

MATTHEW JAMES CAMPEN, PH.D., M.S.P.H.
REGENTS' PROFESSOR, UNIVERSITY OF NEW MEXICO

Home:

2312 Hannett Dr, NE
Albuquerque, NM 87106
(505) 232-0863
mcampen@salud.unm.edu

Office:

MSC09 5360
1 University of New Mexico
Albuquerque, NM 87131
(505) 925-7778 (office), 272-6749 (fax)

EDUCATION

Postdoctoral Fellowship | June, 2002

Division of Pulmonary and Critical Care Medicine
Johns Hopkins University School of Medicine, Baltimore, MD
Cardiopulmonary Physiology, Christopher P. O'Donnell, Advisor
Genetic Contributions to Adverse Cardiac Sequelae Due to Sleep Apnea

Doctor of Philosophy | July, 2000

Department of Environmental Science and Engineering
University of North Carolina at Chapel Hill, School of Public Health
Environmental Health Science, W. Penn Watkinson, Advisor
Dissertation Title: Cardiopulmonary Toxicity of Particulate Matter Air Pollution-Associated Transition Metals in Rodents.

Master of Science in Public Health | December, 1997

University of North Carolina at Chapel Hill, School of Public Health
Environmental Health Science, W. Penn Watkinson, Advisor
Thesis Title: Cardiovascular and Thermoregulatory Toxicity of an Emission Source Particulate in Healthy and Compromised Rats.

Bachelor of Science | June, 1994

Virginia Polytechnic Institute and State University
Biochemistry and Psychology, Minor in Chemistry

PROFESSIONAL APPOINTMENTS

KL2 Program Director (2017-present)

Professor (2015-present)

Associate Professor (2009-2015)

Department of Pharmaceutical Sciences

College of Pharmacy

University of New Mexico, Albuquerque, NM

Director, Cardiovascular and Pulmonary Physiology (2007-2009)

Associate Scientist, Study Director (2004-2009)

Associate Research Scientist (2002-2004)

Toxicology Division, National Environmental Respiratory Center

Lovelace Respiratory Research Institute, Albuquerque, NM

ADJUNCT APPOINTMENTS

Adjunct Assistant Professor (2005-2008)
Department of Pathology, Center for Tropical Diseases
University of Texas, Medical Branch, Galveston, TX

Adjunct Assistant Professor (2002-2009)
School of Medicine & School of Pharmacy
University of New Mexico, Albuquerque, NM

HONORS AND AWARDS

Marshall Hahn Scholarship at VPI & SU, 1990
Mary O. Amdur Award for Environmental Inhalation Toxicology, Society of Toxicology Meeting, 1999 for presentation entitled: Cardiopulmonary Toxicity of Instilled Nickel, Vanadium, and Iron in Monocrotaline-Treated Rats. M J Campen, K L Dreher, D L Costa, and W P Watkinson.
Individual National Research Service Award, NHLBI, 2001 "Hemodynamic Responses to Apnea in Mouse Strains", 1F32HL068417-01
Graduate Volunteer Faculty Award, 2006, College of Pharmacy, University of New Mexico
Research Paper of the Year, 2007, Inhalation and Respiratory Specialty Section, Society of Toxicology, for Lund et al. (#31, below)
Young Investigator Award, Inhalation and Respiratory Specialty Section, Society of Toxicology, 2013
Society of Toxicology Achievement Award, 2014
UNM Regents' Professorship, 2017-2019

SOCIETY MEMBERSHIPS

American Physiological Society 1998-2009.
American Thoracic Society 2001-present.
Society of Toxicology, 2002-present.
President / Executive Officer, Mountain West Regional Chapter, 2005-2007
Councilor, Inhalation Specialty Section, 2007-2009
Member, Research Funding Committee, 2008-2009
Member, Disease Prevention Task Force, 2008-2011
President, Founding Officer, Cardiovascular Specialty Section, 2010-2011
Member, Publications Committee, 2012-2016; Chair, 2015-2016
Member, Awards Committee, 2015-2017
President / Executive Officer, Inhalation and Respiratory Specialty Section, 2017-2020
New Mexico Center for Environmental Health Sciences, 2003-2008
American Heart Association, 2005-present

PROFESSIONAL ACTIVITIES

Organized 2005 Mountain West Society of Toxicology Meeting, "Environmental Cardiology", Santa Fe, New Mexico
Member, Albuquerque Air Quality Board, 2006-2009
Environmental Justice Subcommittee Member, 2007
Contributor, Cardiovascular Toxicology Chapter, 2009 Integrated Science Assessment

for Particulate Matter, Environmental Protection Agency
 Contributor, Systemic Toxicology Chapter, 2009 Integrated Science Assessment for
 Carbon Monoxide, Environmental Protection Agency
 Advisory Committee, Great Lakes Air Center for Integrated Environmental Research
 (GLACIER), EPA-funded program, 2010-2015
 Clean Air Scientific Advisory Committee (CASAC) member, Oxides of Nitrogen
 Integrated Science Assessment review, US EPA, 2013
 Expert Panelist, Workshop to Discuss Policy-Relevant Science to Inform EPA's Review
 of the Primary and Secondary National Ambient Air Quality Standards for the Effects
 of Particulate Matter, Feb. 9–11, 2015
 Contributor, Cardiovascular Toxicology Chapter, 2016 Integrated Science Assessment
 for Particulate Matter, Environmental Protection Agency

GRANT REVIEW

Congressional Line-Item Program Review, National Center for Environmental Research,
 U.S. Environmental Protection Agency, 2006
 Physiology Panel, Crew Health Joint NRA Review, National Aeronautics and Space
 Administration, 2008
 NIEHS, 2009/01 EHS (T2) 1, EHS Training Grants Review Meeting, November, 2008
 NIEHS, Special Emphasis Panel, 2009/05 ZES1 JAB-J (K9) 1 Pathways to
 Independence/Career Development, February, 2009
 Physiology Panel, Postdoctoral Fellowship Review, National Aeronautics and Space
 Administration, 2009
 Italian Ministry of Health, Young Investigator Awards, 2009
 American Heart Association, Vascular Wall Biology Study Section, April 2010
 NIEHS, Special Emphasis Panel, 2010 ZES1 JAB-C Virtual Consortium for
 Translational/ Transdisciplinary Environmental Research (ViCTER), May 2010
 Italian Ministry of Health, Young Investigator Awards, 2010
 NIEHS, Research Careers in Environmental Health, ZES1-LKB-J-K9, July 14, 2011
 Colt Foundation, United Kingdom Young Investigator Award, September, 2011
 Fondazione Cariplo, Italian Biomedicine Research Grants, October 2011
 American Heart Association, Vascular Wall Biology Study Section, April 2013
 NIEHS, Special Emphasis Panel, ZES1 JAB-C Virtual Consortium for Translational/
 Transdisciplinary Environmental Research (ViCTER), May 2013
 NIEHS P42 Superfund Research Centers, October 24-25, 2013
 American Heart Association, Vascular Wall Biology Study Section, Co-Chair, April 2014
 Colt Foundation, United Kingdom Young Investigator Award, October, 2014
 American Heart Association Innovative Research Grant, Vascular Sciences, Oct 2014
 NIH CSR, P51 Primate Center Review, ZRG1 BBBP-J 55 R, December, 2014
 NIEHS, Special Emphasis Panel, K99/R00 Pathways to Independence/Career
 Development, April 2015
 NIEHS, Child Health and the Environment Center Grant Review Committee, 2015/8
 ZES1 LKB-D, May 2015
 NIEHS, Outstanding New Environmental Scientist (ONES) Award Review Committee,
 ZES1 JAB-J, July 2015
 NIH CSR, Systemic Injury of Environmental Exposures, ad hoc, Feb 18, 2016
 NIEHS, IAM Career Application Review- ZES1 LWJ-J (KS) 1, July 11, 2016
 NIEHS P30 Environmental Health Centers Review Committee, ad hoc, Aug 16-17, 2016
 NIA SEP, ZAG1 ZIJ-8 (J1) Alzheimer's Disease and Air Pollution, Sept 8, 2016

CDC/NIOSH Study Section Review Panel, Oct 11, 2016
 NIEHS P30 Environmental Health Centers Review Committee, ad hoc, Aug 29-30, 2017
 NIA SEP, ZAG1 ZIJ-8 (J1) Alzheimer's Disease and Air Pollution, Sept 7, 2017
 NIH CSR, Systemic Injury of Environmental Exposures (SIEE), Regular Member, 2017-2020

EDITORIAL CONTRIBUTIONS: JOURNALS

Inhalation Toxicology, 2006-2011 Editorial Board
Associate Editor, 2009-2016
 Cardiovascular Toxicology, 2006-2011 Editorial Board
Associate Editor, 2009-2016
 Toxicological Sciences, 2009-2018 Editorial Board
Associate Editor, 2011-2019
Interim Editor-in-Chief, 2013
 Toxicology Letters, 2012-2015 Editorial Board

GRANT RESEARCH SUPPORT: CURRENT

P20GM130422-01A1	Campan (PI)	8/1/2020-7/31/2025
New Mexico Center for Metals in Biology and Medicine		
This Center of Biomedical Research Excellence is established to leverage our institutional expertise in analytical chemistry for metal interactions with biology to address research questions related to toxicity, nutritional and therapeutic value, and potential drug delivery usage of metals. Emphasis on early career development for UNM assistant professors is a major aspect to the P20.		
Role: Director		Direct Costs: \$7,800,000
R01ES014639	Campan (PI)	04/01/2008 – 03/31/2024
Enhancement of Coronary Constriction by Volatile Organic Air Toxics (NIEHS)		
Investigating the vascular toxicity of common components of combustion mixtures and the impact on cardiac health.		
Role: Principal Investigator		Cumulative Direct Costs: \$2,380,755
R01OH010828-01A0	Campan, Ottens (coPI)	4/1/2015-3/31/2019
Systemic Health Implications of Occupational Nanomaterial Exposure (NIOSH/CDC)		
Examining the circulatory and cerebrovascular effects of pulmonary exposure to nanomaterials.		
Role: Co-Principal Investigator		Direct Costs: \$1,600,000
R01ES026673	Campan (PI)	8/01/2016-7/31/2021
Inhalation of Contaminated Mine Waste Dusts as a Route for Systemic Metal Toxicity (NIEHS)		
Assessing the cardiorespiratory health effects of metal-laden particulate matter originating from local abandoned mine sites in tribal lands of the southwestern United States.		
Role: Principal Investigator		Direct Costs: \$1,625,180
KL2TR001448	Campan (PI)	04/1/17 – 3/31/25
Mentored Career Development Program: UNM Clinical and Translational Science Center		
Building the capacity of our faculty to perform clinical and translational research, thereby addressing the significant health problems of New Mexico, the region, and the nation. Our short-term objective is to enhance our KL2 program by strengthening recruitment, augmenting individualized training, and improving mentoring to ensure that scholars become independently funded by the end of their K-award period.		

Role: Principal Investigator

P42ES025589 Lewis J (PI) 08/15/17 – 3/31/22
 UNM Metal Exposure Toxicity Assessment on Tribal Lands in the Southwest (METALS)
 Superfund Research Program
 The goal of the UNM METALS center is elucidation of how exposures to metal mixtures from uranium mining wastes result in systemic inflammation - exacerbating DNA damage, immune dysregulation, and cardiovascular disease.
 Role: Center Deputy Director/Administrative Core

R01ES029442 Kheradmand (PI) 08/01/19-07/31/21
 Toxic Effects of eCigs following Transition from Conventional Cigarettes
 Assessing the cardiovascular health effects of e-cigarettes as compared to conventional tobacco products.
 Role: Co-investigator

GRANT RESEARCH SUPPORT: COMPLETED

1F32HL068417-01 Campen (PI) 8/14/01-6/30/02
 Hemodynamic Responses to Apnea in Mouse Strains
 Characterization of the sleep physiology and cardiovascular responses to hypoxia in several mouse strains.
 Role: Principal Investigator Direct Costs: \$31,303

R830839-010 Campen (PI) 4/21/03-4/20/07
 US EPA STAR Award
 Coronary Effects of Diesel Exhaust Particulate Matter
 Examining effects of diesel exhaust on coronary vessel physiology and indices of risk for sudden cardiac death in a susceptible animal model.
 Role: Principal Investigator Direct Costs: \$500,000

4709-RFPA03-4/04-5 Campen (PI) 3/01/04-12/31/06
 Health Effects Institute
 Air Pollution-Induced Circulatory Redistribution: Potential Role of Venoconstriction in Particulate Matter-Associated Heart Failure
 Investigating relative effects of diesel exhaust on constriction in the venous and arterial circulations.
 Role: Principal Investigator Direct Costs: \$160,000

CF 826442-01-1 Mauderly (PI) 4/1/98 – continuing
 US EPA
 National Environmental Respiratory Center
 To place respiratory health risks from mixed pollutant atmospheres and sequential pollutant exposures in their appropriate context as a basis for regulatory and technological decision-making.
 Role: Co-Investigator

RD831860 Kanagy (PI) 9/1/04-8/30/09
 US EPA
 Diesel-Induced Vascular Dysfunction: Role of Endothelin (ES-03-010)
 Examining the role of endothelin in causing particulate matter-related cardiovascular effects.
 Role: Co-Investigator

R83399001-0 Campen (PI) 1/1/09-12/31/10

US EPA STAR Award

Development of Environmental Health Outcome Indicators

Assaying tissues for biomarkers of exposure:health outcome indicators resulting from inhalation of complex combustion mixtures.

Role: Principal Investigator

Direct Costs: \$332,000

EPA #CR-83234701

Vedal (PI)

5/1/06-4/30/11

NPACT: Integrated Epidemiologic and Toxicologic Cardiovascular Studies to Identify Toxic Components of Fine Particulate Matter

Examining the atherosclerotic effects of contrasting source pollutants in both toxicological and epidemiological studies.

Role: Co-investigator

1R21OH010495

Campen (PI)

09/01/13-8/31/15

Endothelial Cells as Biosensors for Occupational Cardiovascular Risk

Utilizing endothelial cells to identify alterations in serum inflammatory potential induced by nanomaterial inhalation.

Role: Principal Investigator

Direct Costs: \$275,000

RD-83479601-0

Vedal (PI)

7/1/10-6/30/16

University of Washington Center for Clean Air Research (EPA)

Project 3. Cardiovascular Consequences of Immune Modification by Traffic-Related Emissions

Role: Project 3 Principal Investigator

Direct Costs: \$414,937

P20GM121176-01

Deretic (PI)

09/01/17-08/31/22

Autophagy, Inflammation and Metabolism (AIM) in Disease Center

The AIM Center is a cutting-edge program for examining how autophagy pathways are involved in a broad range of diseases. This program is designed to help develop new scientists in the fields of autophagy, inflammation and metabolism.

Role: Mentoring Director

R01ES023838-01

Campen (PI)

4/1/2016-3/31/2019

ViCTER Award: Vascular Consequences of Gas and Particulate Phases of Near-Roadway Pollution (NIEHS)

Role: Co-Principal Investigator

Direct Costs: \$750,000

CONTRACTS

UNM 3RN71

Campen (Study Director)

2/1/13-10/31/13

PGTi

Efficacy Testing of Test Article in Rodent Models of Pulmonary Arterial Hypertension

Role: Study Director

Total Cost: \$52,700

UNM Pending

Campen (SD)

12/1/11-1/31/12

Theravance

Efficacy Testing of Novel Compounds in a Mouse Model of Pulmonary Arterial Hypertension, Phase 2

Role: Study Director

Total Cost: \$38,700

UNM 3RF48

Campen (SD)

7/29/11-12/31/11

Theravance

Efficacy Testing of Novel Compounds in a Mouse Model of Pulmonary Arterial Hypertension

Role: Study Director

Total Cost: \$33,220

UNM3RC91 Corridor Pharmaceuticals Efficacy Testing of Novel Compounds and Sildenafil in Reversing MCT-Induced Pulmonary Hypertension in a Rodent Model Role: Study Director	Campen (SD)	4/1/2011-6/15/2011 Total Cost: \$55,000
LRRF FY08-119 Theravance, Inc. Efficacy Testing of a Novel Compound in Reducing Angiotensin-II Induced Hypertension in the Beagle Dog Model Role: Study Director	Campen (SD)	8/1/2008-1/31/2009 Total Costs: \$94,000
LRRF #2550227 ExxonMobil Biomedical Sciences Toxicogenomic Approaches to Evaluate the Cardiovascular Effects of Emissions from Diesel Engines Using Alternate Fuel Grades Role: Study Director	Campen (SD)	2/1/2007-1/31/2008 Total Costs: \$150,000
LRRF FY07-28 Galleon Pharmaceuticals, Inc Initial Efficacy Studies of S-Nitrosothiol-Related Compounds in Rats Role: Study Director	Campen (SD)	6/1/2006-12/30/2007 Total Costs: \$226,000
LRRF FY05- 013 LabPharma, Ltd Cardiovascular Safety Assay of Calcitonin Gene-Related Peptide by Inhalation in Dogs Role: Study Director	Campen (SD)	11/1/2004-3/31/2005 Total Costs: \$98,450
DAMD17-00-C-0031 JAYCOR/DOD subcontract # 959288 Small Animal Test in Support of Model Development Analyzing respiratory mechanics of rodents exposed to gases release in combustion processes for the development of a human model of emergency exposures. Role: Study Director	Campen (SD)	1/1/03-12/31/04 Total Costs: \$400,000

PUBLICATIONS

Journal Articles:

- Demakis, G.J., Harrison, D.W., and Campen, M.J. A test of Kinsbourne's selective activation model. *Internat. J. Neurosci.* 72:201-207, 1993.
- Watkinson, W.P., Campen, M.J., Lyon, J.Y., Highfill, J.W., Wiester, M.J., and Costa, D.L. Impact of the hypothermic response in inhalation toxicology studies. *Ann. NY Acad. Sci.* 813:849-863, 1997.
- Watkinson, W.P., Campen, M.J., and Costa, D.L. Arrhythmia induction after exposure to residual oil fly ash particles in the pulmonary hypertensive rat. *Toxicological Sciences* 41:209-216, 1998.
- Kodavanti, U.K., Jackson, M.C., Ledbetter, A.D., Richards, J.R., Gardner, S.Y., Watkinson, W.P., Campen, M.J., and Costa, D.L. Lung injury from intratracheal and inhalation exposures to residual oil fly ash in a rat model of monocrotaline-induced pulmonary hypertension. *J. Toxicol. Environ. Health* 57:101-121, 1999.
- Campen, M.J., Norwood, J., McGee, J., Mebane, R., Hatch, G.E., and Watkinson, W.P. Ozone-induced hyperthermia and bradycardia in rats and guinea pigs exposed in whole-body or nose-only systems. *J. Therm. Biol.* 25:81-89, 2000.
- Watkinson, W.P., Campen, M.J., Nolan, J.P., Kodavanti, U.P., Dreher, K.L., Su, W-Y, Highfill, J.W., and Costa, D.L. Thermoregulatory effects following exposure to particulate matter in healthy and cardiopulmonary-compromised rats. *J. Therm. Biol.* 25:131-137, 2000.
- Campen, M.J., Costa, D.L., and Watkinson, W.P. Cardiac and thermoregulatory toxicity of residual oil fly ash in cardiopulmonary-compromised rats. *Inhal. Toxicol.* 12(S2):7-22, 2000.
- Kodavanti, U.K., Schladweiler, M.C., Ledbetter, A.D., Watkinson, W.P., Campen, M.J., Winsett, D.W., Richards, J.R., Crissman, K.M., Hatch, G.E., and Costa, D.L. The spontaneously hypertensive rat as a

- model of cardiovascular disease: evidence of exacerbated cardiopulmonary injury and oxidative stress from inhaled emission particulate matter. *Toxicol. Appl. Pharmacol.* 164(3):250-63, 2000.
9. Watkinson, W.P., Campen, M.J., Nolan, J.P., and Costa, D.L. Cardiac and systemic responses to inhaled pollutants in rodents: Effects of ozone and particulate matter. *Environ. Health Perspect.*, 109:539–546, 2001.
 10. Watkinson, W.P., Campen, M.J., Wichers, L.B., Nolan, J.P., Kodavanti, U.P., and Costa, D.L. Impact of toxic agents or adverse conditions on thermoregulatory function in awake rodents. *J. Therm. Biol.*, 26:331–338, 2001.
 11. Campen, M.J., Nolan, J.P., Schladweiler M.C.J., Kodavanti, U.P., Evansky, P., Costa, D.L., and Watkinson, W.P. Cardiac and thermoregulatory effects of inhaled particulate matter-associated transition metals in rats: a potential synergism between nickel and vanadium sulfate. *Toxicol. Sci.* 64:243-252, 2001.
 12. Tagaito, Y., Polotsky, V.Y., Campen, M.J., Wilson, J.A., Balbir, A., Smith, P.L., Schwartz, A.R., and O'Donnell, C.P. A model of sleep-disordered breathing in the C57Bl/6J mouse. *J. Appl. Physiol.* 91:2758-2766, 2001.
 13. Campen, M.J., Nolan, J.P., Schladweiler, M.C., Kodavanti, U.P., Costa, D.L., and Watkinson, W.P. Cardiac and thermoregulatory effects of instilled particulate matter-associated transition metals in healthy and cardiopulmonary-compromised rats. *J Toxicol Environ Health A* 65:1615-1631, 2002.
 14. Campen, M.J., Tagaito, Y., Jenkins, T.P., Smith, P.L., Schwartz, A.R., and O'Donnell, C.P. Phenotypic differences in hemodynamic behavior across sleep wake states in various strains of inbred mice. *Physiol Genomics* 11:227-234, 2002.
 15. Watkinson W.P., Campen M.J., Wichers L.B., Nolan J.P., and Costa D.L. Cardiac and thermoregulatory responses to inhaled pollutants in healthy and compromised rodents: modulation via interaction with environmental factors, *Environ Res* 92:35-47, 2003.
 16. Campen M.J., McDonald J.D., Gigliotti A.P., Seilkop S.K., Reed M.D., and Benson J.M. Cardiovascular effects of inhaled diesel exhaust in spontaneously hypertensive rats. *Cardiovascular Toxicology* 3:353-61, 2003.
 17. Tankersley, C.G., Campen, M., Bierman, A., Flanders, S.E., Broman, K.W., and Rabold, R. Particle Effects on Heart-Rate Regulation in Senescent Mice. *Inhalation Toxicology* 16:381 – 390, 2004.
 18. Walker, D.M., Poirier, M.C., Campen, M.J., Cook, Jr., D.L., Divi, R.L., Nagashima, K., Lund, A.K., Cossey, P.Y., Hahn, F.F., and Walker, V.E. Persistence of Mitochondrial Toxicity in Hearts of Female B6C3F1 Mice Exposed *In Utero* to 3'-Azido-3'-deoxythymidine. *Cardiovascular Toxicology*, 4(2):133-53, 2004.
 19. Campen M.J., Tagaito Y., Li J., Balbir A., Tankersley C.G., Smith P., Schwartz A., and O'Donnell CP. Phenotypic variation in cardiovascular responses to acute hypoxic and hypercapnic exposure in mice. *Physiol. Genom.* 20(1):15-20, 2004.
 20. Campen, M.J., Tagaito, Y., Jenkins, T.P., Balbir, A., and O'Donnell. Heart rate variability responses to hypoxic and hypercapnic exposures in different mouse strains. *J Appl. Physiol.* 99:807-813, 2005.
 21. Campen, M.J., Shimoda, L.A., and O'Donnell, C.P. The acute and chronic cardiovascular effects of intermittent hypoxia in C57BL/6J mice. *J Appl Physiol* 99:2028-2035, 2005.
 22. Campen, M.J., Babu, N.S. Helms, G.A., Pett, S., Wernly, J., Mehran, R., and McDonald, J.D. Nonparticulate Components of Diesel Exhaust Promote Constriction in Coronary Arteries from ApoE^{-/-} Mice. *Toxicological Sciences* 88:95-102, 2005.
 23. Tesfaigzi, Y., McDonald, J.D., Reed, M.D., Hahn, F.F., Singh, S.P., Eynott, P.R., Campen, M.J., Mauderly, J.L. Low Level Subchronic Exposure to Wood Smoke Exacerbates Inflammatory Responses in Allergic Rats. *Toxicol. Sci.*, 88:505-513, 2005.
 24. Zhuang, J., Xu, F., Campen, M.J., Hernandez, J., Shi, S., and Wang, R. Transient carbon monoxide inhibits the ventilatory responses to hypoxia through peripheral mechanisms in the rat. *Life Sciences*, 78:2654-2661, 2006.
 25. Reed, M. D., M.J. Campen, A. P. Gigliotti, K. S. Harrod, J. D. McDonald, J.C. Seagrave, S. K. Seilkop, and J. L. Mauderly. Health Effects of Subchronic Exposure To Environmental Levels Of Hardwood Smoke. *Inhal. Toxicol.* 18(8):523-39, 2006.
 26. Obot Akata CJ, Blair LF, Barr EB, Storch S, Vigil G, and Campen MJ. Development of a head-out plethysmograph system for non-human primates in an animal biosafety level 3 facility. *J. Pharmacol. Toxicol. Meth.*, 55(1):96-102, 2006.
 27. Campen MJ, Milazzo ML, Fulhorst C, Obot Akata CJ, and Koster F. Characterization of Shock in a Hamster Model of Hantavirus Infection. *Virology*, 356(1-2):45-49, 2006.
 28. March, T.H., Wilder, J.A., Esparza, D.C., Cossey, P.Y., Blair, L.F., Herrera, L.K., McDonald, J.D., Campen, M.J., Mauderly, J.L., Seagrave, J. Modulators of Cigarette Smoke-Induced Pulmonary

- Emphysema in A/J Mice. *Toxicol Sci.* 92(2):545-59, 2006.
29. Campen, M.J., McDonald, J.D., Reed, M.D., and Seagrave, J. Fresh Gasoline Emissions, Not Paved Road Dust, Trigger Alterations in Cardiac Repolarization in ApoE^{-/-} Mice. *Cardiovasc Toxicology* 6(3-4):199-210, 2006.
 30. Rowan, WH, Campen, MJ, Wichers, LB, Watkinson WP. Heart Rate Variability in Rodents — Uses and Caveats in Toxicological Studies. *Cardiovasc Toxicol*, 7:28-51, 2007.
 31. Lund, A.K., Knuckles, T.L., Obot Akata, C., Shohet, R., McDonald, J.D., Gigliotti, A., Seagrave, J., and Campen, M.J. Gasoline Exhaust Emissions Induce Vascular Remodeling Pathways Involved in Atherosclerosis. *Toxicol. Sci.* 95(2):485-94, 2007.
 32. Chang B, Crowley M, Campen M, Koster F. Hantavirus cardiopulmonary syndrome. *Semin Respir Crit Care Med.*28(2):193-200, 2007.
 33. McDonald JD, Reed MD, Campen MJ, Barrett EG, Seagrave J, Mauderly JL. Health effects of inhaled gasoline engine emissions. *Inhal. Toxicol.* 19(Suppl 1):107-116, 2007.
 34. Aragon AC, Kopf PG, Campen MJ, Huwe JK, and Walker MK. In utero and lactational 2,3,7,8-tetrachlorodibenzo-p-dioxin exposure: Effects on fetal and adult cardiac gene expression and adult cardiac and renal morphology. *Toxicol Sci.* 101(2):321-330, 2008.
 35. Knuckles TL, Lund AK, Lucas SN, and Campen MJ. Diesel Exhaust Exposure Enhances Venoconstriction through Uncoupling of eNOS. *Toxicol Appl Pharmacol.*, 230:346-351, 2008.
 36. Seagrave JC, Campen MJ, McDonald JD, Mauderly JL, and Rohr AC. Oxidative Stress, Inflammation, and Pulmonary Function Assessment in Rats Exposed to Laboratory-Generated Pollutant Mixtures. *J Toxicol Environ Health*, 71:1352-1362, 2008.
 37. Mishra NC, Rir-sima-ah J, Langley RJ, Singh SP, Peña-Philippides JC, Koga T, Razani-Boroujerdi S, Hutt J, Campen M, Kim KC, Tesfaigzi Y, and Sopori ML. Nicotine Primarily Suppresses Lung Th2 but not Goblet Cell and Muscle Cell Responses to Allergens. *J Immunol*, 180:7655-7663, 2008.
 38. Zhuang, J., Xu, F., Campen, M.J., Zhang, C., Pena-Philippides, J.C., and Sopori, M.L. Inhalation of the Nerve Gas Sarin Impairs Ventilatory Responses to Hypercapnia and Hypoxia in Rats. *Toxicol and Appl Pharmacol.* 232(3):440-447, 2008.
 39. Reed MD, Barrett EG, Campen MJ, Divine KK, Gigliotti AP, McDonald JD, Seagrave JC, Seilkop SK, Swenberg JA, and Mauderly JL. Health Effects of Subchronic Inhalation Exposure to Gasoline Engine Emissions. *Inhal Toxicol*, 20(13):1125-43, 2008.
 40. Lund AK, Lucero JA, Lucas S, Madden MC, McDonald JD, Seagrave JC, Knuckles TL, and Campen MJ. Vehicular Emissions Induce Vascular MMP-9 Expression and Activity via Endothelin-1 Mediated Pathways. *Arterioscler Thromb Vasc Biol*, 29(4):511-517, 2009.
 41. Cherng TW, Campen MJ, Knuckles TL, Gonzalez-Bosc L and Kanagy NL. Impairment of coronary endothelial cell ET_B receptor function following short-term inhalation exposure to whole diesel emissions. *Am J Physiol Regul Integr Comp Physiol*, 297:640-647, 2009.
 42. Singh SP, Rir-sima-ah J, Mishra N, Campen M, Kurup V, and Sopori ML. Maternal exposure to secondhand cigarette smoke primes the lung for allergen-induced inflammation, muscarinic receptor overexpression, airway hyperreactivity, and atopy; rolipram attenuates the hyperreactivity but not the inflammatory/IgE responses. *J Immunol*, 183:2115-2121, 2009.
 43. Campen MJ. Nitric oxide synthase: "enzyme zero" in air pollution-induced vascular toxicity. *Toxicol Sci.* 110:1-3, 2009.
 44. Campen MJ, Lund AK, Knuckles TL, Conklin DJ, Bishop B, Young D, Seilkop SK, Seagrave JC, Reed MD, and Jacob D. McDonald JD. Inhaled Diesel Emissions Alter Atherosclerotic Plaque Composition in ApoE^{-/-} Mice. *Toxicol Appl Pharmacol*, 242:310-317, 2010.
 45. McDonald JD, Doyle-Eisele M, Campen MJ, Seagrave JC, Holmes TD, Lund A, Surratt JD, Seinfeld JH, Rohr AC, and Knipping, EM. Cardiopulmonary Response to Inhalation of Biogenic Secondary Organic Aerosol. *Inhalation Toxicol*, 22:253-265, 2010.
 46. Torres SM, Divi RL, Walker DM, McCash CL, Carter MM, Campen MJ, Einem TL, Chu Y, Seilkop SK, Kang H, Poirier MC, Walker VE. In Utero Exposure of Female CD-1 Mice to AZT and/or 3TC: II. Persistence of Functional Alterations in Cardiac Tissue. *Cardiovasc Toxicol*, 10:87-99, 2010.
 47. Campen MJ, Lund AK, Doyle-Eisele M, McDonald JD, Knuckles TL, Rohr A, Knipping E, and Mauderly JL. A Comparison of Vascular Effects from Complex and Individual Air Pollutants Indicates a Toxic Role for Monoxide Gases. *Environ Health Perspect*, 118(7):921-927, 2010. PMID: 20197249.
 48. Cherng TW, Paffett ML, Jackson-Weaver O, Campen MJ, Walker BR, and Kanagy NL. Mechanisms of Diesel-Induced Endothelial NOS Dysfunction in Coronary Arterioles. *Environ Health Perspect*, 119:98-103, 2011.
 49. Kodavanti UP, Thomas R, Ledbetter AD, Schladweiler MC, Shannahan JH, Wallenborn JG, Lund AK,

- Campen MJ, Butler EO, Gottipolu RR, Nyska A, Richards JE, Andrews D, Jaskot RH, McKee J, Kotha SR, Patel RB, Parinandi NL. Vascular and Cardiac Impairments in Rats Inhaling Ozone and Diesel Exhaust Particles. *Environ Health Perspect*, 119:312-318, 2011.
50. Maresh JG, Campen M, Reed MD, Darrow A, Shohet R. Hypercholesterolemia potentiates aortic endothelial response to inhaled diesel exhaust. *Inhalation Toxicol*, 23:1-10, 2011.
 51. Knuckles TL, Buntz JG, Paffett ML, Channell M, Harmon M, Cherng T, Lucas SN, McDonald JD, Kanagy NL, and Campen MJ. Formation of Vascular S-Nitrosothiols and Plasma Nitrates/Nitrites Following Inhalation of Diesel Emissions. *J Toxicol Environ Health A*, 74:828-837, 2011. PMID:21598168.
 52. McDonald JD, Campen MJ, Harrod K, Seagrave JC, Seilkop SK, Mauderly JL. Engine Operating Load Influences Diesel Exhaust Composition and Modulates Lung Inflammation, Susceptibility to Infection, Oxidative Stress and Cardiovascular Toxicity. *Environ Health Perspect*, in press, 2011.
 53. Lund AK, Lucero J, Harman M, Mathews N, Madden M, McDonald JD, Seagrave J, and Campen MJ. The Oxidized Low Density Lipoprotein Receptor Mediates Vascular Effects of Inhaled Vehicle Emissions. *Am J Resp Crit Care Med*, 184:82-91, 2011. **Cover Art for AJRCCM.
 54. Paffett ML, Lucas SN, Harman M, Campen MJ. Resveratrol Reverses Experimental Pulmonary Hypertension: A Potential Role for Atrogin-1 in Smooth Muscle. *Vasc Pharm*, in Press, 2011.
 55. Campen MJ, Lund AK, and Rosenfeld ME. Mechanisms Linking Traffic-Related Air Pollution and Atherosclerosis. *Curr Opin Pulmon Med*, 18:155-60, 2012.
 56. Seilkop SK, Campen MJ, Lund AK, McDonald JD, Mauderly JL. Identification of Chemical Components of Common Air Pollutants that Affect Indicators of Atherosclerosis. *Inhal Toxicol*, 24:270-87, 2012.
 57. Channell MC, Aragon M, Paffett ML, Devlin R, Campen MJ. Circulating factors induce coronary endothelial cell activation following exposure to inhaled diesel exhaust and nitrogen dioxide in humans: Evidence from a novel translational in vitro model. *Toxicol Sci*, 127:179-186, 2012.
 58. Paffett ML, Channell MC, Naik V, Lucas SN, Campen MJ. Cardiac and vascular atrogin-1 mRNA expression is not associated with dexamethasone efficacy in the monocrotaline model of pulmonary hypertension. *Cardiovasc Toxicol*, 12(3):226-234, 2012.
 59. Campen MJ. Vascular endothelium as a target of diesel particulate matter-associated toxicants. *Arch Toxicol*. 86(4):517-8, 2012.
 60. Paffett ML, Hesterman J, Candelaria G, Lucas S, Anderson T, Irwin D, Hoppin J, Norenberg J, Campen MJ. Longitudinal In Vivo SPECT/CT Imaging Reveals Morphological Changes and Cardiopulmonary Apoptosis in a Rodent Model of Pulmonary Arterial Hypertension. *PLoS One*. 7(7):e40910, 2012
 61. Agarwal B*, Campen MJ*, Channell MM, Wherry SJ, Varamini B, Davis JG, Baur JA, Smoliga JM. Resveratrol for primary prevention of atherosclerosis: clinical trial evidence for improved gene expression in vascular endothelium. *Int J Cardiol*. 166(1):246-8, 2013. *denotes co-1st authorship.
 62. Robertson S, Colombo ES, Lucas SN, Hall PR, Febbraio M, Paffett ML, Campen MJ. CD36 mediates endothelial dysfunction downstream of circulating factors induced by O₃ exposure. *Toxicol Sci*, 134:304-311, 2013.
 63. Colombo ES, Davis J, Makvandi M, Aragon M, Lucas SN, Paffett ML, Campen MJ. Effects of nicotine on cardiovascular remodeling in a mouse model of systemic hypertension. *Cardiovasc Toxicol*, 13:364-9, 2013.
 64. Smoliga JM, Colombo ES, Campen MJ. A healthier approach to clinical trials evaluating resveratrol for primary prevention of age-related diseases in healthy populations. *Aging (Albany NY)*, 5(7):495-506, 2013.
 65. Campen MJ. To breathe or not to breathe: negative data on ozone and vascular function in an established research model. *Toxicol. Sci.*, 135(2):263-264, 2013.
 66. Campen MJ, Paffett ML, Colombo ES, DeLuca M, Lucas SN, Gershman B, Hoppin J, Norenberg J, Anderson T, Nysus M, Willis M. Muscle RING Finger-1 promotes a maladaptive phenotype in chronic hypoxia-induced right ventricular remodeling. *PLoS One*, 9(5):e97084, 2014. PMID: 24811453
 67. Vedal S, Campen MJ, McDonald JD, Larson TV, Sampson PD, Sheppard L, Simpson CD, Szpiro AA. National Particle Component Toxicity (NPACT) initiative report on cardiovascular effects. *Res Rep Health Eff Inst*. 178:5-8, 2013. PMID: 24377210
 68. Sood A, Seagrave J, Herbert G, Harkins M, Alam Y, Chiavaroli A, Shohreh R, Montuschi P, Campen M, Harmon M, Qualls C, Berwick M, Schuyler M. High sputum total adiponectin is associated with low odds for asthma. *J Asthma*. 51, 459-466, 2014. PMID: 24447284
 69. Campen MJ, Robertson S, Lund AK, Lucero J, McDonald JD. Engine Exhaust Particulate And Gas Phase Contributions To Vascular Toxicity. *Inhal Toxicol*, 26:353-360, 2014. PMID: 24730681
 70. Mauderly JL, Barrett EG, K.C. Day KC, Gigliotti AP, McDonald JD, Harrod KS, Lund AK, Reed MD, Seagrave J, Campen MJ Seilkop SK. National Environmental Respiratory Center (NERC) Experiment in

- Multipollutant Air Quality Health Research: II. Comparison of Responses to Diesel and Gasoline Engine Exhausts, Hardwood Smoke, and Simulated Downwind Coal Emissions. *Inhal. Toxicol.* 26:651-667, 2014. PMID: 25162719
71. Cung H, Aragon MJ, Zychowski K, Anderson J, Nawarskas J, Roldan C, Sood A, Qualls C, Campen MJ. Characterization of a Novel Endothelial Biosensor Assay Reveals Increased Cumulative Serum Inflammatory Potential in Stabilized Coronary Artery Disease Patients. *Journal of Translational Medicine*, 13:99, 2015. PMID: 25890092
 72. Schisler JC, Ronnebaum SM, Madden M, Channell MM, Campen MJ, Willis MS. Endothelial Inflammatory Transcriptional Responses to an Altered Serum Exposome Following Inhalation of Diesel Emissions. *Inhal Toxicol*, 27:272-280, 2015. PMID: 25942053
 73. Aragon MJ, Chrobak I, Brower J, Roldan L, Fredenburgh LE, McDonald JD, Campen MJ. Inflammatory and Vasoactive Effects of Serum Following Inhalation of Varied Complex Mixtures. *Cardiovasc Toxicol*, 16:163-171, 2015. PMID: 25900702
 74. Paffett ML, Zychowski KE, Sheppard L, Robertson S, Weaver J, Lucas SN, Campen MJ. Ozone inhalation impairs coronary artery dilation via intracellular oxidative stress: Evidence for serum-borne factors as drivers of systemic toxicity. *Toxicol Sci*, 146:244-253, 2015. PMID: 25962394
 75. Harmon ME, Campen MJ, Miller C, Shuey C, Cajero M, Lucas SN, Pacheco B, Erdei E, Ramone S, Nez T, Lewis J. Circulating Oxidized LDL and Conventional Biomarkers of Cardiovascular Health In a Cohort of Navajo Community Members. *PLoS ONE*, 11(3):e0143102. doi: 10.1371/journal.pone.0143102, 2016. PMID: 26938991
 76. Brower JB, Doyle-Eisele M, Moeller B, Stirdivant S, McDonald JD, Campen MJ. Metabolomic Changes in Murine Serum Following Inhalation Exposure to Gasoline and Diesel Engine Emissions. *Inhal Tox*, 28:241-50, 2016. PMID: 27017952
 77. Aragon M, Erdely A, Bishop L, Salmen R, Weaver J, Liu J, Hall P, Eye T, Kodali V, Zeidler-Erdely P, Stafflinger JE, Ottens AK, Campen MJ. MMP-9-Dependent Serum-Borne Bioactivity Caused by Multi-walled Carbon Nanotube Exposure Induces Vascular Dysfunction Via the CD36 Scavenger Receptor. *Toxicological Sciences*, 150(2):488-98, 2016. PMID: 26801584
 78. Mumaw CL, Levesque S, McGraw C, Robertson S, Lucas S, Stafflinger JE, Campen MJ, Hall P, Norenberg JP, Anderson T, Lund AK, McDonald JD, Ottens AK, Block ML. Microglial Priming through the Lung-Brain Axis: The Role of Air Pollution-induced Circulating Factors. *FASEB J*, 30:1880-1891, 2016. PMID: 26864854
 79. Zychowski KE, Lucas SN, Sanchez B, Herbert G, Campen MJ. Hypoxia-induced pulmonary arterial hypertension augments lung injury and airway reactivity caused by ozone exposure. *Toxicol Appl Pharmacol.* 305:40-45, 2016. PMID: 27286659
 80. Zychowski KE, Sanchez B, Herbert G, Pedrosa RP, Lorenzi-Filho G, Drager LF, Polotsky VY, Campen MJ. Serum from Obstructive Sleep Apnea Patients Induces Inflammatory Responses in Coronary Artery Endothelial Cells: Assessment of Continuous Positive Airway Pressure Therapy on Cardiovascular Biomarkers. *Atherosclerosis*, 254:59-66, 2016. PMID: 27693879
 81. Tyler CR, Zychowski KE, Sanchez BN, Rivero V, Lucas S, Herbert G, Liu J, Irshad H, McDonald JD, Bleske BE, Campen MJ. Surface area-dependence of gas-particle interactions influences pulmonary and neuroinflammatory outcomes. *Particle and Fibre Toxicol*, 13(1):64, 2016. PMID: 27906023
 82. Harmon ME, Lewis J, Miller C, Hoover J, Ali AS, Shuey C, Cajero M, Lucas S, Pacheco B, Erdei E, Ramone S, Nez T, Gonzales M, Campen MJ. Residential Proximity to Abandoned Uranium Mines and Serum Inflammatory Potential in Chronically Exposed Navajo Communities. *J Exposure Sci Environ Epidemiol.* 27:365-371, 2017. PMID: 28120833
 83. Li R, Yang J, Saffari A, Jacobs J, Baek KI, Hough G, Larauche M, Ma J, Jen N, Moussaoui N, Zhou B, Kang H, Campen M, Reddy S, Henning S, Pisegna J, Li Z, Fogelman A, Sioutas C, Navab M, Hsiai T. Ambient Ultrafine Particle Ingestion Alters Gut Microbiota in Association with Increased Atherogenic Lipid Metabolites. *Scientific Reports*, 7:42906, 2017. PMID: 28211537
 84. Aragon M, Topper L, Tyler CR, Sanchez BN, Zychowski KE, Young T, Herbert G, Hall P, Erdely A, Eye T, Zeidler-Erdely P, Ottens AK, Campen MJ. Serum-Borne Bioactivity Caused by Pulmonary Multiwalled Carbon Nanotube Exposure Induces Neuroinflammation Via Blood Brain Barrier Impairment. *Proc Natl Acad Sci USA*, 114(10):E1968-E1976, 2017. PMID: 28223486
 85. Tyler CR, Noor S, Young T, Rivero V, Sanchez B, Lucas S, Caldwell KK, Milligan ED, Campen MJ. Aging Exacerbates Neuroinflammatory Outcomes Induced by Acute Ozone Exposure. *Toxicological Sciences*, 163:123-139, 2018. PMID: 29385576
 86. Harmon ME, Lewis J, Miller C, Hoover J, Ali AS, Shuey C, Cajero M, Lucas S, Pacheco P, Erdei E, Ramone S, Nez T, Campen MJ, Gonzales M. Arsenic Contribution to Circulating Oxidized Low-density

- Lipoprotein in a Native American Community. *JTEH* 81(13):535-548, 2018. PMID: 29641933
87. Zychowski KE, Kodali V, Harmon M, Tyler C, Sanchez B, Ordonez Suarez Y, Herbert G, Wheeler A, Avasarala S, Cerrato JM, Kunda NK, Muttill P, Shuey C, Brearley A, Ali A, Lin Y, Shoeb M, Erdely A, Campen MJ. Respirable Uranyl-Vanadate Containing Particulate Matter Derived from a Legacy Uranium Mine Site Exhibits Potentiated Cardiopulmonary Toxicity. *Toxicological Sciences*, 164:101-114, 2018. PMID: 29660078
 88. Olvera Alvarez HA, Kubzansky LD, Campen MJ, Slavich GM. Early life stress, air pollution, inflammation, and disease: An integrative review and immunologic model of social-environmental adversity and lifespan health. *Neurosci. Biobehav. Rev.* 92:226-242, 2018. PMID: 29874545
 89. Deretic V, Prossnitz E, Burge M, Campen MJ, Cannon J, Liu KJ, Sklar LA, Allers L, Garcia SA, Baehrecke EH, Behrends C, Cecconi F, Codogno P, Chen GC, Elazar Z, Eskelinen EL, Fourie B, Gozuacik D, Hong W, Hotamisligi G, Jättelä M, Jo EK, Johansen T, Juhász G, Kimchi A, Ktistakis N, Kroemer G, Mizushima N, Münz C, Reggiori F, Rubinsztein D, Ryan K, Schroder K, Simonsen A, Tooze S, Vaccaro M, Yoshimori T, Yu L, Zhang H, Klionsky DJ. Autophagy, Inflammation, and Metabolism (AIM) Center of Biomedical Research Excellence: supporting the next generation of autophagy researchers and fostering international collaborations. *Autophagy*, 14:925-929, 2018. PMID: 29938597
 90. Oakley RH, Campen MJ, Paffett ML, Chen X, Wang Z, Parry TL, Hillhouse C, Cidlowski JA, Willis MS. Muscle-specific regulation of right ventricular transcriptional responses to chronic hypoxia-induced hypertrophy by the Muscle Ring Finger-1 (MuRF1) ubiquitin ligase in mice. *BMC Medical Genetics*, 19:175, 2018. PMID: 30241514
 91. Assad N, Sood A, Campen MJ, Zychowski KE. Metals-induced pulmonary fibrosis. *Curr. Environ. Health Rep.* 5:486-498, 2018.
 92. Mota R, Campen MJ, Cuellar ME, Garver WS, Hesterman J, Qutaish M, Daniels T, Nysus M, Wagner CR, Norenberg JP. ¹¹¹In-DANBIRT In Vivo Molecular Imaging of Inflammatory Cells in Atherosclerosis. *Contrast Media Mol Imaging*. 6508724, 2018. PMID: 30538613.
 93. Zou B, You J, Lin Y, Duan X, Zhao X, Fang X, Campen MJ, Li S. Air pollution intervention and life-saving effect in China. *Environ Int.* 125:529-541, 2019. doi: 10.1016/j.envint.2018.10.045. PMID: 30612707
 94. Triplett KD, Pokhrel S, Castleman MJ, Daly SM, Elmore BO, Joyner JA, Sharma G, Herbert G, Campen MJ, Hathaway HJ, Prossnitz ER, Hall PR. GPER activation protects against epithelial barrier disruption by *Staphylococcus aureus* α -toxin. *Sci Rep.* 9:1343, 2019. doi: 10.1038/s41598-018-37951-3. PMID: 30718654
 95. Zychowski KE, Wheeler A, Sanchez B, Harmon M, Steadman-Tyler CR, Herbert G, Lucas SN, Ali AM, Avasarala S, Kunda N, Robinson P, Muttill P, Cerrato JM, Bleske B, Smirnova O, Campen MJ. Toxic effects of particulate matter derived from dust samples near the Dzhidinski ore processing mill, eastern Siberia, Russia. *Cardiovascular Toxicology*, 19(5):401-411, 2019. doi: 10.1007/s12012-019-09507-y. PMID: 30963444.
 96. Mostovenko E, Young TL, Muldoon PP, Bishop L, Canal CG, Vucetic A, Zeidler-Erdely PC, Erdely A, Campen MJ, Ottens AK. Nanoparticle Exposure Driven Circulating Bioactive Peptidome Causes Systemic Inflammation and Vascular Dysfunction. *Particle & Fibre Toxicology*, May 9, 2019. PMID: 31142334
 97. Deretic V, Prossnitz E, Burge M, Campen MJ, Cannon J, Liu KJ, Liu M, Hall P, Sklar LA, Allers L, Mariscal L, Garcia SA, Weaver J, Baehrecke EH, Behrends C, Cecconi F, Codogno P, Chen GC, Elazar Z, Eskelinen EL, Fourie B, Gozuacik D, Hong W, Jo EK, Johansen T, Juhász G, Kimchi A, Ktistakis N, Kroemer G, Mizushima N, Münz C, Reggiori F, Rubinsztein D, Ryan K, Schroder K, Shen HM, Simonsen A, Tooze SA, Vaccaro M, Yoshimori T, Yu L, Zhang H, Klionsky DJ. Autophagy, Inflammation, and Metabolism (AIM) Center in its second year. *Autophagy*. 2019 Oct;15(10):1829-1833. doi:10.1080/15548627.2019.1634444. Epub 2019 Jul 15. PMID: 31234750
 98. Zychowski KE, Sanchez B, Tyler CR, Harmon M, Liu J, Irshad H, McDonald JD, Bleske BE, Campen MJ. Vehicular Particulate Matter (PM) Characteristics Impact Vascular Outcomes Following Inhalation. *Cardiovasc Toxicol.* 2019 Aug 13. PMID: 31410643
 99. Madison MC, Landers CT, Gu BH, Chang CY, Tung HY, You R, Hong MJ, Baghaei N, Song LZ, Porter P, Putluri N, Salas R, Gilbert BE, Levental I, Campen MJ, Corry DB, Kheradmand F. Electronic cigarettes disrupt lung lipid homeostasis and innate immunity independent of nicotine. *J Clin Invest.* 29(10):4290-4304, 2019. PMID: 31483291
 100. Fitch MN, Phillippi D, Zhang Y, Lucero J, Pandey RS, Liu J, Brower J, Allen MS, Campen MJ, McDonald JD, Lund AK. Effects of inhaled air pollution on markers of integrity, inflammation, and microbiota profiles of the intestines in Apolipoprotein E knockout mice. *Environ Res.* 181:108913, 2020. PMID: 31753468

101. Cheng W, Liu Y, Tang J, Duan H, Wei X, Zhang X, Yu S, Campen MJ, Han W, Rothman N, Belinsky SA, Lan Q, Zheng Y, Leng S. Carbon content in airway macrophages and genomic instability in Chinese carbon black packers. *Arch Toxicol.* 94:761-771, 2020. PMID: 32076763
102. Sanchez B, Zhou X, Gardiner AS, Herbert G, Lucas S, Morishita M, Wagner JG, Lewandowski R, Harkema JR, Shuey C, Campen MJ, Zychowski KE. Serum-borne factors alter cerebrovascular endothelial microRNA expression following particulate matter exposure near an abandoned uranium mine on the Navajo Nation. *Part Fibre Toxicol.* 17:29, 2020. PMID: 32611356
103. Tang J, Cheng W, Gao J, Li Y, Yao R, Rothman N, Lan Q, Campen MJ, Zheng Y, Leng S. Occupational exposure to carbon black nanoparticles increases inflammatory vascular disease risk: an implication of an ex vivo biosensor assay. *Part Fibre Toxicol.* 17:47, 2020. PMID: 32993720
104. Begay J, Sanchez B, Wheeler A, Baldwin, Jr. F, Lucas S, Herbert G, Ordonez Y, Shuey C, Klaver Z, Harkema JR, Wagner JG, Morishita M, Bleske B, Zychowski KE, Campen MJ. Assessment of particulate matter toxicity and physicochemistry at the Claim 28 uranium mine site in Blue Gap, AZ. *J Toxicol Environ Health pt A*, 84:31-48, 2021.
105. Garcia M, Salazar R, Wilson T, Lucas S, Herbert G, Young T, Begay J, Denson JL, Zychowski K, Ashley R, Byrum S, Mackintosh S, Bleske BE, Ottens AK, Campen MJ. Early Gestational Exposure to Inhaled Ozone Impairs Maternal Uterine Artery and Cardiac Function. *Toxicological Sciences*, *in press*, 2020.
106. Ni Y, Tracy R, Cornell E, Kaufman J, Szpiro A, Campen MJ, Vedal S. Short-term exposure to air pollution and biomarkers of cardiovascular effect: a repeated measures study. *Environmental Pollution*, *in press*, 2021.
107. Pearce E, Campen MJ, Baca JT, Blewett JP, Femling J, Hanson D, Kraai E, Muttill P, Wolf B, Lauria M, Braude D. Aerosol Generation with Various Approaches to Oxygenation in Healthy Volunteers in the Emergency Department. *J Am Coll Emerg Physicians Open*. *In press*, 2021.

Books:

1. Walker MK & Campen MJ (Eds.). 2010. *Comprehensive Toxicology, Volume 6: Cardiovascular Toxicology (2nd ed.)*. Elsevier Ltd, Kidlington, UK.
2. Campen MJ (Ed.). 2017. *Comprehensive Toxicology, Volume 6: Cardiovascular Toxicology (3rd ed.)*. Elsevier Ltd, Kidlington, UK.

Chapters, Monographs, Conference Proceedings:

1. Watkinson, W.P., Wiester, M.J., Highfill, J.W., Aileru, A.A., Campen, M.J., Tepper, J.S., and Costa, D.L. Thermoregulatory considerations affecting both acute and prolonged exposures to ozone in rodents. In: *Thermal Balance in Health and Disease*. (E. Zeisberger, E. Schonbaum, and P. Lomax, eds.), pp. 509-514, Birkhauser-Verlag, Berlin, 1994.
2. Campen, M.J. Cardiovascular and thermoregulatory toxicity of an emission source particulate in healthy and compromised rats. Thesis submitted to the University of North Carolina School of Public Health, 1996.
3. Campen, M.J., Costa, D.L., and Watkinson, W.P. Cardiac and thermoregulatory toxicity of residual oil fly ash in cardiopulmonary-compromised rats. In: *Proceedings of the Third Colloquium on Particulate Matter Air Pollution and Human Health*, June 6-8, 1999, Durham, NC.
4. Watkinson, W.P., Campen, M.J., Nolan, J.P., Kodavanti, U.P., Dreher, K.L., Su, W-Y., Highfill, J.W., and Costa, D.L. Cardiovascular effects following exposure to particulate matter in healthy and cardiopulmonary-compromised rats. In: *Relationships between Acute and Chronic Effects of Air Pollution*. (U Heinrich and U Mohr, eds.) pp. 447-463, ILSI Press, Washington, 2000.
5. Watkinson, W.P., Campen, M.J., Nolan, J.P., Kodavanti, U.P., and Costa, D.L. Cardiac and thermoregulatory effects following exposure to particulate matter in healthy and compromised rats. In: *From Epidemiology to the Gene: Mechanisms by which Particulate Matter Induces Adverse Effects*. Society of Toxicology, Symposium, March 19-23, 2000.
6. Campen, M.J. Cardiopulmonary Toxicity of Particulate Matter Air Pollution-Associated Transition Metals in Rodents. Dissertation submitted to the University of North Carolina School of Public Health, 2000.
7. McDonald, J.D., Reed, M.D., Campen, M.J., Barrett, E.G., Seagrave, J., and Mauderly, J.L. Health Effects of Inhaled Gasoline Engine Emissions. *Proceedings of 10th International Inhalation Symposium*, Hannover, Germany, 2006.
8. Vedal S, Mauderly JL, Campen MJ, Kaufman JS, Larson TV, McDonald JD, Sampson PD, Sheppard L, and Simpson CD. University of Washington /Lovelace Respiratory Research Institute Particle Components and Sources Project: The Health Effects Institute National Particle Components Toxicity (NPACT) Initiative.

Proceedings of the Air Quality VI Conference, Arlington, VA, Sept 24, 2007.

9. Campen, MJ. Environmental Protection Agency Integrated Science Assessment for Particulate Matter: Cardiovascular Toxicology Chapter. 2008
10. Knuckles TL, Stanek LW, and Campen MJ. Air Pollution and Cardiovascular Disease. In *Comprehensive Toxicology* 2nd Edition. M.J. Campen and M.K. Walker, Eds. Elsevier Ltd, 2010
11. Campen MJ and Lund AK. Vehicular Emissions and Cardiovascular Disease. In *Environmental Cardiology*, Royal Society of Chemistry Monograph, 2010 [ISBN 978-1-84973-005-1].
12. Knuckles TL, Oesterling-Owens E, and Campen MJ. Air Pollution and Cardiovascular Disease, An Update. *Accepted*. Elsevier Ltd, 2015
13. Campen MJ. Cardiovascular Toxicology. Casarett and Doull's Toxicology: The Basic Science of Poisons, 9th Edition, 2019.
14. Knuckles TL and Campen MJ. Air Pollution and Cardiovascular Disease, An Update. In *Comprehensive Toxicology* 2nd Edition. M.J. Campen and M.K. Walker, Eds. Elsevier Ltd, 2018.
15. Young TL, Zychowski KE, Denson JL, and Campen MJ. Blood-brain barrier at the interface of air pollution-associated neurotoxicity and neuroinflammation. In *Advances in Neurotoxicology*, vol. 3, Aschner M and Costa L, eds. 2019.

Book Reviews:

1. Campen, M.J. Handbook of physiology, section 2: the cardiovascular system, volume I: the heart. Chest 125:1968, 2004.
2. Campen, M.J. Heart Failure: A Companion to Braunwald's Heart Disease. Chest 128: 3088, 2005.

Abstracts and Presentations:

1. Watkinson, W.P., M.J. Wiester, M.J. Campen, and V.M. Richardson. Ozone toxicity in the unanesthetized, unrestrained rat: Effect of changes in ambient temperature on physiological parameters. *Toxicologist* 12:230, 1992.
2. Demakis, G.J., D.W. Harrison, and M.J. Campen. Interference effects of neutral and affective word rehearsal on affect perception. Proceedings of the *Fifth Annual American Psychological Society*, 1993.
3. Watkinson, W.P., M.J. Wiester, G.E. Hatch, A.A. Aileru, M.J. Campen, J.W. Highfill, J.S. Tepper, and D.L. Costa. Thermoregulatory considerations affecting both acute and prolonged exposures to ozone in rodents. Abstracts of the *Ninth International Symposium on Pharmacology of Thermoregulation* 9:93, 1994.
4. Campen, M.J., W.P. Watkinson, J.R. Lehmann, and D.L. Costa. Modulation of residual oil fly ash (ROFA) particle toxicity in rats by pulmonary hypertension and ambient temperature (T_a) change. *Am. J. Resp. Crit. Care Med.* 153:A542, 1996.
5. Costa, D.L., J.R. Lehmann, D.W. Winsett, Z.H. Meng, W.P. Watkinson, M.J. Campen, U. Kodavanti, and G.E. Hatch. Pre-existing lung inflammation: A proposed mechanism for enhanced cardiopulmonary toxicity of PM in rats. Abstracts of the *Annual Conference of the Health Effects Institute*, 1996.
6. Watkinson, W.P., M.J. Campen, J.L. Lyon, J.W. Highfill, M.J. Wiester, and D.L. Costa. Impact of the hypothermic response in inhalation toxicology studies. Abstracts of the *Tenth International Symposium on Pharmacology of Thermoregulation* 10:H24/132, 1996.
7. Terrell, D., J.K. McGee, J.L. Mansfield, M.A. Stevens, W.P. Watkinson, M.J. Campen, and M.V. Evans. Application of a closed inhalation exposure system for simultaneous measurement of metabolic and physiological variables during chloroform (CHCl₃) exposure in rats. *Toxicologist* 36:327, 1997.
8. Campen, M.J., W.P. Watkinson, S.M. Dowd, and D.L. Costa. Changes in electrocardiographic waveform parameters after exposure to residual oil fly ash in the cold-acclimated and cardiopulmonary-compromised rat. *Am. J. Resp. Crit. Care Med.* 155:A247, 1997.
9. Kodavanti, U.P., M. Jackson, S.Y. Gardner, W.P. Watkinson, M.J. Campen, J. Richards, and D.L. Costa. Particle-induced lung injury in hypertensive rats. *Am. J. Resp. Crit. Care Med.* 155:A247, 1997.
10. Watkinson, W.P., M.J. Campen, and D.L. Costa. Arrhythmia induction after exposure to residual oil fly ash particles in the pulmonary hypertensive rat. *Am. J. Resp. Crit. Care Med.* 155:A247, 1997.
11. Campen, M.J., R. Mebane, Q.T. Krantz, W.P. Watkinson. Induction of QTc dispersion in saline- and monocrotaline-treated rats by hypoxic challenge. *The Toxicologist*, 1998.
12. Campen, M.J., J. Norwood, J. McKee, R. Mebane, G.E. Hatch, and W.P. Watkinson. Ozone-induced thermoregulatory response differences in rats and guinea pigs exposed in nose-only or whole body systems. *Am. J. Resp. Crit. Care Med.* 157:A156, 1998.
13. Jackson, M.C, A. Ledbetter, D.L. Costa, J. Richards, S.Y. Gardner, M.J. Campen, W.P. Watkinson, U.P.

- Kodavanti. In a rat model of monocrotaline-induced pulmonary disease, can diverse cardiopulmonary responses collectively predict susceptibility to inhaled particles. *Am. J. Resp. Crit. Care Med.* 157:A152, 1998.
14. Watkinson, W.P., M.J. Campen, U.P. Kodavanti, A.D. Ledbetter, and D.L. Costa. Effects of inhaled residual oil fly ash particles on electrocardiographic and thermoregulatory parameters in normal and compromised rats. *Am. J. Resp. Crit. Care Med.* 157:A150, 1998.
 15. Campen, M.J., K.L. Dreher, D.L. Costa, and W.P. Watkinson. Cardiopulmonary Toxicity of Instilled Nickel, Vanadium, and Iron in Monocrotaline-treated rats. *The Toxicologist*, 1999.
 16. Watkinson, W.P., Campen, M.J., Dreher, K.L., Winsett, D.W., Kodavanti, U.P., Jackson, M.C., and Highfill, J.W. Effects of exposure to metallic constituents of residual oil fly ash in healthy and cardiopulmonary compromised rats. *Am. J. Resp. Crit. Care Med.* 159:A29, 1999.
 17. Campen, M.J., J.P. Nolan, T.P. Jenkins, S.M. Dowd, R. Mebane, Q.T. Krantz, D.L. Costa, and W.P. Watkinson. Heart Rate Variability In Healthy- And Monocrotaline-Treated Rats During Exposure To Lowered Ambient Oxygen. *The Toxicologist* March 2000.
 18. Campen, M.J., Watkinson, W.P., Nolan, J.P., Kodavanti, U.P., Evansky, P.A., Jenkins, T.P., Dowd, S.M., and Costa, D.L. Effects of inhaled metallic constituents of particulate matter air pollution on arrhythmogenesis, electrocardiographic parameters, and heart rate variability in normal and compromised rats. *Am. J. Resp. Crit. Care Med.* 161:A240, 2000.
 19. Watkinson, W.P., Campen, M.J., Nolan, J.P., Kodavanti, U.P., Schladweiler, M.C.J., Evansky, P.A., Highfill, J.W., and Costa, D.L. Effects of inhaled metal constituents of particulate matter air pollution on cardiopulmonary and thermoregulatory parameters in healthy and monocrotaline-treated rats. *Am. J. Resp. Crit. Care Med.* 161:A240, 2000.
 20. Schladweiler, M.C.J., Ledbetter, A.D., Richards, J.H., Winsett, D.W., Campen, M.J., Nolan, J.P., Hauser, R., Christiani, D.C., Costa, D.L., and Kodavanti, U.P. Pulmonary impact of zinc-containing emission particles in three rat strains: multiple exposure scenarios. *Am. J. Resp. Crit. Care Med.* 161:A912, 2000.
 21. Benson, J.M., Muggenburg, B.A., Tilly, L.P., Campen, M.J., Watkinson, W.P., Powell, Q.W., Barr, E.B., and Mauderly, J.L. Effects of inhaled metals on electrocardiograms of aged beagle dogs and F344/n rats. *The Toxicologist*, March 2001
 22. Watkinson, W.P., Campen, M.J., Nolan, J.P., Kodavanti, U.P., Schladweiler, M.C.J., Evansky, P.A., Lappi, E.R., and Costa, D.L. Effects of inhalation of soluble metallic constituents of particulate matter with preexposure and/or concurrent exposure to ozone on cardiovascular and thermoregulatory parameters in awake rats. *Am J Resp Crit Care Med*, March 2001.
 23. Nolan, J.P., Campen, M.J., Kodavanti, U.P., Schladweiler, M.C.J., Vincent, R., Costa, D.L., and Watkinson, W.P. Effects of instillation of ambient particulate matter on cardiopulmonary and thermoregulatory parameters in spontaneously hypertensive rats. *Am J Resp Crit Care Med*, March 2001
 24. Campen, M.J., Tagaito, Y., Wilson, J.A., Smith, P.L., Schwartz, A.R., and O'Donnell, C.P. Cardiovascular dynamics in rem sleep and during hypoxia suggests a genetic susceptibility to sleep-disordered breathing in dba mice. *Am J Resp Crit Care Med*, March 2001
 25. Tagaito Y., Polotsky, V.Y., Campen, M.J., Wilson, J.A., Smith, P.L., Schwartz, A.R., and O'Donnell, C.P. The phenotypic expression of sleep disordered breathing (SDB) in C57BL/6J (B6) mice. *Am J Resp Crit Care Med*, March 2001
 26. Watkinson, W.P., Campen, M.J., Wichers, L.B., Nolan, J.P., Kodavanti, U.P., and Costa, D.L. Impact of toxic agents on thermoregulatory function in awake rodents. *Proc. Australian Physiol. and Pharmacol. Society* 32:168P, 2001.
 27. Watkinson, W.P., Campen, M.J., Wichers, L.B., Nolan, J.P., Kodavanti, U.P., Schladweiler, M.C.J., Evansky, P.A., Lappi, E.R., and Costa, D.L. Effects of inhalation of metallic constituents of particulate matter on cardiac, pulmonary, and thermoregulatory parameters in healthy and compromised rats. 34th World Congress of the International Union of Physiological Sciences; Christchurch, New Zealand, Abstract #1231, 2001.
 28. Campen, M.J., Y. Tagaito, J.A. Wilson, P.L. Smith, A.R. Schwartz, C.P. O'Donnell. Pulmonary and systemic blood pressure responses to acute hypoxia in chronically instrumented mice. 34th World Congress of the International Union of Physiological Sciences; Christchurch, New Zealand, Abstract #963, 2001.
 29. Campen, M.J., Y. Tagaito, C.G. Tankersley, A.R. Schwartz, P.L. Smith, C.P. O'Donnell. Hemodynamic Control during REM Sleep: Phenotypic Variation among Mouse Strains. FASEB, April, 2002.
 30. Campen, M.J., A. Gigliotti, B. Tibbetts, C. Elliott, E.B. Barr, S.K. Seilkop, M.D. Reed, J.L. Mauderly, and J.M. Benson. Cardiovascular Effects of Diesel Exhaust Inhalation in Spontaneously Hypertensive (SH) Rats. *The Toxicologist*, Salt Lake City, March 2003.
 31. Tankersley, C.G., M.J. Campen, A. Bierman, S.E. Flanders, R. Rabold, and R. Frank. Particle effects on heart

- rate regulation in senescent mice. Presented at the American Association for Aerosol Research Colloquium on PM and Human Health, Pittsburgh, PA, April, 2003.
32. Seagrave, J.C., Kanagy, N.L., and Campen, M.J. Oxidation of LDL May Mediate Cardiovascular Effects of Air Pollutants. EPA Conference on Cardiovascular Effects of Air Pollution. Louisville, KY 2004.
 33. Campen, M.J., J. Seagrave, L. Blair, S. Lucas, A. Gigliotti, M.D. Reed, J.D. McDonald. ApoE Mouse Model of Atherosclerosis Confers Susceptibility to Extrapulmonary Effects of Diesel Exhaust. *The Toxicologist*, 2005.
 34. Campen, M.J. Razani-Boroujerdi, S., Lucas, S., Pena-Philippides, J.C., Sopori, M. Differential effects of sarin gas exposure regimen on airway reactivity and cytokine expression. *The Toxicologist*, 2006.
 35. Lund, A.K., Knuckles, T., and Campen, M.J. Subchronic exposure to whole gasoline engine emissions results in alterations of molecular pathways involved in progression of atherosclerosis. Conference on Arteriosclerosis, Thrombosis and Vascular Biology, Denver, April, 2006.
 36. Campen MJ, Knuckles T, and Lund AK. Acute Alteration in Aortic Matrix Metalloproteinases following Exposure to Gasoline Exhaust Emissions in ApoE^{-/-} Mice. Presented at NIEHS/EPA Sponsored Environmental Cardiology Meeting, Durham, NC, October 12, 2006.
 37. Cherng, T.W., Gonzalez-Bosc, L., Campen, M.J., and Kanagy, N.L. Altered Coronary Artery Vasoreactivity in Rats Exposed to Intermittent Hypoxia/Hypercapnia. American Heart Association, Scientific Sessions, Chicago, IL, 2006.
 38. Knuckles, T., Lund, A.K., and Campen, M.J. Diesel exhaust enhances venous constriction and congestion. *The Toxicologist*, 2007.
 39. Campen M.J. and Chen, L.C. Air pollution and atherosclerosis: Impact on vascular oxidative stress, dyslipidemia, and remodeling. *The Toxicologist*, 2007.
 40. Maresh, J.G., Campen, M.J., Reed, M.D., Shohet, R.V. In Vivo endothelial response of Tie2-GFP/ApoE deficient mice to whole diesel exhaust. *The Toxicologist*, 2007.
 41. Lund, A.K., Knuckles, T., Seagrave, J.C., Obot Akata, C., McDonald, J.D., and Campen, M.J. Exposure to whole gasoline engine emissions results in alterations of molecular pathways involved in progression of atherosclerosis. *The Toxicologist*, 2007.
 42. Seagrave, J., Campen, M.J., Dunaway, S., Herbert, G., Mauderly, J.L., McDonald, J.D., and Rohr, A.C. Exposure to gasoline engine exhaust causes oxidative stress in rats. *The Toxicologist*, 2007.
 43. Knuckles, T.L., Lund, A.K., Lucas, S., Babu, S., and Campen, M.J. Diesel Exhaust Enhances Vascular Oxidative Stress, Vasoconstriction and Venous Congestion in a Cardiomyopathic Hamster Model. Conference on Arteriosclerosis, Thrombosis and Vascular Biology, Chicago, April, 2007.
 44. Lund, A.K., Knuckles, T.L., Lucero, J., Seagrave, J., McDonald, J.D., and Campen, M.J. Exposure to Gasoline Engine Emissions Increases Vascular Reactive Oxygen Species and Activates Molecular Pathways Involved in Progression of Atherosclerosis. Conference on Arteriosclerosis, Thrombosis and Vascular Biology, Chicago, April, 2007.
 45. Knuckles, T., Lucas, S., Lund, A.K., Cherng, T.W., Kanagy, N.L., and Campen, M.J.. Effects of Inhaled Diesel Exhaust on Vascular Oxidative Stress and eNOS Function. *The Toxicologist*, 2008.
 46. Madrid AK, Buntz JG, Chen LC, McDonald JD, Mauderly JL, and Campen, MJ. Exposure to combined vehicular emissions alters vascular reactivity in ApoE^{-/-} mice. Society of Toxicology Annual Meeting, March, 2009.
 47. Lund AK, Lucero J, Mathews N, Lucas S, Campen MJ. Inhalational exposure to vehicular emissions increases vascular lipid peroxide levels via the lectin-like-ox-ldl scavenger receptor (LOX-1). Society of Toxicology Annual Meeting, March, 2009.
 48. Knuckles TL, Lund AK, Lucas S, Madden M, Campen MJ. Systemic Disposition of Inhaled Nitric Oxide, a Significant Component of Vehicular Emissions. Society of Toxicology Annual Meeting, March, 2009.
 49. Cherng TW, Campen MJ, Walker BR and Kanagy NL. Diesel exhaust exposure augments constrictor sensitivity to ET-1 that is ET_B receptor mediated. Society of Toxicology Annual Meeting, March, 2009.
 50. Kanagy, N.L., Cherng, T.W., Campen, M.J., and Walker, B.R. Diesel exhaust exposure increases blood pressure, sympathetic activity, and coronary artery constrictor function. FASEB, 2009
 51. Campen, M.J., Buntz, J., Lund, A.K., Seagrave, J., Vedal, S., Mauderly, J.L., and McDonald, J.D. Vascular Effects of Vapor and Particulate Phases of Traffic-Related Air Pollution: Initial results from the NPACT Initiative. *Am J Resp Crit Care Med*, March 2009.
 52. Paffett, M.L., Lund, A.K., Lucas, S., Mathews, N., Lucero, J., Harman, M., and Campen, M.J. Reductions in Atrophic E3 Ubiquitin Ligase Expression in Pulmonary Arteries Correlate with the Development of Pulmonary Hypertension. American Heart Association Scientific Sessions, Orlando, FL, 2009.
 53. Lund AK, Lucero J, Mathews N, Harman M, Lucas S, and Campen MJ. Vascular Lectin-Like-OxLDL Scavenger Receptor (LOX-1) Mediates Oxidative Stress, Endothelin-1, and Matrix Metalloproteinase Expression in the Vasculature of Vehicular Engine Emissions-Exposed Mice. American Heart Association Scientific

Sessions, Orlando, FL, 2009.

54. Kodavanti UP, Thomas, Ronald T, Lund AK, Schladweiler MC, Campen MJ, Shannahan JH, Ledbetter AD, Richards JE, Nyska A, Jaskot RH, Butler EO, Parinandi NL. Oxidized lipids and lipid mediators are involved in cardiovascular injury induced by diesel exhaust particles (dep) and ozone. Society of Toxicology Annual Meeting, March, 2010.
55. Campen MJ, Lund AK, Buntz J, Lucero J, Mathews N, Mauderly JL, McDonald JD. Vascular Lipid Peroxidation and Dysfunction Induced by Complex Combustion Emissions: An Update of the NPACT Study. Society of Toxicology Annual Meeting, March, 2010.
56. Lund AK, Lucero J, Mathews N, McDonald JD and Campen MJ. Vascular Inhaled vehicular emissions-mediate induction of vascular oxidative stress, lectin-like oxLDL receptor, endothelin-1, and matrix metalloproteinase expression are attenuated through statin treatment. Arteriosclerosis, Thrombosis, and Vascular Biology Annual Meeting, 2010.
57. Barrett EG, Rudolph K, Royer C, Campen MJ, Kuehl PJ, Lu B, Wright MR, Baker WR, Wright CD. A Novel Mutual Prodrug of Salmeterol and Desisobutrylciclesonide Attenuates Acute Bronchoconstriction in the Absence of Cardiovascular Side-Effects in Ragweed Sensitized and Naïve Dogs. *Am J Resp Crit Care Med*, March 2010.
58. Campen MJ, Naik V, Lucas S, Paffett ML. Dysregulation of E3 Ubiquitin Ligases Atrogin-1 and MuRF-1 in Pulmonary Arteries from Monocrotaline-Treated Rats. *Am J Resp Crit Care Med*, March 2010.
59. Paffett ML, Lund AK, Lucas S, Mathews N, Harman M, Lucero J, Campen MJ. Resveratrol Attenuates the Loss of Atrogin-1 in Pulmonary Arteries and Reverses Established Monocrotaline-Induced Pulmonary Hypertension. *Am J Resp Crit Care Med*, March 2010.
60. Campen MJ, Lund A, Seagrave J, Lucero J, Mathews N, Mauderly JL, McDonald JD. Gas-Particle Interactions in Driving Vascular Lipid Peroxidation Following Inhalation of Traffic-Related Air Pollutants. *Am J Resp Crit Care Med*, March 2010.
61. Buntz JG, Lucas SN, Campen MJ. Effects of inhaled nitric oxide and carbon monoxide on vascular responsiveness. Society of Toxicology Annual Meeting, March, 2011.
62. Harmon M, Channell M, Campen MJ, Erdei E, Downs M, Pacheco B, Malony D, Cajero M, DeGroat J, Shuey C, Henio-Adeky S, Ramone S, Nez T, Lewis J. Biomarkers of Cardiovascular Risk In Navajo Populations Exposed to Contaminated Uranium Mining Sites. Society of Toxicology Annual Meeting, March, 2011.
63. McDonald J, Doyle-Eisele M, Lund A, Campen M, Knipping E, Rohr A. Atmospheric Aerosols Formed From Biogenic and Anthropogenic Precursor Reactions and Coal Combustion Emissions Show Mild Vascular Toxicity Compared with Motor Vehicle Exhaust. Society of Toxicology Annual Meeting, March, 2011.
64. Seagrave J, Campen MJ. Role of Low Density Lipoprotein Oxidation In Second-Hand Smoke-Induced Cardiovascular Disease. *Am J Resp Crit Care Med*, May 2011.
65. Mauderly JL, Seilkop S, McDonald JD, Lund AK, Campen MJ. Identification of Combustion Product Components Causing Vascular Responses In ApoE^{-/-} Mice. *Am J Resp Crit Care Med*, May 2011.
66. Campen MJ, Paffett ML, Lucas SN, Anderson T, Irwin D, Candelaria G, Norenberg J. Longitudinal Evaluation Of Cardiac Remodeling And Pulmonary Apoptosis In A Rodent Model Of Pulmonary Hypertension Using Quantitative In Vivo SPECT/CT Imaging. *Am J Resp Crit Care Med*, May 2011.
67. Paffett ML, Channell MM, Campen MJ. Sirtuin-1 Induced Reduction of Pulmonary Artery Smooth Muscle Cell Proliferation And Hypertrophy. *Am J Resp Crit Care Med*, May 2011.
68. Harmon M, Campen M, Miller C, Shuey C, Cajero M, Pacheco B, Erdei E, DeGroat J, Stark G, Ramone S, Henio-Adeky S, Nez T, Lewis J. Drinking Water Arsenic Levels Predict Plasma Levels of Oxidized LDL Cholesterol (oxLDL) in Navajo Populations Exposed to Uranium-Contaminated Mining Sites. Society of Toxicology Annual Meeting, March, 2012.
69. Buntz JG, Lucas SN, Campen M. Vascular function effects of acute inhalation of carbon monoxide and nitric oxide. Society of Toxicology Annual Meeting, March, 2012.
70. Colombo ES, Paffett ML, McDonald JD, Reed MD, Mauderly J, Griffith J, Trujillo K, Campen M. Alterations in Neural Telomere System Following Chronic Inhalation Exposure to Coal Combustion. Society of Toxicology Annual Meeting, March, 2012.
71. Aragon M, Paffett ML, Colombo ES, Channell M, Buntz J, Lucas SN, Campen M. Arsenic does not affect cardiac growth in the Angiotensin-II model of hypertension. Society of Toxicology Annual Meeting, March, 2012.
72. Paffett ML, Lucas SN, Campen M. Enhanced Coronary Vascular Reactivity to Serotonin Following Acute Ozone Exposure in Rat. Society of Toxicology Annual Meeting, March, 2012.

73. Campen MJ, Channell MC, Devlin RB, Madden M. Plasma Obtained Following Nitrogen Dioxide or Diesel Engine Emissions Exposure Induces Adhesion Molecule Expression in Human Coronary Artery Endothelial Cells. Society of Toxicology Annual Meeting, March, 2012.
74. Campen MJ, Lund AK, McDonald JD. Cardiovascular Outcomes of Simulated, Contrasting Ambient Air Pollution Environments. *Am J Resp Crit Care Med*, May 2012.
75. Campen MJ, Channell MC, Devlin RB, Madden M. Circulating Factors Following Nitrogen Dioxide and Diesel Engine Exhaust Exposure Induce Adhesion Molecule Expression in Human Coronary Artery Endothelial Cells. *Am J Resp Crit Care Med*, May 2012.
76. Campen MJ, Chen LC. Role Of Circulating Factors In Mediating Systemic Toxicity Of Inhaled Substances. Society of Toxicology Annual Meeting, Phoenix, AZ, March 2014.
77. Aragon M, Erdely A, Campen MJ. Endothelial Cells as Biosensors to Assess the Systemic Inflammatory Impact of Multi Walled Carbon Nanotubes. Society of Toxicology Annual Meeting, Phoenix, AZ, March 2014.
78. Campen MJ, Aragon M, Erdely A. Induction of Serum Inflammatory Potential by Pulmonary Exposure to Multi-Walled Carbon Nanotubes. *Am J Resp Crit Care Med*, San Diego, May, 2014
79. Chrobak I, Brower J, Aragon MJ, Kheirandish N, Robertson S, Fredenburgh L, McDonald JD, and Matthew Campen, MJ. Impact of test atmosphere composition on serum bioactivity and endothelial toxicity. Presented at the Annual United States Environmental Protection Agency Clean Air Research Center Meeting, Atlanta, GA, September 19, 2014.
80. Zychowski K, Herbert G, Tyler C, Lucas SN, Sanchez B, Cerrato J, Avasarala S, Muttill P, Kunda N, Campen MJ. Navajo Mine Dust Exposure and Subsequent Toxicological Implications. Oral presentation at the Society of Toxicology Annual Conference, Baltimore, MD, March 14, 2017.
81. Zychowski K, Herbert G, Lucas SN, Kunda N, Muttill P, Brearley A, Bleske B, Cerrato J, Campen MJ. Health effects from respirable uranyl-vanadate and uranyl-silicate particulates from an abandoned mine sites in the Southwestern United States. Abstract submitted to the Society of Toxicology Annual Conference, San Antonio, TX, 2018.
82. Begay J and Baldwin, Jr, F. Assessment of Metal Contaminants and Toxicity of Windblown Particulates from the Claim 28 Uranium Mine. Navajo Nation Environmental Protection Agency (EPA) Conference: June 20-22, 2018
83. Begay J, Ordonez Y, Sanchez B, Wheeler A, Lucas S, Baldwin, Jr. F, Herbert G, Shuey C, Harkema J, Wagner J, Morishita M, Bleske B, Campen MJ. In Vivo Toxicity Assessments of Metal Contaminated Windblown Particulate Matter from an Abandoned Uranium Mine on the Navajo Reservation. Society of Toxicology (SOT) Mountain West Regional Meeting: September 19-21, 2018
84. Begay J, Ordonez Y, Sanchez B, Wheeler A, Lucas S, Baldwin, Jr. F, Herbert G, Shuey C, Harkema J, Wagner J, Morishita M, Bleske B, Campen MJ. In Vivo Toxicity Assessments of Metal Contaminated Windblown Particulate Matter from an Abandoned Uranium Mine on the Navajo Reservation. 10th Conference on Metal Toxicity & Carcinogenesis: October 28-31, 2018
85. Begay J, Ordonez Y, Lucas S, Sanchez B, Wheeler A, , Baldwin, Jr. F, Herbert G, Shuey C, Harkema J, Wagner J, Morishita M, Bleske B, Campen MJ. In Vivo Toxicity Assessment of Metal Contaminated Wind Blown Particulate Matter from an Abandoned Uranium Mine on the Navajo Reservation. SOT Annual Meeting: March 10-14, 2019
86. Begay J, Ordonez Y, Lucas S, Sanchez B, Wheeler A, , Baldwin, Jr. F, Herbert G, Shuey C, Harkema J, Wagner J, Morishita M, Bleske B, Campen MJ. In Vivo Toxicity Assessment of Metal Contaminated Windblown Particulate Matter from an Abandoned Uranium Mine on the Navajo Reservation. American Indian Science and Engineering Society (AISES) Region 3 Meeting: March 28-30, 2019
87. Begay J, Sanchez B, Wheeler A, Baldwin, Jr. F, Lucas S, Herbert G, Ordonez Y, Shuey C, Harkema J, Wagner J, Morishita M, Bleske B, Campen M. Using the Mobile Air Research Lab to for in vivo assessment of Metal Contaminated Wind-Blown Particulates from Abandoned Uranium Mines within U.S. American Indian Tribal Lands. 13th International Particle Toxicity Conference, Salzburg, Austria, Sept 12, 2019
88. Campen M. Mechanisms of Vascular Inflammation and Cardiometabolic Health in Indigenous Peoples. American Heart Association Scientific Sessions, Philadelphia, PA, Nov 17, 2019.
89. K. E. Zychowski¹, B. Sanchez¹, X. Zhou¹, A. S. Gardiner¹, G. Herbert¹, S. Lucas¹, M. Morishita², J. G. Wagner², J. Harkema², C. Shuey³, and M. J. Campen. Serum-Borne Factors Alter Cerebrovascular Endothelial microRNA Expression following Particulate Matter Exposure Near an Abandoned Uranium Mine on the Navajo Nation. Society of Toxicology, March 2020.
90. E. El Hayek, S. Medina, J. Guo, A. Nouredine, K. Zychowski, R. Hunter, C. Velasco, A. Brearley, M. Spilde, T. Howard, F. Lauer, G. Herbert, M. Wiese, S. Cabaniss, A. Ali, S. Burchiel, M. Campen, and J.

- Cerrato. Uptake and Toxicity of Respirable Uranium-Carbon-Bearing Particulate Matter in A549 Lung Epithelial Cells. Society of Toxicology, March 2020.
91. R. P. Hunter, A. Bolt, A. Brearley, J. Cerrato, C. Velasco, J. Weaver, D. McChesney, P. Muttli, G. Herbert, M. Campen, and K. Zychowski. DNA Damage from Regional Metal-Enriched Particulate Matter in a549 Lung Epithelial Cells. Society of Toxicology, March 2020.
 92. J. Begay¹, Y. Ordonez¹, S. Lucas¹, B. Sanchez¹, A. Wheeler¹, F. Baldwin, Jr.¹, G. Herbert¹, C. Shuey¹, J. Harkema², J. Wagner², M. Morishita³, B. Bleske¹, K. Zychowski¹, and M. Campen¹ Physicochemical Characterization and Toxicological Assessment of Regional Particulates Adjacent Abandoned Uranium Mines within Native American Communities. Society of Toxicology, March 2020.
 93. K. Burton, C. McVeigh, E. Barr, G. Herbert, R. Hunter, S. Medina, S. Lucas, A. Ali, M. Campen, and A. M. Bolt. Acute Effects of Inhaled Tungsten Particles on the Lung Microenvironment. Society of Toxicology, March 2020.

Invited Lectures, Prepared Symposia:

1. "Cardiovascular Effects of Air Pollution." Michigan State University, East Lansing, MI. July 12, 2005.
2. "Cardiovascular Effects of Air Pollution: More than Just Particles." East Carolina University, Greenville, NC. July 18, 2005.
3. "Electrocardiographic Impact of Whole Emissions in the ApoE^{-/-} Mouse." Environmental Protection Agency, Research Triangle Park, NC. January 31, 2006
4. "Acute and Chronic Cardiovascular Health Effects of Gasoline and Diesel Engine Emissions." University of Louisville, Louisville, KY. February 23, 2006.
5. "Air Pollution and Atherosclerosis", Society of Toxicology, Symposium Chair, Charlotte, NC, March 27, 2007.
6. "Diesel and Gasoline Exhaust Exposure Induces Biomarkers of Vascular Remodeling and Oxidative Stress" American College of Sports Medicine, New Orleans, LA. May 31, 2007.
7. "Vascular Toxicity of Complex Emissions", Seminar for the Department of Environmental and Occupational Health, School of Public Health, University of Washington, July 16, 2007.
8. "Vascular Toxicity of Inhaled Pollutants", Invited Lecture for the Department of Pulmonary Medicine, University of New Mexico, Albuquerque, NM, October 3, 2007.
9. "The Comparative Toxicity Test Program of the National Environmental Respiratory Center: Vascular Toxicity of Complex Emissions", Toxicology Forum European Meeting, Brussels, Belgium, October 24, 2007.
10. "Essentials of Respiratory Safety Pharmacology", American College of Toxicology Meeting, Charlotte, NC, November 13, 2007.
11. "Vascular Toxicity of Complex Emissions", Invited Lecture for the Department of Physiology, West Virginia University, Morgantown, WV, November 15th, 2007.
12. "Air Pollution and Atherosclerosis", Symposium Chair, American Association for the Advancement of Science, Annual Meeting, Boston, MA, February, 2008.
13. "Endothelial Dysfunction: More than just a No NO Phenomenon" Society of Toxicology, Symposium Chair, Seattle, WA, March, 2008.
14. "Cardiovascular Effects in Animal Models of Exposure to Defined Sources" Health Effects Institute Annual Meeting, Philadelphia, April, 2008.
15. "Shock in a Hamster Model of Hantavirus Cardiopulmonary Syndrome" Respiratory Physiology in Laboratory Animal Models: An Advanced Course, Battelle Eastern Science & Technology Center Aberdeen, MD, April, 2008.
16. "Atherosclerosis and Vehicular Emissions Exposure: More than Just Airborne Particles" Physiology Seminar, Johns Hopkins School of Public Health, Baltimore, MD, April, 2008.
17. "Gasoline Emissions and Vascular Remodeling", American Heart Association Scientific Sessions, New Orleans, LA November 9th, 2008.
18. "Complex Interactions of Urban Air Pollution: Impact on Vascular Pathophysiology" College of Veterinary Medicine, Louisiana State University, Baton Rouge, LA, November 12th, 2009.
19. "Biochemical Pathways for Smooth Muscle Atrophy in Pulmonary Arterial Hypertension," Department of Pulmonary Medicine, University of New Mexico, Albuquerque, NM, December 2, 2009.
20. "Environmental Influence on Vascular Remodeling Pathways" Department of Physiology, West Virginia University, Morgantown, WV, April 8th, 2010.
21. "Endothelial Function and Lipid Peroxidation" NIEHS-EPA Symposium on Air Pollution and

- Cardiovascular Disease, Seattle, WA, 2010.
22. "Environmental Influence on Vascular Remodeling Pathways" Department of Environmental Medicine, New York University, Tuxedo Park, NY, August 5th, 2010.
 23. "Complex Responses to Complex Mixtures: Vascular Effects of Air Pollution", Department of Gerontology, University of Southern California, March 14th, 2011.
 24. "Environmental Influences on Cardiovascular Health", Rio Grande Chapter of the American Industrial Hygiene Association Annual Meeting, October 27th, 2011.
 25. "Cardiovascular Toxicity of Simulated Complex Air Pollution Mixtures" Health Effects Institute Annual Meeting, Chicago, April, 2012.
 26. "How Does Inhalation Exposure Cause Systemic Vascular Toxicity?" Allegheny-Erie Regional Chapter of the Society of Toxicology Annual Meeting, Pittsburgh, PA, May, 2012.
 27. "Impact of inhaled nitrogen air pollutants on cardiovascular function" RCN Human Health Conference Impacts of Excess Nitrogen in the Environment on Human Health, Bethesda, MD, November 14th, 2012.
 28. "Complex Mixtures of Air Pollutants and Cardiopulmonary Health" National Vehicle & Fuel Emissions Laboratory, United States Environmental Protection Agency, Ann Arbor, MI, February 26th, 2013.
 29. "Mechanisms Mediating Systemic Vascular Toxicity Following Inhalation Exposure to Nanomaterials" Mountain West Society of Toxicology Regional Chapter Annual Meeting, Albuquerque, NM, September 19th, 2013.
 30. "Pathways Mediating Systemic Vascular Insult Following Inhalation Exposure to Airborne Toxicants" University of Utah, Salt Lake City, UT, February 3rd, 2014.
 31. "Impacts of Environmental Factors on Endothelial 'Micro-Exposome': Implications for Chronic Vascular Disease", Department of Biochemistry and Molecular Biology, University of New Mexico School of Medicine, September 29th, 2014.
 32. "Cardiovascular Impacts of Inhaled Pollutant Mixtures" Umeå University, Sweden, December 11th, 2014.
 33. "Air Pollution and Neuroinflammation: Can Smoke Cause Fire?" Department of Preventive Medicine, University of Southern California, March 27th, 2015.
 34. "Gasoline, Diesel Engine and Mixed Emissions Effects on Oxidized Lipids and Vascular Function" American Heart Association Scientific Sessions, November 2015.
 35. "Air Pollution and Health Effects Beyond the Lung: Traveling Sterile Inflammation" Infectious Disease and Inflammation Program, University of New Mexico School of Medicine, May 2016.
 36. "Inhalation of particulates and gases and systemic inflammatory effects: Modification of circulating components promotes cerebrovascular endothelial inflammation and dysfunction." Japanese Society of Toxicology Annual Conference, Nagoya, Japan, June 2016.
 37. "Circulating Inflammatory Bioactivity Resulting from Environmental Exposures" National Institute of Occupational Health Sciences, Cincinnati, OH, July 19th, 2016.
 38. "Environmental Health Concerns Associated with Uranium Mines Sites in Southwestern Tribal Communities" Department of Environmental Health, University of Cincinnati, July 20th, 2016.
 39. "Vascular Toxicity from Inhaled Toxins: Refining our understanding of "indirect" effects", Division of Cardiology, University of Louisville, October 24, 2016.
 40. "Uranium and Vanadium Drive Cardiopulmonary Toxicity of Respirable Dusts Derived from Abandoned Uranium Mine Sites in the Southwest" 9th Metals Toxicity and Carcinogenesis Conference, Lexington, KY, October 25, 2016.
 41. "Inhalation Toxicity of Dusts Derived from Uranium Mines Sites in Southwestern Tribal Communities", Superfund Research Program, University of Arizona, Tucson, AZ, January 19, 2017.
 42. "Pipe Cleaners in the Pipeline: Mechanisms of Action for Novel Cardiovascular Drugs on the Clinical Horizon", New Mexico Pharmacists Association Annual Meeting, Albuquerque, NM, June 25, 2017.
 43. "Cardiopulmonary Consequences of Respirable Dusts Derived from Uranium Mines on the Navajo Nation", Ohio State University College of Public Health, Division of Environmental Health, Columbus, OH, September 13, 2017.
 44. "Air Pollution and Health Effects Beyond the Lung: Traveling Sterile Inflammation", Nationwide Children's Hospital, Columbus, OH, September 14, 2017.
 45. "Inhaled Toxicants and Neuroinflammation: Connecting the Dots", Department of Internal Medicine, College of Medicine, University of Arizona-Phoenix, AZ, February 23, 2018.
 46. "Neurovascular effects of inhaled toxicants", Zhejiang Chinese Medical University, Hangzhou, China, March 26, 2018.
 47. "Impact of a High-Risk Environment on Tribal Lands: Assessing Cardiorespiratory Risk from Uranium Mines", Clinical Translational Research Infrastructure Network (CTR-IN) Annual Conference, University of Nevada-Las Vegas, June 12, 2018.

48. "Respiratory and Cardiovascular Toxicity Related to Windblown Dusts from Abandoned Uranium Mines on Tribal Lands in the Southwest", Biomedical Research Seminar, New Mexico State University, Las Cruces, NM, August 31, 2018.
49. "Assessing Cardiorespiratory Risk from Dusts Arising from Uranium Mines on Tribal Lands" Mountain West Society of Toxicology Annual Conference, University of Arizona-Phoenix, AZ, September 20, 2018.
50. "Assessing Cardiorespiratory Risk from Dusts Arising from Uranium Mines on Tribal Lands", Molecular Toxicology Lectureship (EHS 411), University of California at Los Angeles, December 6, 2018.
51. "Neuroinflammatory Consequences of Inhaled Pollutants: Role of Circulating Factors", Cardiology Grand Rounds, University of California at Los Angeles, December 7, 2018.
52. "Circulating Molecular Shrapnel: Identifying links between inhaled toxicants and neurological outcomes", Michigan State University Institute for Integrative Toxicology Seminar Series, January 11, 2019.
53. "Cardiovascular and Respiratory Toxicity of Particulates from Abandoned Uranium Mines on Navajo Nation", Department of Comparative Biomedical Sciences, School of Veterinary Medicine, Louisiana State University, May 16, 2019.
54. "Respiratory Tract Toxicology", invited lecture for Advanced Comprehensive Toxicology course organized by the American College of Toxicology, Gaithersburg, MD, August 7, 2019.
55. "Pulmonary-derived circulating factors promote cerebrovascular inflammatory mechanisms following inhalation of particles and gases" Keynote lecture for International Particle Toxicology Conference, Salzburg, Austria, September 12, 2019.
56. "Inhalation Toxicity of Dusts from Uranium Mine Sites *plus* Update on Vaping Health Hazards" Invited Seminar for New Mexico Tech, October 4, 2019.
57. "Mechanisms of Vascular Inflammation and Cardiometabolic Health in Indigenous Peoples", Oral Presentation at the American Heart Association Annual Meeting, Philadelphia, PA, November 17, 2019.
58. "Let's think about mom for a change: How gestational exposures to inhaled toxicants may uniquely impact maternal cardiovascular health" Program in Toxicology, Texas A&M University, College Station, TX, December 2, 2019.
59. "What the heck is going on with vaping?" Outreach presentation for Santa Fe (NM) Preparatory School Students (Middle, High School) and Parents, December 3,4, 2019.
60. "From Cardiovascular Disease, to Fetal Effects, to Neurological Outcomes: Can Air Pollution Really Cause Everything?" University of Connecticut Toxicology Scholars Colloquium Seminar, April 6, 2020.
61. "Chemistry and Toxicity of Contaminants from Uranium Mine Sites on Native American Lands of the Southwest" Webinar for the North Carolina School of Science and Mathematics, Earth Day, April 22nd, 2020.
62. "Harmful Effects of Vaping: Lung Toxicity and Impairment of Immune Function" New Mexico Pharmacy Association, Virtual Annual Meeting, September 13th, 2020.
63. "Chemistry and Toxicity of Respirable Contaminants from Uranium Mine Sites on Native American Lands of the Southwest" Department of Chemistry Webinar, State University of New York College of Environmental Science and Forestry, October 29, 2020.
64. "Air Pollution Impacts on Diverse Vascular Beds: Brain and Placenta as Targets" Webinar for Case Western's Cardiovascular Research Institute, November 17, 2020.

INSTITUTIONAL SERVICE

COMMITTEES

- Environmental Health Signature Program Steering Committee, University of New Mexico, 2008-present; Chair, 2013-present
- Cardiovascular and Metabolic Disease Signature Program Steering Committee, University of New Mexico, 2009-present
- Biomedical Graduate School Program Admissions Committee, University of New Mexico, 2010-2012
- Biomedical Graduate School Program Qualifying Exams Review Service, University of New Mexico, 2010-2013
- Search Committee, Dean of Pharmacy Vacancy, University of New Mexico, 2010-11, hired Lynda Welage, Pharm.D.
- Organizational Planning and Evaluation Committee, 2010-11
- Graduate Education Committee, College of Pharmacy, University of New Mexico, 2010-11
- Search Committee, Pharmaceutical Sciences Faculty Position, University of New Mexico, 2010-

11, hired Pamela Hall, Ph.D.
 Curriculum Committee, College of Pharmacy, University of New Mexico, 2011-2013
 Pharmacy Student Portfolio Advisor, 2011-12
 Awards Committee, UNM HSC Faculty Research Excellence Awards, 2012-2014.
 Management of Conflict of Interests (MCOI) Committee, UNM HSC, 2012-2017.
 Graduate Affairs Committee, 2012-2016; Chair, 2014-2016
 Chair, Search Committee for Director of UNM Community Environmental Health Program, 2014-2015
 College of Pharmacy Student Affairs Committee, 2015-present; Chair of Academic Dishonesty Investigations, 2016-present
 Research Steering and Planning Committee (HSC), 2015-present.
 SAGE Committee (CTSC Pilot Funding Reviews) 2015-present.
 Promotion and Tenure Committee Chair, Department of Pharmaceutical Sciences, 2018-present. External P&T support for College of Nursing and Dept of Pharmacy Practice, 2020

INSTRUCTION

Lectures:

Cardiovascular Toxicology (as part of Gen. Toxicology), University of New Mexico, 2003-2009
 Cardiovascular Pharmacology (as part of Gen. Pharmacology), University of New Mexico, 2003-2008
PHRM 731-732, Mechanisms of Drug Action, 2009-2014, mechanisms of therapy for pulmonary hypertension, heart failure, hyperlipidemia, arrhythmia, and anemia
PHRM 593, Pharmaceutical Sciences Research Seminar. Instructor on Record, Spring 2011.
PHRM 731, Mechanisms of Drug Action, Instructor on Record, Fall 2011.
PHRM 580, Toxicology, Cardiovascular & Respiratory Toxicology lectures, 2012-2016, Instructor on Record, 2017
PHRM 593, Pharmaceutical Sciences Research Seminar. Instructor on Record, Spring 2013.
PHRM 705, Pathophysiology, Anemia, Hypoxia, Coagulation, 2011-2019.

Undergraduate Trainees: Lauren Heine, 2015 (Michigan State University Ph.D. program)
 Valeria Rivero, 2015-2016
 Bethany Sanchez, 2015-2017 (Yale University MSPH program)
 Raul Salazar, 2016-2019
 Bryan Villalva, 2017-2018
 Abigail Wheeler, 2017-2018 (Johns Hopkins University PhD program)
 Rita Saracino, 2020-present

Pharm.D. Research Trainees: Heidi Cung, 2013-2015
 Yoselin Ordonez Suarez, 2016-2019
 Alex Wehner, 2016
 Catherine Smith, 2016-2017
 Marcus Garcia, 2016-2020
 Raul Salazar, 2019-present
 Thomas Wilson, 2019-2020

Doctoral/Masters Candidate Committees († indicates principal advisor):
 Kyan Allahdadi, PhD, 2004-2006
 Andrea Aragon, MS, 2005-2007
 Phillip Kopf, 2004-2009
 Salina Torres, 2004-2008
 †Tom Cherng, 2006-2010
 Njotu Larry Agbor, 2009-2013

†Molly Harmon, MS, 2010-2015
 Azita K. Madrid, PhD 2010-2012 (from NYU)
 †Mario Aragon, 2011-2015
 Amber McBride, 2012-2014
 Elani Fourie, 2013-2016
 Christina Termini, 2013-2016
 Moriah Castleman, 2013-2015
 †Roberto Mota, 2014-2016 (MS)
 Kayla Zehr, 2015-2017
 †Tamara Young, 2016-present
 Griffith Davis, 2016-2019, (University of North Texas)
 †Jessica Begay, 2017-2019 (MS), 2020-present (PhD)
 †Marsha Bitsui, 2017-present
 †Russell Hunter, 2019-present
 †David Scieszka, 2020-present

Graduate Student Rotations (1st year): Alexandra Fowler, 2017
 Srinivas Rao Gadam, 2018
 Nathan Cruz, 2020

Dissertation Opponent/Assessment Committee:

Jon Unosson, 2014, Umeå University, Sweden (Opponent to Defense)
 Daniel Vest Christophersen, 2016, University of Copenhagen, Denmark (Assessor)

Post-Doctoral Trainees: Andrew Helms, MD. 2003-04, Cardiothoracic Surgical Fellow, currently a Thoracic Surgeon at WellStar Health System, Marietta, Ga
 Sathish Babu, MD. 2004-05, Cardiothoracic Surgical Fellow, currently President & CEO at Chicago Life Sciences Med Corp, Chicago, USA
 Travis Knuckles, Ph.D. 2005-2008, now Assist Professor at WVU
 Amie Lund, Ph.D. 2005-2009, now Assist Professor, University of North Texas. Received F32 and K99/R00.
 Michael Paffett, Ph.D. 2009-2013, Now Scientist and Technical Rep, Olympus Microscopes
 Elizabeth Sage Colombo, M.D., Ph.D., 2011-2012, now Chief Resident, Quality, University of New Mexico
 Sarah Robertson, Ph.D., 2012-2013, now Environmental Health Scientist, Public Health England
 Katherine Zychowski, Ph.D., 2014-2018, from Texas A&M University. Received K99/R00.
 Christina Tyler, Ph.D., 2015-2016, now at Los Alamos National Labs

Faculty Advisement:

Dawn Delfin, Ph.D. 2013-2016, Clinical and Translational Science Center KL2 Scholar, Assistant Professor, UNM
 Hector Olvera, Ph.D., 2014-2016, Assistant Professor, UTEP, as part of the Harvard University School of Public Health JPB Environmental Health Scholars Program
Through KL2 Mentored Career Development Program: Brandi Fink, PhD; Justin Baca, MD PhD; Kathryn Fietze, PhD; Eliseo Castillo, PhD; Daryl Domman, PhD
Through NM CMBM COBRE: Alicia Bolt, PhD; Rama Gullapali, MD, PhD; Xiang Xue, PhD; Xixi Zhou, PhD

SYMPOSIA AND WORKSHOPS ORGANIZED

- Mountain West Society of Toxicology Annual Meeting, *Environmental Cardiology*, Sante Fe, NM, Keynote Speaker: Ken Ramos, University of Louisville, 2005.
- Air Pollution and Atherosclerosis: Impact on Vascular Oxidative Stress, Dyslipidemia, and Remodeling. Symposium organized / chaired at the Society of Toxicology Annual Meeting, Charlotte, NC, 2007.
- Air Pollution and Atherosclerosis: Impact on Vascular Oxidative Stress, Dyslipidemia, and Remodeling. Symposium organized / chaired at the American Association for the Advancement of Science Annual Meeting, Boston, MA, 2008.
- Endothelial Dysfunction: More than Just a No NO Phenomenon. Symposium organized / chaired the Society of Toxicology Annual Meeting, Baltimore, MD, 2008.
- UNM Cardiovascular and Metabolic Disease Signature Program Research Day, Albuquerque, NM, Keynote Speaker: David Harrison, Vanderbilt University, 2011.
- Cooperative Epidemiology and Toxicology Research: HEI's National Particle Component Toxicity (NPACT) Initiative. Workshop organized / chaired for the 2012 Society of Toxicology Conference.
- UNM Cardiovascular and Metabolic Disease Signature Program Research Day, Albuquerque, NM, Keynote Speaker: James Sowers, University of Missouri, 2012.
- UNM Cardiovascular and Metabolic Disease Signature Program Research Day, Albuquerque, NM, Keynote Speaker: Christopher P. O'Donnell, University of Pittsburgh, 2013.
- Role of Metabolic Syndrome and Perivascular Adipose in Exposure-Induced Vascular Dysfunction, Symposium organized / chaired the Society of Toxicology Annual Meeting, San Antonio, TX, 2013.
- Role of Circulating Factors In Mediating Systemic Toxicity Of Inhaled Substances. Workshop organized / chaired the Society of Toxicology Annual Meeting, Phoenix, AZ, 2014.
- Circulatory Mechanisms Underlying the Systemic Effects of Inhaled Nanoparticles and Complex Combustion Mixtures: Common Pathways for Diverse Toxicants. Workshop organized / chaired the Society of Toxicology Annual Meeting, Baltimore, MD, 2017.
- Not Your Father's ED: Expanding the Definition and Understanding of Endothelial Dysfunction (ED) Due to Inhaled Toxicants. Symposium organized / chaired the Society of Toxicology Annual Meeting, Baltimore, MD, 2019.
- HOT TOPICS Session. E-cigarette and Vaping Product Use-Associated Lung Injury (EVALI): Outbreak Analysis from an Epidemiological, Clinical, Forensic and Mechanistic Perspective. Symposium organized / chaired the Society of Toxicology Annual Meeting, Anaheim, CA, 2020. (Presented as webinar after Covid19 cancellation)