

Center for Health Disparities Research

UC RIVERSIDE



Annual Symposium

2022
FEBRUARY
24-25

UCR VIRTUAL EVENT

#HDRATUCR2022

Welcome

Welcome to the third Annual Research Symposium on Health Disparities Research at the University of California Riverside (HDR@UCR). The center, founded in August 2019, was made possible by a U54 RCMI award HD013368 from the National Institute on Minority Health and Health Disparities (NIMHD) of the National Institutes of Health.

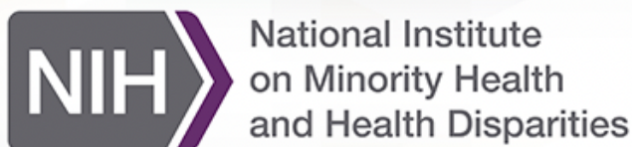
The mission of our center enhances the commitment of UCR and the School of Medicine by creating a rich interdisciplinary, diverse, and collaborative environment for health disparities research. We will achieve our mission goals by infusing community-engaged research methods into the academic culture and equipping investigators and the community with tools and training to improve their extramural funding success. The center aims to move UCR towards national leadership in health disparities research, education, and training, and to inform the national dialogue on health disparities.

We hope that this research symposium will be an opportunity for our advisory boards, UCR campus community researchers, and community members to learn about the center and its mission, and for our participating stakeholders to learn from each other. Together, we can identify the key issues in health disparities, develop robust programs and methods in health disparities research, and move toward effective strategies to address critical health disparities in our communities. We look forward to two days of exciting and engaging discussion and innovation.

Thanks and Acknowledgements

We at UCR would like to respectfully acknowledge and recognize our responsibility to the original and current caretakers of this land, water, and air: the Cahuilla [ka-wee-ahh], Tongva [tong-va], Luiseño [loosay-ngo], and Serrano [se-ran-oh] peoples and all of their ancestors and descendants, past, present, and future. Today this meeting place is home to many Indigenous peoples from all over the world, including UCR faculty, students, and staff, and we are grateful to have the opportunity to live and work on these homelands.

Please take a moment to acknowledge and reflect on the Native, Aboriginal, and Indigenous peoples of your area from which you are physically joining us today. If you are unfamiliar with the original and current caretakers of the land, water, and air from your area, we highly encourage you to take the time to self-educate, reflect, and listen to these histories.



HDR @ UCR Annual Symposium

Quick Overview: February 24, 2022



12:30 - 1:00pm

Welcome

- Dean Deas (12:30-12:40pm)
- Welcome by Center Co-directors (12:40-1:00pm)

1:00 - 2:00pm

Keynote Speaker Presentation

Carrie Breton, ScD, University of Southern California

2:10 - 3:10pm

FIRST, Clinical, and CFF Awards

3:15 - 3:45pm

A) Research Updates - 5 year, R01 Projects

3:45 - 4:15pm

B) Shifting IRWGs to PIC Awards - Stories on how to move to the next level

4:20 - 5:20pm

Workshop: Better understanding racism through an interrogation of racial classification in research and practice.

5:30 - 6:30pm

Keynote Speaker Presentation

Gabriel Maldonado, MBA, Founder and CEO, TruEvolution Inc.



HDR @ UCR Annual Symposium

Quick Overview: February 25, 2022

11:00-11:10am

Welcome from the Center Co-directors

11:10am-12:30pm

Publishing Health Disparities Research Panel

- *American Journal of Public Health*
- *Ethnicity & Disease*
- *Social Science & Medicine*

12:30-1:00pm

Lunch Break

1:00-2:00pm

Keynote Speaker Presentation

Jenna LeComte-Hinely, Ph.D., HARC

2:00-2:40pm

COVID-19, Advances and Challenges: HDR projects

2:40-3:00pm

Closing Remarks

- **Bruce Link, PhD**

3:00-3:10pm

Center Closing





Carrie Breton, ScD, USC

Carrie Breton, ScD, is Professor of Preventive Medicine at the Keck School of Medicine of USC and is Director of the Maternal And Developmental Risks from Environmental and Social Stressors (MADRES) Center for Environmental Health Disparities. She also co-directs the USC program site for the Environmental Influences on Child Health Outcomes (ECHO) national NIH program. Dr. Breton's work addresses the interplay between genetics, epigenetics and susceptibility to environmental exposures such as air pollution and tobacco smoke on health outcomes in children. Her work in the MADRES Center examines whether pre- and postpartum environmental exposures, coupled with exposures to psychosocial and built environment stressors, affect maternal and child cardiometabolic health outcomes, including perturbed infant growth trajectories and increased childhood obesity risk. Her work in ECHO takes a multigenerational life course approach to studying the contribution of the environment to the developmental origins of childhood and emerging adult respiratory and metabolic health. She has conducted several other studies investigating how environmental exposures alter epigenetic profiles in newborns and young children, and what roles those changes play in underlying disease risk. Dr. Breton holds an ScD in Epidemiology from Harvard T Chan School of Public Health, an MPH from the University of California, Los Angeles, and a BA from Amherst College.



Gabriel Maldonado, MBA, TruEvolution

Gabriel Maldonado is the Founder and CEO of TruEvolution, a social justice and community health organization advancing the quality of life and human dignity of LGBTQ people based in Riverside, California. As a former member of the Presidential Advisory Council on HIV/AIDS under President Obama, Gabriel works to elevate the representation of minority community-based organizations in state and federal policy priorities. In addition to his work at TruEvolution, Gabriel continues his advocacy serving on regional boards, such as Borrego Community Health Foundation and global organizations such as the AIDS Healthcare Foundation.

2022 HDR@UCR ANNUAL SYMPOSIUM

VIRTUAL Event Agenda 1: FEBRUARY 24, 2022

12:30-12:40pm

Dean Welcome

Deborah Deas, M.D., M.P.H, SOM Dean

12:40-1:00pm

Welcome and Introduction by Center Co-directors

David Lo, M.D., Ph.D., School of Medicine

Juliet McMullin, Ph.D., Anthropology

1:00-2:00pm

Keynote Speaker Presentation:

Investigating the Interplay Between Environmental and Social Stressors on Material and Child Health

Carrie Breton, Sc.D, University of Southern California

2:00-2:10pm

Break

2:10-2:20pm

FIRST, Clinical, and CFF Awards

FIRST

Healing the Academy: Addressing Mental Health

Disparities Among Underrepresented Graduate Students

Evelyn Vazquez, Ph.D., Social Medicine, Population, and Public Health

2:20-2:25pm

Financial/Legal Disparities Among Southern California Breast Cancer Patients and Survivors

Deborah Lefkowitz, Ph.D., School of Public Policy

2:25-2:40pm

CLINICAL

A Tele-Health Model of Screening for Autism in Under-Resourced Communities: Closing the Gap in Access

Katherine Stavropoulos, Ph.D., Graduate School of Education

2022 HDR@UCR ANNUAL SYMPOSIUM

VIRTUAL Event Agenda 1: FEBRUARY 24, 2022

2:40-2:45pm

FIRST, Clinical, and CFF Awards *cont'd*

CFF

Field Testing to Determine Best Practices for Community-Accessible Remediation of Soil Contamination to Reduce Metal Exposures

Danielle Stevenson, Ph.D. Candidate, Environmental Toxicology

2:45-2:55pm

The Role of Ethnic Discrimination on the Development of Anxious Hypervigilance in Latinx Youth

Kalina Michalska, Ph.D., Psychology

2:55-3:00pm

Effects on Mental Health of News

Media Coverage of Police Violence against Black Women

Allison Monterrosa, Ph.D., California State University, San Marcos

3:00-3:10pm

Q&A

3:10-3:15pm

Break

3:15-3:30pm

A) Research Updates - 5 year, R01 Projects

Childhood Asthma and Salton Sea

David Lo, M.D., Ph.D., School of Medicine

3:30-3:45pm

Childhood Obesity

Ann Cheney, Ph.D., Social Medicine, Population, and Public Health

Alison Tovar, Ph.D., Brown University

2022 HDR@UCR ANNUAL SYMPOSIUM

VIRTUAL Event Agenda 1: FEBRUARY 24, 2022

3:45-3:55pm

B) Shifting IRWGs to PIC Awards -
Stories on how to move to the next level

*Contextualizing Latinx Children's Developing
Psychopathology: An Interdisciplinary Investigation of
Sociocultural and Psychological Processes Contributing
to Health Disparities in Anxiety*

Elizabeth Davis, Ph.D., Psychology

3:55-4:05pm

How We Heal: Structural Racism in Health Care

Moazzum Bajwa, M.D., MPH, Department of Family Medicine

4:05-4:15pm

Q&A

4:20-5:20pm

*Workshop - Better Understanding Racism Through an
Interrogation of Racial Classification in Research and Practice*

Yolanda Moses, Ph.D., Anthropology

Bruce Link, Ph.D., Public Policy, and Sociology

Taylor Hargrove, Ph.D., The University of North Carolina
at Chapel Hill

5:20-5:30pm

Break

5:30-6:30pm

Keynote Speaker Presentation:

Coming Over the Rainbow: Stigma & Tools of Resilience

Gabriel Maldonado, MBA, Founder and CEO, TruEvolution

2022 HDR@UCR ANNUAL SYMPOSIUM

VIRTUAL Event Agenda 2: FEBRUARY 25, 2022

11-11:10am

Welcome from the Co-Directors

David Lo, M.D., Ph.D. School of Medicine

Juliet McMullin, Ph.D. Professor, Anthropology

11:10am-12:30pm

Publishing Health Disparities Research Panel

Ferzana Kapadia, Ph.D. Deputy Editor for the American
Journal of Public Health

Bettina Beech, Dr.PH., MPH, Associate Editor for the Journal
Ethnicity & Disease

Catherine Panter- Brick, M.Sc., D.Phil., Senior Editor, Social
Science & Medicine

12:30-1:00pm

Lunch Break

1:00-2:00pm

COVID Research in the Inland Empire

Jenna LeComte-Hinely, Ph.D., HARC

2:00-2:10pm

COVID-19, Advances, and Challenges: HDR Projects

*A Solution to Halt Further Isolation of People Aging with HIV
During the COVID-19 Pandemic*

Jeff Taylor, HIV+Aging Research Project-Palm Springs

Christopher Christensen, HIV+Aging Research Project-Palm
Springs

2022 HDR@UCR ANNUAL SYMPOSIUM

VIRTUAL Event Agenda 2: FEBRUARY 25, 2022

2:10-2:15pm	<i>Community Spread and Dynamics of the COVID-19 in Southern California: Effects of Human Mobility and Access to Testing and Care</i> Ran Wei , Ph.D., School of Public Policy Yujia Zhang , Ph.D., Center for Geospatial Sciences
2:15-2:25pm	<i>Correlates of Child and Parent Health and Well-Being during COVID-19 in the Inland Empire</i> Jan Blacher , Ph.D. Graduate School of Education
2:25-2:40pm	<i>STOP COVID-19, CA - CEAL PROJECT</i> Michelle Burroughs , M.P.H., Social Medicine, Population, and Public Health Ann Cheney , Ph.D., Social Medicine, Population, and Public Health Juliet McMullin , Ph.D., Anthropology Maria Conchita Pozar , Center for Health Disparities Ashley Moran , Student Researcher, Center for Health Disparities Evelyn Vazquez , Ph.D., Social Medicine, Population, and Public Health Sherri Salgado , Riverside/San Bernardino Indian Health, Inc. Regina Patton Stell , Ph.D., NAACP Riverside Branch
2:40-3:00pm	Closing Remarks Bruce Link , Ph.D., Public Policy, and Sociology
3:00-3:10pm	Center Closing David Lo , M.D., Ph.D. Senior Associate Dean for Research, SOM

2020 Grant Awards / Research Projects

Fostering Interdisciplinary Research-early Stage Pilot Grants (FIRST)

Andrea Polonijo, Chancellor's Postdoctoral Fellow, Department of Social Medicine, Population, and Public Health, SOM (Mentor: Brandon Brown, Center for Healthy Communities, SMPPH)

"Bundling Rapid HIV Testing with a Meningitis and HPV Vaccination Intervention to Reduce Health Disparities"

Young men who have sex with men (MSM) are at elevated risk for human immunodeficiency virus (HIV) infection, human papillomavirus (HPV)-related cancers, and meningitis. These disparities are further magnified among young racial-ethnic minority MSM, who disproportionately lack healthcare access. Rapid HIV testing in non-clinical, community-based settings has proven to be an effective strategy for reaching racial-ethnically diverse groups of young MSM, including those who have never received prior HIV screening in traditional clinical settings. Hence, community-based, rapid-HIV testing sites may provide a valuable opportunity to refer clients for other preventative interventions—including HPV and meningitis vaccination—to help reduce health disparities across multiple diseases. Hypothesis to be tested: Integrating direct messaging about HPV and meningitis vaccination into community-based, rapid HIV-testing visits will increase clients' (a) willingness to vaccinate against HPV and meningitis and (b) actual uptake of these vaccines. Approach: Data will be collected and analyzed in partnership with TruEvolution, the Inland Empire's leading HIV non-profit organization that offers rapid HIV testing and primarily serves lesbian, gay bisexual, transgender, and queer communities and persons of color. Data collection will occur in three phases. First, qualitative focus groups with members of TruEvolution's support groups will be used to shape the messaging used in an integrated rapid-HIV testing and meningitis and HPV vaccination intervention. Second, a quantitative survey will be conducted with rapid-HIV testing clients to assess (a) their underlying knowledge, attitudes, and beliefs about HPV and meningitis vaccination and (b) their willingness to be vaccinated after receiving a HPV and meningitis vaccination messaging intervention. Third, a follow-up quantitative survey will measure intervention recipients' perceptions about and actual uptake of meningitis and HPV vaccines, in the months following the intervention.

Lucie Kalousova, Assistant Professor Sociology (Mentor: Bruce Link, Public Policy)

"The Impact of the Tobacco 21 Law on Smoking Initiation Disparities in California"

Cigarette smoking remains the most important preventable cause of death in the United States. Smoking is highly unequally distributed in the population. Children with low socioeconomic status, from some racial/ethnic backgrounds, and sexual minorities, are more likely to initiate into smoking and to initiate earlier in life. This translates to large disparities in health. As a new policy to combat smoking initiation, California implemented the Tobacco 21 law in June 2016, which bars people under 21 from purchasing tobacco products including e-cigarettes. The study will evaluate whether the law was successful in preventing initiation, delaying initiation, and whether its effects were comparable for advantaged and disadvantaged children and youth. Hypotheses to be tested: 1) Probability of cigarette initiation among children and youth was lower in 2016 than in 2015. 2) Probability of e-cigarette initiation among children and youth was lower in 2016 than in 2015. 3) Decline in probability of cigarette initiation was greater for advantaged than disadvantaged children. 4) Decline in probability of e-cigarette initiation was greater for advantaged than disadvantaged children. 5) Time to initiation among children and youth was longer in 2016 than in 2015. 6) Time to e-cigarette initiation among children and youth was longer in 2016 than in 2015. 7) Increase in time to cigarette initiation was greater for advantaged than disadvantaged children. 8) Increase in time e-cigarette initiation was greater for advantaged than disadvantaged children. Approach: I will use the California Health Interview Survey and Population Assessment of Tobacco and Health survey. I will estimate matched difference in differences models and event history models to assess whether the probability of initiation and time to initiation have changed after the policy implementation, and whether the policy was equally beneficial to advantaged and disadvantaged children.

2020 Grant Awards / Research Projects

Pilot Interdisciplinary Collaborative Awards (PIC)

Chioun Lee, Assistant Professor Sociology; Soojin Park, Assistant Professor GSOE

"Cardiovascular Health at the Intersection of Gender and Race/Ethnicity: Identifying Life-course Processes to reduce health disparities"

In 2010, the American Heart Association introduced a new metric, "ideal cardiovascular health," to improve cardiovascular (CV) health and reduce health disparities in populations, yet racial/ethnic disparities in CV health persist. Non-Whites are far less likely than Whites to achieve ideal CV health, and the racial/ethnic gap is larger for women than men among Blacks and Hispanics. The mediating role of life-course factors has been widely implicated, but existing studies are limited to only a few factors whose relative importance has not been rigorously tested. Using two national longitudinal studies of aging (the Midlife in the United States study and the Health Retirement Survey), we aim (1) to examine to what degree disparities in CV health exist at the intersection of race/ethnicity and gender and (2) to assess to what degree life-course factors (early-life adversity, adult socioeconomic status, perceived discrimination, parenthood, and neighborhood) contribute to the disparities. We use causal decomposition analysis to estimate the extent to which racial/ethnic-gender disparities would be reduced if the distributions of life-course mediators were equal across the groups. We conduct sensitivity analyses to determine the extent to which unmeasured confounders would invalidate our findings. The proposed project will advance the PIs' overall goal of conducting health disparities research. The PIs will use financial support from the PICR Award to prepare a R01 proposal, through which the PIs will use an intersectionality approach to investigate life-course processes that reduce health disparities. Although our study does not directly collect data from a community sample, we aim to engage with health professionals and residents in the community by presenting our work and receiving feedback at community research centers. Findings from this project will inform intervention programs that are designed to reduce cardiovascular disease risk by modifying life-course factors, particularly for marginalized individuals.

Kalina Michalska, Assistant Professor Psychology; Rengin Firat, Assistant Professor Sociology

"The effects of intergenerational transmission of cultural values on youth with disruptive behavior disorders"

Aggression and disruptive behavior disorders, such as conduct problems (CP) in girls have tremendous clinical and public health significance. In the past decade, while overall youth aggression and delinquency decreased significantly, criminal behavior and delinquency increased sharply among girls. Yet, there is little research on the intersectional mechanisms through which aggression and CP disadvantage girls of color, and even less research on Latinx girls. Building on a growing body of literature demonstrating that first generation and more recent immigrants have better overall and particularly mental health outcomes than second generation (US born) immigrants, and that cultural value transmission and acculturation play a role in creating this 'health paradox' (e.g., Pfundmair et al. 2015), our study addresses this gap by focusing on the role of ethnic/racial value socialization practices among Latinx immigrant parents on their children's emotional regulation and reactivity during threat and safety learning and mother-child interaction tasks. Hypothesis to be tested: Our main hypothesis is that a more successful transmission of cultural values, or ethnic/racial socialization, (measured with surveys with the parents) will potentially lead to improved emotional regulation and reactivity in children that we will measure through both self-reported and psychophysiological indicators of emotion reactivity to stressors. The current proposal will employ multiple methods (e.g., psychophysiology, survey, community advisory boards) to characterize the association between ethnic/racial family socialization and psychophysiological correlates (skin conductance and heart rate variability) of emotion processing with multidimensional measures of youth aggression, conduct problems, and delinquency. Drawing from the large Latino population in the Riverside county (California) catchment area, we will recruit a sample of 120 pre-adolescent Latina mother-daughter pairs to test our hypotheses.

2020 Grant Awards / Research Projects

Rachel Wu, Assistant Professor Psychology; Mark Mapstone, Professor Clinical Neurology UC Irvine; Marcus Kaul, Associate Professor Biomedical Sciences SOM

“Cognitive health disparities in minority/disadvantaged older adults”

Although several studies have investigated ways to mitigate cognitive decline in older adults, only three have included a sizeable proportion (approximately 25%) of minority older adults in the sample (Tzuang et al., 2018). A growing literature shows that older adults from particular minority ethnic and racial groups (African American and Hispanic/Latinx), with low socioeconomic status, and with low formal education levels (up to some college) are disproportionately at greater risk for cognitive decline and Alzheimer's Disease and related dementias (ADRD) compared to higher SES, non-Hispanic Whites (e.g., Garcia et al., 2017; Gross et al., 2015). It is unclear whether and how cognitive interventions, such as learning new skills, may be differentially beneficial for older adults in minority/disadvantaged groups compared to majority groups. Although learning new skills enhances cognitive abilities (e.g., Leanos et al., 2019; Park et al., 2014) and brain structures in older adults on average (e.g., white matter integrity and gray matter volume, Boyke et al., 2008; see Zatorre et al., 2012), skill learning is an inherently stressful activity, which may increase inflammatory markers that may interfere with neural growth factor signaling (e.g., Cotman et al., 2007; Steptoe et al., 2001). No published study has yet investigated the impact of stress from cognitive interventions involving novel skill learning on inflammation and vascular function in older adults. These key metabolic pathways are affected early and robustly by AD pathobiology. The funded intervention will collect cognitive and socio-motivational data, and the proposed research would fund additional data collection and analyses of biological markers of inflammation and vascular function, which would reflect stress from novel skill learning. The study population is expected to include at least 30% racial/ethnic minorities and/or individuals with low levels of formal education and/or low socio-economic status. An important aspect of our proposed research includes community engagement (e.g., older adult research assistants, talks at community events) to open communication channels to align scientific and community goals for the intervention project. Potential outcomes (hypotheses): In terms of cognitive and socio-motivational outcomes, minority older adults may benefit more from the skill learning intervention compared to majority older adults given their societal disadvantages (e.g., restricted access to education). In terms of biological markers, minority older adults may have higher initial levels of inflammatory markers compared to majority older adults, but may not increase as much from the stress from novel skill learning due to developed coping strategies to stress in their daily lives.

Interdisciplinary Research Working Groups (IRWG)

Ilana Bennett, Assistant Professor Psychology; Psychology, Statistics, Bioengineering

"Working group on underrepresented participant recruitment barriers"

The University of California, Riverside (UCR) Aging Initiative seeks to create an Institute on Healthy Aging. The Institute will be a center of research on aging, provide education, and be a hub for the community. We envision a uniquely integrative research program that considers aging from molecule to individual to society. To date, our understanding of aging within and between these levels of study is significantly limited by the homogeneity of older adults who enroll in research studies. Situated in one of the most diverse areas of the country, the campus-wide Aging Initiative is poised to overcome this limitation. Yet, our participant enrollments fail to match the ethnic and racial diversity of the local Riverside community. To address this obstacle and to achieve better understanding of disparities across aging demographics, we are assembling a working group tasked to identify barriers to recruitment of individuals from underrepresented backgrounds and to overcome these barriers through outreach in the Riverside community. As such, this working group directly addresses health disparities among aging populations in our region. It will also lead to more represented research that will positively influence the scientific understanding of aging across diverse populations. Lastly, our work can also serve as a case study to be shared with other groups of how to successfully engage diverse, underserved and underrepresented older adult populations in research that can promote healthy aging.



2020 Grant Awards / Research Projects

David Volz, Associate Professor Environmental Sciences; Biomedical Sciences, CEE, Chemistry, Environmental Sciences, MCSB

“UCR Superfund Research Program”

Within the United States and around the world, arsenic is a naturally occurring trace element (metalloid) and groundwater contaminant primarily derived from weathering of porous, arsenic-containing rocks within underlying aquifers. Long-term exposure to elevated concentrations of inorganic arsenic ($>50\text{-}100\text{ }\mu\text{g/L}$) may lead to a range of adverse health effects within adults and children. Within pregnant women, arsenic readily migrates through the placenta and, in addition to maternal exposure, has the potential to expose the developing fetus, resulting in low birth weight and fetal malformations. Low income residents within rural, unincorporated communities of eastern Coachella Valley (Thermal, Oasis, Mecca, and North Shore) are particularly vulnerable to elevated exposure to arsenic-contaminated groundwater. Therefore, from January 2020 through April 2021, the primary objective of our Interdisciplinary Research Working Group (IRWG) will be to catalyze discussions, develop a cohesive research/outreach strategy, and flesh out focused yet integrated projects/cores for a five-year UCR Superfund Research Program (UCR-SRP) Center (P42) application (maximum of \$8.75M total direct costs over five years) to be submitted to the NIH's National Institute of Environmental Health Sciences (NIEHS) in April 2021. The overall theme of our problem-oriented P42 application will be centered on human exposure and effects of arsenic-contaminated groundwater within low-income Latino communities of eastern Coachella Valley – a theme that is not specifically addressed within NIEHS' existing P42 portfolio, has not been thoroughly investigated within eastern Coachella Valley, and has immediate relevance to other low-income desert regions of the Southwestern United States.

Khaleel Razak, Associate Professor Psychology; Psychology, Public Policy

“The contribution of hearing loss to age-related cognitive decline in the Inland Empire”

Hearing loss is one of the strongest risk factors in the development of age-related cognitive decline and dementia. Indeed, it is a stronger risk factor than hypertension and obesity which are conditions about which the aging population is generally well informed. Hearing loss is also the most modifiable risk factor when treated from middle age. However, there are very little data on the prevalence of age-related hearing loss and the hurdles to obtaining hearing aids in the Inland Empire (IE) region. The aim of the present proposal is to assemble a group of researchers with backgrounds in the fields of aging, hearing sciences, population health and medical sociology to begin collecting data on the extent to which aging population in the IE receive hearing loss diagnoses and treatment. We will also form a network with IE counties' stakeholders on aging to identify the sample population and begin collecting survey based data on disparities in aging and hearing loss diagnoses/treatment. Finally, we will organize a workshop with IRWG investigators, their trainees, IE county stakeholders and outside consultants to develop multi-year extramural federal and state grant proposals to identify whether there are socioeconomic, racial-ethnic and other disparities in treatment of age-related hearing loss in the IE and the extent to which this leads to social isolation and cognitive decline.



2020 Grant Awards / Research Projects

Carolyn Murray, Professor Psychology; Psychology, Anthropology, History

“Fight or Flight: Antiblack Terror, Fear, and Mental Health in the Contemporary United States”

The present proposal is requesting funds to establish an Interdisciplinary Research Working Group (IRWG), with a specific focus on fear as a foundational element of the Black youth experience which impacts both their physical and mental health, and results in extremely disparate health outcomes. This project will follow principles of community participatory research. Specifically, the underlying principles are: (1) The project seeks to enhance the community's welfare through empowering the community to address its own health issues. (2) The project will be designed to increase community knowledge of the issue, such as understanding the effects of violence on the psyche of children in the Black community. (3) Community and academic participants will be involved in all project phases, including planning, implementation, research and evaluation, analysis, interpretation, and dissemination. (4) The project will consider and address the political, social, and economic determinants of the main health issue addressed by the project. (5) Dissemination of the research results will be the responsibility of all project participants. The working group will develop a research proposal for more substantial funding to deal with the impacts of Black fear.

Moazzum Bajwa, Assistant Professor Family Medicine SOM; Anthropology, Psychology, SMPPH

“How We Heal: Applying Structural Competency to Care for the Immigrant and the Refugee”

The association between inequality and health is influenced by multiple environmental and socio-political contexts. Migration is considered a significant factor that reframes the experiences of specific subpopulations (i.e. foreign-born Latinos) into persistent and daily chronic strain; this can adversely affect health outcomes in a profound way, leading to psychological distress, psychosomatic symptoms, and compromised immune systems. The ability to address these issues requires structural competency of the macrosystems, microsystems, and exo-systems that shape these individual health outcomes. Structural competency is broadly defined as the capacity to both recognize and respond to the downstream effects of social, political, and economic factors that extend beyond the clinical walls². There are several domains within each of these factors that require analytical understanding at the community level to impact lasting change. The focus of our Interdisciplinary Research Working Group is to develop a collaborative framework to address the issues that afflict immigrant and refugee health. Our goal is to bring together academics, advocates, providers, and community leaders with expertise in structural inequality in immigrant and refugee health to advance conversations and action. Community-level action is a precursor for healthcare policy change and research. As a first step toward this goal, we will organize a conference. Through the lens of structural competency, our conference will serve as a nexus for community-based clinicians, public health officials, public policy professionals, and local community organizers to share their experiences and collaborate to address each system level and improve health outcomes.

2021 Grant Awards / Research Projects

Fostering Interdisciplinary Research-early Stage Pilot Grants (FIRST)

Evelyn Vázquez, Ph.D., Department of Social Medicine, Population, and Public Health (Mentor: Ann Cheney, Ph.D., Co-mentor: Michalis Faloutsos, Ph.D.)

"Healing the Academy: Addressing Mental Health Disparities Among Underrepresented Graduate Students"

The proposed research focuses on underrepresented graduate students (UGSs), which include students who have had to overcome oppression and discrimination in their life. The research itself will engage stakeholders in research on underrepresented graduate student health and examine academic structures that contribute to poor mental health among this student population. The project work consists of two specific aims. First aim is to engage key stakeholders in examining the impact of academic environments on UGS mental health. Second aim is to characterize the academic environmental conditions that contribute to poor mental health among UGSs. We anticipate that the structural vulnerability model can explain how hostile work environments influence mental health burden among UGSs. We also anticipate that the combination of surveys and tech-enabled longitudinal light-weight data collection will capture nuances in academic structures explaining both historical and institutional factors in UGS mental health outcomes.

Samantha C. Ying, Assistant Professor of Soil Biogeochemistry (Mentors: Dr. Kathryn Urich, Dean of CNAS, and Dr. Scott Fendorf, Senior Associate Dean at Stanford University)

Does replenishing California's groundwater adversely affect water quality and disadvantaged communities?

33 million Californians use groundwater as their primary drinking source. Due to California's climate and recent severe drought, California's groundwater needs multiple routes of replenishment to sustain agricultural, residential, and industrial uses. While these methods increase total quantity of groundwater, some methods to recharge groundwater may lower water quality which can adversely affect health of consumers in certain communities disproportionately particularly within rural agricultural areas. Flood managed aquifer recharge (flood MAR) is a relatively new method that is being explored to contribute to groundwater replenishment. Rainwater and other surface water runoff are funneled to large permeable basins on agricultural sites where water can then infiltrate to the aquifer. The proposed research will accomplish the first of 2 phases. Phase 1 will determine whether and how flood MAR will contribute to groundwater quality decrease within the vicinity of a MAR basin with Pajaro Valley through a series of biogeochemical experiments which may adversely affect the health of nearby communities dependent upon that water supply. We will engage stakeholders from the Community Water Dialogue of Pajaro Valley to disperse our research findings and to hold forums where stakeholders can provide information that will inform long-term research objectives and policies to increase groundwater quantity while maintaining drinking water quality. Phase 2 will determine the health impacts of the MAR-sourced metal contamination of groundwater.



2021 Grant Awards / Research Projects

Clinical Studies

Dr. Katherine Stavropoulos (Graduate School of Education); & **Jan Blacher** (Graduate School of Education)

"A Tele-Health Model of Screening for Autism in Under-Resourced Communities: Closing the Gap in Access"

The UCR SEARCH Center will use this grant to expand their current free autism screening/diagnosis program to include telehealth. This project is strengthened by partnerships with the UCR School of Medicine (Co-Investigator Dr. Takesha Cooper), stakeholders (Mirna Sucena), and internationally recognized experts in telehealth assessments (Dr. Zachary Warren). There is growing recognition of inequity related to accessibility of early autism screenings and diagnosis for underserved families. The current grant is designed to both increase access to quality autism diagnoses for families who would otherwise have difficulty accessing such services, and to systematically measure the efficacy and validity of telehealth compared to traditional in-person screenings. Our measures will include both caregiver ratings of satisfaction, feasibility, and utility of telehealth procedures and comparisons of diagnostic agreement across assessment settings (e.g. in person vs. telehealth). This dual approach is critical to increase our understanding of both whether telehealth is objectively as accurate as traditional in-person screenings, and whether families who would utilize telehealth services find the format acceptable, satisfactory, and convenient. By asking families about what aspects of telehealth they find most helpful (e.g. it saves time, does not necessitate taking time off work, does not require travel), we can tailor SEARCH's approach to implementing telehealth procedures for families across the Inland Empire. Finally, our ability to provide all services in both English and Spanish based on caregiver/child preference will allow us to reach families who would otherwise be left out of research conducted only in English.

Brandon Brown, PhD MPH, UCR Social Medicine Population and Public Health

"A Solution to Halt Further Isolation of People Aging with HIV During the COVID-19 Pandemic"

Prior to COVID-19, the HIV epidemic was arguably the worst public health crisis affecting the United States. While previously a death sentence, combination therapy transformed HIV infection into a largely manageable, chronic condition so that the majority of people with HIV now are over age 50. Many people aging with HIV have also endured significant trauma due to AIDS, including personal losses of friends and loved ones, contributing to high rates of depression. Physical distancing required for older people living with HIV who may be at increased risk for severe COVID-19 complications has enhanced the urgency to develop interventions that mitigate depression and isolation. Our preliminary COVID-19 survey data show that half of people aging with HIV reported experiencing anxiety and depression. Some reported skipping meals due to worries about money for food, and many reported missing a dose of their HIV medication during the COVID-19 pandemic, with the majority stating that they forgot as the reason. Our overall objective is to develop an online "virtual village" for use by older people living with HIV (PLWH) so that they can remain socially connected during the COVID-19 pandemic and beyond. We will do this by (Aim 1) further characterizing issues related to depression, isolation, and basic needs of people aging with HIV during the COVID-19 pandemic, (Aim 2) co-develop ideas for what to include in a virtual village, and (Aim 3) piloting activities for the virtual village. Methods: We will conduct key informant interviews and virtual focus groups as a follow-up to our quantitative needs assessment for older PLWH isolated during COVID-19. We will then utilize conjoint analysis for decision making on the key areas to include in the virtual village. Finally, we will pilot activities for the virtual village in a group of people aging with HIV in Palm Springs, including the deaf community which is often overlooked. We will utilize community-based participatory action research (CBPAR) processes throughout the project, allowing our community advisory board (which we developed from a previous project on HIV and aging) to steer all phases of the work. Community-driven research helps ensure community investment and a higher likelihood of sustainability of any outcomes, rather than researchers deciding what they feel is best.



2021 Grant Awards / Research Projects

Dr. Jan Blacher PhD, Graduate School of Education

"Mental Health and Educational Risks through the Lens of Disparities: Elevating Family Resilience during COVID-19"

COVID-19 has caused an unprecedented disruption to K-12 education. To prevent the spread of coronavirus, in-person instruction was suddenly replaced with remote learning, or the education of children at home. This major change led to worsened issues of equity in education, as well as heightened caregiving burdens and parenting stress at home. Although adverse effects of school closures are likely felt by all families, the impact may be disproportionately higher among vulnerable groups, including: young children who are largely dependent on caregivers for remote learning; children with special education needs who have experienced a significant reduction in support services that they rely on, and racial/ethnic minority children for whom inequalities might widen. For the richly diverse communities of the Inland Empire, pre-existing socioeconomic and health disparities threaten to exacerbate consequences of school closures. Yet, the existing research on COVID-19 has overlooked the role of distance learning in contributing to health outcomes and disparities. To address this limitation in the field, this proposal seeks to conduct a study of family adaptation as a function of family stressors, resources, and perceptions of remote learning with 500 parents of school-aged children in the Inland Empire. Utilizing a mixed-methods longitudinal design, the specific aims are to: 1) describe immediate family needs and experiences of school closures; 2) assess how families fare across spectrums of child development, disability, and race/ethnicity over time; and 3) investigate intervening variables that may predict family adaptation outcomes. This proposal generates a new opportunity to empirically explore parent narratives as a step towards determining the impact of COVID-19 on families with school-aged children, as well as assessing community resources and capacities for mitigation. Findings from this research will contribute to our understanding of the underlying mechanisms through which disparities emerge, with the goal of elucidating pathways to family resilience.

Elizabeth Davis, PhD. Associate Professor, Psychology

"Contextualizing Latinx children's developing psychopathology: An interdisciplinary investigation of sociocultural and psychological processes contributing to health disparities in anxiety"

Growing evidence suggests that Latinx children have a heightened risk for anxiety symptoms. We lack a clear understanding of how early-emerging symptoms are maintained, worsened, or improved. Even less clear are the reasons for the disparity in mental health outcomes among Latinx youth. Given the heightened risk for anxiety and other psychopathology among Latinx, the primary goal of this new IRWG is to improve understanding of the disproportionate risk for psychopathology (like anxiety) faced by Latinx youth. This IRWG will bring together five UCR faculty from three different disciplines (Psychology, Hispanic Studies, Political Science) to interrogate the open question of why this specific health disparity—increased risk for and prevalence of anxiety—exists for Latinx children. The faculty participants have complementary expertise in child development, clinical science, emotion regulation, bilingualism and linguistic contexts, and the socioeconomic ramifications of work, labor, and labor-related policies, all of which influence and contextualize children's development and lives. This project will enable a deep investigation into the factors that may help explain Latinx children's anxiety development, including emotion regulation abilities, and the sociocultural contexts in which children live and grow. This interdisciplinary approach represents a promising, problem focused way to advance our understanding of Latinx children's psychopathology.

