

**SHABBAR I. RANAPURWALA, PhD, MPH, BHMS**

137 E Franklin St, Suite 500, CB# 7505  
 Chapel Hill, NC 27599  
 Phone: 919-843-3529  
 Email: [sirana@email.unc.edu](mailto:sirana@email.unc.edu)

---

**EDUCATION**

2014 PhD, Epidemiology  
 University of North Carolina, Chapel Hill, NC, USA  
 2009 MPH, Environmental Health  
 Western Kentucky University, Bowling Green, KY, USA  
 2004 BHMS (Bachelor of Homoeopathic Medicine and Surgery),  
 Maharashtra University of Health Sciences, Nashik, India

**PROFESSIONAL EXPERIENCE**

10/2016 – present Research Assistant Professor, Department of Epidemiology, and Core Faculty Member, Injury Prevention Research Center, University of North Carolina at Chapel Hill, NC.  
 11/2016 – present Adjunct Assistant Professor, Department of Epidemiology, University of Iowa, Iowa City, IA.  
 06/2014 – 09/2016 Postdoctoral Research Scholar, Injury Prevention Research Center, College of Public Health, University of Iowa, Iowa City, IA.  
 09/2010 – 05/2014 Graduate Research Trainee, Divers Alert Network (DAN), Durham, NC.  
 06/2010 – 08/2010 Data Analyst, North Carolina Institute for Public Health, University of North Carolina, Chapel Hill, NC.  
 8/2009 – 05/ 2009 Instructor, Department of Liberal Arts and Science, Western Kentucky University Community College, Bowling Green, KY  
 02/2008 – 05/2009 Graduate Research Assistant, Department of Public Health, Western Kentucky University, Bowling Green, KY.  
 02/2009 – 05/2009 Intern, Kentucky Department of Environmental Protection, Division of Water, Bowling Green, KY.  
 12/2008 – 01/2009 Environmental Health Intern, International Health and Human Service Learning Program – Belize 2009, CHHS, Western Kentucky University in Gales Point, Belize.  
 01/2007 – 08/2007 Resident Medical Officer, Dharmadhikari Hospital, Nagpur, India.  
 11/2005 – 01/2007 Senior Resident Medical Officer, KRIMS Hospital, Nagpur, India.  
 01/2005 – 12/2005 Resident Intern, Nagpur College of Homoeopathy & Hospital, Nagpur, India.

**AWARDS AND HONORS**

2016 Clinical Trials, Statistical, and Data Management Center Poster Award for the poster: *Predictors of injury in a farm vehicle crash: modifiable and non-modifiable factors*. College of Public Health Research Week, University of Iowa, Iowa City, IA  
 2016 Rural Policy Research Institute Poster Award for the poster: *Predictors of injury in a farm vehicle crash: modifiable and non-modifiable factors*. College of Public Health Research Week, University of Iowa, Iowa City, IA  
 2015 Collegiate Poster Award for the poster entitled: *To report or not to report? Effect on Crime Victimization*. College of Public Health Research Week, University of Iowa, Iowa City, IA  
 2014 Delta Omega Theta Chapter Service Award for service and leadership, Gilling's School of Global Public Health, University of North Carolina, Chapel Hill, NC  
 2013 Robert Verhalen endowed scholarship for Injury Prevention and Trauma Management, Gilling's School of Global Public Health, University of North Carolina, Chapel Hill, NC  
 2013 Class of 2013 scholarship, Gilling's School of Global Public Health, University of North Carolina, Chapel Hill, NC  
 2013 Society for Public Health Education (SOPHE)/ Center for Disease Control and Prevention (CDC) Unintentional Injury Prevention Fellowship: 2013-2014

- 2009 Outstanding Graduate Student for Environmental Public Health, College of Health and Human Services, Western Kentucky University, Bowling Green, KY
- 2008 World Toppers scholarship, travel and study for the 2009 International Health and Human Service Learning Program, Western Kentucky University, Bowling Green, KY
- 2008 College of Health and Human Services travel scholarship for the 2009 International Health and Human Service Learning Program, Western Kentucky University, Bowling Green, KY

## PROFESSIONAL MEMBERSHIPS

- 2014 – Society for Advancement of Violence and Injury Research
- 2011 – Society for Epidemiologic Research
- 2009 – American Public Health Association

## PUBLICATIONS

### Books and chapters

1. Denoble PJ, **Ranapurwala SI**, Vaithyanathan P, Bird N. Prevalence of sudden cardiac death risk factors in scuba divers – an online survey. In the proceedings of the 4<sup>th</sup> Conference on Diving Physiology, Technology and Hyperbaric Medicine. Japanese Society of Hyperbaric and Undersea Medicine, Tokyo, Japan, November, 2012; 71-74.

### Peer Reviewed Journals (\*Denotes the author was an advisee or student mentee)

1. **Ranapurwala SI**, Shanahan ME, Alexandridis AA, Proescholdbell ST, Naumann RB, Edwards D, Marshall SW. Opioid overdose mortality among former North Carolina inmates: A retrospective cohort 2000-2015. *Am J Public Health*. 2018 Sep;108(9):1207-1213. doi: 10.2105/AJPH.2018.304514. Epub 2018 Jul 19.
2. **Ranapurwala SI**, Naumann R, Austin A, Dasgupta N, Marshall SW. Methodologic limitations of prescription opioid safety research and recommendations for improving the evidence base. *Pharmacoepidemiol Drug Saf*. 2018 Jun 3. doi: 10.1002/pds.4564. [Epub ahead of print] Review.
3. **Ranapurwala SI**, Kucera KL, Denoble PJ. The healthy diver: A cross-sectional survey to evaluate the health status of recreational scuba diver members of Divers Alert Network (DAN). *PLoS ONE*. 2018. 13(3): e0194380.
4. **Ranapurwala SI**, Carnahan R, Brown G, Hinmann J, Casteel C. Impact of prescription monitoring program on opioid pain reliever prescribing patterns in Iowa. *Pain Med*. 2018. doi: 10.1093/pm/pny029. [Epub ahead of print]
5. Brinkley-Rubenstein L, Macmadu A, Marshall B, Heise A, **Ranapurwala SI**, Rich JD, Green TC. Risk of fentanyl-involved overdose among those with past year incarceration: Findings from a recent outbreak of illicit synthetic fentanyl overdose in 2014 and 2015. *Drug Alcohol Depend*. 2018 Feb 9;185:189-191. doi: 10.1016/j.drugalcdep.2017.12.014. [Epub ahead of print]
6. Rosenberg M, **Ranapurwala SI**, Townes A, Bengtson AM. Do Black Lives Matter in public health research and training? *PloS ONE*. 2017; Oct 10;12(10):e0185957.
7. **Ranapurwala SI**, Wing S, Poole C, Kucera KL, Marshall SW, Denoble PJ. Mishaps and unsafe conditions in recreational scuba diving and pre-dive checklist use: A prospective cohort study. *Inj Epidemiol*. 2017 Dec;4(1):16. doi: 10.1186/s40621-017-0113-z. Epub 2017 Jun 5.
8. **Ranapurwala SI**, Peek-Asa C, Casteel C. Volunteering in Adolescence and Adult Delinquency: A Longitudinal Analysis from the Add Health Study. *Inj Epidemiol*. 2016 Dec;3(1):26. PMID: 27807807.
9. **Ranapurwala SI**, Denoble PJ, Poole C, Marshall SW, Kucera KL, Wing SB. Factors influencing adherence to pre-dive checklists among recreational scuba divers. *Undersea Hyperb Med*. 2016;43(7):827-32.
10. **Ranapurwala SI**, Mello ER, Ramirez MR. A GIS-based matched case-control study of road characteristics in farm vehicle crashes from nine Midwestern US states. *Epidemiology*. 2016;27(6):827-34. [Epub: Jul 27, 2016] doi: 10.1097/EDE.0000000000000542. PMID: 27468005.
11. **Ranapurwala SI**, Berg MT, Casteel C. Reporting crime victimizations to the police and the incidence of future victimizations: A longitudinal study. *Plos One*. 2016; 11(7):e0160072. doi: 10.1371/journal.pone.0160072. PMID: 27466811.
12. **Ranapurwala SI**, Denoble PJ, Poole C, Marshall SW, Kucera KL, Wing S. The effect of using a pre-dive checklist on the incidence of diving mishaps in recreational scuba diving: A cluster randomized trial. *International Journal of Epidemiology*, 2016; 45(1):223-231. [Epub: Nov 3, 2015]. doi: 10.1093/ije/dyv292. PMID: 26534948.

13. Hatzenbuehler ML, Schwab-Reese L, **Ranapurwala SI**, Hertz M, Ramirez MR. Anti-Bullying Policies Reduce the Risk of Bullying Victimization: A State-Level Analysis. *JAMA Pediatrics*, 2015; 169(10):e152411. [Epub: Oct 5, 2015] doi: 10.1001/jamapediatrics.2015.2411. PMID: 26437015.
14. **Ranapurwala SI**, Bird N, Vaithyanathan P, Denoble PJ. Scuba diving injuries among Divers Alert Network members 2010-2011. *Diving and Hyperbaric Medicine*, 2014; 44(2):79-85. PMID: 24986725.
15. Denoble PJ, Nelson CL, **Ranapurwala SI**, Caruso JL. Prevalence of left ventricular hypertrophy in scuba diving and traffic accident victims. *Undersea and Hyperbaric Medicine*, 2014; 41 (2):127-33. PMID: 24851550.
16. Zanchi J, Ljubkovic M, Denoble PJ, Dujic Z, **Ranapurwala S**, Pollock NW. Influence of repeated daily diving on decompression stress. *International Journal of Sports Medicine*, 2014; 35(6):465-8. doi: 10.1055/s-0033-1334968. PMID: 23771833.
17. Denoble PJ, **Ranapurwala SI**, Vaithyanathan P, Clarke RE, Vann RD. Per-capita claims rates for decompression sickness among insured Divers Alert Network members. *Undersea and Hyperbaric Medicine*, 2012; 39(3):709-15. PMID: 22670551.
18. Lartey GK, Habib F, **Ranapurwala SI**, Bowles T. Health Departments' Activities in Promoting Motor Vehicle Safety Among Children. *American Journal of Health Studies*, 2008; 23(3):124-29.

*In review*

19. \*Caves J, **Ranapurwala SI**, Moracco KE, Marshall SW. Impact of firearm regulatory strictness on intimate partner homicide and homicide-suicide.
20. Rauscher K, Casteel C, Brown B, **Ranapurwala SI**. Adolescent Victims of Violence at Work: Results from the National Crime Victimization Survey.

*In preparation*

21. **Ranapurwala SI**, Young T, Wu H, Peek-Asa C, Cavanaugh JE, Ramirez MR. Public health application of predictive analysis: Forecasting the risk of farm crash injuries.
22. Ringwalt C, Schiro S, McCort A, **Ranapurwala SI**. Trends of 'chilling effect' in opioid pain reliever prescriptions in North Carolina: 2009-2015.
23. Chawla D, Drover SSM, Kinlaw A, **Ranapurwala SI**. Association of marijuana use with prescription drug misuse.
24. Geary S, Graham L, Proescholdbell SK, Moracco KE, **Ranapurwala SI**, Macy R. Understanding intimate partner violence related deaths in North Carolina: North Carolina Violent Death Reporting System, 2011-2015.
25. MARIC consortium. Multi-national meta-analysis of all-cause mortality after prison release: a protocol.

**Dissertation**

**Ranapurwala, SI**. Prevention of scuba diving mishaps using a pre-dive checklist: A cluster randomized trial. Epidemiology Department, Gillings School of Global Public Health, University of North Carolina, Chapel Hill, NC, USA. Chair: Steve Wing, PhD. Committee: Charles Poole, PhD; Stephen W. Marshall, PhD; Kristen Kucera, PhD; Petar Denoble, MD.

**CONFERENCES PRESENTATIONS** (\* = Presenter)**Oral presentations**

- \*Macmadu A, Brinkley-Rubenstein L, Marshall B, Heise A, **Ranapurwala SI**, Rich JD, Green TC. Risk of fentanyl-involved overdose among those with past year incarceration: Findings from a recent outbreak of illicit synthetic fentanyl overdose in 2014 and 2016. 11<sup>th</sup> Academy and Health Policy Conference on Correctional Health, March 2018; Houston, TX, USA.
- \***Ranapurwala SI**. Confounding and Directed Acyclic Graphs: Innovations in research and training at NCIPC funded Injury Prevention Research Centers. American Public Health Association annual conference, November 2017; Atlanta, GA, USA.
- \***Ranapurwala SI**, Shanahan ME, Alexandridis AA, Proescholdbell ST, Naumann RB, Edwards D, Marshall SW. Opioid overdose mortality among former North Carolina inmates: 2000-2015. American Public Health Association annual conference, November 2017; Atlanta, GA, USA.
- \***Ranapurwala SI**, Hinmann J, Carnahan R, Brown G, Casteel C. Association of Iowa PMP with opioid pain reliever prescribing patterns: An interrupted time series approach. American Public Health Association annual conference, November 2017; Atlanta, GA, USA.

- \*Rauscher KJ, Brown B, Casteel C, **Ranapurwala SI**. Comparing Workplace Violence Experiences of Adolescent and Adult Workers Using the National Crime Victimization Survey. American Public Health Association annual conference, November 2017; Atlanta, GA, USA.
- \***Ranapurwala SI**, Hinmann J, Carnahan R, Brown G, Casteel C. Impact of prescription monitoring program on opioid pain reliever prescribing patterns in Iowa. Society for Advancement of Violence and Injury Research, September 2017; Ann Arbor, MI, USA.
- \***Ranapurwala SI**, Young T, Wu H, Cavanaugh JE, Peek-Asa C, Ramirez MR. Public health application of predictive modeling: Forecasting the risk of farm crash injuries. Society for Epidemiologic Research Annual Conference, June 2017; Seattle, WA, USA.
- \***Ranapurwala SI**, Young T, Ramirez MR. Predictors of injury in a farm vehicle crash: modifiable and non-modifiable factors. Midwest Rural Agricultural Safety and Health Conference, November 2015; Decorah, IA, USA.
- \***Ranapurwala SI**, Casteel C. Effect of doing volunteer work in formative years on adult delinquency: A longitudinal study. Society for Advancement of Violence and Injury Research, March 2015; New Orleans, LA, USA.
- \***Ranapurwala SI**, Mello E, Ramirez MR. Effect of road characteristics on the incidence of farm vehicle-related crashes; 40<sup>th</sup> Annual International Traffic Records Forum, October 2014; St. Louis, MO, USA.
- \*Bourque J, **Ranapurwala SI**, Denoble PJ. Divers with implantable cardiac devices; oral presentation; The 47<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June, 2014; St. Louis, MO, USA.
- Ranapurwala SI**, \*Bird N, Vaithyanathan P, Denoble PJ. Diving injury rates: Results from an online survey; oral presentation; The 46<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June 12, 2013; Orlando, FL, USA.
- Ranapurwala SI**, Wing SB, Moore J, \*Denoble PJ. A pre-dive safety checklist may prevent diving mishaps: Results from a grouped randomized trial; oral presentation; The 46<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June 12, 2013; Orlando, FL, USA.
- \***Ranapurwala SI**, Denoble PJ, Vann RD, Vaithyanathan P. Decompression Sickness Claims Rate among Insured Divers Alert Network Members; poster presentation; 1<sup>st</sup> Annual SER Web meeting; November 5, 2011; Web meeting.
- \*Horney JA, Davis SED, Fleischauer A, Davis M, **Ranapurwala S**. Use of the Community Assessment for Public Health Emergency Response (CASPER) in North Carolina, 2003 to 2010; oral presentation; Council of State and Territorial Epidemiologists Annual Meeting; June 12-16, 2011; Pittsburgh, PA.
- Taylor RR, \***Ranapurwala SI**, Hill M. Protection of Public Health and Capacity Development for Rural Water System in Gales Point, Belize - An Environmental Health Service Learning Project; oral presentation; 137<sup>th</sup> Annual APHA Meeting; November 7-11, 2009; Philadelphia, PA.
- \***Ranapurwala SI**, Hill M, Taylor RR. Environmental Health Service Learning and Water Quality in Gales Point, Belize; oral presentation; 2009 Annual KPHA Conference, March 2009, Louisville, KY.
- \***Ranapurwala SI**, Hill M, Taylor RR. Environmental Health Service Learning and Water Quality in Gales Point, Belize; oral presentation; Annual 39<sup>th</sup> Student Research Conference, Western Kentucky University, February 2009, Bowling Green, KY.

### Poster presentations

- \*Caves J, **Ranapurwala SI**, Moracco KE, Marshall SW. Impact of the number of state firearm safety laws on intimate partner homicide. American Public Health Association annual conference, November 2017; Atlanta, GA, USA.
- Rosenberg M, Townes A, \***Ranapurwala SI**, Bengtson A. Following the trail of investments in public health research to trace racial health disparities. Society for Advancement of Violence and Injury Research, September 2017; Ann Arbor, MI, USA.
- \***Ranapurwala SI**, Young T, Ramirez MR. Predictors of injury in a farm vehicle crash: modifiable and non-modifiable factors. University of Iowa, College of Public Health 2015 Research Week – April 2015, Iowa City, IA [Awarded best research poster in two categories].
- \***Ranapurwala SI**, Berg MT, Casteel C. Does police reporting of victimization help? Relationship with the incidence of future victimization. Society for Epidemiologic Research annual meeting, June 2015; Denver, CO, USA.

- \***Ranapurwala SI**, Mello E, Ramirez MR. Road segment characteristics and the incidence of farm vehicle-related crashes: A GIS based multistate matched case-control study; Society for Epidemiologic Research annual meeting, June 2015; Denver, CO, USA.
- \***Ranapurwala SI**, Casteel C, Berg MT. To report or not to report? Effect on crime victimization. The University of Iowa, College of Public Health 2015 Research Week – April 2015, Iowa City, IA [Awarded best research poster in the college in faculty/staff/postdoc category].
- \***Ranapurwala SI**, Casteel C, Berg MT. To report or not to report? Effect on crime victimization. Society for Advancement of Violence and Injury Research, March 2015; New Orleans, LA, USA.
- \***Ranapurwala SI**, Mello E, Ramirez MR. Effect of road characteristics on the incidence of farm vehicle-related crashes; 142<sup>nd</sup> Annual American Public Health Association Conference, November 2014; New Orleans, LA, USA.
- Ranapurwala SI**, \*Denoble PJ. Factors affecting adherence to pre-dive checklists: A nested study; poster presentation; The 47<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June, 2014; St. Louis, MO, USA.
- \***Ranapurwala SI**, Denoble PJ, Marshall SW, Poole C, Kucera KL, Wing SB. Cultivating safe behaviors in recreational scuba divers: A cluster randomized trial of pre-dive checklists; poster presentation; The 65<sup>th</sup> Annual Society of Public Health Education conference, March 19, 2014. Baltimore, MD, USA.
- \***Ranapurwala SI**, Wing SB, Denoble PJ. A pre-dive safety checklist may prevent diving mishaps: Results from a grouped randomized trial; poster presentation; The 46<sup>th</sup> Annual Society of Epidemiologic Research meeting, June 18, 2013. Boston, MA.
- \*Denoble PJ, Nelson CL, **Ranapurwala SI**, Caruso JL. Prevalence of Left Ventricular Hypertrophy in Scuba Diving and Traffic Accident Victims; poster presentation; The 46<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June 12, 2013.
- Covington D, **Ranapurwala SI**, Ebersole DG, \*Denoble PJ. Modification of Individual Diving Practices after PFO Diagnosis or PFO Closure; poster presentation; The 46<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June 12, 2013.
- \*Denoble PJ, **Ranapurwala SI**, Vaithyanathan P, Clarke RE, Vann RD. Per Capita Claims Rates For Decompression Sickness (DCS) Among Insured Divers Alert Network (DAN) Members; poster presentation; The 45<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June 22, 2012.
- \*Denoble PJ, **Ranapurwala SI**, Vaithyanathan P., Bird N. Online Survey Of Health Status Of DAN Members; poster presentation; The 45<sup>th</sup> Undersea & Hyperbaric Medical Society (UHMS) Annual Scientific Meeting, June 22, 2012.
- Meija E, \*Nochetto M, Bird N, **Ranapurwala S**, Denoble PJ. A Case Series of Decompression Illness in Miskito Fishermen Divers Treated in 2010 at Clinica La Bendicion; poster presentation; 44<sup>th</sup> Annual Scientific Meeting – Undersea & Hyperbaric Medicine; June 15-18, 2011; Fort Worth, TX.
- \*DiBiase L, Davis S, Rosselli R, Smith-Craig H, **Ranapurwala S**, Horney J, Casani J. Evaluating local health departments' H1N1 vaccination campaigns: Lessons learned (with handout); poster presentation; Public Health Preparedness Summit 2011; February 22-25, 2011; Atlanta, GA.
- Lartey GK, Habib F, \***Ranapurwala SI**, Bowles T. Health Departments' Activities in Promoting Motor Vehicle Safety Among Children; poster presentation; 2008 Annual KPHA Conference, April 2008, Louisville, KY.

### INVITED ORAL PRESENTATIONS

- Methodologic Limitations of Prescription Opioid Safety Research: A Call for Integrated Data Systems and Modern Epidemiology. The North Carolina Translational and Clinical Sciences Institute. June 4, 2018.
- Disproportionate effects of opioids and violence on disadvantaged populations. Gillings School of Global Public Health: The Lunch with the Dean Series. April 26, 2018.
- Association of Iowa PMP with opioid pain reliever prescribing patterns: An interrupted time series approach. University of Minnesota School of Public Health, Junior Faculty Lunch. April 5, 2018.
- Policies to prevent opioid poisoning. Cecil G. Sheps Center for Health Services and Research, Chapel Hill, NC, April 2, 2018.
- Opioid overdose deaths after release from prison. North Carolina Department of Corrections, Raleigh, North Carolina, May 26, 2017.

Advancing injury prevention with modern epidemiologic methods: Examples from opioid poisoning, youth violence, and occupational transportation safety. Department of Epidemiology, University of Colorado, Denver. June 23, 2016.

Using epidemiologic methods to advance injury prevention in opioid poisoning, youth violence, and occupational transportation safety. Department of Epidemiology, University of North Carolina, Chapel Hill. May 3, 2016.

Volunteering and youth violence prevention: My ongoing work and future directions. University of Iowa Injury Prevention Research Center Executive committee meeting. November 5, 2015.

Effect of Road Characteristics on the Incidence of Farm Vehicle Crashes: A Matched Case-Control Study. Great Plains Center for Agricultural Health advisory council meeting. January 14, 2015.

Road characteristics and incidence of farm vehicle crashes. State Traffic Records coordinating committee, Iowa City, Iowa. September 18, 2014.

Prevention of Scuba Diving Mishaps using a Pre-dive Checklist: A Cluster Randomized Trial. Injury Prevention Research Center. Iowa City, Iowa. July 17, 2014.

Cultivating Safe Behaviors in Recreation Diving. Divers Alert Network Public Lecture Series, Durham, NC. Dec 4, 2013.

Checklists Work: Preventing Diving Mishaps, Injuries, and Fatalities. Down Under Scuba Monthly Meeting, Raleigh, NC. Oct 8, 2013.

Pre-dive Safety Checklist Prevents Diving Mishaps: Results from a Group Randomized Trial. Undersea and Hyperbaric Medicine Society Pacific chapter annual meeting, Las Vegas, NV. Sept 7, 2013.

Diving Injury Rates: Results from an Online Survey. Undersea and Hyperbaric Medicine Society Pacific chapter annual meeting, Las Vegas, NV. Sept 7, 2013.

Epidemiological Studies in Scuba Diving at Divers Alert Network. Center for Hyperbaric Medicine and Environmental Physiology, Duke University Medical Center, Durham, NC. Jan 13, 2012.

Principles and Practice of Homoeopathy. Four contributory lectures for Final year and Intern Homoeopathic Medical Students, Nagpur College of Homoeopathy & Hospital, India. Nov, 2006.

## **TEACHING EXPERIENCE**

### ***At the University of North Carolina, Chapel Hill***

**Co-instructor**, Intervention Epidemiology (EPID 790). Department of Epidemiology, University of North Carolina at Chapel Hill, NC. Fall 2017. Six PhD students.

Co-instructor with Emily Gower and Steve Marshall. The class covered topics on intervention epidemiology and randomized trials and causal inference in this area. I covered topics on causal inference in randomized and observational studies, methods for addressing adherence and contamination in randomized trials including intent-to-treat, per-protocol, as-treated, marginal structural models, and complier average causal effect. I also covered topics on quasi-experimental designs specifically interrupted-time-series analysis and generalizability.

### **Guest lectures**

Injury Prevention (EPID 627). Department of Epidemiology, University of North Carolina at Chapel Hill, NC. Fall 2017: Topic – Opioid Epidemic.

**Teaching Assistant**, Principles of Epidemiology (EPID 600). Department of Epidemiology, University of North Carolina, Chapel Hill, NC. Spring 2013. 39 Students – mix of PhD, Masters, and Undergraduate. TA for Victor Schoenbach, PhD. The class covered general epidemiology principles for students from all over the UNC School of Public Health.

### ***Conference Workshops***

**Co-instructor**, Workshop on Causal Inference and Directed Acyclic Graphs. Society for Advancement of Violence and Injury Research (SAVIR) – September 2017, Ann Arbor, MI, USA. Six attendees.

**At the University of Iowa**

**Co-instructor**, Epidemiology III (EPID 7400): Theoretical perspectives. Department of Epidemiology, University of Iowa, Iowa City, IA. Fall 2015. Nine PhD students.

Co-instructor with Audrey Saftlas, PhD. The class covered topics on causal inference in epidemiology. I covered topics on causal inference in randomized and observational studies, directed acyclic graphs, confounding, and mediation.

**Guest lectures**

Introduction to Oral Epidemiology (DPH 6004). College of Dentistry, University of Iowa, Iowa City, IA. Spring 2016: Topic – Confounding and Directed Acyclic Graphs with journal club discussion.

Injury Epidemiology (OEH 6520). Department of Occupational and Environmental Health, University of Iowa, Iowa City, IA. Spring 2015-2016: Topic – Effect Measure Modification.

Injury Epidemiology (OEH 6520). Department of Occupational and Environmental Health, University of Iowa, Iowa City, IA. Spring 2015-2016: Topic – Confounding and Directed Acyclic Graphs.

Injury and violence prevention (OEH 4510). Department of Occupational and Environmental Health, University of Iowa, Iowa City, IA. Fall 2014: Topic – Introduction to Injury Epidemiology.

Epidemiology seminar. Department of Epidemiology, University of Iowa, Iowa City, IA. Fall 2014: Topic – Directed Acyclic Graphs (DAG) – why and how?

**At Western Kentucky University**

**Instructor**, Personal Health (HED 100C). Department of Liberal Arts and Science (Health Education), Western Kentucky University Community College at South Campus, Bowling Green, KY. Fall 2009, Spring 2010. 60 students per semester.

**GRANT SUPPORT**

**Submitted (Pending)**

US Food and Drug Administration

**Methodological Advances in Evaluating Abuse Deterrent Opioid Analgesics**

09/01/2018 – 08/03/2021 PI: Dasgupta

Role: Lead for two sub-projects

To evaluate and compare methods for the confounding by “indication”, the expected likelihood that patients receiving ADF opioids have different risk profiles for experiencing overdose/abuse outcomes than patients prescribed traditional opioids.

National Institute for Drug Abuse, National Institutes of Health

**Evaluation of state-mandated acute & post-surgical pain-specific CDC opioid prescribing guidelines (R01)**

09/30/2018 – 09/29/2021 PI: Ranapurwala

Role: Lead PI

To examine the impact of a state mandated CDC opioid guideline for acute and post-surgical pain on physicians’ opioid prescribing behaviors and opioid safety outcomes (including fatal and non-fatal overdose) among patients.

National Institute for Drug Abuse, National Institutes of Health

**Chronic Pain Management, Opioid Misuse, and Risk of Blood-borne Infections**

04/01/2018 – 03/31/2020 PI: Pence

Role: Co-investigator

The overall objective of this application is to leverage a unique combination of “big data” and qualitative data to generate high-quality evidence about optimal strategies to taper or end long-term opioids.

National Institute for Occupational Health and Safety, CDC

**Trends and Disparities in Fatal Occupational Injury in North Carolina (R01)**

09/01/2017 – 08/30/2020 PI: Richardson

Role: Co-investigator

To strengthen the understanding of fatal occupational injuries in NC by identifying trends in fatal injury rates and assessing disparities by industry/ occupation, race, and worker age.

**Current**

University of North Carolina Injury Prevention Research Center  
National Center for Injury Prevention and Control, Centers for Disease Control and Prevention

**Evaluation of North Carolina Medical Board's opioid prescribing policy**

08/01/2017 – 07/31/2019 PI: Ranapurwala

Total award (direct and indirect): \$300,000

Role: PI, 15%

To evaluate the impact of North Carolina Medical Board's opioid prescribing policies on inappropriate tapering and abrupt stoppage of opioid prescriptions and overdose deaths in North Carolina.

National Center for Injury Prevention and Control, Centers for Disease Control and Prevention  
**University of North Carolina Injury Prevention Research Center**

08/01/2014 – 07/31/2019 PI: Marshall, SW

Total award (direct and indirect): \$4,011,500

Role: Epidemiologist, 15% (Oct'16 to Aug'19: did not participate in proposal development)

North Carolina Department of Health and Human Services  
National Center for Injury Prevention and Control, Centers for Disease Control and Prevention

**Prescription Drug Overdose: Prevention for States**

03/01/16 – 08/31/17 Subcontract PI: Shanahan, M

Award (per year direct): \$149,398

Role: Analyst, 25% (Oct'16 to Aug'18: did not participate in proposal development)

To evaluate the impact of prescription monitoring program and other policies in North Carolina on prescription drug overdose

National Football League

**Role of Active Rehabilitation in Concussion Management: A Randomized Controlled Trial**

05/01/2016 – 04/30/2019 PI: Register-Mihalik J

Total award (direct and indirect): \$2,599,957

Role: Analyst, 45% (Oct'16 to Apr'19: did not participate in proposal development)

To evaluate the effect of a concussion rehabilitation program

**Completed**

University of Iowa Injury Prevention Research Center  
National Center for Injury Prevention and Control, Centers for Disease Control and Prevention

**Poisoning: Improved Surveillance for Determining Control Measures**

08/01/2015 – 07/31/2017 PI: Casteel, C

Total award (direct and indirect): \$300,000

Role: Co-investigator, 10% (Aug'15 to Sept'16); Subcontract PI, 10% (Oct'16 to Jul'17)

To develop and implement an enhanced and integrated state poisoning surveillance system

National Center for Injury Prevention and Control, Centers for Disease Control and Prevention  
**University of Iowa Injury Prevention Research Center**

August 2012 – July 2017 PI: Peek-Asa, C

Total award (direct and indirect): \$4,525,000

Role: Postdoctoral Research Scholar, 25% (Jun'14 to Aug '16 : did not participate in proposal development)

National Institute of Occupational Safety and Health - U50 OH007548-11  
Great Plains Center for Agricultural Health

09/30/2011 – 09/29/2016 PI: Gerr, F

Award: \$1,644,111 (2014)



**Subproject: Farm Equipment Crash Study (PI: Marizen Ramirez)**

Role: Epidemiologist, 25% (Jun'14 to Sept'16: did not participate in proposal development)

To develop a comprehensive epidemiologic profile of farm crashes, analysis of risk factors, and evaluate the impact of lighting and marking policies of farm equipment on the incidence of crashes.

University of Iowa

**Office of Vice President for Research & Economic Development/ College of Public Health**

August 2013 – July 2016

PI: Casteel, C

Total award (direct only- internal funds): \$105,354

Role: Postdoctoral Research Scholar, 40% (Jun'14 to July'16: did not participate in proposal development)

The University of Iowa Injury Prevention Research Center

**Assessment of community service programs/ curricula in middle/junior and high schools**

July 1, 2015 – June 30, 2016

PI: Ranapurwala, SI

Total Award (direct): \$21,506 (pilot funding)

Role: Principal Investigator, 5%

Center for Injury Epidemiology and Prevention, Columbia University

**Evaluation of Anti-Bullying Laws across the Country**

01/01/2014 – 12/31/2014

Multiple PIs: Ramirez, MR and Hatzenbuehler, M

Total Award: \$7,500

Role: Co-Investigator, 2% (Jun'14 to Dec'14: did not participate in proposal development)

Divers Alert Network

**Scuba diving intervention study: A cluster randomized controlled trial**

01/05/2011 – 04/30/2012

PI: Ranapurwala, SI

Total Award (Direct): \$32,000

Role: Principal Investigator, 20%

To investigate the effect of using a pre-dive checklist on the incidence of diving mishaps in recreational scuba divers

Divers Alert Network

**The University of North Carolina at Chapel Hill Graduate Research Training in cooperation with Divers Alert Network**

09/01/2010 – 05/25/2014

Total Award: Year 1: \$25,000; Year 2: \$31,231; Year 3: \$31,231; Year 4 (9 months): \$27,731.

Role: Epidemiologist and Biostatistician (50%, plus Tuition and Health Insurance at UNC)

Worked on multiple research projects at Divers Alert Network

1. Medical evaluation for fitness to dive: A needs assessment (PI: Bird)
2. Evaluation of decompression sickness claims (PI: Denoble)
3. Prevalence of Left Ventricular Hypertrophy in Scuba Diving and Traffic Fatalities (PI: Denoble)
4. DAN insured members' health survey (PI: Denoble)
5. Diving experience of divers with implanted cardiac devices (Co-PIs: Denoble/ Bourque)

**MENTORING**

**University of North Carolina, Chapel Hill**

1. Josie Caves – MSPH in Epidemiology, UNC-CH – chaired Master's committee, graduated in 2017; current Doctoral student in Epidemiology, UNC-CH – member of dissertation committee (expected graduation in 2019).
2. Katie Wolfe – Doctoral student in Epidemiology, UNC-CH – member of dissertation committee (expected graduation in 2019).
3. Laurie Graham – Doctoral student in Social Work, UNC-CH – member of her dissertation committee (expected graduation in 2019).

**PROFESSIONAL SERVICE**

**University of North Carolina, Chapel Hill**

- 2017 Epidemiology methods qualifying examination committee
- 2016 – Core faculty, UNC Injury Prevention Research Center
- 2011 Data Collection, North Carolina Institute for Public Health. Rapid needs assessment of wildfire damages at Holy Shelter Game Land, Pender, NC.
- 2010 Data Collection, North Carolina Institute for Public Health. Household awareness survey about KI distribution within the 10-mile emergency planning zone around the Shearon Harris nuclear power plant, Raleigh, NC.

**State of North Carolina**

- 2016 – Opioid and Prescription Drug Abuse Advisory Council, Research and Evaluation Core

**Divers Alert Network (DAN), Durham, NC**

- 2017 – Member of the DAN Institutional Review Board

**State of Iowa**

- 2014 – 2016 Prescription Drug Abuse Reduction Task Force

**University of Iowa**

- 2014 – 2016 Great Plains Center for Agricultural Health Internal Advisory Committee
- 2014 – 2016 Injury Prevention Research Center Strategic Executive Committee
- 2014 – 2015 University of Iowa Postdoctoral Association, Public Health representative

**Onslow County, NC, USA**

- 2012 Data Analysis, Onslow County Community Health Assessment Survey. 30 hrs.

**Western Kentucky University, Bowling Green, KY**

- 2008 – 2009 Secretary, Kentucky Public Health Association student chapter
- 2008 – 2009 President, International Students Club
- 2007 – 2008 Public Relations Officer, International Club

**Warren County, KY, USA**

- 2008 Student Health Educator, Warren Region Juvenile Detention Center. 50 hours.  
Future selves program for incarcerated children and youth provided vocational awareness, education, and practical coping strategies.

**Professional Societies**

- 2015 – Society for Advancement of Violence and Injury Research (SAVIR), Science and Research Committee
- 2014 – 2015 American Public Health Association Injury Control and Emergency Health Services (ICHES), Policy Committee

**Grant Review**

- 2018 Western University of Health Sciences Intramural grant

**Journal Review**

American Journal of Epidemiology; American Journal of Preventive Medicine; American Journal of Public Health; Drug Alcohol Dependence; Epidemiology; Injury Epidemiology; Journal of Family Violence; Journal of Family Medicine and Primary Care; Journal of Trauma and Care; Pain Medicine; PLoS One; Violence and Gender.

**Conference Abstract Review**

- 2013 – Society of Epidemiologic Research (SER), Annual conference
- 2014 – Society of Public Health Education (SOPHE), Annual conference
- 2015 – American Public Health Association, Annual conference
- 2015 Epidemiology Congress of the Americas 2016 [for Society of Epidemiologic Research]

***Conference session moderator***

2017 – Society for Advancement of Violence and Injury Research

2017 – American Public Health Association – Injury Control and Emergency Health Services section