Hyunyoung (Young) Jeong, Pharm.D., Ph.D.

Departments of Industrial and Physical Pharmacy and Pharmacy Practice College of Pharmacy Purdue University <u>youngjeong@purdue.edu</u> Office: 765-496-0852

LICENSURE

Professional Licensure (Registered Pharmacist): State of Illinois

EDUCATION

1998-2004	Ph.D. in Pharmacy
	College of Pharmacy, University of Illinois at Chicago, Chicago, IL
	Advisor: Dr. Win L. Chiou
1997-2001	Pharm.D.
	College of Pharmacy, University of Illinois at Chicago, Chicago, IL
	Graduation with <i>summa cum laude</i>
1990-1994	B.S. in Pharmacy
	College of Pharmacy, Seoul National University, Seoul, Korea

PROFESSIONAL EXPERIENCE

2021-present	Professor
	Departments of Industrial and Physical Pharmacy (IPPH) and Pharmacy Practice
	(PHPR), Purdue University
2019-2021	Professor
	Department of Pharmaceutical Sciences, University of Illinois at Chicago
2017-2018	Associate Head for Research
	Department of Pharmacy Practice, University of Illinois at Chicago
2017-2019	Professor
	Departments of Pharmacy Practice and Biopharmaceutical Sciences (joint
	appointment) University of Illinois at Chicago
2016-2017	Director of Graduate Education
	College of Pharmacy, University of Illinois at Chicago
2015	Acting Director of Graduate Education
	College of Pharmacy, University of Illinois at Chicago
2012-2017	Associate Professor
	Departments of Pharmacy Practice and Biopharmaceutical Sciences (joint
	appointment), University of Illinois at Chicago
2006-2012	Assistant Professor
	Departments of Pharmacy Practice and Biopharmaceutical Sciences (joint
	appointment), University of Illinois at Chicago

2004-2006	Postdoctoral Fellow/Visiting Instructor				
	Departments of Pharmacy Practice and Biopharmaceutical Sciences (joint				
	appointment), University of Illinois at Chicago				
	Supervisors: Drs. William T. Beck and James H. Fischer				
2001-2004	Teaching/Research Assistant				
	Department of Biopharmaceutical Sciences, University of Illinois at Chicago				
1994-1995	Pharmacist				
	Samsung Medical Center, Seoul, Korea				

PUBLICATIONS

Corresponding author: underlined

- 1. <u>Chiou WL</u>, Ma C, Chung SM, Wu TC, **Jeong H**. Similarity in the linear and nonlinear oral absorption of drugs between human and rat. Int J Clin Pharmacol Ther. 2000;38(11):532-9.
- 2. <u>Chiou WL</u>, **Jeong H**, Chung SM, Wu TC. Evaluation of using dog as an animal model to study the fraction of oral dose absorbed of 43 drugs in humans. Pharm Res. 2000;17(2):135-40.
- 3. <u>Chiou WL</u>, **Jeong H**, Wu TC, Ma C. Erythromycin breath test. Clin Pharmacol Ther. 2001; 70(4):395-9.
- <u>Chiou WL</u>, Jeong H, Wu TC, Ma C. Use of erythromycin breath test for in vivo assessments of cytochrome P4503A activity and dosage individualization. Clin Pharmacol Ther. 2001;70(4):305-10.
- <u>Chiou WL</u>, Wu TC, Ma C, Jeong H. Enhanced oral bioavailability of docetaxel by coadministration of cyclosporine: quantitation and role of P-glycoprotein. J Clin Oncol. 2002;20(7):1951-2.
- 6. Wu TC, Ma C, **Jeong H**, Yao HM, <u>Chiou WL</u>. Comparison of gastrointestinal absorption between human and rat: the role of intestinal absorptive surface area and unstirred aqueous layer. Food Chem Toxicol. 2002;40(11):1727-8.
- 7. <u>Chiou WL</u>, Ma C, Wu TC, **Jeong H**. Unexpected lack of effect of the rifampin-induced P-glycoprotein on the oral bioavailability of its substrate, talinolol, in humans: implication in phenotyping. J Pharm Sci. 2003;92(1):4-7.
- Jeong H and <u>Chiou WL</u>. Role of P-glycoprotein in hepatic metabolism of tacrolimus. Xenobiotica. 2006;36(1):1-13.
- 9. Jeong, H and <u>Kaplan B</u>. Therapeutic monitoring of mycophenolate mofetil. Clin J Am Soc Nephrol 2007;2(1):184-91.
- 10. **Jeong H,** Choi S, Song JW, Chen H, <u>Fischer JH</u>. Regulation of UDP-glucuronosyltransferase (UGT) 1A1 by progesterone and its impact on labetalol elimination. Xenobiotica. 2008; 38(1):62-75.
- 11. Choi S, Sainz B Jr, Corcoran P, Uprichard S, Jeong H. Characterization of increased drug metabolism activity in dimethyl sulfoxide (DMSO)-treated Huh7 hepatoma cells. Xenobiotica

2009; 39(3):205-17.

- 12. <u>Shord S</u>, Cavallari LH, Gao W, **Jeong H**, Deyo K, Patel SR, Camp JR, Labott SM, Molokie RE. The pharmacokinetics of codeine and its metabolites in Blacks with sickle cell disease. Eur J Clin Pharmacol. 2009;65(7):651-8.
- Chen H, Yang K, Choi S, Fischer JH, <u>Jeong H</u>. Upregulation of UDP-glucuronosyltransferase (UGT) 1A4 by 17β-estradiol: a potential mechanism of increased lamotrigine elimination in pregnancy. Drug Metab Dispos. 2009;37(9):1841-7.
- 14. <u>Shord S</u>, Chan L, Camp JR, Vasquez EM, **Jeong, H**, Molokie RE, Baum CL, Xie H. Effects of oral clotrimazole troches on the pharmacokinetics of oral and intravenous midazolam. Br J Clin Pharmacol. 2010;69:160-6.
- 15. Jeong H. Altered drug metabolism during pregnancy: hormonal regulation of drug-metabolizing enzymes. Exp Opin Drug Metab Toxicol 2010;6(6):689-99.
- 16. Yang K, Koh KH, Jeong H. Induction of CYP2B6 and CYP3A4 expression by 1aminobenzotriazole (ABT) in human hepatocytes. Drug Metab Lett 2010;4(3):129-33.
- 17. <u>Della Torre M</u>, Hibbard JU, **Jeong H**, Fischer JH. Betamethasone in pregnancy: influence of maternal body weight and multiple gestation on pharmacokinetics. Am J Obstet Gynecol. 2010;203(3): 254.e1-12.
- 18. Koh KH, Xie H, Yu AM, Jeong H. Altered cytochrome P450 expression in mice during pregnancy. Drug Metab Dispos. 2011;39(2):165-9.
- 19. Choi SY, Fischer L, Yang K, Chung H, Jeong H. Isoform-specific regulation of cytochrome P450 expression and activity by estradiol in female rats. Biochem Pharmacol. 2011;81(6):777-82.
- 20. <u>Cavallari LH</u>, **Jeong H**, Bress A. Role of cytochrome P450 genetic variants in personalized drug therapy. Pharmacogenomics and Personalized Medicine 2011;4:123-136.
- Liu Y, Jeong H, Takahashi H, Drozda K, Patel SR, Shapiro NL, Nutescu EA, <u>Cavallari LH</u>. Decreased Warfarin Clearance Associated With the CYP2C9 R150H (*8) Polymorphism. Clin Pharmacol Therap. 2012;91(4): 660-65.
- 22. Koh KH, Jurkovic S, Yang K, Choi SY, Jung JW, Kim KP, Zhang W, Jeong H. Estradiol induces cytochrome P450 2B6 expression at high concentrations: Implication in estrogen-mediated gene regulation in pregnancy. Biochem Pharmacol. 2012;84(1):93-103.
- 23. Vaynshteyn D, Jeong H. Caffeine induces CYP1A2 expression in rat hepatocytes but not in human hepatocytes. Drug Metab Lett. 2012;6(2): 116-9.
- 24. Choi S, Koh KH, Jeong H. Isoform-specific regulation of cytochromes P450 expression by estradiol and progesterone. Drug Metab Disp. 2013;41(2):263-9.
- 25. Cavallari LH, Vaynshteyn D, Freeman KM, Wang D, Perera MP, Takahashi H, Drozda K, Patel SR, Jeong H. CYP2C9 promoter region SNPs linked to the R150H polymorphism are functional suggesting their role in CYP2C9*8-mediated effects. Pharmacogenetics and Genomics. 2013;23(4):228-31.

- Zhang N, Seguin RP, Kunze KL, Zhang Y, Jeong H. Characterization of inhibition kinetics of (S)warfarin hydroxylation by noscapine: Implications in warfarin therapy. Drug Metab Dispos. 2013;41(12):2114-23.
- 27. Lee H, Zhu T, Patel K, Zhang Y, Truong L, Hevener KE, Gatuz JL, Subramanya G, **Jeong H**, Uprichard SL, Johnson ME. High-throughput screening (HTS) and hit validation to identify small molecule inhibitors with activity against NS3/4A proteases from multiple Hepatitis C Virus genotypes. PlosOne 2013;8(10):e75144.
- 28. <u>Fischer J</u>, Sarto GE, Hardman J, Endres L, Jenkins TM, Kilpatrick SJ, **Jeong H**, Geller S, Deyo K, Fischer PA, Rodvold KA. Influence of gestational age and body weight on the pharmacokinetics of labetalol in pregnancy. Clin Pharmacokinet. 2014;53(4):373-83.
- Koh KH*, Pan X*, Shen H, Arnold SLM, Yu AM, Gonzalez FJ, Isoherranen N, Jeong H. (*, equally contributed) Altered expression of small heterodimer partner governs cytochrome P450 (CYP) 2D6 induction during pregnancy in CYP2D6-humanized mice. J Biol Chem 2014;289(6):3105-13.
- 30. Lee JK, Chung HJ, Fischer L, Fischer J, Gonzalez FJ, <u>Jeong H</u>. Human placental lactogen induces CYP2E1 expression via PI 3-kinase pathway in female human hepatocytes. Drug Metab Dispos 2014;42(4):492-9.
- Li W, Ning M, Koh K, Kim H, Jeong H. 17β-Estradiol (E2) Induces Sulfotransferase (SULT) 2A1 Expression through Estrogen Receptor (ER) α. Drug Metab Dispos 2014;42(4):796-802.
- 32. Zhang Y, Liu Y, Mehboob S, Song J, Boci T, Johnson ME, Ghosh AK, <u>Jeong H</u>. Metabolismdirected structure optimization of benzimidazole-based Francisella tularensis enoyl-reductase (FabI) inhibitors. Xenobiotica 2014;44(5):404-16.
- 33. Stone R, Hong J, Jeong H. Pharmacokinetics of monoclonal antibodies used for inflammatory bowel diseases in pregnant women. J Clin Toxicol 2014;4:209.
- Koh KH*, Pan X*, Zhang W, McLachlan A, Urrutia R, Jeong H. (*, equally contributed) Kruppellike Factor 9 (KLF9) Promotes Cytochrome P450 (CYP) 2D6 Expression during Pregnancy in CYP2D6-humanized Mice. Mol Pharmacol 2014;86(6):727-35 (selected for Journal Highlights).
- 35. Hernandez W, Aquino-Michaels K, Drozda K, Patel S, **Jeong H**, Takahashi H, Cavallari LH, <u>Perera</u> <u>MA</u>. Novel single nucleotide polymorphism in CYP2C9 is associated with changes in warfarin clearance and CYP2C9 expression levels in African Americans. Trans Res 2015;165(6):651-7.
- 36. Ning M, Koh KH, Pan X, Jeong H. Hepatocyte nuclear factor (HNF) 4α transactivation of cytochrome P450 (Cyp) 2d40 promoter is enhanced during pregnancy in mice. Biochem Pharmacol 2015;94(1):46-52.
- 37. Miller Z, Kim KS, Lee DM, Kasam V, Baek SE, Lee KH, Zhang YY, Ao L, Carmony K, Lee NR, Zhou S, Zhao Q, Jang Y, **Jeong H**, Zhan CG, Lee W, Kim DE, <u>Kim KB</u>. Proteasome inhibitors with pyrazole scaffolds from structure-based virtual screening. J Med Chem 2015;58(4):2036-41.
- 38. Zhang S, Pan X, Jeong H. GW4064, an agonist of Farnesoid X Receptor (FXR), represses CYP3A4 expression in human hepatocytes. Drug Metab Dispos 2015;43(5):743-8.

- 39. Pan X, Lee, YK, Jeong H. Farnesoid X receptor agonist represses cytochrome P450 2D6 expression by upregulating small heterodimer partner. Drug Metab Dispos 2015;43(7):1002-7.
- 40. Pan X and Jeong H. Estrogen-induced cholestasis leads to repressed CYP2D6 expression in CYP2D6-humanized mice. Mol Pharmacol 2015; 88(1):106-12.
- 41. <u>McClay K</u>, Mehboob S, Yu J, Santarsiero B, Deng J, Cook JL, **Jeong H**, Johnson ME, Steffan RJ. Indole trimers with antibacterial activity against Gram-positive organisms produced using combinatorial biocatalysts. AMB Express. 2015;5(1):125.
- 42. Ao L, Reichel DA, Hu D, **Jeong H**, Kim KB, Bae Y, <u>Lee W</u>. Polymer Micelle Formulations of Proteasome Inhibitor Carfilzomib for Improved Metabolic Stability and Anti-Cancer Efficacy in Human Multiple Myeloma and Lung Cancer Cell Lines. J Pharmacol Exp Ther 2015;355(2):168-73.
- 43. Zhang N, <u>Liu Y</u>, <u>Jeong H</u>. Drug-drug interaction potentials of tyrosine kinase inhibitors via inhibition of UDP-glucuronosyltransferases. Scientific Reports 2015;5:17778.
- 44. Tracy TS, Chaudhry AS, Prasad B, Thummel KE, Schuetz EG, Zhong X, Tien Y, <u>Jeong H</u>, Pan X, Shireman LM, Tay-Sontheimer J, Lin YS. Interindividual Variability in Cytochrome P450-Mediated Drug Metabolism. Drug Metab Dispos 2016;44(3):343-51.
- 45. Koh KH, Jeong H. Electrophoretic mobility shift assay (EMSA) and aupershift assay of Cytochrome P450 2B6 in response to estrogen. Methods Mol Biol 2016;1366:41-51.
- 46. Cho S, Ning M, Zhang Y, Rubin LH, Jeong H. 17β-Estradiol up-regulates UGT1A9 expression via ERα. Acta Pharm Sin B 2016; 6(5):504-509.
- 47. Gautam J, Banskota S, Regmi SC, Ahn S, Jeon YH, **Jeong H**, Kim SJ, Nam TG, Jeong BS, <u>Kim JA</u>. Tryptophan hydroxylase 1 and 5-HT7 receptor preferentially expressed in triple-negative breast cancer promote cancer progression through autocrine serotonin signaling. Mol Cancer 2016;15:75.
- 48. <u>Wisner KL</u>, **Jeong H**, Chambers C. Use of antipsychotics during pregnancy: Pregnant women get sick sick women get pregnant. JAMA Psychiatry 2016;73(9):901-3.
- 49. Pan X, Ning M, Jeong H. Transcriptional regulation of CYP2D6 expression. Drug Metab Dispos. 2017;45(1):42-48.
- 50. Yu AM, Ingelman-Sundberg M, Cherrington NJ, Aleksunes LM, Zanger UM, Xie W, Jeong H, Morgan ET, Turnbaugh PJ, Klaassen CD, Bhatt AP, Redinbo MR, Hao P, Waxman DJ, Wang L, Zhong XB. Regulation of drug metabolism and toxicity by multiple factors of genetics, epigenetics, lncRNAs, gut microbiota, and diseases: a meeting report of the 21st International Symposium on Microsomes and Drug Oxidations (MDO). Acta Pharm Sin B 2017;7(2):241-248.
- 51. Pan X, Kent R, Won KJ, Jeong H. Cholic acid feeding leads to increased CYP2D6 expression in CYP2D6-humanized mice. Drug Metab Dispos. 2017;45(4):346-352.
- 52. Ning M, Jeong H. High fat diet feeding alters expression of hepatic drug-metabolizing enzymes in mice. Drug Metab Dispos. 2017;45(7):707-711.
- 53. Gautam J, Ku JM, Regmi SC, **Jeong H,** Wang Y, Banskota S, Park MH, Nam TG, Jeong BS, <u>Kim JA</u>. Dual inhibition of NOX2 and receptor tyrosine kinase by BJ-1301 enhances anticancer therapy

efficacy via suppression of autocrine stimulatory factors in lung cancer. Mol Cancer Ther 2017;16(10):2144-2156.

- 54. Cho S*, Tripathi A*, Chlipala G, Green S, Lee H, Chang EB, Jeong H (*, equally contributed). Fructose diet alleviates acetaminophen-induced hepatotoxicity in mice. PlosOne 2017;12(8):e0182977.
- 55. Nobutani K, Miyoshi J, Musch MW, Nishiyama M, Watanabe J, Kaneko A, Yamamoto M, Yoshida M, Kono T, Jeong H, <u>Chang EB</u>. Daikenchuto (TU-100) alters murine hepatic and intestinal drug metabolizing enzymes in an in vivo dietary model: effects of gender and withdrawal. Pharmacol Res Perspect 2017;5(5).
- Yeo WS, Arya R, Kim KK, Jeong H, Cho KH, <u>Bae T</u>. The FDA-approved anti-cancer drugs, streptozotocin and floxuridine, reduce the virulence of Staphylococcus aureus. Sci Rep. 2018;8(1):2521.
- Ning M, Duarte JD, Rubin LH, <u>Jeong H</u>. CYP2D6 protein level is the major contributor to interindividual variability in CYP2D6-mediated drug metabolism in healthy human liver tissue. Clin Pharmacol Ther 2018.
- Morgan ET, Dempsey JL, Mimche SM, Lamb TJ, Kulkarni S, <u>Cui JY</u>, <u>Jeong H</u>, <u>Slitt AL</u>. Physiological Regulation of Drug Metabolism and Transport: Pregnancy, Microbiome, Inflammation, Infection, and Fasting. Drug Metab Disp. 2018;46(5):503-513.
- 59. <u>Gaedigk A</u>, Dinh JC, **Jeong H**, Prasad B, Leeder JS. Ten years' experience with the CYP2D6 activity score: a perspective on future investigations to improve clinical predictions for precision therapeutics. J Pers Med. 2018; 8(2): 15
- 60. Oguri T, Kwon Y, Woo JKK, Prehna G, Lee H, Ning M, Won KJ, Lee J, Mei S, Shi Y, **Jeong H**, <u>Lee H</u>. A family of small intrinsically disordered proteins involved in flagellum-dependent motility in Salmonella enterica. J Bacteriol. 2018;201(2):1.
- Guo Y, Crnkovic CM, Won K-J, Yang X, Lee JR, <u>Orjala J, Lee H</u>, <u>Jeong H</u>. Commensal gut bacteria convert the immunosuppressant tacrolimus to less potent metabolites. Drug Metab Disp. 2019;47(3):194-202.
- 62. Won K-J, Park J-S, Jeong H. Repression of hepatocyte nuclear factor 4 alpha by AP-1 underlies dyslipidemia associated with retinoic acid. J Lipid Res. 2019;60(4):794-804.
- 63. Ning M, Duarte JD, Isoherranen N, Rubin LH, Jeong H. Determinants of CYP2D6 mRNA levels in healthy human liver. Clin Transl Sci. 2019;12(4):416-423.
- 64. Zhong G, Kirkwood J, Won K-J, Tjota N, **Jeong H**, <u>Isoherranen N</u>. Characterization of vitamin A metabolome in human livers with and without Nonalcoholic fatty liver disease. J Pharmacol Exp Ther. 2019;370(1):92-103.
- 65. Cho S, Won K-J, Yang X, Leone V, Hubert N, Chang EB, Chung E, Park J-S, <u>Lee H</u>, <u>Jeong H</u>. Phenylpropionic acid produced by gut microbiota alleviates acetaminophen-induced hepatotoxicity. bioRxiv (<u>https://doi.org/10.1101/811984</u>)
- 66. Jeong H, Stika CS. Methods to Study Mechanisms Underlying Altered Hepatic Drug Elimination

During Pregnancy. Semin Perinatol. 2020;151228

- 67. Guo Y, Lee H, Jeong H. Gut microbiota in reductive drug metabolism. Prog Mol Biol Transl Sci 2020;171:61-93. PMID: 32475528
- 68. Guo Y, Lee H, Edusei E, Albakry S, <u>Jeong H</u>, <u>Lee JR</u> Blood profiles of gut bacterial tacrolimus metabolite in kidney transplant recipients. Transplant Direct 2020;6(10): e601.
- 69. Liu R, Marshall K, Ma R, Pham KLT, Shetye G, Liu Z, Cho S, **Jeong H**, Franzblau SG, Moraski GC, <u>Miller MJ.</u> Syntheses and studies of deuterated Imdiazo[1,2-a]pyridine-3-carboxamides with potent anti-tuberculosis activity and improved metabolic properties. Bioorg Chem. 2022; 106074.
- 70. Gadalla HH, Lee S, Kim H, Armstrong AT, Fathalla D, Habib F, **Jeong H**, Lee W, <u>Yeo Y</u>. Size optimization of carfilzomib nanocrystals for systemic delivery to solid tumors. J Control Release 2022;352: 637-651.
- 71. Jeong H, Armstrong AT, Isoherranen N, Czuba L, Yang A, Zumpf K, Ciolino J, Torres E, Stika CS, Wisner KL. Temporal changes in the systemic concentrations of retinoids in pregnant and postpartum women. PlosOne 2023;18(2):e0280424.

RESEARCH SUPPORT

ACTIVE GRANTS

<u>R01 HD089455</u>

8/10/2017-6/30/2023 (NCE)

National Institute of Child Health and Human Development (NICHD)
Title: Molecular basis of altered drug metabolism during pregnancy
Role: MPI (MPI: Katherine Wisner, Northwestern University)
Description: Our goals are to identify and characterize multiple factors that are potentially responsible for the pharmacokinetic changes of drugs used in pregnant women.
Amount (total): \$3,095,605

<u>3R01HD089455-04S1</u>

9/15/2020-6/30/2023

(NCE)

NICHD Title: Pharmacogenetic Risks Operating in Failure Of Nifedipine to Delay Pre-Term Birth (PROFOUND-PTB)

Description: The goal is to examine how the clinical outcome from nifedipine (a tocolytic agent) is affected by pharmacogenetics. Amount (total): \$331,426

<u>R21 AT011565</u>

9/01/21 - 8/31/23

National Center for Complementary and Integrative Health (NCCIH) Title: Gut bacterial *O*-demethylation Role: MPI (MPI: Hyunwoo Lee) Amount (direct): \$275,000 R01 AG0731228/01/21 - 4/30/26National Institute of Aging (NIA)Title: Immunoproteasome inhibitors for the treatment of Alzheimer's DiseaseRole: Co-I (PI: Kyung Bo Kim, University of Kentucky)Amount (direct): \$479,452

R21 AT0113914/08/22 - 3/31/24NCCIHTitle: Pregnane X Receptor (PXR)-Activating Gut Bacterial MetabolitesRole: MPI (MPI: Hyunwoo Lee)Amount (direct): \$275,000

COMPLETED GRANTS

Frontier Award10/1/2007-9/30/2009American College of Clinical PharmacyRole: PITitle: Effects of female hormones on hepatic drug metabolism: clinical implication duringpregnancyAmount (direct): \$30,000

<u>R21 HD055313</u>

7/20/2008-6/30/2011

NICHD Title: Regulation of genes involved in hepatic drug elimination by female hormones Role: PI

Amount (direct): \$275,000

K12 HD0558929/1/2008-2/28/2011NH, Office of Research in Women's HealthBuilding Interdisciplinary Research Careers in Women's Health (BIRCWH) programRole: Scholar (PI: Stacie Geller); traineeAmount: 75% Salary support + \$20,000/year

Spark award1/1/2009-12/31/2010Chicago Biomedical Consortium1/1/2009-12/31/2010Role: co-PI (PI: Keith Thulborn, Thomas Meade)1/1/2009-12/31/2010Title: Metabolic MR Imaging for studies of human brain disease1/1/2009-12/31/2010

Vahlteich Hans Award1/1/2010-12/31/2010University of Illinois at Chicago, College of Pharmacy
Role: PI1/1/2010-12/31/2010Title: Induction of CYP2D6 expression in pregnancy
Amount (direct): \$50,0001/1/2010-12/31/2010

<u>R56 AI089535</u> NIAID	7/26/2010-7/25/2012
Title: Development of PLpro and 3CLpro protease inhibitors as nov Role: Co-I (PI: Michael Johnson); preclinical characterization of lea Amount (total direct): \$100,000	el SARS therapeutics d compounds.
<u>Midwest Affiliate Grant-In-Aid</u> American Heart Association (AHA)	7/1/2010-6/30/2012
Title: Functional and clinical significance of the CYP2C9*8 allele Role: Co-I (PI: Larisa Cavallari); functional characterization of CYP nucleotide polymorphisms that are in linkage disequilibrium wi Amount (total direct): \$22,723	2C9*8 and the single ith CYP2C9*8.
<u>Defense Threat Reduction Agency contract HDTRA1-CC-0011</u> Department of Defense	2/11/2011-11/10/2012
Title: Broad spectrum antibiotic against category A agents Role: Co-I (PI: Michael Johnson); preclinical characterizati Amount (total direct): \$128,799	on of lead compounds.
R21 HL106097	8/1/2011-7/31/2013
National Heart Lung and Blood Institute (NHLBI) Title:Comprehensive studies of novel SNPs affecting warfarin dose Role: Co-I (PI: Minoli Perera); functional characterization of geneti with warfarin dose. Amount (total direct): \$79,239	in African Americans c variations that are associated
<u>Just-In-Time Funding</u> University of Illinois at Chicago, Center for Clinical and Translation Induction of CYP2D6 expression during pregnancy Role: PI Amount (total direct): \$15,000	1/3/2012-1/2/2013 nal Science (CCTS)
<u>R01 MD009217</u> National Institute on Minority Health and Health Disparities (NIM) Title: Health disparity in pharmacogenomics: African American SN Role: Co-I (PI: Minoli Perera); consultation on study design and dat Amount (total direct): \$4,650/year (to Jeong lab)	7/10/2014-4/30/2016 HD) Ps and drug metabolism ca analysis
<u>R41AI112114</u> NIAID	6/20/2014-5/31/2016

Title: Development of broad spectrum Hepatitis C virus NS3/4A protease inhibitors Role: Co-I (PI: Michael Johnson and Hyun Lee); preclinical characterization of lead compounds Amount (total direct): \$20,000/year (to Jeong Lab)

Young Jeong, PharmD, PhD

7/1/2014-6/30/2016

4/1/2011-3/31/2017

R41AI110090 NIAID Title: Development of novel dual-mode antibiotics for drug resistant S. aureus Role: Co-I (PI: Michael Johnson); preclinical characterization of lead compounds Amount (total direct): \$19,069 for year 2 only (to Jeong lab)

R01 HD065532

NICHD Title: Altered drug metabolism in pregnancy Role: PI Amount (total direct): \$893,403

R21/33 AI121664

NIAID

Title: Development of anti-virulence drugs targeting the SaeRS two component system in Staphylococcus aureus

Role: Co-I (PI: Taeok Bae, Indiana University); preclinical characterization of lead compounds Amount (total direct): \$30,000 for 2 years (to Jeong Lab)

Catalyst Award

Chicago Biomedical Consortium

Title: Role of gut microbiota in determining drug efficacy and toxicity

Role: PI (co-PI: Eugene Chang, University of Chicago)

Description: The goal of this study is to determine the effects of gut microbiota on hepatic drug metabolism

Amount (total direct): \$100,000 (to Jeong lab)

R01 GM112746

NIH/NIGMS

Title: Molecular basis of interindividual variability in CYP2D6-mediated drug metabolism Role: PI

Description: The goal of this project is to identify and characterize genetic and environmental factors contributing to interindividual variability in CYP2D6-mediated drug metabolism.

Amount (total direct): \$790,000

P50 AT000155 19-S3

NCCIH

Title: One-year administrative Supplement to P50 grant entitled "Botanical dietary supplements for women's health"

Role: Co-I (PI: Guido Pauli, University of Illinois at Chicago); to define the roles of gut microbiota in chemical transformation of botanical compounds Amount (direct): \$100,000/year

R37 AI054193

National Institute of Allergy and Infectious Diseases (NIAID)

12/1/2015-11/30/2017

3/1/2016-2/28/2018

7/1/2015-6/30/2020

7/1/2019-6/30/2020

9/30/2016-12/31/2020

Title: Design, syntheses and studies of novel antituberculosis agents Role: Co-I (PI: Marvin Miller, Notre Dame University); for preclinical characterization of lead compounds.

Amount (direct): ~\$20,000/year

R37 GM053386

9/1/2012-8/31/2020

National Institute of General Medical Sciences (NIGMS) Title: Design & synthesis of nonpeptide protease inhibitors Role: Co-I (PI: Arun K. Ghosh, Purdue University); for preclinical characterization of lead compounds. Amount (direct): ~\$70,000/year

NATIONAL/INTERNATIONAL CONFERENCE PRESENTATIONS

- Jeong H, Chiou WL. Rapid intestinal absorption mechanism of tacrolimus, a large molecule: role of P-glycoprotein and lack of active uptake. American Association of Pharmaceutical Scientists 2003 Annual Meeting, Salt Lake City, UT. (poster)
- 2. Choi S, Jeong H, Deyo K, Fischer JH. Protein binding of labetalol in pregnancy. American Society of Clinical Pharmacology and Therapeutics 2007 Annual Meeting, Anaheim, CA. (poster)
- Jeong H, Chen H, Choi S, Fischer JH. Estrogen receptor-mediated regulation of UDPglucuronosyltransferase (UGT) 1A4 by estrogen. Experimental Biology 2008 Annual Meeting, San Diego, CA. (poster)
- 4. Choi S, Chen H, Jeong H. Ethinylestradiol-mediated regulation of hepatic cytochrome P450 enzymes in rat liver microsomes. American Association of Clinical Pharmacy 2008 Annual Meeting, Louisville, KY. (poster)
- Choi S, Sainz B, Uprichard S, Jeong H. Characterization of increased drug metabolism activity in DMSO-treated Huh7 hepatoma cells. International Society of Studies of Xenobiotics 2008 Annual Meeting, San Diego, CA. *Drug Metabolism Reviews 40: suppl 3; 156.* (poster)
- Koh K, Jeong H. Effects of 17β-estradiol (E2) on expression of CYP enzymes in human hepatocytes. International Society of Studies of Xenobiotics 2009 Annual Meeting, Washington, DC. Drug Metabolism Reviews 41: suppl 3; 49. (poster)
- Yang K, Koh K, Choi S, Jeong H. CAR (constitutive androstane/active receptor)-mediated upregulation of CYP2B6 expression by 17β-estradiol (E₂). International Society of Studies of Xenobiotics 2009 Annual Meeting, Washington, DC. *Drug Metabolism Reviews 41: suppl 3; 89.* (poster)
- Choi S, Jeong H. Effects of 17β-estradiol (E₂) on activities of CYPs in human hepatocytes. International Society of Studies of Xenobiotics 2009 Annual Meeting, Washington, DC. Drug Metabolism Reviews 41: suppl 3; 90. (poster)
- 9. Jeong H. Altered drug metabolism in pregnancy. Asian Conferences on Clinical Pharmacy 2009, Seoul, Korea. (oral)
- 10. Jeong H, Koh K, Choi S, Yang K. Regulation of Hepatic Drug-metabolizing Enzymes by Estradiol and Progesterone: a Potential Mechanism of Altered Drug Elimination in Pregnancy. Annual Interdisciplinary Women's Health Research Symposium 2009, Washington, DC. *J Women's*

Health 18(10):1505. (poster)

- 11. Koh K, Yu AM, Jeong H. Induction of CYP2D6 expression in *CYP2D6*-humanized mouse during pregnancy. Gordon Research Conference 2010, Holderness, NH. (poster)
- 12. Choi S, Fischer L, Jeong H. Estradiol (E2)-mediated regulation of hepatic Cytochrome P450 (CYP) enzymes in rats. Gordon Research Conference 2010, Holderness, NH. (poster)
- 13. Jurkovic S and Jeong H. Role of estrogen receptor (ER) in CYP2B6 induction by estradiol. Gordon Research Conference 2011, Hoderness, NH. (poster)
- Chung H, Fischer L, Jeong H. Effects of growth hormone family on cytochrome P450 (CYP) expression in human hepatocytes. International Society of Studies of Xenobiotics 2011 Annual Meeting, Atlanta, GA. (poster)
- 15. Koh KH, Jurkovic S, Yang K, Choi S, Jeong H. 17β-Estradiol (E2) enhances cytochrome P450 (CYP) 2B6 expression via cooperative actions of estrogen receptor (ER) and constitutive androstane receptor (CAR). International Society of Studies of Xenobiotics 2011 Annual Meeting, Atlanta, GA. (poster)
- 16. Chung H, Jeong H. Transcriptional regulation of CYP2E1 expression by placental lactogen. American Association of Pharmaceutical Scientists 2012 Annual Meeting, Chicago, IL. (poster)
- Pan X, Koh K, Yu A-M, Jeong H. Induction of CYP2D6 expression during pregnancy is associated with an increased activity of hepatocyte nuclear factor 4α. Experimental Biology 2013 Annual Meeting, Boston, MA. (poster) (won 3rd place in predoctoral poster competition)
- 18. Li W, Ning M, Kim H, Jeong H. 17β-Estradiol (E2) induces sulfotransferase (SULT) 2A1 expression through estrogen receptor (ER)α. Experimental Biology 2013 Annual Meeting, Boston, MA. (poster)
- Zhang Y-Y, Johnson M, Ghosh A, Jeong H. Metabolism-directed structure optimization of benzimidazole-based *F. Tularensis* enoyl-Reductase (FabI) inhibitors. Experimental Biology 2013 Annual Meeting, Boston, MA. (poster)
- 20. Koh KH, Pan X, Yu A-M, Jeong H. Functional association of hepatocyte nuclear factor 4 alpha (HNF4α) and Krüppel-like factor 9 (KLF9) in cytochrome P450 2D6 (CYP2D6) regulation during pregnancy. Experimental Biology 2013 Annual Meeting, Boston, MA. (poster)
- Lee J, Chung HJ, Pan X, Ingelman-Sundberg M, Jeong H. Induction of cytochrome P450 (CYP) 2E1 expression by placental lactogen. Experimental Biology 2013 Annual Meeting, Boston, MA. (poster) (won 3rd place in postdoctoral poster competition)
- 22. Jeong H, Pan X, Koh KH, Yu A-M, Isoherranen N, Gonzalez F. Altered expression of small heterodimer partner governs CYP2D6 induction during pregnancy in CYP2D6-humanized mice. Experimental Biology 2014 Annual Meeting, San Diego, CA. (poster) (selected for 2014 EB's press briefings)
- Ning M, Koh KH, Jeong H. Altered HNF4α activity contributes to cyp2d40 induction during pregnancy in mice. International Society of Studies of Xenobiotics 2014 Annual Meeting, San Francisco, CA. (poster)
- 24. Pan X, Jeong H. Differential expression of small heterodimer partner potentially contributes to interindividual variability of CYP2D6-mediated drug metabolism. International Society of Studies of Xenobiotics 2014 Annual Meeting, San Francisco, CA. (poster)
- 25. Pan X, Jeong H. Inducers of small heterodimer partner expression lead to decreased CYP2D6 expression and activity. Experimental Biology 2015 Annual Meeting, Boston, MA. (poster) (won 3rd place in predoctoral poster competition)
- 26. Zhang S, Pan X, Jeong H. GW4064, An agonist of Farnesoid X Receptor, represses CYP3A4 expression in human hepatocytes. Experimental Biology 2015 Annual Meeting, Boston, MA. (poster)
- 27. Ning M, Jeong H. High Fat Diet Feeding Alters Expression of Hepatic Drug-metabolizing Enzymes

in Mice. Experimental Biology 2016, San Diego, CA. (poster)

- 28. Kent R, Jeong H. Fenofibrate upregulates SHP expression but does not alter CYP2D6 expression. Experimental Biology 2016, San Diego, CA. (poster)
- 29. Kent R, Pan X, Jeong H. Cholic acid feeding increases CYP2D6 expression in CYP2D6-humanized mice. Experimental Biology 2016, San Diego, CA. (poster)
- 30. Cho S, Ning M, Zhang Y, Rubin LH, Jeong H. 17β-Estradiol up-regulates UGT1A9 expression via ERα. Experimental Biology 2016, San Diego, CA. (poster)
- 31. Han S, Ning M, Oh Y, Chun S, Park JE, Jeong H, Lee W. Impact of Hypoxia on the Expression of Liver-type and Cancer-type Variants of Organic Anion Transporting Polypeptide 1b3 (OATP1B3) in Primary Human Hepatocytes and Human Hepatic Cancer Cell Lines. International Society of Studies of Xenobiotics, International Meeting 2016, Busan, Korea. (poster)
- 32. Guo Y, Cho S, Chung E, Park S, Jeong H. Structural differences in gut microbiota lead to altered hepatic expression of Drug Disposition Genes (DDG) in mice. Experimental Biology 2017, Chicago, IL. (poster)
- 33. Cho S, Chlipala G, Green S, Lee H, Jeong H. Differential gut microbiota modulates acetaminophen hepatotoxicity. Experimental Biology 2017, Chicago, IL. (poster)
- 34. Won K, Jeong H. atRA upregulates SHP expression through RXR activation. Experimental Biology 2017, Chicago, IL. (poster) (won 3rd place in postdoctoral poster competition)
- 35. Tripathi A, Cho S, Chlipala G, Green S, Jeong H. Fructose diet decreases APAP-induced hepatotoxicity in mice. Experimental Biology 2017, Chicago, IL. (poster)
- 36. Cho S, Won K, Tripathi A, Chang EB, Lee H, Jeong H. Commensal gut microbiota modulates susceptibility to acetaminophen-induced hepatotoxicity. The Liver Meeting 2017, Washington DC. (poster) (selected as a Presidential Poster of Distinction; top 10% of scored abstracts).
- Won K, Jeong H. atRA induces cholesterol accumulation through CYP7A1 repression in the liver. Experimental Biology 2018, San Diego, CA. (poster) (won 3rd place in postdoctoral poster competition)
- 38. Tripathi A, Chen H, Lee H, Jeong H. Gut microbiota metabolize etoposide to its demethylated product. Keystone Meeting 2019, Montreal, Canada. (poster)
- 39. Guo Y, Crnkovic CM, Won K-J, Yang X, Lee JR, Orjala J, Lee H, Jeong H. Commensal gut bacteria convert tacrolimus to less potent metabolites. Keystone Meeting 2019, Montreal, Canada. (poster; also selected for oral presentation)
- 40. Cho S, Won K-J, Leone V, Chang EB, Lee H, Jeong H. Commensal gut microbiota modulates susceptibility to acetaminophen-induced hepatotoxicity in C57BL/6 mice. Keystone Meeting 2019, Montreal, Canada. (poster)
- 41. Tripathi A, Sullivan P, Orjala J, Jeong H, Lee H. Gut microbiota governs etoposide exposure after oral administration. American Society of Microbiology 2020, Chicago, IL (poster; the meeting was canceled)
- 42. Yang X, Cho S, Lee H, Jeong H. Gut bacteria-derived small molecules 4-hydroxy-cinnamic acid and 5-aminovalerate regulate acetaminophen-induced cell death in primary mouse hepatocytes. American Society of Microbiology 2020, Chicago, IL (poster; the meeting was canceled)
- 43. Yang X, Cho S, Lee H, Jeong H. Differential expression of gut bacterial phenylalanine reductive pathway potentially modulates host susceptibility to acetaminophen-induced liver injury. Experimental Biology 2021 (virtual meeting)

INVITED PRESENTATIONS

Listing only national/international presentations

- 1. Altered drug metabolism in pregnancy. Korean-American Pharmaceutical Scientists Association, Los Angeles, CA. November 9, 2009.
- 2. Molecular mechanisms for altered drug metabolism during pregnancy. College of Pharmacy, Kentucky University, Lexington, KY. October 29, 2010.
- 3. Altered drug metabolism during pregnancy. College of Pharmacy, Purdue University, Lafayette, IN. September 22, 2011.
- 4. Regulatory mechanisms underlying CYP2D6 induction during pregnancy. College of Pharmacy, SUNY Buffalo, NY. October 25, 2012.
- 5. Sources of pharmacokinetic variability: pregnancy and genetics. College of Pharmacy, Kentucky University, Lexington, KY. December 18, 2012.
- 6. Mechanisms underlying altered drug metabolism during pregnancy. College of Pharmacy, University of Washington, Seattle, WA. January 10, 2013.
- 7. Mechanisms underlying altered drug metabolism during pregnancy. North Jersey Drug Metabolism Discussion Group, Somerset, NJ. October 17, 2013.
- 8. CYP2D6 induction during pregnancy. American Society of Pharmacology and Experimental Therapeutics, Experimental Biology Meeting. San Diego, CA. April 30, 2014.
- 9. Sources of pharmacokinetic variability: Pregnancy and genetics. University of California at Davis, Sacramento, CA. May 2, 2014.
- Altered drug metabolism during pregnancy. Northeast Ohio Medical University, Rootstown, OH. June 3, 2014.
- Interindividual variability in CYP2D6-mediated drug metabolism. American Society of Pharmacology and Experimental Therapeutics, Experimental Biology Meeting. Boston, MA. March 29, 2015.
- 12. Altered drug pharmacokinetics during pregnancy. China Heart Congress, Beijing, China. August 8, 2015.
- 13. CYP2D6-humanized mice in the study of altered drug metabolism in pregnancy. International Society of Studies of Xenobiotics Meeting. Busan, Korea. June 13, 2016.
- 14. Roadway to precision medicine: Factors determining drug efficacy and toxicity. Seoul National University, Seoul, Korea. June 20, 2016.

- 15. Roadway to precision medicine: Factors determining drug efficacy and toxicity. Yeungnam University, Daegu, Korea. June 22, 2016.
- 16. Mechanisms underlying altered drug metabolism during pregnancy. Obstetric Pharmacology Research Centers Meeting. Bethesda, MD. March 2, 2017.
- Mechanisms underlying altered drug metabolism during pregnancy. American Society of Pharmacology and Experimental Therapeutics, Experimental Biology Meeting. Chicago, IL April 23, 2017.
- 18. Interindividual variability in drug response and toxicity. American Society of Pharmacology and Experimental Therapeutics, Experimental Biology Meeting. Chicago, IL April 24, 2017.
- 19. Factors determining drug efficacy and toxicity. University of Florida. Gainesville, FL February 23, 2018.
- 20. Interindividual variability in drug response and toxicity. University of Southern California. Los Angeles, CA. June 28, 2018.
- 21. Drug metabolism by gut bacteria. Great Lakes Drug Metabolism and Discussion Group Meeting. Ann Arbor, MI. May 9, 2019.
- 22. Role of gut microbiota in modulation of acetaminophen-induced hepatotoxicity. Applied Pharmaceutical Analysis annual meeting. Boston, MA. September 9, 2019.
- 23. Role of gut microbiota in drug efficacy and toxicity. Purdue University, West Lafayette, IN. September 11, 2019, November 11, 2021, March 4, 2022.
- 24. Molecular control of drug metabolism by the gut microbiota. The Liver Meeting by the American Association for the Study of Liver Diseases (AASLD). Washington, DC. November 4, 2022.
- 25. Acetaminophen-Induced Liver Injury and the Microbiome. ISSX 2023. Boston, MA. September 13, 2023.

TEACHING ACTIVITIES

Professional (PharmD) courses

Purdue University

- Introduction to Pharmacokinetics (PHRM835): Course coordinator (2022-present) and instructor (2022-present). Every Spring semester
- Dosage Form II (PHRM 829): Instructor (2021-2022). Every Spring semester

University of Illinois at Chicago

- Introduction to Pharmacokinetics (PHAR400/PHAR435): Course coordinator (2004-2018) and instructor (2004-2021). Every Fall semester
- Applied Pharmacokinetics (PMPR440): Instructor. Every Spring semester, 2006-2016
- Principles of Drug Action and Therapeutics I (PHAR401): Instructor. Every Fall semester, 2006-2015
- Seminars in Pharmacy Practice (PMPR355): Instructor. Every Spring semester, 2007-2015
- Pharmaceutical Applications of Genomics and Bioinformatics (PMMP412): Instructor. Every Fall semester, 2016-2021

Graduate (PhD) courses

University of Illinois at Chicago

- Biopharmaceutical Sciences I (BPS501): Instructor. Every Fall semester, 2006-2021
- Drug Discovery, Design and Development (PMPG507): Instructor. Every Fall semester, 2007-2021
- Drug Metabolism (BPS594): Course coordinator and instructor. Every other Spring semester, 2015-2021

TRAINING OF RESEARCH PERSONNEL

Undergraduate Students

- 1. Jiae Park. 01/2009-05/2009 and 08/2010-12/2010; Honor's College Capstone project.
- 2. Liam Fischer. 05/2009-08/2009; summer undergraduate research project.
- 3. Lindsey Choi. 01/2009-05/2011; Honor's College Capstone project.
- 4. Elisa Lim. 01/2011-05/2011
- 5. Hayoung Kim. 05/2013-12/2013
- 6. Sofia Lombardi. 09/2022-05/2023

PharmD. Students

- 1. Ellie Jhun. 08/2007-12/2007; independent research project for pharmacy students
- 2. Heesue Kim, B.S. 05/2011-08/2012; independent research project for pharmacy students; a recipient of Riback Summer Research Fellowship in 2012
- 3. James Hong, B.S. 05/2012-08/2012; independent research project for pharmacy students. Role: Research project advisor
- 4. Brian Montalbano, B.S. 09/2015-05/2016; independent research project for pharmacy students. Role: Research project advisor
- 5. Benish Alam, B.S. 01/2016-05/2016; independent research project for pharmacy students. Role: Research project advisor

Graduate Students

- Research Advisees

- 1. Taylor Choi, Ph.D. 05/2008-09/2009. Role: Thesis project co-advisor
- 2. Suyoung Choi, Pharm.D., Ph.D. 08/2006-05/2012. Current position: Reviewer at FDA
- 3. Steve Jurkovic, M.S. 01/2010-05/2012
- 4. David Varynshteyn, Pharm.D., M.S. 05/2011-08/2012. Current position: Pharmacist
- 5. Nan Zhang, Ph.D. 08/2012-01/2014. Current position: Reviewer at FDA
- 6. Xian Pan, Ph.D. 08/2011-07/2015. Current position: Scientist at SimCYP
 - a. Won 3rd place in predoctoral poster competition, Experimental Biology 2013
 - b. Won 3rd place in predoctoral poster competition, Experimental Biology 2015
- 7. Miaoran Ning, Ph.D. 01/2013-07/2017. Current position: Scientist at Abbvie
 - a. Recipient of American Association of Pharmaceutical Scientists, Predoctoral Fellowship (2016-2017)
- 8. Shu Zhang, M.S. 01/2014-05/2016. Current position: Scientist at Genetech
- 9. Sungjoon Choi, Ph.D. 08/2014-02/2020. Current position: Scientist at Genetech
- 10. Becca Kent, M.S. 01/2015-12/2017
- 11. Ashutosh Tripathi, Ph.D., 01/2016-01/2021. Current position: Scientist at GBT
- 12. Yukuang Guo, M.S., 05/2016-12/2020. Current position: Scientist at Takeda
 - a. Recipient of American Heart Association, Predoctoral Fellowship (2019-2021)
- 13. Ziwei Zhang, M.S., 05/2018-08/2019
- 14. Xiaotong Yang, Ph.D., 05/2018-05/2023
- 15. Giokdjen Ilktach, M.S., 05/2019-12/2020
- 16. Ein Kywat, M.S., 05/2021-05/2023
- 17. Pei-Ru Jin, M.S., 08/2021-present

- Others

- 1. Misuk Bae, 08/2007. Role: Preliminary exam committee member
- 2. Bethany White, 05/2008. Role: Preliminary exam committee member
- 3. Ying He, 05/2007. Role: Preliminary exam committee member
- 4. Jahye Myung, 08/2009. Role: Preliminary exam committee member
- 5. Suhair Sunoqrot, 08/2010. Role: Preliminary exam committee member
- 6. Melanie Kollmer, 09/2010. Role: Preliminary exam committee member
- 7. Huifang Han, 12/2010. Role: M.S. thesis committee member
- 8. Samuel Erb, 08/2012. Role: Preliminary exam committee member
- 9. Ryan Pearson, 06/2011. Role: Preliminary exam committee member
- 10. Yang Song, 08/2010-08/2011. Role: Preliminary exam/Ph.D. thesis committee member
- 11. Amrita Banerjee, 08/2011-08/2012. Role: Ph.D. thesis committee member
- 12. Fatima Khaja, 09/2012-03/2014. Role: Ph.D. thesis committee member
- 13. Ellie Jhun, 03/2014-present. Role: Ph.D. thesis committee member
- 14. Asawari Lote, 03/2014. Role: Preliminary exam committee member
- 15. Goda Muralidhar, 03/2014-present. Role: Ph.D. thesis committee member
- 16. Thao Nguyen D. Pham, 05/2014-present. Role: Ph.D. thesis committee member
- 17. Joelle Sacks, 2014-2018. Role: Preliminary exam committee member; thesis committee member
- 18. Hao-jui Hsu, 08/2014. Role: Ph.D. thesis committee member
- 19. Matthew Gilbertson, 05/2015. Role: Preliminary exam committee member
- 20. Rui Wang, 08/2015. Role: Preliminary exam committee member

- 21. Karina Lima, 05/2016. Role: Preliminary exam committee member
- 22. Nicole Lamond, 2016-2020. Role: Preliminary exam committee member; thesis committee member
- 23. Lingyi Huang, 09/2017. Role: Ph.D. thesis committee member
- 24. Joelle Sacks, 01/2018. Role: Ph.D. thesis committee member
- 25. Subbulakshmi Karthikeyan, 03/2018. Role: Ph.D. thesis committee member
- 26. Dulari Jayawardena, 03/2018. Role: Ph.D. thesis committee member
- 27. Gen Liu, 08/2019. Role: Preliminary exam committee chair
- 28. Zuoxiao Shi, 06/2019. Role: Preliminary exam committee member
- 29. Karina Esparza, 2018-2019. Role: Ph.D. thesis committee member

Postdoctoral Fellows

- 1. Kwi Hye Koh, Ph.D., 2008-2013. Current position: Staff Scientist at Rush Medical Center, Chicago
- 2. Hye Jin Chung, Ph.D., 2010-2011. Current position: Faculty at Gyeongsang National University, Korea
- 3. Yong Liu, M.D., Ph.D., 2010-2011. Current position: Faculty at Dalian University of Technology, China
- 4. Yan-Yan Zhang, Ph.D., 2011-2013. Current position: Scientist at GlaxoSmithKlein, China
- 5. Jin Kyung Lee, Ph.D., 2012-2014. Current position: Scientist at Green Cross Pharmaceuticals, Korea
 - a. Won 3rd place in postdoctoral poster competition, Experimental Biology 2013
- 6. Wei Li, Ph.D., 2012-2013. Current position: Faculty at Yangzhou University, China
- 7. Di Hu, Ph.D., 2013-2015. Current position: Faculty at Shenyang Pharmaceutical University, China
- 8. Kun Zhou, Ph.D., 2016-2017
- 9. Kyoung Jae Won, Ph.D., 2016-present
 - a. Won 3rd place in postdoctoral poster competition, Experimental Biology 2018
- 10. Zhihao Liu, PhD., 2018-2019. Current position: Scientist at University of Maryland

COMMITTEE SERVICE

Editorial Board Member

- 2015 present Drug Metabolism and Disposition
- 2019 present Pharmacological Reviews (Associate Editor)
- 2021 present AAPS Open

Grant Reviewer

- 2012 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 EMNR-R (Translational Research in Pediatric and Obstetric Pharmacology)
- 2013 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZAI1 LR-M (Centers of Excellence for Translational Research), Step 1 reviewer

- 2015 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZHD1 DSR-A (Obstetric-Fetal Pharmacology Research Centers)
- 2019 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 DKUS-R 83 (Liver metabolism/Toxicity)
- 2019 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 IDM-C (Adverse Drug Reaction)
- 2020 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 EMNR-S (Obstetric/Pediatric Pharmacology)
- 2021 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 EMNR-A (Obstetric/Pediatric Pharmacology)
- 2022 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 EMNR-S55 (Obstetric/Pediatric Pharmacology)
 - NIH Grant Reviewer, EMNR-K (11)
- 2023 NIH Ad-hoc Grant Reviewer, Special Emphasis Panel, ZRG1 EMS-10 - NIH Grant Reviewer, ZHD1 DSR-A

Data Safety and Monitoring Board

2016-2020 - "Hop Botanical Dietary Supplements - Metabolism and Safety in Women," by Dr. Richard van Breemen at University of Illinois at Chicago

Symposium Chair

- 2012 -"Nuclear receptors in physiology and disease," Great Lakes Nuclear Receptor Conference, Chicago, IL
- 2015 "Interindividual variability in P450-mediated drug metabolism," Experimental Biology, Boston, MA
- 2016 "Humanized or transgenic animal models in drug metabolism and toxicology studies," International Society of Studies of Xenobiotics Meeting, Busan, South Korea
 - "Role of gut microbiota in drug metabolism and toxicology," Microsomes and Drug Oxidations Meeting, Davis, CA
- 2017 "Transporters and enzymes: novel insights into the regulation of drug disposition and response," International Society of Studies of Xenobiotics Meeting, Providence, RI
- 2018 "The microbiome and cancer," Experimental Biology, San Diego, CA
- 2019 ASPET-APS Presidential Symposium on Gut Microbiomes, Experimental Biology, Orlando, FL
- 2021 "Gut Microbiota in Drug Efficacy and Toxicity," Experimental Biology

Conference Organizer

 - International Scientific Advisory Board, 11th International Society of Studies of Xenobiotics Meeting (an international meeting held in Busan, Korea)
 - Organizing Committee, Microsomes and Drug Oxidations Meeting (an international meeting held in Davis, CA)

2016-present	- Orga	anizin	ig Co	mmitte	e, Gre	eat Lak	es Dri	ug Metab	olism	& Di	scussic	on G	roup A	nnual
	Meeti	ng												
0004	0	•	0	. т 1	Б	٦.٢.	1 1.	0. D'	•	0	ъл		0004	

2024 - Organizer, Great Lakes Drug Metabolism & Discussion Group Meeting 2024

Professional Organization Officer

2013-2016	American Society of Pharmacology and Experimental Therapeutics, Division for
	Drug Metabolism and Disposition, Councilor
2016-2020	American Society of Pharmacology and Experimental Therapeutics, Division for
	Drug Metabolism and Disposition, Secretary/treasurer-elect (2 years),
	Secretary/treasurer (1 year), and Past-Secretary/treasurer (1 year)
2022-2025	American Society of Pharmacology and Experimental Therapeutics, Division for
	Drug Metabolism and Disposition, Chair-elect (1 years), Chair (1 year), and Past-
	Chair (1 year)

Journal Reviewer

AAPS Journal

Acta Pharmaceutica Sinica B Antimicrobial Agents and Chemotherapy **Biochemical Pharmacology Biomedical Chromatography** Breast Cancer Research British Journal of Pharmacology Chemical Research and Toxicology Clinical Pharmacology and Therapeutics **Clinical Translational Sciences** Current Drug Metabolism Drug Metabolism and Disposition Drug Metabolism Letters Drug Metabolism Reviews Experimental Biology and Medicine Expert Opinion in Drug Metabolism and Toxicology **FEBS** Letter Food and Chemical Toxicology Frontiers in Pharmacology Gene International Journal of Molecular Sciences Journal of Antimicrobial Chemotherapy Journal of Controlled Release Journal of Medicinal Chemistry Journal of Pharmacology and Experimental Therapeutics Life Sciences Molecular Cancer and Therapeutics

Molecular Metabolism Molecular Pharmacology Nuclear Receptor Research Pharmaceutics PlosOne Reproductive Toxicology Scientific Reports Theranostics Xenobiotica

Poster Judge/Abstract Reviewer

- 2010 Poster abstract reviewer for American Association of Pharmaceutical Scientists (AAPS) Annual Meeting
- 2010 Student/Postdoc Poster Session Judge, University of Illinois at Chicago College of Pharmacy Research Day
- 2011 Poster abstract reviewer for AAPS Annual Meeting
- 2011 Student/Postdoc Poster Session Judge, University of Illinois at Chicago College of Pharmacy Research Day
- 2011 Student Poster Session Judge, Controlled Release Society-Illinois Student Chapter Symposium
- 2013 Student/Postdoc Poster Session Judge, University of Illinois at Chicago College of Pharmacy Research Day
- 2013 Poster Session Judge, Experimental Biology, American Society of Pharmacology and - Experimental Therapeutics (ASPET) Annual Meeting
- 2015 Student/Postdoc Poster Session Judge, University of Illinois at Chicago College of Pharmacy Research Day
 - Poster Competition Judge, Experimental Biology, ASPET Annual Meeting
- 2016 Poster Competition Judge, Experimental Biology, ASPET Annual Meeting
- 2017 Poster Competition Judge, Experimental Biology, ASPET Annual Meeting
- 2023 Poster Competition Judge, Experimental Biology, ASPET Annual Meeting

Service to the Departments

Member (appointed), Journal club and Publication Committee in Department of		
Biopharmaceutical Sciences		
Member (appointed), Biopharmaceutical Sciences (BPS) Curriculum Committee		
Member (appointed), BPS Graduate Committee		
Member (appointed), Ad-hoc Mentoring Committee in Department of Pharmacy		
Practice (PMPR)		
Member (appointed), PharmD Fellowship Award Committee in PMPR		
Member (appointed), BPS and PMPR P&T committees		
Member (appointed), BPS and PMPR faculty search committees		
Chair (appointed), PMPR Strategic planning "scholarship" subcommittee		
Member (appointed), BPS Department Head search committee		

2018	Member (appointed), BPS faculty search committees
2019	Member (appointed), PSCI Department Head search committee
2019-2020	Member (appointed), PSCI faculty search committee
2022-2023	Chair (appointed), IPPH faculty search committee

Service to the College

2007-2008	Member (appointed), Ad-hoc PharmD Summer Fellowship Award Committee
2007	Member (appointed), Ad-hoc College Accreditation Self Study Committee
2007-2009	Member (elected), PharmD Admission Committee
2010-2014	Member (elected), Student Disciplinary Committee
2010	Member (appointed), Ad-hoc PharmD Summer Fellowship Award Committee
2010, 2013	Member (appointed), Ad-hoc Vahlteich Research Grant Review Committee
2014	Chair (appointed), Ad-hoc Vahlteich Research Grant Review Committee
2015	Acting Director of Graduate Education
2016	Director of Graduate Education
2016-2019	Member (elected), Executive Committee
2017	Member (appointed), Pharmacy Dean search Committee
2021-2024	Member (appointed), PharmD Admission Committee

Service to the University

2011-2013	Member (appointed), Animal Care Committee, Small Animal Subcommittee, UIC
2015-2017	Member (appointed), University of Illinois at Chicago, Building Interdisciplinary
	Research in Women's Health (BIRCWH) Advisory Board, UIC
2017-2022	Member (appointed), Campus Research Board, UIC
2022-2025	Member (appointed), Animal Care Committee, Purdue
2022-2024	Member (appointed), University Faculty Senate, Purdue

ACADEMIC AWARDS & HONORS

1 998	- National Pharmacists Association Scholarship Award, College of Pharmacy, University of Illinois at Chicago
	- Scholarship, Seoul National University Alumni Association in Chicago Area
1999	- Crystal Memorial Award, College of pharmacy, University of Illinois at Chicago
2000	- Charles R. Walgreen, Jr. Scholarship, College of pharmacy, University of Illinois at Chicago

- Paul Sang Award, College of pharmacy, University of Illinois at Chicago

2001 - Graduation with *summa cum laude*

- 2002 Van Doren Scholarship, College of pharmacy, University of Illinois at Chicago - Korean American Scholarship Foundation Scholarship
- 2003 Dean's Scholar, Graduate College, University of Illinois at Chicago
 Poster Award (3rd place), Pharmaceutics Graduate Students Research Meeting
- 2017 Early Career Achievement Award in Drug Metabolism and Disposition, American Society of Pharmacology and Experimental Therapeutics

PROFESSIONAL AFFILIATIONS

2001-2013, 2021- present	American Association of Pharmaceutical Scientists (AAPS)
2006-2010	American College of Clinical Pharmacy (ACCP)
2006-2010	American Society of Clinical Pharmacology and Therapeutics (ASCPT)
2006-present	International Society for the Study of Xenobiotics (ISSX)
2006-present	American Society of Pharmacology and Experimental Therapeutics
(ASPET)	
2020-present	American Association for the Advancement of Science (AAAS)