UNIVERSITY OF MASSACHUSETTS LOWELL

COMPREHENSIVE PROFESSIONAL VITAE

NAME: Yuan Zhang DATE: 10/2024

SCHOOL: Susan and Alan Solomont School of Nursing

COLLEGE: Zuckerburg College of Health Sciences

RANK: Associate Professor with Tenure

FIELD: Occupational Health and Health Promotion

A. EDUCATION AND ACADEMIC QUALIFICATIONS

1. Education

2013		Department of Work Environment, University of Massachusetts Lowell
		Post-Doctoral Research Fellow, Center for the Promotion of Health in the New England Workplaces (CPH-NEW), funded by NIOSH 2U19 OH008857
2013	Ph.D.	Solomont School of Nursing, University of Massachusetts Lowell, Lowell, MA
		Area of Specialty: Occupational Health and Health Promotion
		Dissertation Topic: "Sleep duration and health outcomes of formal caregivers
		in skilled nursing facilities: The contribution of the work environment."
2011	Post-Masters	University of Massachusetts Lowell, Lowell, MA
	Certificate	Nursing Education Certificate
		Environmental Risk Assessment Certificate
2007	M.S.	School of Nursing, Shandong University, Jinan, Shandong, P. R. China
		Area of Specialty: Clinical Nursing and Nursing Education
2004	B.S.	School of Nursing, Shandong University, Jinan, Shandong, P. R. China

2. Additional Research Training

2014 Summer Institute, John A. Hartford Institute Geriatric Nursing Scholar, New

York University

2011 Internship, Office of Occupational Health Nursing, OSHA, Washington, D.C.

3. Academic Experience

2019-present Associate Professor, Solomont School of Nursing

University of Massachusetts Lowell

2013-2019	Assistant Professor, Solomont School of Nursing
	University of Massachusetts Lowell
2007-2013	Senior Research Assistant, Center for the Promotion of Health in the New England Workplaces (CPH-NEW) funded by NIOSH Total Worker Health® (2U19 OH008857), Department of Work Environment, University of Massachusetts Lowell
2006-2007	Research Assistant for "Patients' intensive care experience during mechanical

ventilation", School of Nursing, Shandong University, P. R. China

B. PROFESSIONAL ACTIVITIES

1. Professional Appointments, Advisory Board, and Consulting

2024-2027	Member, Diversity, Equity, and Inclusion (DEI) Committee, Sleep Research Society. Appointed 3-year term. Responsible for advertising the diversity, equity and inclusion mission of the professional society and recruit members from diverse backgrounds and disciplines.
2024-2025	Member, ANA Massachusetts Living Legend/Award Committee. Appointed 1-year term. Responsible for reviewing, scoring, and selecting MA State Living Legend recipients and award recipients.
2023	Grant Reviewer for the NIOSH CPH-NEW Center Diversity, Equity, and Inclusion (DEI) Pilot Grants
2020	Grant Reviewer for the Study Section, National Institute of General Medical Sciences (NIGMS), NIH
2018-2020	Grant Reviewer, completed the 2-year term for the American Nurse Foundation Grants
2016-2017, 2018-2019	Grant Reviewer for the NIOSH CPH-NEW Center Pilot Grants
2014-2018	Consultant, VA Center of Innovation on Disability and Rehabilitation Research (CINDRR), provide consultation on the research study "Safe Patient Handling and Movement (SPHM) Course Content: A National Survey of Nursing Programs."
2015-2017	Eta Omega Chapter Treasurer, Sigma Theta Tau International Honor Society of Nursing
2014-2017	Eta Omega Chapter Key Award coordinator, Leadership Succession Committee, Sigma Theta Tau International Honor Society of Nursing
2013-present	Faculty Advisor/Mentor, Evidence-Based Practice and Research Council, Lowell General Hospital

2. Editorial Experience

2021-present Editorial Board Member, Workplace Health & Safety, the Official Journal of

the American Association of Occupational Health Nursing (AAOHN)

(Impact Factor 2.6). Responsibilities included manuscript review, input on the editorial direction of the journal, participation at editorial board meetings and discussions, and manuscript recruitment.

3. Professional Honors and Awards

2024	American Nurses Association (ANA) Massachusetts Excellence in Nursing Research Award
2024	Teaching Excellence Award, Solomont School of Nursing
2023	Recognition as <i>UMentor Faculty Advocate 2023</i> at the University of Massachusetts Lowell Faculty Symposium
2020	Recognition as <i>Launch Mentor 2020</i> at the University of Massachusetts Lowell Faculty Symposium
2018	Recognition as <i>faculty with the most publications</i> in the Zuckerberg College of Health Sciences at the University of Massachusetts Lowell Faculty Symposium
2017	Massachusetts Association of Colleges of Nursing Faculty Early Career Award
2017	University of Massachusetts Lowell Online Course Development Award
2016	Teaching Excellence Award, Solomont School of Nursing
2015	Sigma Theta Tau International Eta Omega Chapter Travel Award
2010	Outstanding Graduate Student Award, University of Massachusetts Lowell
2009	May Futrell Scholarship Award, University of Massachusetts Lowell
2008	May Futrell Scholarship Award, University of Massachusetts Lowell

4. Professional Service to the Discipline

a. Reviewer of Referred Journal Articles

2024	Nursing and Health Sciences
2024	Journal of Occupational and Environmental Medicine
2024	Workplace Health & Safety
2024	Industrial Health
2023	Workplace Health & Safety
2023	BMC Nursing
2023	Annals of Work Exposures and Health
2023	Sleep Health: Journal of the National Sleep Foundation
2022	Workplace Health & Safety
2021	Workplace Health & Safety
2021	Preventive Medicine
2020	BMC Nursing
2019	International Journal of Industrial Ergonomics

	2019	Industrial Health									
	2018	BMC Nursing									
	2018	Western Journal of Nursing Research									
	2018	International Journal of Behavioral Medicine									
	2018	International Journal of Nursing Education Scholarship									
	2017	BMJ Open									
	2016	BMC Geriatrics									
	2016	International Journal of Nursing Studies									
	2015	PLOS ONE									
	2015	Journal of Occupational and Environmental Medicine									
	2015	Journal of Applied Gerontology									
	2015	Ergonomics									
	2014	Health Promotion Practice									
	2014	BMC Public Health									
	2013	Neuropsychiatric Disease and Treatment									
	2013	Journal of Multidisciplinary Healthcare									
	Health Services Insights										
	b. Reviewer of Refe	erred Conference Abstracts and Scholarship									
	2022	3 rd International Symposium to Advance Total Worker Health®									
	2018	2 nd International Symposium to Advance Total Worker Health®									
	2015	American Public Health Association Conference									
	2014	American Public Health Association Conference									
	2014	Keogh Memorial Scholarship, American Public Health Association									
	2013	Work, Stress, and Health Conference									
<u>5. 1</u>	Professional Associat	ion Participation									
	2024-present	American Association of Occupational Health Nurses									
	2023-present	Eastern Nursing Research Society									
	2023-present	American Nurses Association									
	2023-present	Massachusetts Nurses Association									
	2015-present	Massachusetts Public Health Association									
	2013-present	Sleep Research Society									
	2009-present	American Public Health Association									
	2009-present	Honor Society of Nursing, Sigma Theta Tau International									
	2015-2019	American Nurses Association									

2015-2019 Massachusetts Nurses Association

2013-2013 American Academy of Sleep Medicine

2011-2011 American Society of Safety Engineers

6. Certification and Licensure

2011-present Massachusetts RN license # RN 2269663

2011-present Healthcare Professionals CPR Certification

C. RESEARCH

1. Grants and Contracts

a. Research Grants: Under Review (n=3)

2024 University of Michigan (National Institute on Aging) \$3

\$160,000 (submitted)

"Dementia-specific training and workforce outcomes in assisted living and nursing homes" (2025-2026)

The project will examine the prevalence and determinants of nursing staff receiving dementia-specific training and its associations with staff outcomes.

Role: Co-Investigator. PI: Cassandra Hua, Department of Public Health. I contribute to the project with my expertise on workforce training and nursing staff outcomes.

2024 R01 National Institute of Nursing Research (NINR)

\$3.4 million (submitted)

"Addressing burnout among correctional nurses using participatory interventions for management, mitigation, and prevention: A multi-level approach" (2025-2030)

The project will cultivaite a comprehensive understanding and mitigation of correctional nurses' burnout in Connecticut through a multi-level organizational and system Healthy Workplace Participatory Intervention.

Role: Co-Investigator and Co-lead. PI: Mazen El Ghaziri. I prepared all of the grant documents with the PI, including specific aims, research strategy, budget, budget justification, and all other grant supporting documents. I will co-lead the project with PI on study site coordination, survey design and administration, focus group/interview facilitation, and implementation and evaluation of the Total Worker Health® Healthy Workplace Participatory Program with correctional nurses.

2024 R21 National Institute of Biomedical Imaging and Bioengineering (NIBLB)

\$603,658 (submitted)

"Comprehensive predictive and causal insights analysis of physician burnout on care quality and sociocultural factors using wearables, clinical narratives, and causal modeling" (2025-2028)

The project will leverage wearable technologies, clinical notes analytics, and job-related administrative databases to predict behavioral and physiological biomarkers of stress-related disorders, compassion fatigue, exhaustion, and burnout for residential physicians.

Role: Co-Investigator. PI: Mohammad Arif Ul Alam, Department of Computer Science. I contribute to the project with my expertise on work-related exposure assessment and mental health assessment and promotion.

b. Research Grants: Funded as Tenured Associate Professor since 2019 (n=9)

G.17 NIOSH-CPH-NEW Center (5 U19 OH012299-02) \$7 million (awarded)

R01 "Safety in Healthcare through Integrated Facilitated Teams (SHIFT)-II" "Total Worker Health Dissemination and Implementation Hub" (2021-2026)

SHIFT-II involves evaluating the long-term effectiveness and sustainability of the Healthy Workplace Participatory Program (HWPP) at one public sector healthcare facility and expand the HWPP to multiple unit-based teams within the facility. The project will also implement an adapted HWPP through healthcare unions and worker associations, using a Train-the-Trainer model and evaluate HWPP uptake and adoption within healthcare unions.

Role: Co-Investigator. PI: Laura Punnett, Suzanne Nobrega, & Alicia Kurowski, Department of Biomedical Engineering. I contributed to the project with my expertise on shift work and sleep promotion, musculoskeletal health, and workplace participatory interventions linking occupational health and health promotion. I am serving as key resources for shift work intervention and sleep promotion for healthcare workers.

G.16 R01 National Institute of Aging (R01 AG044416)

\$1.8 million (awarded)

"Treatment of circadian disruption from shiftwork in older adults" (2019-2023)

This R01 grant will field-test a sleep timing intervention and evaluate its feasibility, efficacy, and acceptability in older night shift nurses for promoting sleep duration and quality and improving on-shift alertness and performance. The intervention has been previously tested in lab simulated older night shift workers with promising outcomes.

Role: Site Principal Investigator. PI: Jeanne Duffy, Brigham Women's Hospital/Harvard Medical School. I contributed to communications with the healthcare institutions, on-site recruitment of participants, development of the survey measures and focus group scripts, facilitation of focus groups, analyses of quantitative and qualitative data, and report writing and manuscript publications.

G.15 NIOSH-CPH-NEW Center (2U19 OH008857-11) Supplement \$70,000 (awarded)

"Wearable technology and biophysical measurements to assess psychosocial impact of work organization and critical workplace events" (2020-2022)

This supplement grant used field objective sensors for a two-week continuous track of blood pressure, heart rate, respiration, heart rate variability, and sleep of correctional officials and nurses to assess the effect of psychosocial impact of work organization and critical workplace

events on these objective measures.

Role: Co-Investigator. PI: Insoo Kim & Jennifer Garza, University of Connecticut. I contributed to the project with my expertise on sleep and objective field measures. I was actively involved in the overall study design and data collection, development of survey measures, and analysis of survey and objective data.

G.14 Merrimack College Seed Grant

\$18,000 (awarded)

"Perceived knowledge of registered nurses caring for hospitalized underserved patients with opioid use disorder." (2024-2026)

The project will examine nurses' knowledge and attitude, and confidence in educating and documenting OUD-related care to patients in the inpatient settings.

Role: Consultant. PI: Inyene Essien, School of Nursing and Health Sciences, Merrimack College. I contribute to the project with my expertise in developing quantitative and qualitative questions and collecting field surveys with healthcare workers.

G.13 University of Massachusetts Lowell Seed Grant

\$15,000 (awarded)

"Improving optimism, sleep quality, stress, and mental health using a virtual reality-based intervention among undergraduate students: a pilot study" (2023-2025)

This pilot study will examine the effectiveness of a virtual reality-based intervention to improve optimism, sleep quality and mental health among college students.

Role: Co-Principal Investigator. PI: Yun-Ju Lai. I contributed to the project with my expertise on sleep and mental health promotion.

G.12 Faculty Equity Collaborative Mentoring Seed Grant

\$2,000 (awarded)

"A Diverse Asian Faculty Peer Mentoring Group for Quantitative Research Collaboration and Career Advancement" (2023-2024)

This seed grant will connect Asian faculty for a peer mentoring group to promote future career advancement and collaborative grant applications.

Role: Co-Investigator. PI: Hsien-Yuan Hsu, Research and Evaluation in Education, College of Fine Arts, Humanities, and Social Sciences.

G.11 Donahue Center for Business Pilot Research Grant

\$3,000 (awarded)

Using marketing technology to foster healthy sleep habits (2022-2024)

The study will develop a smartphone app to educate college students on healthy sleep habits, dietary choices and exercise using marketing language to improve sleep quality.

Role: Co-Principal Investigator. PI: Ann Kronrod, Department of Marketing Entrepreneurship and Innovation. I contributed to the project with my expertise on sleep education and smartphone app assessment of sleep quantity and quality.

G.10 Donna Manning Pilot Research Grant

\$4,000 (awarded)

Optimism with sleep quality, stress, and mental health among college students returning to classes during the COVID-19 pandemic (2022-2023)

The study will examine the associations of optimism with sleep quality, stress, and mental health and evaluate whether sleep and stress play mediating roles in the associations between optimism and mental health among college students.

Role: Co-Principal Investigator. PI: Yunju Lai. I contributed to the project with my expertise on sleep and mental health assessment and mediating effect analysis.

G.9 University of Massachusetts Lowell Seed Grant

\$10,000 (awarded)

"Investigating the link between sleep alterations and cognitive decline in the elderly using wearable devices" (2021-2023)

This pilot study will examine the associations between sleep and cognitive function among older adults using wearable devices.

Role: Co-Principal Investigator. PI: Joyita Dutta, Department of Electric and Computer Engineering. I contributed to the project with my expertise on sleep and objective field measures. I will be actively involved in the overall study design and data collection and contribute to the analysis and interpretation of sleep and cognition data from wearable devices.

c. Research Grants: Funded as Assistant Professor since 2013 (n=8)

G.8 NIOSH-CPH-NEW Center (2U19 OH008857-11)

\$6.3 million (awarded)

R01 "Safety in Healthcare through Integrated Facilitated Teams (SHIFT)" "Total Worker Health Dissemination and Implementation Hub" (2016-2021)

Project A SHIFT involves evaluating the effectiveness and cost-effectiveness of the Healthy Workplace Participatory Program (HWPP), adapted to joint management-labor teams, and utilizing process evaluation to compare uptake among the three types of public health sector institutions and determine predictors of uptake, fidelity, and effectiveness.

Project C Total Worker Health® Dissemination and Implementation Hub is a communication, education, and dissemination project dedicated to advancing TWH science and practice.

Role: Co-Investigator. PI: Laura Punnett. I contributed to the project with my expertise on shift work and sleep promotion, musculoskeletal health, and workplace participatory interventions linking occupational health and health promotion. I am leading the development and implementation of a continuous education program on ergonomics in healthcare (https://www.uml.edu/Research/CPH-NEW/nurse-education/ergonomics/) and serving as key resources for shift work intervention and sleep promotion for healthcare workers.

G.7 College of Health Sciences Research Grant, University of Massachusetts Lowell

\$8,000 (awarded)

"Using smartwatch to investigate health behaviors of night shift nurses" (2016-2018)

This pilot project proposed to use smartwatch and smartphone app to collect objective measures of eating, exercise, and sleep behaviors of 30-night shift nurses. The detailed behavioral examination will provide us with rich information for the development of effective behavioral interventions for night shift nurses.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

G.6 CPH-NEW Pilot Grant, University of Massachusetts Lowell \$11,000 (awarded)

"Development and implementation of a healthy sleep intervention for correctional supervisors using participatory action research." (2016-2018)

This pilot project proposed to develop and implement healthy sleep training and a smartphone-based sleep tracking app to correctional supervisors. A quasi-experimental study design is used to collect the effectiveness of the intervention on sleep quality, health behaviors and health outcomes of correctional supervisors in 19 Connecticut correctional facilities.

Role: Consultant. PI: Alicia Dugan, University of Connecticut Health Center. I contributed to the project with my expertise on sleep hygiene education and healthy sleep promotion in shift workers. I served as resources and consultation on the content of the healthy sleep training and app development and sleep data analyses.

G.5 Eta Omega Chapter Research Grant, Sigma Theta Tau International \$1,900 (awarded)

"Coping with stress and sleep quality among college nursing students." (2015-2016)

This pilot project proposed to use online surveys to examine the relationships among stress, coping strategies, sleep quality, and mental health among college nursing students.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

G.4 CPH-NEW Pilot Grant, University of Massachusetts Lowell \$11,000 (awarded)

"Assessing the occupational health risks and health behaviors for men in correctional nursing and evaluating the barriers and facilitators for a peer mediation program." (2015-2017)

The research project proposed to use quantitative and qualitative methods to examine gender difference in occupational exposures, health behaviors and outcomes of correctional nurses and examine facilitators and barriers to improve the utilization of EMPOWER as peer mediation program for coworker violence.

Role: Co-Investigator. PI: Mazen El Ghaziri. I contributed to this project with my expertise on occupational health nursing, especially on occupational exposures, health behaviors and outcomes of nurses. I was involved in the research proposal writing, study participants recruitment, data collection and analyses, and reports and manuscripts writing.

G.3 Interprofessional Education Teaching Grant

\$2,000 (awarded)

"Reinvigorating engagement and collaboration through interprofessional education." (2015-2016)

This pilot teaching project proposed to implement an interprofessional education (IPE) activity with nursing and public health students in research methods course to foster engagement, understanding, communication, and collaboration across different disciplines.

Role: Principal Investigator. Co-PI: Joel Tickner, Department of Public Health. Act as the principal and leading personnel on this project.

G.2 University of Massachusetts Lowell Seed Grant

\$9,000 (awarded)

"Investigation of physical workload and sleep quality with objective field measures among rehabilitation professionals." (2014-2016)

This pilot project proposed to use objective field measures to characterize the physical workload, leisure-time physical activity, and sleep quality of rehabilitation employees in nursing homes. PATH observation, Actigraphy sleep and physical activity data, and a short survey were collected with 40 rehabilitation employees at eight nursing homes.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

G.1 NIOSH- CPH-NEW Center (2U19 OH008857)

\$9.5 million (awarded)

R01 "Promoting Physical and Mental Health of Caregivers through Trans-Disciplinary Intervention (Pro-Care)" (2006-2016)

Role: Research Assistant (2007-2012), Post-Doctoral Research Fellow (2013), and Research Affiliate (2013-2016). PI: Laura Punnett. I contributed to the field participatory intervention, conducting formative, process, and outcome evaluations, facilitating focus groups and key informant interviews, collecting onsite surveys, analyzing quantitative and qualitative data, and writing reports and publishing manuscripts.

d. Completed Faculty Start-Up Funded Research (n=4)

2018 University of Massachusetts Lowell Faculty Start-Up Funds

\$1,000

"Musculoskeletal disorders and sleep quality among nursing staff" (2018-2020)

This pilot project collected online surveys with 516 nursing staff at Lowell General Hospital on musculoskeletal pain, sleep quality, and interests in a workplace yoga program for chronic pain management. The project aims at collecting pilot data for the re-submission of the NIH R34 grant on workplace yoga implementation for nurses with chronic low back pain.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

2016 University of Massachusetts Lowell Faculty Start-Up Funds

\$2,000

"Physical activity behaviors among nursing staff" (2016-2018)

This pilot project collected paper surveys with 363 nursing staff at Lowell General Hospital on shift workers' leisure-time physical activity, and facilitators and barriers for engaging in regular physical activity of nursing staff.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

2015 University of Massachusetts Lowell Faculty Start-Up Funds

\$2,000

"Shift work and sleep among hospital nurses" (2015-2017)

This pilot project proposed collected paper surveys with 397 nurses at Lowell General Hospital to examine the associations among shift work, sleep-wake habits, sleep disturbances, and health behaviors and outcomes of hospital nurses.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

2014 University of Massachusetts Lowell Faculty Start-Up Funds

\$1,000

"Centralized work station changing to hybrid work station: Communication and teamwork among nursing staff" (2014-2015)

This pilot project included individual interviews with 20 nursing staff at Lowell General Hospital to examine the impact of work station change from centralized station to pod station on communication and teamwork among nursing staff.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

e. Unfunded Research

2024 University of Massachusetts Lowell Seed Grant

\$15,000

"The DeeperSleeper App: How Can Figurative Language Contribute to the Efficacy of a Mobile App Designed to Help Develop Healthier Sleep Habits" (2024-2026)

This pilot study will examine the effectiveness of a mobile app using figurative language compared to plain language to improve sleep of college students.

Role: Co-Principal Investigator. PI: Ann Kronrod, Department of Marketing Entrepreneurship and Innovation. I contribute to the project with my expertise on sleep education and smartphone app assessment of sleep quantity and quality.

2023 National Science Foundation (NSF)

\$998,070

"Intelligent wearable mental health assessor for frontline healthcare workers" (2023-2026)

The project will leverage wearable technologies, clinical notes analytics, and job-related administrative databases to detect and predict behavioral and physiological biomarkers of stress-related disorders, compassion fatigue, exhaustion, and burnout.

Role: Co-Principal Investigator. Scored but unfunded. PI: Mohammad Arif Ul Alam, Department of Computer Science. I contribute to the project with my expertise on work-related exposure assessment and mental health assessment and promotion.

Department of Justice (DOJ)

\$250,000

"A sleep health and wellness training program to improve the well-being of police officers" (2024-2026)

This project will design, develop, and implement a web-based education and training on sleep

health and wellness to improve sleep, mental health, and well-being of police officers.

Role: Site Principal Investigator. PI: Laura Barger, Brigham Women's Hospital/Harvard Medical School. I contribute to communications with police departments, interviews with police officers, and develop the education and training program.

2023 University of Massachusetts Lowell Seed Grant

\$15,000

"Testing the efficacy of a mobile application designed to improve sleep" (2023-2025)

This pilot study will examine the effectiveness of a mobile app using figurative language compared to plain language to improve sleep of college students.

Role: Co-Principal Investigator. PI: Ann Kronrod, Department of Marketing Entrepreneurship and Innovation. I contribute to the project with my expertise on sleep education and smartphone app assessment of sleep quantity and quality.

2022 R01 National Institute of Aging (NIA)

\$4 million

"Treatment of circadian disruption from shiftwork in older adults" (2023-2028)

This R01 grant will field-test a melatonin intervention and evaluate its feasibility, efficacy, and acceptability in older night shift workers for promoting sleep duration and quality.

Role: Site Principal Investigator. Scored but unfunded. PI: Jeanne Duffy, Brigham Women's Hospital/Harvard Medical School. I contribute to communications with workplaces, recruitment of participants, development of the focus group script, facilitation of focus groups, analyses of quantitative and qualitative data, and report writing and manuscript publications.

2021 ORAU-Directed Research and Development Grant

\$150,000

"Assessing the occupational health risks and health behaviors of prison and jail correctional nurses" (2021-2022)

This grant will use mixed methods design to compare occupational health hazards, explore differences and similarities in safety and health behavior and health outcomes of jail and prison correctional nurses, as well as explore and evaluate techniques to assess correctional nurses implicit bias in provision of care in jail and prison correctional settings.

Role: Co-Investigator. PI: Mazen ElGhaziri. I contribute to this project with my expertise in assessing occupational risks, health behaviors and outcomes of healthcare workers. I will be involved in in the survey and interview script development, data collection and analyses, and manuscript and report writing.

2020 Department of Defense Peer Reviewed Medical Research Program

\$312,987

"A smartwatch platform for sleep and cardiovascular monitoring: A pilot observational study in women veterans and civilians" (2021-2023)

This pilot observational study aims to examine the effect of sleep on cardiovascular risks among women veterans and civilians using wearable devices.

Role: Co-Investigator. PI: Joyita Dutta, Department of Electric and Computer Engineering. I contribute to the project with my expertise on sleep and objective field measures. I will be actively involved in the overall study design and data collection and contribute to the analysis and interpretation of sleep-wake data from wearable devices.

2019 National Institute of Justice

\$1.5 million

"Corrections officer research on stress and fatigue elimination: A multistate evaluation of the effect of shift work and extended hours on corrections officer physical and mental health"

This grant will examine the effect of scheduling and extended work (work schedules, overtime, and secondary employment) on correctional officers' stress and fatigue assessed by subjective measures and objective physiologic markers. The study will recommend guidelines that support healthy scheduling practices within the correctional workforce.

Role: Co-Investigator. Scored but unfunded. PI: Mazen ElGhaziri. I contribute to this project with my expertise in assessing the effect of shift work on stress, fatigue, sleep, and health outcomes of shift workers. I was involved in the grant proposal writing, and will actively participate in the survey development, data collection and analyses, and manuscript and report writing.

2018 R34 National Center for Complementary and Integrative Health

\$687,300

"Workplace yoga implementation to nurses with chronic low back pain"

The study will implement a tailored workplace yoga program to nurses with chronic low back pain through adapting the yoga program, pilot-testing and iteratively refining it, and evaluating the feasibility of the workplace yoga compared to stretch through a 12-wk single-center RCT.

Role: Principal Investigator. Scored but unfunded. Act as the principal and leading personnel on this project.

2018 National Institute of Justice

\$1.5 million

"Corrections officer research on stress and fatigue elimination: A multistate evaluation of the effect of shift work and extended hours on corrections officer physical and mental health"

This grant will examine the effect of scheduling and extended work (work schedules, overtime, and secondary employment) on correctional officers' stress and fatigue assessed by subjective measures and objective physiologic markers. The study will recommend guidelines that support healthy scheduling practices within the correctional workforce.

Role: Co-Investigator. PI: Mazen ElGhaziri. I contribute to this project with my expertise in assessing the effect of shift work on stress, fatigue, sleep, and health outcomes of shift workers. I was involved in the grant proposal writing, and will actively participate in the survey development, data collection and analyses, and manuscript and report writing.

"Workplace yoga for nurses with chronic low back pain"

The study will design a tailored workplace yoga program for nurses with chronic low back pain through qualitative formative evaluation using participatory action research and the social ecological model, pilot-test and refine the program, and evaluate the feasibility of the refined yoga program through a 12-wk randomized waitlist controlled trial.

Role: Principal Investigator. I act as the principal and leading personnel on this project.

2017 R01 National Heart, Lung, and Blood Institute

\$2.1 million

"Implementation and evaluation of an evidence-based sleep strategy for shift workers"

This R01 grant was revised based on reviewers' positive comments and resubmitted in March 2018. The study will field-test a sleep timing intervention and evaluate its feasibility, efficacy, and acceptability in night shift nurses for promoting sleep duration and quality as well as improving on-shift alertness and performance. The intervention has been previously tested in lab simulated night shift workers with promising outcomes.

Role: Site Principal Investigator. PI: Jeanne Duffy, Brigham Women's Hospital/Harvard Medical School. I contribute to communications with the healthcare institutions, on-site recruitment of participants, development of the survey measures and focus group scripts, facilitation of focus groups, analyses of quantitative and qualitative data, and report writing and manuscript publications.

2016 R01 NIA AG044416 Administrative Supplement

\$54,000

"Treatment of circadian disruption from shiftwork in older adults"

This administrative supplement will survey health care workers on their sleep habits, factors contributing to the choice of sleep timing and duration, and their acceptability to the intervention that was tested effective in the parent R01. We will examine whether there are racial/ethnic disparities that impact sleep behaviors and practices when working night shifts.

Role: Site Principal Investigator. PI: Jeanne Duffy, Brigham Women's Hospital/Harvard Medical School. I contribute to the design and administration of surveys at nursing homes, and provide expertise on survey analysis and manuscript and report writing.

2016 American Sleep Medicine Foundation Focused Projects Award

\$20,000

"mHealth intervention for sleep promotion of night shift nurses: A feasibility trial"

This project proposes to develop a smartphone app intervention to promote sleep quality of night shift nurses. RCT is used to collect feasibility, process evaluation, and initial efficacy of the intervention on sleep quality of 30-night shift nurses.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

2016 American Nurse Foundation Grant

\$10,000

"An online education and smartphone app intervention for sleep and mental health

promotion among female nursing students: A feasibility trial"

This project proposes to develop a 2-hour online education and a smartphone app intervention to promote sleep quality and mental health of female nursing students. RCT is used to collect feasibility and efficacy of the intervention on sleep and mental health of 40 nursing students.

Role: Principal Investigator. Act as the principal and leading personnel on this project.

2015 American Nurse Foundation Grant

\$5,000

"Understanding role stressors across the novice to expert nurse practitioner continuum."

This project proposes to describe personal and job-related stressors in the role transition of newly practicing nurse practitioners and identify individual and organizational factors that contribute to their job stress, work-life balance, and job satisfaction.

Role: Co-Investigator. PI: Anya Peters. I contribute to the proposal writing, including specific aims, research methods, and interview questions.

2. Academic and Professional Publications

*Denotes Data-Based Manuscripts (n=41)

Average Impact Factor for Nursing Journals = 1.0-3.0

a. Referred Manuscript Publications (Total n=45)

Manuscripts Published as Associate Professor since 2019 (n=21)

2024

*Essien, Y. (PhD student), Zhang, Y., Koren, A., Palacios, N., Louis, F., & Tucker, K. The mediating effect of depression on the relationship between perceived discrimination and persistent prescription opioid use in Puerto Rican adults. *Journal of Addictions Nursing*. Advanced Online Publication. (Impact Factor 0.6) (cited by)

This study reported the mediating effect of depression in the association between discrimination and persistent prescription opioid use in Boston Puerton Rican adults.

J.44* Lai, Y-J., Tsai, E-Y., Jarustanaput, P. (PhD student), Wu, Y-S., Chen, Y-H., O'Leary, S.E., Manachevakul, S. (PhD student), Zhang., Y., Shen, J., & Wang, Y. Optimism and mental health in college students: The mediating role of sleep quality and stress. *Frontiers in Psychology*. 15, 1403146. doi:10.3389/fpsyg.2024.1403146. (Impact Factor 2.6) (cited by)

This study reported the mediating effect of sleep quality and stress in the association between optimism and depression/anxiety among college students.

J.43* Nobrega, S. (PhD student), Zhang, Y., Hendrickson-Lohmeier, J., & Cavallari, J. (2024).
Development and psychometric evaluation of the Total Worker Health skill scale. <u>Annals of Work Exposures and Health</u>. 68(5), 466-475. doi: 10.1093/annweh/wxae030 (Impact Factor 2.6) (cited by)

This study developed and evaluated the psychometric characteristics including reliability and validity

of a Total Worker Health Skill Scale.

J.42* Siddique, S. (PhD student), Gore, R., Zhang, Y., Punnett, L., & SHIFT Research Team.
(2024). Emotional exhaustion in healthcare workers: Moving beyond coping skills to improve organizational conditions. <u>Journal of Occupational and Environmental Medicine</u>. Advanced Online Publication. doi:10.1097/JOM.0000000000003063 (Impact Factor 3.2) (cited by)

This cross-sectional study reported that job hazards mediated and moderated the association between organizational safety and emotional exhaustion.

J.41* Barger, L., **Zhang, Y.,** Lammers-van der Holst, H., Snoep, D., Murphy, A., Desnoyers, B., & Duffy, J. (2024). Feasibility, effectiveness and acceptability of an afternoon-evening sleep schedule in older nightshift workers. <u>SLEEP Advances</u>, 5(1), zpae010. doi:10.1093/sleepadvances/zpae010 (Impact Factor 0.4) (cited by)

This mixed methods study reported that participants assigned to the 8-hr self-selected and 8-hr afternoon-evening groups has significantly increased time-in-bed than the baseline and the control group. Focus group discussions indicated that although feasible, it was not acceptable by participants to spend 8-hr in bed due to family and other ADLs.

Nobrega, S. (PhD student), & **Zhang, Y.** (2024). Let's learn together! A mixed methods study to assess readiness for interprofessional education on Total Worker Health practice. <u>Workplace Health & Safety: The Official Journal of the American Association of Occupational Health Nursing.</u> Advanced Online Publication. doi:10.1177/21650799231217320 (Impact Factor 2.6) (cited by)

This mixed methods study reported occupational safety and health professionals' readiness for interprofessional education on Total Worker Health practice through survey and focus groups.

2023

J.39* Lammers-van der Holst, H.M., Quadri, S., Murphy, A., Ronda, J., Zhang, Y., Barger, L., & Duffy, J. (2023). Evaluation of sleep strategies between night shifts in actual shift workers.
<u>Sleep Health: Journal of the National Sleep Foundation.</u> doi:10.1015/j.sleh.2023.08.025
(Impact Factor 4.45) (cited by)

This paper reported significant differences between morning, delayed, split-sleep or mixed sleepers in the timing of sleep, subjective sleep quality, and regularity of sleep between consecutive night shifts, whereas sleep duration and subjective soundness of sleep did not show differences.

Zhang, Y., Murphy, J. (Immerse scholar), Lammers-van der Holst, H.M., Barger, L., Lai, Y-J., & Duffy, J. (2023). Interventions to improve sleep of nurses: A systematic review.

*Research in Nursing and Health, 46(5), 462-484. doi:10.1002/nur.22337 (Impact Factor 2.24) (cited by)

This systematic review paper summarized findizm930604ngs from 38 previous experimental and quasi-experimental studies on interventions used to improve sleep outcomes of nurses, including aroma therapy, dietary supplements, cognitive behavioral therapy, light therapy, mind-body therapy, sleep education, exercise, napping, shift schedule modification, and multicomponent intervention.

J.37* Essien, Y. (PhD student), Zhang, Y., Koren, A., Palacios, N., Louis, F., & Tucker, K. (2023). Sociocultural factors associated with persistent prescription opioid use among Puerto Rican adults in Massachusetts. *PLOS One*, *18*(8), e0290104. doi:10.1371/journal.pone.0290104 (Impact Factor 3.75) (cited by)

This paper reported significant associations between perceived discrimination and persistent prescription opioid use among 798 Puerto Ricans living in MA.

J.36 Fallon, P. (PhD student), Jaeger, L., **Zhang, Y.,** Dugan, A., Cherniack, M., & ElGhaziri, M. (2023). Peer support programs to reduce work-related organizational stress and trauma for public safety workers and military: A scoping review. *Workplace Health & Safety: The Official Journal of the American Association of Occupational Health Nursing, 71(11), 523-535.* doi:10.1177/21650799231194623 (Impact Factor 2.6) (Received the Golden Pen Award for Professional Practice by AAOHN) (cited by)

This review paper summarized findings from 13 previous studies on the use of peer support program for public safety workers to reduce organizational stress and trauma.

Zhang, Y., Dugan, A., ElGhaziri, M., **Siddique, S. (PhD student)**, & Punnett, L. (2023). Work-family conflict and depression among healthcare workers: The role of sleep and decision latitude. *Workplace Health and Safety: The Official Journal of the American Association of Occupational Health Nursing, 71(4), 195-205. doi:10.1177/21650799221139998 (Impact Factor 2.6) (cited by)*

This paper reported that sleep disturbances served as a mediator while decision latitude served as a moderator in the association between work-family conflict and depression among healthcare workers.

2022

J.34* Zhang, Y., ElGhaziri, M., & de Castillero, E. (2022). Synergistic effect of self-efficacy and social support on regular participation in leisure-time physical activity among nursing staff.
<u>International Journal of Nursing Practice</u>, e13087. doi:10.1111/ijn.13087 (Impact Factor 2.23) (cited by)

This paper used mixed methods research to report that self-efficacy and social support has a synergistic effect on nursing staff's regular participation in leisure-time physical activity. Qualitative data suggested that work-out areas in the workplace with release time and organized activity may promote regular leisure-time physical activity of nursing staff.

J.33* Dugan, A.G., Decker, R.E., Zhang, Y., Lombardi, C.M.,...Cavallari, J. (2022). Precarious work schedules and sleep: A study of unionized full-time workers. <u>Occupational Health Science</u>, 6(2), 247-277. doi:10.1007/s41542-022-00114-y (Impact Factor 3.1) (cited by)

This paper reported that precarious work schedules had indirect effects on fatigue and depressive symptoms through sleep quantity. Schedule flexibility moderated the relation between precarious work schedules and sleep quantity. Sleep quality moderated the association between sleep quantity and fatigue and depressive symptoms.

- J.32* Burns-Mullett, C. (DNP student), & Zhang, Y. (Corresponding author) (2021).

 STOP-Bang screening for obstructive sleep apnea and referring for further evaluation in preoperative patients: A quality improvement project. <u>Journal of PeriAnesthesia Nursing</u>, 37(5), 601-606. doi: 10.1016/j.jopan.2021.11.001 (Impact Factor 1.7) (cited by)
 - This paper reported that 46.9% of the 32 preoperative patients had a further consultation with PCP about OSA risks after implementing STOP-Bang screening at an ambulatory surgery center.
- J.31* Zhang, Y., ElGhaziri, M., Siddique, S. (PhD student), Gore, R., Kurowski, A., Nobrega, S., & Punnett, L. (2021). Emotional labor and depressive symptoms among healthcare workers: The role of sleep. Workplace Health and Safety: The Official Journal of the American Association of Occupational Health Nursing, 69(8), 383-393. doi:10.1177/21650799211014768. (Impact Factor 2.6) (cited by)

This paper reported that sleep disturbances significantly mediated the association between surface-acting emotional labor and depressive symptoms among healthcare workers.

2020

- J.30 Punnett, L., Nobrega, S., Zhang, Y., Rice, S., Gore, R., Kurowski, A., & SHIFT Research Team. (2020). Safety and Health through Integrated, Facilitated Teams (SHIFT):
 Stepped-wedge protocol for prospective, controlled evaluation using mixed methods. <u>BMC Public Health</u>, 20(1), 1463. doi:10.1186/s12889-020-09551-2 (Impact Factor 4.55) (cited by)
 - This paper reported the stepped-wedge protocol for prospective, mixed-methods evaluation of the Healthy Workplace Participatory Program in the CPHNEW safety and health through integrated facilitated teams (SHIFT) project.
- **Zhang, Y.,** ElGhaziri, M., Nasuti, S., & Duffy, J. (2020). The comorbidity of musculoskeletal disorders and depression: Associations with working conditions among hospital nurses.

 <u>Workplace Health and Safety: The Official Journal of the American Association of Occupational Health Nursing,</u> 68(7), 346-354. doi:10.1177/2165079919897285 (Impact Factor 2.6) (cited by)

This paper reported that work-family conflict and 8-hr night shift or 12-hr day shift were associated with the comorbidity of musculoskeletal disorders and depression among hospital nurses.

J.28* Park. M., Zhang, Y., Price, L.L., Bannuru, R.R., & Wang, C. (2020). Mindfulness is associated with sleep quality among patients with fibromyalgia. <u>International Journal of Rheumatic Diseases</u>, 23(3), 294-301. doi:10.1111/1756-185X.13756 (Impact Factor 2.56) (cited by)

This paper reported that higher mindfulness was associated with better sleep quality, less sleep disturbance, less pain interference, anxiety and depression in patients with fibromyalgia. Pain interference, depression, and anxiety mediated the association between mindfulness and sleep quality and disturbances.

2019

J.27* Peters, A., Kellogg, M., & Zhang, Y. (2019). Implementation of a smartphone app to measure

and manage anxiety in undergraduate clinical nursing students. <u>Nursing Education</u>
<u>Perspectives: Official Journal of the National League for Nursing, 40(6), 367-369</u>. (Impact Factor 1.0) (cited by)

This paper reported quantitative and qualitative findings from 11 clinical nursing students for using a smartphone app to measure and manage anxiety.

J.26* Kotejoshyer, R. (PhD student), Zhang, Y., Flum, M., Fleishman, J. M., Punnett, L., & ProCare Research Team. (2019). Prospective evaluation of fidelity, impact and sustainability of participatory workplace health. *International Journal of Environmental Research and Public Health*, 16(9), E1494. doi: 10.3390/ijerph16091494 (Impact Factor 4.61) (cited by)

This paper reported the process fidelity, program impact, and medium-term sustainability of a workplace participatory program integrating occupational safety and health with health promotion through mix-method research at three intervention and three control sites.

J.25* ElGhaziri, M., Dugan, A., **Zhang, Y.,** & Castro, M.E. (2019). Sex and gender role differences in occupational exposures and work outcomes among registered nurses in correctional settings. <u>Annals of Work Exposures and Health,</u> 63(9), 568-582. doi:10.1093/annweh/wxz018 (Impact Factor 2.6) (cited by)

This paper reported the sex and gender role differences in occupational exposures and work outcomes among 95 correctional nurses in a northeast state of US.

Manuscripts Published as Assistant Professor since 2013 (n=20)

2019

Zhang, Y., ElGhaziri, M., Dugan, A., & Castro, M. (2019). Work and health correlates of sleep quantity and quality among correctional nurses. *Journal of Forensic Nursing*, 15(1), 42-51. doi:10.1097/JFN.000000000000229 (Impact Factor 1.0) (cited by)

This paper reported an online survey with 89 correctional nurses in a northeast state of US about the work and health factors correlated with their sleep quantity and quality.

2018

J.23* Powell-Cope, G., Rugs, D., lalynytchev, A., Devine, D., McCoskey, K., Zhang, Y., & Deter, L. (2018). Patient handling and mobility course content: A national survey of nursing programs.
 The American Journal of Nursing, 118(11), 22-31. (Impact Factor 2.7) (AJN Featured Article and 1.5 Continuing Education Credits Offering) (cited by)

This paper reported an online survey with faculty from 228 baccalaureate and associate degree nursing programs in the U.S. about nursing curriculum coverage for patient handling and mobility content.

Zhang, Y., Peters, A., & **Bradstreet, J (Immerse scholar).** (2018). Relationships among sleep quality, coping styles, and depressive symptoms among college nursing students: A multiple mediator model. *Journal of Professional Nursing: Official Journal of the American*<u>Association of Colleges of Nursing, 34(4), 320-325.</u> doi:10.1016/j.profnurs.2017.12.004
(Impact Factor 2.5) (cited by)

This paper reported that association between sleep quality and depressive symptoms was attenuated by coping, especially emotional disengagement coping, through analysis with 242 nursing students.

J.21* Zhang, Y., & Tickner, J. (2018). Reinvigorating engagement and collaboration through interprofessional education (RECIPE) in nursing and public health students. <u>Journal of Nursing Education and Practice</u>, 8(12), 15-20. (Impact Factor 0.3) (cited by)

This paper reported the evaluation of an interprofessional education (IPE) activity implemented with nursing and public health undergraduates in fall 2015.

Zhang, Y., Peters, A., & Chen, G. (2018). Perceived stress mediates the association between sleep quality and mental disorders among college nursing students. *International Journal of Nursing Education Scholarship*, 15(1). doi:10.1515/ijnes-2017-0020 (Impact Factor 1.0) (cited by)

This paper reported that perceived stress mediated the association between sleep quality and mental disorders among 242 college nursing students participating in a cross-sectional survey.

Zhang, Y., Duffy, J., de Castillero, E., & Wang, K. (2018). Chronotype, sleep characteristics, and musculoskeletal disorders among hospital nurses. <u>Workplace Health and Safety: The Official Journal of the American Association of Occupational Health Nursing</u>, 66(1), 8-15. doi:10.1177/2165079917704671 (Impact Factor 2.6) (cited by)

This paper reported that evening type, prolonged sleep onset latency, and using sleep-promoting substances were associated with increased risk of MSDs among nurses.

2017

Zhang, Y., Punnett, L., & Rebecca, G. (2017). Predictors of nursing staff voluntary termination in nursing homes: A case-control study. <u>Journal of Applied Gerontology: The Official Journal of the Southern Gerontological Society</u>, 38(11), 1518-1536. doi:10.1177/0733464817724043 (Impact Factor 3.0) (cited by)

This paper reported that evening shift work and shift length>8hrs contributed to nursing staff voluntary termination through using a case-control study design with nursing staff in 18 nursing homes.

Zhang, Y., Chernaik, M., & **Hallet, K (Immerse scholar).** (2017). Relationship issues among college nursing students: Associations with stress, coping, sleep and mental disorders.

<u>Teaching and Learning in Nursing,</u> 12(4), 246-252. doi:10.1016/j.teln.2017.06.005 (Impact Factor 1.9) (cited by)

This paper reported that nursing students were facing various kinds of relationship issues, which were significantly associated with perceived stress, coping, poor sleep quality, and anxiety and depression.

Zhang, Y., Duffy, J., & de Castillero, E. (2017). Do sleep disturbances mediate the association between work-family conflict and depression among nurses? A cross-sectional study. <u>Journal of Psychiatric and Mental Health Nursing</u>, 24(8), 620-628. doi:10.1111/jpm.12409 (Impact Factor 2.7) (cited by)

This paper reported that sleep disturbances significantly mediated the association between work-family

conflict and depressive symptoms among nurses.

Zhang, Y., Punnett, L., & Nannini, A. (2017). Work-family conflict, sleep, and mental health of nursing assistants working in nursing homes. <u>Workplace Health and Safety: The Official Journal of the American Association of Occupational Health Nursing</u>, 65(7), 295-303. doi:10.1177/2165079916665397 (Impact Factor 2.6) (cited by)

This paper reported that work-family conflict was associated with nursing assistants' mental health, and poor sleep quality mediated the association between work-family conflict and mental health.

Zhang, Y., Cifuentes, M., Gao, X., **Amaral, G. (Immerse scholar),** & Tucker, K. (2017). Age- and gender-specific associations between insomnia and falls in Boston Puerto Rican adults. *Quality of Life Research*, 26(1), 25-34. doi:10.1007/s11136-016-1374-7 (Impact Factor 3.5) (cited by)

This paper reported that adults with insomnia had a 32% increased likelihood of having falls. Insomnia was significantly associated with higher risk of falls in adults of 60 y or older, and in women.

2016

J.13* Zhang, Y., Punnett, L., Mawn, B., & Gore, R. (2016). Working conditions and mental health of nursing staff in nursing homes. *Issues in Mental Health Nursing*, *37*(7): 485-492. doi:10.3109/01612840.2016.1162884 (Impact Factor 2.1) (cited by)

This paper reported that mental health was associated with different working conditions in different nursing groups, including nursing assistants, licensed practical nurses, and registered nurses.

Zhang, Y., Flum, M., **Kotejoshyer, R. (PhD student),** Fleishman, J. M., Henning, R., & Punnett, L. (2016). Workplace participatory occupational health/health promotion program: Facilitators and barriers observed in three nursing homes. *Journal of Gerontological Nursing*, 42(6), 34-42. doi:10.3928/00989134-20160308-03 (Impact Factor 1.3) (cited by)

Using the Social Ecological Model, this paper reported facilitators and barriers for a participatory occupational health/health promotion program in three nursing homes through qualitative evaluations.

J.11* Xu, D., Chen, L., Wan, X., Zhang, Y., Liu, N., & Wang, K. (2016). Toileting behavior and related health beliefs among Chinese female nurses. *International Journal of Clinical Practice*, 70(5), 416-423. doi:10.1111/ijcp.12798 (Impact Factor 2.6) (cited by)

Using the Health Belief Model, this paper found that the perceived barriers of healthy toileting behaviors and self-efficacy predicted healthy toileting behaviors; while perceived severity of lower urinary track symptoms predicted unhealthier toileting behaviors.

Zhang, Y., Punnett, L., PhillipsMcEnany, G., & Gore, R. (2016). Contributing influences of work environment on sleep quantity and quality of nursing assistants in long-term care facilities. *Geriatric Nursing*, 37(1), 13-18. doi:10.1016/j.gerinurse.2015.08.010 (Impact Factor 2.7) (cited by)

This paper reported that nursing assistants' sleep quantity and quality were closely associated with the beneficial work features in the long-term care environment.

2015

Zhang, Y., Soroken, L. (PhD student), Laccetti, M., de Castillero, E., & Konadu, A. (2015). Centralized to hybrid nurse station: communication and teamwork among nursing staff. *Journal of Nursing Education and Practice*, 5(12), 34-41. doi:10.5430/jnep.v5n12p34 (Impact Factor 0.3) (cited by)

This qualitative study reported although nursing staff experienced the challenge of isolation, they consistently identified patient-centered interactions and learning to work as a team at the hybrid station.

Zhang, Y., Flum, M., West, C., & Punnett, L. (2015). Assessing organizational readiness for a participatory occupational health/health promotion intervention in skilled nursing facilities.

<u>Health Promotion Practice</u>, 16(5), 724-732. doi:10.1177/1524839915573945 (Impact Factor 1.9) (cited by)

This paper qualitatively assessed readiness of five skilled nursing facilities for a participatory occupational health/health promotion intervention.

2014

J.7* Zhang, Y., Punnett, L., Gore, R., & The CPHNEW Research Team. (2014). Relationships among employees' working conditions, mental health and intention to leave in nursing homes. <u>Journal of Applied Gerontology: The Official Journal of the Southern Gerontological Society,</u> 33(1), 6-23. doi:10.1177/0733464812443085 (Impact Factor 3.0) (cited by)

This paper reported that clinical caregivers' intention to leave was reduced greatly when they get along with supervisors and coworkers, feel respect at work, and have more decision-making opportunities.

2013

Raman, G., Zhang, Y., Minichiello, V.J., D'Ambrosio, C., & Wang, C. (2013). Tai Chi improves sleep quality in healthy adults and patients with chronic conditions: A systematic review and meta-analysis. *Journal of Sleep Disorders & Therapy*, 2, 141. doi:10.4172/2167-0277.1000141 (Impact Factor 2.9) (cited by)

This meta-analysis reported that Tai Chi improved sleep quality in both healthy adults and patients with chronic health conditions.

J.5* Holmberg, M.D. (MS student), Flum, M., West, C., Zhang, Y., Qamili, S., & Punnett, L. (2013). Nursing assistants' dilemma: Caregiver vs. caretaker. <u>Hospital Topics</u>, 91, 1-8. doi:10.1080/00185868.2013.757953 (Impact Factor 1.62) (cited by)

This paper qualitatively assessed nursing assistants' opinions on the extent to which the work environment supported or impeded their care-giving to residents.

Manuscripts Published Prior to Appointment at the University (n=4)

2011

J.4* Zhang, Y., Flum, M., Nobrega, S., Blais, L., Qamili, S., & Punnett, L. (2011). Work organization and health issues in long-term care centers: Comparison of perceptions between

caregivers and management. *Journal of Gerontological Nursing*, *37*(5), 32-40. doi:10.3928/00989134-20110106-01 (Impact Factor 1.3) *(cited by)*

This qualitative study explored common and divergent perceptions of caregivers and managers concerning occupational safety, work organization, and psychosocial concerns at nursing homes.

J.3 Zhang, L., & Zhang, Y. (2011). A novel region merge algorithm based on neutrosophic logic. <u>International Journal of Digital Content Technology and its Applications</u>, 5(7), 381-387. doi:10.4156/jdcta.vol5.issue7.47 (cited by)

This study compared the breast cancer image processing with a new fuzzy based method.

2006

J.2* Zhang, Y., & Wang, K.F. (2006). The application of self-efficacy theory in the health education of patients with diabetes. *Chinese Journal of Practical Nursing, 10*, 73-74. (In Chinese) *(cited by)*

This paper is a literature review and summary about the application of self-efficacy theory in the health education with diabetic patients. The paper was published in Chinese.

J.1* Zhang, Y., & Wang, K.F. (2006). The anxiety of patients with breast cancer in different stages of hospitalization and Nursing countermeasures. *Nursing Journal of Chinese People's Liberation Army*, 2, 30-31. (In Chinese) *(cited by)*

This paper is a cross-sectional study to compare breast cancer patients' anxiety pre- and post-operation.

Manuscripts in Review

- 1. *Zhang, Y., Murphy, A.S., Lammers-van der Holst, H.M., Barger, L.K., & Duffy, J.F. Night shift work and sleep experiences in older night shift nurses. *Western Journal of Nursing Research*. (in review)
- 2. Nobrega, S. (PhD student), Zhang, Y., & & Cavallari, J. Assessment of Total Worker Health learning needs among multidisciplinary occupational safety and health professionals: A survey study to guide continuing education. *Journal of Occupational and Environmental Medicine*. (in review)
- **3.** Van der Rhee, M. (MS student), Lammers-van der Holst, H.M., Zhang, Y., Barger, L.K., Wise, J.C., Murphy, A.S., & Duffy, J.F. Limited time for sleep in night shiftworkers is more frequent in women, older workers, and those with more shiftwork experience. <u>Journal of Occupational and Environmental Medicine</u>. (in review)
- **4.** *Siddique, S. (PhD student), Gore, R., Zhang, Y., & Punnett, L. Emotional exhaustion in healthcare workers: Moving beyond coping skills to improve organizational conditions. *American Journal of Public Health*. (in review)
- **5.** *Siddique, S. (PhD student), Gore, R., Zhang, Y., Punnett, L., & SHIFT Research Team. Surface-acting emotional labor, emotional exhaustion and depression in healthcare workers. *Scandinavian Journal of Work, Environment and Health.* (in review)

6. *Parker, T. (PhD student), ElGhaziri, M., Zhang, Y., Barnes-Farrell, J., Gossett, E., Shishivan, H.H., Henning, R., Garza, J., Kim, I., & Cherniack, M. Real-time reporting and the impact of workplace violence and incivility in the nursing population assessed using experience sampling methods (ESM). *Workplace Health & Safety*. (in review)

b. Referred Conference Paper Publications (n=1)

*Ding, X. (PhD student), Xu, J., Wang, H., Chen, G, Thind, H., & Zhang, Y. (2016). WalkMore: Promoting walking with just-in-time context-aware prompts. IEEE Annual Wireless Health Conference, October 25-27, National Institute of Health, Bethesda, MD, US.

c. Published Journal-indexed Abstracts (n=13)

- ***Zhang, Y.,** Lammers-van der Holst, H.M., Barger, L.K.,...Duffy, J.F. (2023). Individual differences of sleep pattern and duration between two consecutive night shifts among night workers. *Sleep*, 45 (Suppl. 1), A111. doi:10.1093/sleep/zsad077.0249 (Impact Factor 5.6)
- **A.12** *Zhang, Y., Murphy, A. (Immerse scholar), Lammers, H., Barger, L., Swaminathan, N., Granfield, C., Palacios, A.A., & Duffy, J. (2022). Sleep patterns and experiences in older night shift nurses. <u>Sleep.</u> 45 (Suppl. 1), A151. doi:10.1093/sleep/zsac079.333 (Impact Factor 5.6)
- **A.11** *Zhang, Y., ElGhaziri, M., Siddique, S. (PhD student), Gore, R., Kurowski, A., Nobrega, S., & Punnett, L. (2021). Sleep disturbances mediate the association between emotional labor and depressive symptoms among healthcare workers. <u>Sleep.</u> 44 (Suppl. 2), A292-293. doi:10.1093/sleep/zsab072.747 (Impact Factor 5.6)
- **A.10** *Lammers-van der Holst, H.M., **Zhang, Y.,** Barger, L.K.,...Duffy, J.F. (2021). Limited time for sleep in night shift workers is associated with risk of insomnia and shift work disorder. <u>Sleep.</u> 44 (Suppl. 2), A119-120. doi:10.1093/sleep/zsab072.298 (Impact Factor 5.6)
- ***Zhang, Y.,** Thind, H., Kim, S., **Nunes, R. (Immerse scholar), Reidy, J. (Immerse scholar),** Punnett, L., & Duffy, J.F. (2020). Associations of low back pain and sleep among nursing staff. *Sleep, 43 (Suppl. 1)*, A389. doi: 10.1093/sleep/zsaa056.1020 (Impact Factor 5.6)
- ***Zhang, Y.,** Thind, H., Kim, S., **Soup, A.** (**Immerse scholar**), Punnett, L., & Duffy, J.F. (2020). Workplace yoga program features and associations with shift work and sleep among nursing staff. <u>Sleep</u>, 43 (Suppl. 1), A296. doi:10.1093/sleep/zsaa056.774 (Impact Factor 5.6)
- **A.7** *Lammers-van der Holst, H.M., **Zhang, Y.,** Barger, L.K.,...Duffy, J.F. (2020). Sex differences in sleep and quality of life in healthcare shift workers. *Sleep.* 43 (Suppl. 1), A146-147. doi:10.1093/sleep/zsaa056.379 (Impact Factor 5.6)
- ***Zhang, Y., Kotejoshyer, R. (PhD student),** Punnett, L., & Buchholz, B. (2018). Physical workload, leisure-time physical activity, musculoskeletal disorders, and sleep quality among rehabilitation employees. <u>Sleep.</u> 41 (suppl. 1), A341. doi:10.1093/sleep/zsy061.917 (Impact Factor 5.6)
- ***Zhang, Y.,** Duffy, J., & de Castillero, E. (2017). Relationships of musculoskeletal disorders, sleep disturbances, and depression among hospital nurses. <u>Sleep.</u> 40 (suppl. 1), A410. doi:10.1093/sleepj/zsx050.1098 (Impact Factor 5.6)

- ***Zhang, Y.,** Duffy, J., de Castillero, E.R., & Wang, K. (2016). Chronotype, sleep characteristics, and musculoskeletal disorders among hospital nurses. *Journal of Sleep and Sleep Disorders Research*, 39, A263. (Impact Factor 1.0)
- ***Zhang, Y.,** Cifuentes, M., Gao, X., **Amaral, G. (Immerse scholar),** & Tucker, K. (2016). Age-and gender-specific associations between insomnia and falls in older Puerto Ricans. *Journal of Sleep and Sleep Disorders Research*, 39, A356. (Impact Factor 1.0)
- *Raman, G., **Zhang, Y.,** Minichiello, V., D'Ambrosio, C., & Wang, C. (2014). Tai Chi and sleep quality in adults: A systematic review and meta-analysis. *Journal of Alternative and Complementary Medicine*, 20(5), A66. doi:10.1089/acm.2014.5173. abstract. PMID: 24805674 (Impact Factor 2.38)
- *Zhang, Y., Price, L., Morgan, N., Morgan, L., & Wang, C. (2014). Mindfulness is associated with sleep quality among patients with fibromyalgia. *Arthritis & Rheumatology*, 66(S10), S1116. doi:10.1002/art.38914. abstract. (Impact Factor 13.3)

d. Other Publications

- 2018-2021 Led the development and dissemination of a 5-CEU "Ergonomics in Healthcare: A Continuous Education Program for Nurses, Nursing Assistants and Healthcare Managers" https://www.uml.edu/research/cph-new/education-training/ergonomics/ Over 1500 nurses, nursing assistants, nursing students, and other healthcare workers have completed the program.
- *Zhang, Y. (2013). Sleep duration and health outcomes of formal caregivers in skilled nursing facilities: The contribution of the work environment. Doctoral Dissertation, University of Massachusetts Lowell, Lowell, MA.
- *Zhang, Y. (2011). Working conditions, employee mental health, and intention to leave the job. CPH News Views. 2011 May; (21): 1-2. Retrieved from http://www.uml.edu/docs/News%20and%20Views%20Issue21_tcm18-40725.pdf
- *Zhang, Y. (2009). How does sleep quality impact safety and health, especially among shift workers, and what can be done to help? CPH News Views. 2009 Sep; (12): 1-2. Retrieved from http://www.uml.edu/docs/CPH%20News%20and%20Views%20Issue%2012 tcm18-40734.p

3. Professional Conference/Symposium Presentations (n=116)

a. Referred National/International Presentations as Tenured Associate Professor since 2019 (n=33)

- **C.70** "Sleep behaviors are associated with perceived quality of care among healthcare workers" by **Zhang, Y.,** Kurowski, A., Nobrega, S., ElGhaziri, M., Gore, R., & Punnett, L. at <u>2025 AAOHN</u>, Pittsburg, PA, March 31-April 2, 2025. (submitted)
- C.69 "Optimism and mental health in college students: The mediating role of sleep quality and stress" by Lai, Y-J., Tsai, E-Y., Jarustanaput, P., **Zhang, Y.,** & Zaidi, M. at the 2024 Council for the Advancement of Nursing Science Conference, Washington, DC, June 13-15, 2024. (podium)
- C.68 "Competencies for leading integrative Total Worker Health practices: Perspectives from occupational safety and health professionals" by **Nobrega, S. (PhD student)**, Morocho, C., **Zhang,**

- **Y. at** the 2024 European Academy of Occupational Health Psychology, Granada, Spain, June 5-7, 2024. (poster)
- C.67 "Let's learn together! Attitudes of occupational safety and health professionals about the use of interprofessional education pedagogies in continuing education" by Nobrega, S. (PhD student),
 Zhang, Y. at 2024 International Congress for Occupational Health, Marrakesh, Morocco, April 28-May 3, 2024. (podium)
- **C.66** "Facilitators and barriers for the availability, use and helpfulness of PSP programs to address correctional officers stress and trauma in prison and jail settings: Findings from a National Survey" by **Fallon, P. (PhD student)**, El Ghaziri, M., Jaegers, L. A., **Zhang, Y.**, Dugan, A., Cherniack, M. at the 2023 Work, Stress and Health Conference, Miami, FL, November 8-11, 2023. (poster)
- C.65 "Total Worker Health® Competency Among Multidisciplinary Occupational Safety and Health Professionals: A Survey Study to Guide Continuing Education" by Nobrega, S. (PhD student), Morocho, C., Zhang, Y., & Cavallari, J. at the 2023 Work, Stress and Health Conference, Miami, FL, November 8-11, 2023. (podium)
- C.64 "A Qualitative Investigation of Competencies Needed for *Total Worker Health* Practice" by **Nobrega, S. (PhD student)**, Morocho, C., **Zhang, Y.,** & Cavallari, J. at the 2023 Work, Stress and Health Conference, Miami, FL, November 8-11, 2023. (poster)
- C.63 "The Mediating Effect of Depression on the Relation Between Perceived Discrimination and Persistent Prescription Opioid Use Among Puerto Rican Adults" by Essien-Aleksi, E. I. (PhD student), Koren, A., Palacios, N., Tucker, K. T., & Zhang, Y. at the American Public Health Organization PHN Research Committee Virtual Conference, June 6, 2023. (lightning talk).
- C.62 "Individual differences of sleep pattern and duration between two consecutive night shifts among night workers" by **Zhang, Y.,** Lammers-van der Holst, H.M., Barger, L.K.,...Duffy, J.F. at <u>SLEEP 2023</u>, Indiannapolis, IN, June 3-7, 2023. (poster)
- C.61 "Daily associations between work and sleep among intensive care nurses" by Zhang, Y., El-Ghaziri, M., Parker, T. (PhD student), Barnes-Farrell, J., Gossett, E., Shishivan, H.H., Henning, R., Garza, J., Kim, I., & Cherniack, M. at the 2022 APHA Conference, Boston, November 6-9, 2022. (poster)
- C.60 "Interventions to improve sleep of shift working nurses: A systematic review" by **Zhang**, **Y.**, **Murphy**, **J.** (**Immerse scholar**), Lammers, H., Barger, L., & Duffy, J. at the 2022 APHA Conference, Boston, November 6-9, 2022. (poster)
- C.59 "Work and health behavior correlates of weight gain among formal caregivers in nursing homes" by **Zhang, Y., Nabi, M. (MS student),** & Punnett, L. at the 2022 APHA Conference, Boston, November 6-9, 2022. (poster)
- C.58 "Real-time workplace violence incidents and stress reporting among intensive care registered nurses" by El-Ghaziri, M., **Zhang, Y., Parker, T. (PhD student)**, Barnes-Farrell, J., Gossett, E., Shishivan, H.H., Henning, R., Garza, J., Kim, I., & Cherniack, M. at the 2022 APHA Conference, Boston, November 6-9, 2022. (podium)
- C.57 "Sociocultural factors associated with persistent prescription opioid use among Puerto Rican adults in Massachusetts" by **Essien, I. (PhD student)**, **Zhang, Y.,** Koren, A., Palacios, N., & Tucker, K. at the 2022 APHA Conference, Boston, November 6-9, 2022. (poster)

- C.56 "Peer support for frontline correction officers: Results from a national survey" by Fallon, P. (PhD student), El-Ghaziri, M., Jaeger, L., Zhang, Y., & Dugan, A. at the 2022 APHA Conference, Boston, November 6-9, 2022. (poster)
- C.55 "Real-time approaches to measure workplace violence among nurses, is one measure enough? Development of an incident scoring system" by **Parker, T. (PhD student)**, El-Ghaziri, M., Barnes-Farrell, J., **Zhang, Y.,** Henning, R., & Cherniack, M. at the 2022 IAWBH Conference, San Diego, September 19-24, 2022. (poster)
- C.54 "Sleep patterns and experiences in older night shift nurses" by **Zhang, Y.,** Murphy, A., Lammers, H., Barger, L., Swaminathan, N., Granfield, C., Palacios, A.A., & Duffy, J. at <u>SLEEP 2022</u>, Charlotte, NC, June 4-8, 2021. (poster)
- C.53 "Investigating nursing incivility and harassment experiences by characterizing day-level experiences" by **Parker**, **T.** (**PhD** student), Barnes-Farrell, J., Cherniack, M., El-Ghaziri, M., Gilmer, D., Gossett, E., Shishivan, H.H., & **Zhang**, **Y.** at the 2022 EAOHP Conference, Bordeaux, France, July 6-8, 2022. (poster)
- C.52 "Work-family conflict and depressive symptoms among healthcare workers: The role of sleep and decision latitude." by **Zhang, Y.,** Dugan, A., **Siddique, S. (PhD student)**, & Punnett, L. at <u>the 2021</u> Work, Stress and Health Virtual Conference, Miami, FL, November 3-6, 2021. (Poster)
- C.51 "Impact of Surface Acting Emotional Labor on Depression in Healthcare Workers: The Role of Emotional Exhaustion as a Mediator" By Siddique, S. (PhD student), Gore, R., Zhang, Y., & Punnett, L. at the 2021 Work, Stress and Health Virtual Conference, Miami, FL, November 3-6, 2021. (Poster)
- C.50 "Emotional exhaustion in healthcare workers: The importance of organizational leadership and safety" By Siddique, S. (PhD student), Gore, R., Zhang, Y., & Punnett, L. at the 2021 Work, Stress and Health Virtual Conference, Miami, FL, November 3-6, 2021. (Poster)
- C.49 "Immediate and Retrospective Characterizations of Stress in Nursing Incivility and Harassment Experiences." By **Parker, T. (PhD student)**, Barnes-Farrell, J., Cherniack, M., El-Ghaziri, M., Gilmer, D., Gossett, E., Shishivan, H.H., & **Zhang, Y.** at the 2021 Work, Stress and Health Virtual Conference, Miami, FL, November 3-6, 2021. (Poster)
- C.48 "Continuous multimodal assessment of physiological stress responses among nurses in relation to incidents of workplace violence: A feasibility study guided by Total Worker Health® principles." By Gossett, E. (PhD student), Henning, R., El-Ghaziri, M., Barnes-Farrell, J., Parker, T., Zhang, Y., Shishivan, H.H., Kim, I., & Cherniack, M. at the 2021 Work, Stress and Health Virtual Conference, Miami, FL, November 3-6, 2021. (Poster)
- C.47 "Sleep disturbances mediate the association between emotional labor and depressive symptoms among healthcare workers" by **Zhang, Y.,** ElGhaziri, M., **Siddique, S. (PhD student)**, Gore, R., Kurowski, A., Nobrega, S., & Punnett, L. at <u>SLEEP 2021</u>, Seattle, WA, June 12-16, 2021. (Poster)
- C.46 "Limited time for sleep in night shift workers is associated with risk of insomnia and shift work disorder" by Lammers-van der Holst, H.M., **Zhang, Y.,** Barger, L.K.,...Duffy, J.F. at <u>SLEEP 2021</u>, Seattle, WA, June 12-16, 2021. (Poster)
- C.45 "Long shift duration is associated with high risk for Shift Work Disorder" by Lammers-van der

- Holst, H.M., **Zhang, Y.,** Barger, L.K.,...Duffy, J.F. at <u>ESRS Congress 2020</u>, Seville, Spain, September 22-25, 2020. (Poster)
- C.44 "Associations of low back pain and sleep among nursing staff" by Zhang, Y., Thind, H., Kim, S., Nunes, R. (Immerse scholar), Reidy, J. (Immerse scholar), Punnett, L., & Duffy, J. at <u>SLEEP</u> 2020, Philadelphia, PA, June 13-17, 2020. (Poster)
- C.43 "Workplace yoga program features and associations with shift work and sleep among nursing staff" by **Zhang, Y.,** Thind, H., Kim, S., **Soup, A.** (**Immerse scholar**), Punnett, L., & Duffy, J. at <u>SLEEP</u> 2020, Philadelphia, PA, June 13-17, 2020. (Poster)
- C.42 "Sex differences in sleep and quality of life in healthcare shift workers" by Lammers-van der Holst, H.M., **Zhang, Y.,** Barger, L.K.,...Duffy, J.F. at <u>SLEEP 2020</u>, Philadelphia, PA, June 13-17, 2020. (Poster)
- C.41 "Factors associated with regular participation in leisure-time physical activity among nursing staff" by **Zhang, Y.,** ElGhaziri, M., de Castillero, E. at the 2019 American Public Health Association Conference, Philadelphia, PA, November 2-6, 2019. (Poster)
- C.40 "Evaluation of an online nurse continuing education program to prevent patient handling injuries" by Nobrega, S., Zhang, Y., Kurowski, A., Mawn, B., Do, P. (MS student), Chin, W. (PhD student), & Punnett, L. at the 2019 American Public Health Association Conference, Philadelphia, PA, November 2-6, 2019. (Poster)
- C.39 "Development, implementation and evaluation of global health experience with nursing students" by **Zhang, Y.,** King, V., & Zang, Y. at the 27th Annual Conference for Nurse Educators, North Falmouth, MA, May 29-31, 2019. (Poster)

b. Referred Regional Presentations as Tenured Associate Professor since 2019 (n=4)

- C.38 "Individual differences in sleep and mental health of public sector healthcare workers" by Zhang, Y., Kurowski, A., Nobrega, S., El Ghaziri, M., Gore, R., & Punnett, L. at NECOEM/MaAOHN 2024 Annual Conference, Westford, MA, December 5-6, 2024 (accepted)
- C.37 "Night shift work and sleep experiences of older night shift nurses" by **Zhang, Y.,** Murphy, A., Lammers, H., Barger, L., & Duffy, J. at <u>2024 Eastern Nurse Research Society</u>, Boston, MA, April 4-5, 2024. (poster)
- C.36 "Fine Particulate Matter Exposure and Pediatric Mental Health Outcomes: An Integrative Review" by **Trombley, J. (PhD student),** Koren, A., Abdallah, L., & **Zhang, Y.** at <u>2024 Eastern Nurse</u> Research Society, Boston, MA, April 4-5, 2024. (poster)
- C.35 "Scoping review of peer support programs to reduce stress and trauma for frontline safety personnel" by Fallon, P. (PhD student), El Ghaziri, M., Jaegers, L., Zhang, Y., Dugan, A., & Chernick, M. at the 2021 NECOEM Conference, Boston, MA, December 2-3, 2021. (poster)

c. Referred National/International Presentations as Assistant Professor since 2013 (n=26)

C.34 "Racial and ethnic disparities in musculoskeletal disorders and functional disabilities of nursing assistants in long-term care facilities" by **Zhang, Y.,** Punnett, L., & ProCare Research Team at the 2018 NHCGNE Leadership Conference, Boston, MA, November 13-14, 2018. (Poster)

- C.33 "Work and health correlates of sleep quantity and quality among correctional nurses" by **Zhang, Y.,** Ghaziri, M., & Dugan, A. at <u>the 2018 American Public Health Association Conference</u>, San Diego, CA, November 10-14, 2018. (Poster)
- C.32 "Facilitators and barriers to improve the utilization of EMPOWER as a peer mediation program for T3WV (co-worker conflict/workplace bullying) among correctional registered nurses" by ElGhaziri, M., Zhang, Y., Dugan, A., Peters, A., & Castro, M. at the Sixth International Conference for Violence in the Healthcare Sector, Toronto, Canada, October 24-26, 2018. (Podium)
- C.31 "Mindfulness is associated with sleep quality among patients with fibromyalgia" by Park, M., Zhang, Y., Price L., Bannuru, R.R., & Wang, C at the 2018 ACR/ARHP Annual Meeting, Chicago, IL, October 19-24, 2018. (Poster)
- C.30 "Workplace Bullying Exposure and Prevention in Correctional Nursing" by El Ghaziri, M., Dugan, A., Zhang, Y., & Castro, M.E. at the 11th International Conference on Workplace Bullying and Harassment, Bordeaux, France, June 5-8, 2018. (Podium)
- C.29 "Physical workload, leisure-time physical activity, musculoskeletal disorders, and sleep quality among rehabilitation employees" by **Zhang, Y., Kotejoshyer, R. (PhD student),** Punnett, L., & Buchholz, B. at SLEEP 2018, Baltimore, MD, June 2-6, 2018. (Poster)
- C.28 "Reinvigorating engagement and collaboration through interprofessional education (RECIPE) in nursing and public health students" by **Zhang, Y.,** & Tickner, J. at the 26th Annual Conference for Nurse Educators, North Falmouth, MA, May 30-June 1, 2018. (Poster)
- C.27 "Development and Implementation of Smartphone App to Measure and Manage Undergraduate Clinical Student Anxiety" by Peters, A.B., Kellogg, M., **Zhang, Y.** at the 26th Annual Conference for Nurse Educators, North Falmouth, MA, May 30-June 1, 2018. (Poster)
- C.26 "Workplace violence exposure among correctional registered nurses" by ElGhaziri, M., Dugan, A., Zhang, Y., & Castro, M. at https://doi.org/10.108/jhang, Y., & Castro, M. at https://doi.org/10.108/jhang-number-4-8, 2017. (Podium)
- C.25 "Correctional nurse's occupational exposures and attitudes related to health, safety and wellness in the workplace: A mixed method approach" by ElGhaziri, M., Dugan, A., Zhang, Y., & Castro, M. at the 2017 American Assembly for Men in Nursing Annual Conference, Las Vegas, NV, September 21-23, 2017. (Poster)
- **C.24** "Relationships of musculoskeletal disorders, sleep disturbances, and depression among hospital nurses" by **Zhang, Y.,** Duffy, J., & de Castillero, E. at <u>SLEEP 2017</u>, Boston, MA, June 3-7, 2017. (Poster)
- C.23 "Musculoskeletal disorders and comorbid depression: Associations with working conditions among aging nurses" by **Zhang, Y.,** & Wang, K. at the 2016 American Public Health Association Conference, Denver, CO, October 29-November 2, 2016. (Podium)
- C.22 "Sleep quality and mental disorders among college nursing students: The mediating role of perceived stress and coping styles" by **Zhang, Y.,** Peters, A., & Chen, G. at <u>the 2016 American Public Health Association Conference</u>, Denver, CO, October 29-November 2, 2016. (Podium)

- C.21 "Perceptions of role and occupational risk of correctional nurses" by ElGhaziri, M., Dugan, A.,
 Zhang, Y., & Castro, M. at the Fifth International Conference for Violence in the Healthcare Sector, Dublin, Ireland, October 26-28, 2016. (Poster)
- C.20 "Sleep disturbances mediate the association between work-family conflict and depression among hospital nurses" by **Zhang, Y.,** Duffy, J., & de Castillero, E. at the 2016 American Public Health Association Conference, Denver, CO, October 29-November 2, 2016. (Poster)
- C.19 "Chronotype, sleep characteristics, and musculoskeletal disorders among hospital nurses" by **Zhang, Y.,** Duffy, J., & de Castillero, E. at <u>SLEEP 2016</u>, Denver, CO, June 11-15, 2016. (Poster)
- C.18 "Age- and gender-specific associations between insomnia and falls in older Puerto Ricans" by **Zhang, Y.,** Cifuentes, M., Gao, X., **Amaral, G.** (**Immerse scholar**), & Tucker, K. at <u>SLEEP 2016</u>, Denver, CO, June 11-15, 2016. (Poster)
- C.17 "Relationships among work schedules, sleep quality, and functional disability of nursing home employees" by **Zhang, Y.,** Punnett, L., & ProCare Research Team at the 2015 American Public Health Association Conference, Chicago, IL, October 31-November 4, 2015. (Podium)
- **C.16** "Individual differences in sleep-wake habits and sleep quality among nursing home employees" by **Zhang, Y.,** Punnett, L., & ProCare Research Team at the 2015 American Public Health Association Conference, Chicago, IL, October 31-November 4, 2015. (Podium)
- C.15 "Assessing the occupational health risks and health behaviors for men in correctional nursing" by ElGhaziri, M., Dugan, A., **Zhang, Y.,** & Castro, M. at the 2015 American Public Health Association Conference, Chicago, IL, October 31-November 4, 2015. (Poster)
- C.14 "Investigation of physical workload of therapy work in nursing homes" by Kotejoshyer, R. (PhD student), Zhang, Y., Buchholz, B., Punnett, L., & ProCare Research Team at the 2015 Safe Patient Handling and Mobility Conference, Glendale, AZ, April 20-24, 2015. (Poster)
- C.13 "The States of Southeast Asian Communities in New England" by Uy, P., Dinh, K., Ho, I., Kim, S., Kim, M.J., & Zhang, Y., at the 2014 States of Southeast Asian American Studies, Minneapolis, MN, October 2-3, 2014. (Podium)
- C.12 "Predictors of nursing staff voluntary termination in long-term care facilities" by **Zhang, Y.,** Punnett, L., Gore, R., & ProCare Research Team at the 2014 American Public Health Association Conference, New Orlands, LA, November 15-19, 2014. (Poster)
- C.11 "Mindfulness is associated with sleep quality among patients with fibromyalgia" by **Zhang, Y.,** Price, L., Morgan, N., Morgan, L., & Wang, C at <u>American College of Rheumatology,</u> Boston, MA, November 14-19, 2014. (Poster)
- C.10 "Work-family conflict and mental health among caregivers in skilled nursing facilities: The role of sleep" by **Zhang, Y.,** Punnett, L., & The CPHNEW Research Team at the 2013 American Public Health Association Conference, Boston, MA, November 2-6, 2013. (Podium)
- C.9 "Facilitators and barriers for workplace participatory interventions: Perspectives from employees and management in three nursing homes" by **Zhang, Y.,** Flum, M., **Kotejoshyer, R. (PhD student),** Fleishman, J. M., Henning, R., & Punnett, L. at the 2013 Work, Stress, and Health Conference, Los Angeles, CA, May 16-19, 2013. (Podium)

d. Referred Regional Presentations as Assistant Professor since 2013 (n=3)

- C.8 "STOP-Bang Questionnaire Screening for Sleep Apnea Treatment" by **Burns-Mullett, C. (DNP student), & Zhang, Y.** at the 24th Annual Northeast Regional Nurse Practitioner Conference, Boston, MA, May 3-5, 2017. (Poster)
- C.7 "Impact of staff education and electronic medical record alerts on reducing hospital-wide sepsis mortality" by Liddell, J., Simons, S., White, D., & Zhang, Y. at Organization of Nurse Leaders, Massachusetts, Rhode Island & New Hampshire, Norwood, MA, September 11, 2015. (Poster)
- C.6 "A noval idea to attract community hospital nurses to participate in nursing research" by McPadden, T., Albert, K.,...Zhang, Y., Lynch, C. at <u>Organization of Nurse Leaders, Massachusetts, Rhode Island & New Hampshire</u>, Norwood, MA, September 11, 2015. (Poster)

e. Referred National/International Presentations Prior to Appointment at the University (n=5)

- C.5 "Relationships between working conditions and sleep quality among employees in long-term care centers" by **Zhang, Y.,** Punnett, L., & Phillips McEnany, G. at the 2012 Symposium on Human Factors and Ergonomics in Health Care: Bridging the Gap, Baltimore, MD, March 12-14, 2012. (Poster)
- C.4 "Relationships among working conditions, mental health and caregivers' intention to leave in long-term care centers" by **Zhang, Y.,** Punnett, L., & Gore, R. at the Work, Stress, and Health Conference, Orlando, FL, May 19-22, 2011. (Podium)
- C.3 "Sleep quality among employees in long-term care centers: The contribution of the work environment" by **Zhang, Y.,** Punnett, L., & Phillips McEnany, G. at the 2011 American Public Health Association Conference, Washington DC, October 29-November 2, 2011. (Poster)
- C.2 "A Research-to-Practice Partnership in the Long-Term Care Sector" by Punnett, L., Flum, M., Gore, R., Kurowski, A., Lahiri, S., Zhang, Y., Kernan, G., & Roberts, Y. at NIOSH NORA Conference, Cincinnati, OH, July 12-13, 2011. (Poster)
- C.1 "Work organization and health issues in long-term care centers: Comparison of perceptions between caregivers and management" by **Zhang, Y.,** Flum, M., Nobrega, S., Blais, L., Qamili, S., & Punnett, L. at the 2009 American Public Health Association Conference, Philadelphia, PA, November 7-11, 2009. (Podium)

f. Invited Regional/Local Presentations as Tenured Associate Professor since 2019 (n=19)

- S.47 "Low back pain is associated with sleep among nursing staff" by Carriere, C. (PhD student), & Zhang, Y. at the 2024 Lowell General Hospital Research and Quality Fair, Lowell, MA, November 19, 2024. (Poster)
- S.46 "Improving optimism, sleep quality, stress, and mental health using a virtual reality-based intervention among undergraduate students: A pilot study" by Lai, Y-J., Shen, J., Zhang, Y., & Wang, Y. at the UMass Lowell Faculty Symposium, December 5, 2023, UMass Lowell, Lowell, MA. (Lightning Talk)
- S.45 "Prescreening task force" by Carroll, M. & Zhang, Y. at the 2023 Lowell General Hospital Research and Quality Fair, Lowell, MA, November 7, 2023. (Poster)

- S.44 "Treatment of circadian disruption in older night workers" by **Zhang, Y.,** Lammers-van der Holst, H.M., Barger, L.K.,...Duffy, J.F., at the Zuckerberg College of Health Sciences Faculty Retreat, May 2023, UMass Lowell, Lowell, MA. (Podium)
- S.43 "Optimism with sleep quality, stress, and mental health among college students returning to classes during the COVID-19 pandemic" by Lai, Y.J., Zhang, Y., Jarustanaput, P. (PhD student), Manachevakul, S. (PhD student), & O'Leary, S.E. (BS student), at the 2nd Solomont School of Nursing Donna Manning Scholarship and Research Day, April 2023, UMass Lowell, Lowell, MA. (Podium)
- S.42 "Sociocultural Factors Associated with Persistent Prescription Opioid Use Among Puerto Rican Adults in Massachusetts" by Essien-Aleksi, E. I. (PhD student), Koren, A., Palacios, N., Tucker, L. T., & Zhang, Y. at the 1st Solomont School of Nursing Donna Manning Scholarship and Research Day, April 2022, UMass Lowell, Lowell, MA. (Most popular poster award)
- S.41 "Interventions to improve sleep quality of shift-working nurses: A systematic review" by Murphy, J. (Immerse scholar) & Zhang, Y., at the 24th UMass Lowell Virtual Student Research and Community Engagement Symposium, April 2021, UMass Lowell, Lowell, MA. (Poster)
- S.40 "Workplace interventions to reduce low back pain in nursing staff: A systematic review" by **Johnston, A. (Immerse scholar)** & **Zhang, Y.,** at the <u>24th UMass Lowell Virtual Student Research and Community Engagement Symposium</u>, April 2021, UMass Lowell, Lowell, MA. (Poster)
- S.39 "Individual differences of low back pain and sleep among nursing staff" by Nunes, R. (Immerse scholar), Reidy, J. (Immerse scholar), & Zhang, Y., at the 23rd UMass Lowell Virtual Student Research and Community Engagement Symposium, April 27, 2020, UMass Lowell, Lowell, MA. (Poster)
- S.38 "Endorsed workplace yoga program features by nursing staff" by Soup, A. (Immerse scholar), & Zhang, Y., at the 23rd UMass Lowell Virtual Student Research and Community Engagement Symposium, April 27, 2020, UMass Lowell, Lowell, MA. (Poster)
- S.37 "Low back pain is associated with sleep of nursing staff" by Zhang, Y., Thind, H., Kim, S., Nunes, R. (Immerse scholar), Reidy, J. (Immerse scholar), Punnett, L., & Duffy, J. at the UMass Center for Clinical Translational Science, 2020 Community Engagement and Research Symposium, March 20, 2020, UMass, Worcester, MA. (Poster)
- **S.36** "Interested workplace yoga program features by nursing staff and its associations with shift work and sleep" by **Zhang, Y.,** Thind, H., Kim, S., **Soup, A.** (**Immerse scholar**), Punnett, L., & Duffy, J. at the UMass Center for Clinical Translational Science, 2020 Community Engagement and Research Symposium, March 20, 2020, UMass, Worcester, MA. (Poster)
- S.35 "Using survey and interview findings to develop programming for correctional nurses' work environment" by ElGhaziri, M., Dugan, A., & **Zhang, Y.** at the 2020 <u>Semi-annual Sturbridge Symposium by UMass Lowell and UConn,</u> Sturbridge, MA, Jan 16, 2020. (Podium)
- **S.34** "Night shifts in older workers: Field test of a sleep timing strategy" by Duffy, J., Lammers-van der Holst, H.M., & Zhang, Y., et al. at tel:the 2019 Lowell General Hospital Nursing Research and Quality Fair, Lowell, MA, October 29, 2019. (Podium)

- **S.33** "Test of a sleep timing strategy to improve night shift performance in older healthcare workers" by Lammers-van der Holst, H.M., Ronda, J.M., Barger, L.K., **Zhang, Y.,** Duffy, J.F., et al. at Discover Brigham 2019, Boston, MA, November 2019. (Poster)
- S.32 "Development, implementation and evaluation of global health experience with nursing students" by **Zhang, Y.,** King, V., & Zang, Y. at the 2019 Zuckerberg College of Health Sciences Faculty Retreat, Lowell, MA, May 22, 2019. (Poster)
- S.31 "Evaluation of physical activity and sleep quality among night shift nurses using Actigraph and Smartphone app" by Chow, S. (Immerse scholar), Zuber, J. (Immerse scholar), & Zhang, Y., at the 22nd UMass Lowell Student Research and Community Engagement Symposium, May 1, 2019, UMass Lowell, Lowell, MA. (Poster)
- S.30 "Work and health behavior correlates of weight gain among nursing home employees" by Zhang, Y., Nabi, M. (MS student), Punnett, L., & the ProCare Research Team, at the UMass Center for Clinical Translational Science, 2019 Community Engagement and Research Symposium, March 22, 2018, UMass, Worcester, MA. (Poster)
- **S.29** "Self-efficacy and social support are associated with regular participation in leisure-time physical activity among nursing staff" by **Zhang**, **Y.**, ElGhaziri, M., de Castillero, E. at <u>the UMass Center for Clinical Translational Science</u>, 2019 Community Engagement and Research Symposium, March 22, 2018, UMass, Worcester, MA. (Poster)

f. Invited Regional/Local Presentations prior to Tenured Associate Professor (n=28)

- S.28 "Aromatherapy as an adjunct treatment for postoperative nausea and vomiting (PONV) relief" by Carroll, M. & Zhang, Y. at the 2018 Lowell General Hospital Nursing Research and Quality Fair, Lowell, MA, November 5 & 13, 2018. (Podium)
- S.27 "Discharge bundle in the elective joint replacement population" by Veins, B. (DNP student), Adkins, J., & Zhang, Y. at the 2018 Lowell General Hospital Nursing Research and Quality Fair, Lowell, MA, November 5 & 13, 2018. (Poster)
- S.26 "Correlates of sleep quantity and quality among correctional nurses" by **Zhang**, **Y.**, Ghaziri, M., & Dugan, A. at the UMass Center for Clinical Translational Science, 2018 Community Engagement and Research Symposium, March 9, 2018, UMass, Worcester, MA. (Poster)
- S.25 "Work- and leisure-time physical activity, musculoskeletal disorders, and sleep quality among rehabilitation employees" by **Zhang, Y., Kotejoshyer, R. (PhD student)**, Punnett, L., & Buchholz, B. at the UMass Center for Clinical Translational Science, 2018 Community Engagement and Research Symposium, March 9, 2018, UMass, Worcester, MA. (Poster)
- S.24 "Occupational health risks and health behaviors for correctional nurses: An overview" by El Ghaziri, M., Dugan, A., Zhang, Y., Castro, M. at the Semi-annual Sturbridge Symposium by UMass Lowell and UConn, Sturbridge, MA, January 12, 2017. (Podium)
- S.23 "Chronotype, sleep characteristics, and musculoskeletal disorders among hospital nurses" by **Zhang, Y.,** Duffy, J., & de Castillero, E. at <u>UMass Lowell School of Nursing Clinical Practice and Research Symposium</u>, April 27, 2017. (Poster)
- S.22 "Physical activity behaviors among nursing staff" by Zhang, Y., de Castillero, E., Chernaik, M.

- (Immerse scholar), & Hallet, K (Immerse scholar). at the 2016 Lowell General Hospital Nursing Research Fair, Lowell, MA, October 4 & 18, 2016. (Podium and Poster)
- S.21 "Gender role expectations and the lived experience of correctional registered nurses" by ElGhaziri,
 M., Dugan, A., Zhang, Y., & Castro, M. at the Semi-annual Sturbridge Symposium by UMass Lowell and UConn, Sturbridge, MA, May 12, 2016. (Podium)
- S.20 "Coping with relationship issues among college nursing students" by Chernaik, M. (Immerse scholar), & Zhang, Y. at the 2016 Summer UMass Lowell Co-op Scholar Poster Presentations, Lowell, MA, August 3, 2016. (Poster)
- S.19 "Physical activity, sleep quality, safety and health outcomes of shift workers" by **Zhang, Y.,** Duffy J., & de Castillero, E., at the UMass Lowell Faculty Research and Creative Work Symposium, Lowell, MA, March 3, 2016. (Poster)
- **S.18** "Impact of staff education and electronic medical record alerts on reducing hospital-wide sepsis mortality" by Liddell, J., Simons, S., White, D., & **Zhang, Y.,** at the 2015 Lowell General Hospital Nursing Research Fair, Lowell, MA, October 13 & 20, 2015. (Podium and Poster)
- S.17 "Shift work and sleep among hospital nurses" by **Zhang, Y.,** Duffy, J., de Castillero, E., **Long, E.** (**Immerse scholar**), & **Hallet, K.** (**Immerse scholar**), at the 2015 Lowell General Hospital Nursing Research Fair, Lowell, MA, October 13 & 20, 2015. (Podium and Poster)
- **S.16** "Investigation of physical workload and sleep quality in rehabilitation professionals" by **Kotejoshyer, R. (PhD student), Zhang, Y.,** Buchholz, B., Punnett, L., & ProCare Research Team, at the UMass Lowell Faculty Research and Creative Work Symposium, Lowell, MA, March 11, 2015. (Poster)
- S.15 "Centralized work station changing to hybrid work station: communication and teamwork among nursing staff" by **Zhang, Y., Soroken, L. (PhD student),** Laccetti, M., & de Castillero, E., at the 2014 Lowell General Hospital Nursing Research Fair, Lowell, MA, October 21-22, 2014. (Podium and poster)
- S.14 "Predictors of nursing staff voluntary termination in skilled nursing facilities" by **Zhang, Y.,**Punnett, L., & Gore, R., at the Semi-annual Sturbridge Symposium by UMass Lowell and UConn,
 Sturbridge, MA, Jan 16, 2014.(Podium)
- S.13 "Insomnia symptoms and falls among older Puerto Rican adults" by **Zhang, Y.,** Cifuentes, M., Gao, X., **Amaral, G. (Immerse scholar)**, & Tucker, K., at the UMass Center for Clinical Translational Science, 2014 Community Engagement and Research Symposium, November 7, 2014, UMass, Worcester, MA. (Poster)
- S.12 "Mindfulness is associated with sleep quality among patients with fibromyalgia" by **Zhang, Y.,** Price, L., Morgan, N., Morgan, L., & Wang, C at the UMass Center for Clinical Translational Science, 2014 Community Engagement and Research Symposium, November 7, 2014, UMass, Worcester, MA. (Poster)
- S.11 "Predictors of nursing staff voluntary termination in long-term care facilities" by **Zhang, Y.,** Punnett, L., Gore, R., & ProCare Research Team, at the UMass Center for Clinical Translational Science, 2014 Community Engagement and Research Symposium, November 7, 2014, UMass,

- Worcester, MA. (Poster)
- **S.10** "Investigation of physical workload and sleep quality in rehabilitation professionals" by **Kotejoshyer, R. (PhD student)**, **Zhang, Y.,** Buchholz, B., Punnett, L., & ProCare Research Team, at the UMass Center for Clinical Translational Science, 2014 Community Engagement and Research Symposium, November 7, 2014, UMass, Worcester, MA. (Poster)
- S.9 "Sleep mediates the relationship between work-family spillover and mental health of nursing home caregivers" by **Zhang, Y.,** Punnett, L., Phillips McEnany, G., & Mawn, B., at the UMass Lowell Faculty Research and Creative Work Symposium, Lowell, MA, Feb 11, 2014. (Poster)
- **S.8** "Sleep duration and health outcomes among formal caregivers in skilled nursing facilities: The contribution of the work environment" by **Zhang, Y.,** Punnett, L., PhilipsMcEnany, G., & Mawn, B., at the Semi-annual Sturbridge Symposium by UMass Lowell and UConn, Sturbridge, MA, Jan 17, 2013. (Podium)
- S.7 "Facilitators and barriers for workplace participatory programs: Perspectives from employees and management in three nursing homes" by **Zhang, Y.,** Flum, M., **Kotejoshyer, R. (PhD student)**, Fleishman, J. M., Henning, R., & Punnett, L. at the College of Health Sciences Research Symposium, UMass Lowell, Lowell, MA, May 2, 2013. (Podium)
- S.6 "Facilitators and barriers for workplace participatory programs: Perspectives from employees and management in three nursing homes" by Zhang, Y., Flum, M., Kotejoshyer, R. (PhD student), Fleishman, J. M., Henning, R., & Punnett, L. at the 3rd Annual Symposium Community Engaged Research: Exploring the Reach, Impact, & Value, Center for Clinical and Translational Science, UMass Medical, Worcester, MA, November 8, 2013. (Poster)
- "Key factors influencing the success of participatory health promotion and protection programs: A comparison of intervention and non-intervention centers" by Kotejoshyer, R. (PhD student),
 Zhang, Y., Flum, M., Punnett, L., & Fleishman, J. at the 3rd Annual Symposium Community
 Engaged Research: Exploring the Reach, Impact, & Value, Center for Clinical and Translational
 Science, UMass Medical, Worcester, MA, November 8, 2013. (Poster)
- S.4 "Sleep quality among employees in long-term care centers: The contribution of the work environment" by **Zhang**, **Y.**, Punnett, L., & Phillips McEnany, G. at the 2nd Annual Symposium Challenging Issues in Community Health: The Role of Research, Center for Clinical and Translational Science, UMass Medical, Shrewsbury, MA, November 30, 2012. (Poster)
- S.3 "Relationships among employees' working conditions, mental health and intention to leave in long-term care centers" by **Zhang, Y.,** Punnett, L., & Gore, R. at the <u>School of Health and Work</u> Environment Research Symposium, UMass Lowell, Lowell, MA, May 13, 2010. (Poster)
- S.2 "Work organization and health among long-term care employees: Perceptions of health needs & participatory intervention" by Flum, M., Zhang, Y., Blais, L., Russell, J., Nobrega, S., Punnett, L., & ProCare Team, at the <u>School of Health and Work Environment Research Symposium, UMass</u> Lowell, Lowell, MA, May 13, 2010. (Poster)
- **S.1** "A Research-to-Practice Partnership in the Long-Term Care Sector" by Punnett, L., Flum, M., Gore, R., **Zhang, Y.,** Kurowski, A., Lahiri, S., Roberts, Y., Kernan, G., Henning, R., & ProCare

Team, at the <u>School of Health and Work Environment Research Symposium, UMass Lowell,</u> Lowell, MA, May 13, 2010. (Poster)

4. Podcasts, Webinars, and Other Social Media

2023 spring	Research paper was graded as A (high quality) in an integrative review
2023 spring	published in the Journal of Gerontological Nursing
	https://journals.healio.com/doi/10.3928/00989134-20221206-01
2023 spring	Publish an article in the Conversation which has been republished by over
»pg	20 media outlets including the Houston Chronicle, SFGate, the Associated
	Press and Yahoo News
	https://theconversation.com/health-care-workers-are-frazzled-and-poor-slee
	p-may-turn-stress-into-poor-mental-health-199944
2022 spring	Provide sleep health tips and educational materials for the university trivia
	night event in March 2022
	https://www.uml.edu/myuml/Submissions/2022/2022-03-04-15-23-18-Having-
	trouble-falling-asleep-Come.aspx
2020 fall	Interview with University Relations on "Sleep tips for students studying
	online" https://www.uml.edu/News/stories/2020/Remote-Learning-Tips.aspx
2019 fall	LowellSun article "Overnight workers might want to listen to this UML
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	prof"
	prof" https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list
	•
2019 fall	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list
2019 fall	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-listen-to-this-uml-prof/
	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages"
2019 fall 2018 spring	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job
2018 spring	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population
	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population Massachusetts Association of Colleges of Nursing Faculty Teach Award report on
2018 spring 2017 spring	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population Massachusetts Association of Colleges of Nursing Faculty Teach Award report on "Massachusetts Report on Nursing" by ANA Massachusetts
2018 spring	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population Massachusetts Association of Colleges of Nursing Faculty Teach Award report on "Massachusetts Report on Nursing" by ANA Massachusetts Nursing Assistants Need Quality Sleep to Provide Quality Care: Strategies to
2018 spring 2017 spring	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population Massachusetts Association of Colleges of Nursing Faculty Teach Award report on "Massachusetts Report on Nursing" by ANA Massachusetts
2018 spring 2017 spring	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population Massachusetts Association of Colleges of Nursing Faculty Teach Award report on "Massachusetts Report on Nursing" by ANA Massachusetts Nursing Assistants Need Quality Sleep to Provide Quality Care: Strategies to
2018 spring 2017 spring 2016 fall	https://www.lowellsun.com/2019/09/12/overnight-workers-might-want-to-list en-to-this-uml-prof/ Press release "Research aims to improve night-shift workers' sleep: Job performance for older employees critical as labor force ages" Merrimack Valley Magazine editor interview about the science of sleep and research regarding sleep promotion of shift workers and the general population Massachusetts Association of Colleges of Nursing Faculty Teach Award report on "Massachusetts Report on Nursing" by ANA Massachusetts Nursing Assistants Need Quality Sleep to Provide Quality Care: Strategies to Beat Fatigue https://www.uml.edu/News/stories/2016/NursingSleep.aspx

D. INSTRUCTION RELATED ACTIVITY

1. Teaching: University of Massachusetts Lowell – Baccalaureate Level

Number of Students/fall semester

Course #	Course Title	Credit	Fall	Fall	Fall	Fall	Fall	Fall	Fall	Fall	Fall	Fall	Fall	Fall	Fall
		allocation	13*	14*	15**	16**	17**	18**	19**	20**	21	22	23	24	25
NURS.	Health	4 (12h)	12***	-	-	-	-	-	-	-	-	-	-	1	
3150	Promotion &														

													Zha	ang, Y.	
	Risk Reduction of Families II, Gerontological Practicum														
NURS 3010	Research in Nursing and Health Care	3 (3h)	-	35	8 34****	-	-	-	62	-	-	-	-	-	
NURS 3130L	Nursing Assessment and Skills	1 (3h)	-	8	8	-	-	-	-	20	20	20	20	14	
NURS 4140	Role Transition Practicum	6 (6h)	-	-	-	8	10	12	-	-	-	-	-	1	
HSCI. 3400	IPE Research Methods	3 (3h)	-	-	-	-	-	-	-	42	45	73	48	40	
NURS 3230	Independent Study	3 (3h)	-	-	-	-	-	-	-	-	-	-	-	2	

^{*} Awarded pre-tenure course load reduction

Number of Students/spring semester

Course #	Course Title	Credit/Ho	Spr	Spr	Spr	Spr	Spr	Spr	Spr	Spr	Spr	Spr	Spr	Spr
		urs	14*	15*	16**	17**	18**	19**	20**	21****	22**	23**	24**	25**
		allocation												
NURS.31 0	Health	4 (12h)	12***	-	-	-	-	-	-	-	-	-	-	
	Promotion &													
	Risk													
	Reduction of													
	Families II,													
	Gerontologi													
	cal													
	Practicum													
NURS.410	Role	6 (6h)	-	9	11	-	12	-	-	-	-	-	-	
	Transition													
	Practicum													
NURS.300	Research in	3 (3h)	-	-	-	-	-	-	-	-	-	-	-	
	Nursing and													
	Health Care													
NURS.210R	Medication	1 (1h)	-	-	-	54	-	96	-	-	92	83	107	
	Calculations													
	Recitation													
HSCI.340	IPE	3 (3h)	-	-	-	-	-	-	40	-	46	-	40	
	Research													
	Methods													

^{*} Awarded pre-tenure course load reduction

^{**} Awarded research-productive course load reduction

^{***}To reduce class size, this course was divided into two sections and taught twice a semester

^{****} Course PI

^{**} Awarded research-productive course load reduction

^{***}To reduce class size, this course was divided into two sections and taught twice a semester

Number of Students/summer semester

Course #	Course Title	Credit/Hours	Sum								
		allocation	20	21	22	23	24	25	26	27	28
HSCI.3400	Online IPE Research Methods	3 (3h)	29	14	33	30	30				

2. Teaching: University of Massachusetts Lowell - Graduate Level

Number of Students/fall semester

Course #	Course Title	Credit/Hours	Sum	Spr	Spr	Spr	Spr	Fall	Spr	
		allocation	16	17**	19**	20**	23**	24**	25**	
HSCI.5020	Global Health Experience	3 (3h)	8	-	-	-	-			
NURS.7300	Quantitative Research	3 (3h)	-	12	6	-	9			
	Methods and Grantsmanship									
NURS.7390	Mentored Research	3 (3h)	-	-	-	4	1			
NURS.7330	Nurse Scientist Role	3 (3h)	-	-	-	-	-	1		

^{**} Awarded research-productive course load reduction

a. New Course Development

2024-2025	Develop the new RN-PhD Nurse Scientist Role course for the PhD program, including development of the syllabus, assignments, weekly agenda, readings, and teaching it to one PhD student in fall 2024 (NURS.7330)
2023-2024	Convert the 12-week online course to a 6-week online course, including revisions of the syllabus, assignments, and weekly agenda, readings, and lecture notes for the Undergraduate IPE Research Methods course (HSCI. 3400)
2020-2021	Develop the 12-week online course syllabus, assignments, course activities, and weekly agenda, readings, and lecture notes for the Undergraduate IPE Research Methods course (HSCI. 3400)
2019-2020	Develop the <i>hybrid</i> course syllabus, assignment guidelines and rubric, course activities, and weekly agenda, reading, and lecture notes for the PhD Quantitative Research Methods and Grantsmanship (NURS.7300)
2016-2017	Develop the <i>online</i> course syllabus, assignment guidelines and rubric, course activities, and weekly agenda, reading, and lecture notes for the PhD Quantitative Research Methods and Grantsmanship (NURS.7300)
2015-2016	Develop the course objectives, contents, activities, and assignments for the Graduate Global Health Experience Course (HSCI.5020); Organize and lead student global health experience in China in the summer of 2016

b. Dissertation/Thesis/Scholarly Project Advisement

PhD Students (n=11)

2024-present Project title: "Patient activation and quality of life in community-dwelling older

adults with chronic diseases" (Committee Chair)

Student: Linette Wilson

2024-present Project title: "Social support, self-compassion, and psychological well-being among

Thai adults with Type 2 Diabetes Mellitus" (Committee Member)

Student: Ploypapus Jarustanaput (Committee Chair: Ainat Koren)

2024-present Project title: "Correctional nurses' experience of critical incidents and utilization of

resources to address stress and trauma in the workplace: A cross-sectional national

study" (Committee Member)

Student: Aekkachai Fatai (Committee Chair: Mazen El Ghaziri)

2024-present Project title: "Towards wearable signal representation learning for autonomous health

monitoring: Algorithms and systems" (Committee Member)

Department: Computer Science (Committee Chair: MohammadArifUI Alam)

Student: Yidong Zhu

2022-present Project title: "Factors associated with resilience and quality of life among family

caregivers of person with dementia in Thailand" (Committee Chair)

Student: Praphasri Thungmiphon

2020-2024 Project title: "Emotional labor, burnout and depression among healthcare workers"

(Committee Member)

Department: Public Health (Committee Chair: Laura Punnett)

Student: Sundus Siddique. Defense: Spring 2024

2019-2023 Project title: "Investigating hospital safety culture characteristics related to nurse

patient handling policies and practices: A mixed method study" (Committee Chair)

Student: Patricia MacCulloch. Defense: Spring 2023

2022-2023 Project title: "Occupational Safety and Health Professional Perspectives on Total

Worker Health (TWH) Competencies and Interprofessional Continuing Education"

(Committee Member)

Department: Education (Committee Chair: Jill Lohmeier)

Student: Suzanne Nobrega. Defense: Spring 2023

2020-2023 Project title: "Exploring facilitators and barriers of peer support programs for

correctional officers in jail and prison settings: A mixed method approach"

(Committee Member)

Department: Nursing (Committee Chair: Mazen ElGhaziri)

Student: Pamela Fallon. Defense: Spring 2023 2021-2022 Project title: "Sociocultural factors associated with persistent prescription opioid use among Puerto Rican adults in Massachusetts" (Committee Chair) Student: Invene Essien. Defense: Spring 2022 2014-2015 Project title: "Unconstrained smartphone sensing and empirical study for sleep monitoring and self-management." (Committee Member) Department: Commuter Science (Committee Chair: Guanling Chen) Student: Ke Huang. Defense: Spring 2015 DNP Students (n=6) Project title: "Will the implementation of the Institute of Healthcare Improvement's 2020-2021 Joy in Work Framework improve nurse leader resiliency?" (Statistician) Student: Susan Santana (Rivier University) 2017-2018 Project title: "Nurse manager leadership development: Enhancing skillsets to improve staff retention." (Statistician) Student: Cecelia Lynch (MGH Institute of Health Professionals) 2017-2018 Project title: "Does the implementation of discharge bundle compared to standard treatment in the joint replacement population reduce the readmission rate in a ten-week timeframe?" (Preceptor and Statistician) Student: Barbara Vein (Chamberlain College of Nursing) 2015-2016 Project title: "STOP-Bang approach to identifying sleep apnea for referral for treatment." (Committee Chair) Student: Cheryl BurnsMullett 2015-2016 Project title: "Yoga pranayama intervention for PTSD symptoms in Veterans." (Committee Member) Student: Kelly Doyle 2013-2014 Project title: "Safe patient handling: Motivators of Nursing Practice Change." (Committee Member) Student: Carin Bennett-Rizzo **Graduate Research Projects (n=2)** 2013-2014 Project title: "The challenges of palliative care in a global setting." Student: Brianna Eble (Win Best Poster Award)

Project title: "Centralize workstation changing to hybrid work station:

Communication and teamwork among nursing staff."

2013-2014

Student: Afua Konadu

c. Undergraduate Research/Honor Mentor (n=21)

2024 fall Project title: "Improving optimism, sleep quality, stress, and mental health using a virtual reality-based intervention among undergraduate students: a pilot study" (in collaboration with Dr. Yunju Lai) Student: Amee Patel & DiessieMelina SaintLucient **2024 spring** Honor by Contract title "Interventions to reduce physician burnout: A literature review" Student: Zachary Kyros 2023-3024 Project title: "Factors associated with burnout in nursing aides" (in collaboration with Dr. Kimberlee Flink) Student: Barry Kyra 2022-2023 Project title: "Investigating hospital safety culture characteristics related to nurse patient handling policies and practices" Student: Miranda Lee 2022 fall Honor by Contract title "Implementing the fourth age-friendly university principle of intergenerational learning into universities globally" Student: Brianna Harrington 2021 fall Honor by Contract title "Nursing careers after nursing education" Student: Ashley Walsh 2020-2021 Project title: "Treatment of circadian disruption from shiftwork in older adults" Students: Jennifer Murphy & Abigail Johnston 2019-2020 Project title: "Treatment of circadian disruption from shiftwork in older adults" Students: Janine Reidy & Rachel Nunes & Annie Soup 2018-2019 Project title: "Musculoskeletal discomfort and sleep quality among nursing staff" and "Using smartwatch to investigate health behaviors of night shift nurses." Students: Shanna Chow & Julia Zuber 2016-2017 Project title: "Physical activity behaviors among nursing staff." Students: Sarah Nasuti & Joseph Bradstreet 2016 summer Project title: "Coping with stress and sleep quality among college nursing students." Student: Michelle Chernaik 2015-2016 Project title: "Assessing the occupational health risks and health behaviors for men in correctional nursing and evaluating the barriers and facilitators for a peer mediation

program."

Student: Kaylin Hadley

2015 summer Project title: "Shift work and sleep among hospital nurses."

Student: Johanna Griffin

2014-2015 Project title: "Investigation of physical workload and sleep quality with objective

field measures among rehabilitation professionals"

Student: Emily Long

2014 summer Project title: "Insomnia and falls in community-dwelling Puerto Rican adults."

Student: Gina Amaral

d. Guest Speaker/Lecturer

Suest Speaker/Decearer		
2024 fall	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2024 spring	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Kimberlee Flike Role Transition	
2023 fall	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2023 spring	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2022 fall	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2022 spring	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2021 fall	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2021 spring	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2020 fall	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2020 spring	"Shift Work and Sleep Promotion in Nursing" lecture for Dr. Mazen ElGhaziri Role Transition	
2019 fall	"Shift Work and Sleep Promotion in Nursing" Dr. Mazen ElGhaziri Role Transition	
2019 spring	"Shift Work and Sleep Promotion in Nursing" Dr. Mazen ElGhaziri Role Transition	
2018 fall	"Shift Work and Sleep Promotion in Nursing" Dr. Mazen ElGhaziri Role Transition	
2018 spring	"Shift Work and Sleep Promotion in Nursing" Dr. Mazen ElGhaziri Role Transition	
2017 fall	"Research Process in Nursing" Dr. Joel Tickner Research Methods in Public Health	

2017 fall	"Shift Work and Sleep Promotion in Nursing" Professor Laurie Soroken Role Transition
2016 spring	"Where there is a will, there is a way" Spring Fox Lecture, Eta Omega Chapter, Sigma Theta Tau International
2015 fall	Cultural Panel Discussion on Global Health Care, organized by Nursing Student Without Borders Committee
2015 fall	"Data Analysis and Interpretation" Dr. Mazen ElGhaziri Research in Nursing and Health Care
2015 fall	"Research Process in Nursing" Dr. Joel Tickner Research Methods in Public Health
2014 fall	"Data Analysis and Interpretation" Dr. Anya Peters Research in Nursing and Health Care

E. SERVICE ACTIVITIES

1. Service to International Collaborations

a. Student Collaboration

2016 spring	Coordinate the Memorandum of Understanding (MOU) signed on teaching and research collaborations between UMass Lowell and Shandong University, China
2016 summer	Organize and lead an international global health experience trip to China for 8 nursing students at different academic levels, including Post-BS, RN-BS, MS, and PhD

b. Faculty Collaboration

2016 fall Coordinate UMass Lowell faculty sabbatical program at Shandong University, China

2. Service to Professional and Research Community

2024 fall	Tenure and Promotion Review for New York University, New York, NY
2024-2027	Sleep Research Society Diversity, Equity, and Inclusion Committee
2024-2025	ANA Massachusetts Living Legend/Award Committee
2023 fall	Tenure and Promotion Review for the University of Connecticut, Hartford, CT
2013-present	Faculty advisor/mentor, Lowell General Hospital Evidence-Based Practice and Research Council, meet monthly, providing research support to research and quality improvement projects at the hospital, and facilitating the organization's Annual Nursing Research and Quality Fair
2018 fall	Attend Fall Induction, Eta Omega Chapter, Sigma Theta Tau International
2016 fall	Attend Spring Fox Lecture, Eta Omega Chapter, Sigma Theta Tau International
2016 spring	Attend Spring Fox Lecture, Eta Omega Chapter, Sigma Theta Tau International
2015 fall	Attend Fall Induction, Eta Omega Chapter, Sigma Theta Tau International
2015 spring	Attend Spring Fox Lecture, Eta Omega Chapter, Sigma Theta Tau International

2014 fall	Attend Fall Induction, Eta Omega Chapter, Sigma Theta Tau International
2014 spring	Attend Spring Fox Lecture, Eta Omega Chapter, Sigma Theta Tau International
2013 fall	Attend Fall Induction, Eta Omega Chapter, Sigma Theta Tau International

2. Service to University of Massachusetts Lowell

2024-present	Steering Committee Member, Center for Advancing Point of Care Technologies in Heart, Lung, and Blood Diseases (CAPCaT) – UMass Lowell & UMass Medical
2024 spring	Member, Faculty Senate
2022-present	University Launch Team
2018-present	Member, Center of Biomedical and Health Research in Data Sciences (CHORDS)
2015-present	Member, Center for Population Health
2017-2019	Member, Faculty Senate Committee, elected Spring of 2017 as faculty senate representing the Solomont School of Nursing. Attend monthly senate meetings.
2013-2020	Member, Center for Gerontological Research and Partnership
2013-2016	Research Affiliate, Center for the Promotion of Health in the New England Workplace, providing resources and services for research and student mentoring.
2013-2015	Member, Center for Asian American Studies
h Sarvica to th	e Zuckerherg Callege of Health Sciences

b. Service to the Zuckerberg College of Health Sciences

2024 fall	Member, Public Health Qualifying Exam Committee
2024 spring	Member, Public Health Qualifying Exam Committee
2023 spring	Member, Public Health Qualifying Exam Committee
2022-2024	Member, College Recruitment & Retention Committee
2021-2022	Member, Search Committee, Department of Public Health
2020 summer	Member, College COVID Academic Planning Committee
2018 spring	Member, Search Committee for Biostatistician Lecturer, Department of Public Health
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c. Service to the Solomont School of Nursing

2025 spring	Interim Director, PhD Program Committee
2025 spring	Chair, PhD Qualify Exam Committee
2024-2026	Member, Faculty Teaching Award Committee, reviewing teaching excellence award applications in 2025 and 2026.
2022-2024	Co-Chair, Scholarship and Award Committee, reviewing undergraduate scholarship applications and selecting qualified applicants for awards annually
2023-present	Faculty mentor for Dr. Kimberlee Flike

Chair, School Personnel Committee 2021-present 2021-present Member, Research and Scholarship Committee 2020 Chair, COVID Academic Planning Committee 2019-present Faculty mentor for Dr. YunJu Lai 2019-2021 Member, School Personnel Committee 2019 Chair, Faculty Search Committee 2018-2020 Member, Faculty Search Committee **Qualify Exam Committee** 2019-present 2017-present Member, PhD Program Committee, attend monthly committee meetings. Responsibilities include review of PhD program objectives and courses, review of applicants and student progression, prepare AQAD review, and review of PhD program curriculum, and development of new program pathways. 2016-2017 Member, Teaching Excellence Award Committee, reviewing teaching excellence award applications in 2017. 2014-2019 Faculty co-advisor, Nursing Student without Borders Committee, providing guidance and support to the student committee for community services and field trips. 2014-2019 Member, International Collaboration Committee, planning and organizing student international academic learning and service trips. 2014-2022 Member, Scholarship and Award Committee, reviewing undergraduate scholarship applications and selecting qualified applicants for awards annually. 2014-2021 Coordinator, Shalin Liu Internship, coordinating and supervising nursing student internship experience at D'Youville Living Well Community. Student: Caroline Owusu (2020-2021) Student: Nancy Pin (2019-2020) Student: Minhthu Nguyen (2018-2019) Student: Summar Coneeny (2017-2018) Student: Emily Fitzgerald (2016-2017) Student: Maggie Scacca (2015-2016) Student: Kelsey Barrett (2014-2015) 2013-present Member, Baccalaureate Program Committee, attend monthly meetings to discuss/review and implement changes regarding issues at the Baccalaureate program

including program and curriculum objectives, AACN crosswalk, clinical placements,

d. Service on Academic Advising

2013 - 2019Advise 22-26 undergraduate students per semester

accelerated program, and student issues.

2019 – present Advise 15-28 undergraduate and graduate students per semester

e. Service on Student Recruitment

Fall 2024	UMass Lowell College of Health Sciences Prospective Student Open House
Spring 2024	UMass Lowell College of Health Sciences Welcome Day
Fall 2023	UMass Lowell College of Health Sciences Prospective Student Open House
Spring 2023	UMass Lowell College of Health Sciences Welcome Day
Fall 2022	UMass Lowell College of Health Sciences Prospective Student Open House
Fall 2021	UMass Lowell College of Health Sciences Early Action Open House
Fall 2020	Attend PhD Café twice to recruit students for the BS to PhD direct-entry program
Fall 2019	UMass Lowell College of Health Sciences Student Fall Fest
Spring 2019	UMass Lowell College of Health Sciences Early Action Open House
Fall 2018	UMass Lowell College of Health Sciences Prospective Student Open House
Spring 2018	UMass Lowell College of Health Sciences Early Action Open House
Fall 2017	UMass Lowell College of Health Sciences Prospective Student Open House
Spring 2017	UMass Lowell College of Health Sciences Early Action Open House
Fall 2016	UMass Lowell College of Health Sciences Prospective Student Open House
Spring 2016	UMass Lowell College of Health Sciences Early Action Open House
Fall 2015	UMass Lowell College of Health Sciences Prospective Student Open House
Spring 2015	UMass Lowell College of Health Sciences Early Action Open House
Fall 2014	UMass Lowell College of Health Sciences Prospective Student Open House
Summer 2014	UMass Lowell College of Health Sciences HEALL Welcome Dinner
Spring 2014	UMass Lowell College of Health Sciences Accepted Student Open House
Fall 2013	UMass Lowell College of Health Sciences Prospective Student Open House