Chinese Academy of Sciences, Microbiology Institute/Chinese Academy of Sciences and Jiling University.

(10) 1997-2009

As a member of Dr. Tumer's laboratory, I took the major responsibilities of helping Dr. Tumer managing the lab by keeping tracks of our accounts, ordering and receiving supplies, being the lab safety officer, maintaining equipments and facilities, helping training undergraduate and graduate students etc.

(11) April 7, 2009

I made a poster entitled "Detecting food-contaminating pathogens with two molecular technologies" to promote the Biotech Center in SEBS/Rutgers at the Rutgers Day.

(12) Feb. 2005, Feb. 2006, Feb. 2007, Feb. 2008

I participated in the Douglass Science Career Exploration Day entitled "Women in Science---Join the Force". The day-long programs were attended by high school girls and their parents, who participated in panel discussions about career opportunities.

(13) Apr. 18, 2008

I gave a tour of Foran Hall and the Biotech Center for students from Brookdale Community College who are potential participants of the Douglass Project for Rutgers Women in Math, Science and Engineering.

(14) March 22, 2006

During "Daxing Delegation Visit to New Jersey", I was the translator for Dean Robert Goodman and helped with the tour of the Biotech Center by the center director Dr. Gerben Zylstra.

(15) June 2003

I met with reporter Pat Alex from Bergen Record. This meeting resulted in an article entitled "Rutgers site fertile ground for research" which was circulated by the Associated Press to several newspapers including The World Journal in Chinese.

(16) August 1, 2003

I helped coordinating tours for the Douglass Summer Institute – 11th grade high school girls who were interested in math and science.

International collaborations

I have hosted visiting scientists:

(1) Ms. Xiaoling Yu, a researcher from Institute of Tropical Bioscience and Biotechnology (ITBB), Chinese Academy of Tropical Agricultural Science, Hainan, China; May – November 2012; to conduct research on genetic engineering of cassava to facilitate the conversion of starch into fermentable sugar.

(2) Ms. Lijuan Xin, a M.S. student from Dr. Chun Long's lab in China Minzu University, China; Nov. 2011-May 2012; on Chinese government scholarship; to study the anti-diabetic and anti-Alzheimer's activities of botanical extracts for part of her research thesis.

(3) Mr. Yinwen Pang, a researcher from Hainan Quarantine Services, China; Oct.-Dec. 2011; with Mr. M. Lin, we obtained a grant from the Bureau of Science and Technology, Hainan Province, China; to genetically engineer *Anthurium* for bacterial disease resistance.

(4) Dr. Hae Keun Yun, Yeungnam University, Republic of Korea; 9/1/2014-8/31/2015; to engineer grape for downy mildew disease resistance by gene editing technology.

(5) Dr. Hui Zhao, Tianjin University of Commerce, China; Aug. 2014-Feb. 2015; to study the anti-obesity effect of orange PMFs in *C. elegans*.

(6) Dr. Shuxia Yin, Beijing Forestry University, China; June 2014-June 2015; to engineer turfgrass for stress tolerance by gene editing technology.

(7) Dr. Yanping Luo, Hainan University, China; Feb.-May 2015; to study the toxic effect of the synthetic coumarin analogs in *C. elegans*.

Professional activities outside Rutgers

(1) I have been invited back to my graduating university in China (Hainan University, formerly SCCTC) many times since 1994 to present seminars or lectures.

(2) I have given seminars in other universities and research institutes in China including: Fujian Agricultural and Forestry University, Kunming Institute of Zoology/Chinese Academy of Sciences, and Beijing Normal University, Beijing Forestry University, Tianjin University of Commerce, Yunnan Agricultural University, Minzu University of China.

Other activities outside Rutgers

(1) I was the Principal for Huaxia Chinese School-East Brunswick (HXEB) in 2006-2007. I have been a member for the HXEB Board of Trustees since 2004. I was the Dean in General of Academics for Huaxia Chinese School (2010-2011). HXEB is a non-profit organization aiming at teaching Chinese language and culture to anyone interested. My application to East Brunswick Board of Education for the certification of HXEB Chinese Curriculum was approved in 2009, which means HXEB students from East Brunswick can apply for Chinese credits on their high school graduate transcripts. HXEB is only the second Chinese school in the NJ history that has ever attained this status.

(2) I am the vice Chairman since 2007 for the Fukien Chinese Association in New Jersey (FCANJ). FCANJ is a non-profit organization promoting friendship among Chinese who come from Fujian Province, China and currently reside in New Jersey. FCANJ participated in fundraising for Southeast Asia Tsunami victims in 2005, Shichuan Earthquake in 2008, and many other humanitarian activities. FCANJ focuses on developing research and business relationships between Fujian Province and New Jersey.

(3) On April 1, 2015, I gave a presentation to high functioning special needs students in North Brunswick High School on my research in the areas of plant biotechnology and natural products/human health.