# STATE OF THE SCIENCE MEETING

SEPTEMBER 26-27 • ST. PETERSBURG, FLORIDA

AMONG AGRICULTURAL WORKERS IN VULNERABLE RURAL COMMUNITIES



## STATE OF THE SCIENCE

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The Southeastern Coastal Center for Agricultural Health and Safety (SCCAHS) is part of a Centers for Disease Control and Prevention (CDC) / National Institute for Occupational Safety and Health (NIOSH) Agricultural Health and Safety Initiative. SCCAHS explores and addresses the occupational safety and health needs of people working in agriculture, fishing, and forestry in Alabama, Florida, Georgia, Mississippi, North Carolina, South Carolina, the U.S. Virgin Islands, and Puerto Rico. The Center brings together investigators from six partnering institutions: the University of Florida, University of South Florida, Florida State University, Florida A&M University, Emory University, and the University of the Virgin Islands.

The purpose of this **State of the Science** meeting is to 1) identify the mental health issues that farmworkers, farm operators, farm owners and others in these communities face; 2) address the social, environmental and built-environment associations with mental health in rural communities; and 3) understand the inequities in farmworker/fishery/ forestry community mental health (depressive or substance use disorder rates) and how we might close these gaps to encourage individual, family, and community-level resilience.

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## AGENDA LETTER FROM THE DIRECTOR

#### **Thursday, September 26**

5:30 - 7:00 - Poster Session: Arcade outside conference room. Open to presenters, attendees, their students and postdocs. Heavy appetizers to be served. Dinner on your own.

#### Friday, September 27

8:00 - 8:30 - Light breakfast

8:30 - 9:00 - Welcome by Dr. Michael Perri

#### **Mental Health Stressors in Agricultural Workers and Communities**

- 9:00 9:30 **Dr. Christine Chasek,** Investigating Opioid and Alcohol Risk and Misuse Among Rural Agricultural Workers
- 9:30 10:00 **Dr. Anna Scheyett,** Death on the Farm: Characteristics and Contextual Factors in Farmer and Agricultural Worker Suicides in Georgia from 2008-2015

10:00 - 10:15 - Break

#### **Mental Health Stressors Affecting Vulnerable Communities**

- 10:15 10:45 Dr. Robert Leeman, Stressors, Resilience Factors and Applicability of New Interventions for Substance Misuse
- 10:45 11:15 **Dr. Jeanne-Marie Stacciarini,** CBPR: Rurality, Social Networks and Mental Well-being in Rural Latinos
- 11:15 11:40 Lightning rounds

Featuring: Dr. Angela Lindsey, Dr. Heidi Radunovich, Dr. Kim Dunleavy, Farah Arosemena, MPH, and Dr. Joseph Grzywacz

11:40 - 12:20 - Lunch, Lightning round topic table discussions

#### **Community and Individual Resiliency Today**

- 12:20 1:00 **Dr. Ashley Wennerstrom and Dr. Julie Smithwick,** Community Health Workers: A Powerful Resource for Improving Behavioral Health and Building Community Resilience
- 1:00 –1:30 **Dr. Lynn Grattan,** Surviving the Storm: Individual Resilience in Agricultural Leaders after Hurricane Irma

1:30 - 1:45 - Break

1:45 - 3:00 - Facilitated panel discussion

3:00 - 3:30 - Conclusion



Those who work in agriculture face many stressors, including financial uncertainty, family and relationships issues, social isolation, disaster, accidental injury, and acute and chronic diseases, that can affect their mental health. While some mental health issues, such as the high rate of farmer suicides, have been discussed widely, other mental health stressors that affect agriculture workers in vulnerable rural communities have not been discussed as broadly.

For our second annual State of the Science

meeting, we have assembled a slate of outstanding presenters on the topic of Stress and Resilience Among Agricultural Workers in Vulnerable Rural Communities. Our goal is to provide a forum for researchers from a variety of backgrounds to discuss current findings, paving the way for development of interdisciplinary research collaborations on this important topic.

We thank the National Institute of Occupational Safety and Health and the Centers for Disease Control and Prevention for providing the resources for us to learn from the industries we serve and to work with our partners to determine how best to fill the gaps and address needs in the areas of agricultural health and safety in the coastal Southeast.

In addition, we thank our community and stakeholder partners and hope that through our work, we can assist these industries by enhancing their understanding of and capacity to respond to current and future health and safety issues. It is our hope that this work continues to be responsive to unique needs in our region and provide support to the workers in our agriculture, fishing, and forestry industries.

Dr. Glenn Morris Director

## GUEST SPEAKERS

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#### **Dr. Michael Perri**

College of Public Health and Health Professions, University of Florida



Michael G. Perri, Ph.D., ABPP, is the Dean of the College of Public Health and Health Professions and the Robert G. Frank Endowed Professor of Clinical and Health Psychology. Dr. Perri was appointed Dean in 2009, after serving as interim dean for two years. Under his leadership, the college has grown from 1,700 to 2,505 students and has expanded its academic portfolio to include a doctorate of occupational therapy, Ph.D. programs and concentrations in

biostatistics, environmental and global health, epidemiology, One Health, public health, social and behavioral sciences, an online Master's of Public Health, and a Bachelor of Public Health. Dr. Perri's research focuses on health promotion and disease prevention through changes in diet and physical activity. He has contributed to more than 185 publications and has been the principal investigator or co-investigator for more than \$60 million in research grants and contracts. Dr. Perri is an elected fellow of the American Psychological Association, the Society of Behavioral Medicine, and the Obesity Society. He is the recipient of the American Psychological Association's Samuel M. Turner Award for Distinguished Contributions to Applied Research in Clinical Psychology and the Society of Behavioral Medicine's Distinguished Research Mentor Award.

#### **Dr. Christine Chasek**

Department of Counseling and Psychology, University of Nebraska Kearney



Dr. Christine Chasek teaches several mental health, counseling, and development courses at the University of Nebraska Kearney (UNK). For over 15 years, Dr. Chasek practiced mental health and drug and alcohol counseling as a Licensed Independent Mental Health Practitioner and a Licensed Alcohol and Drug Counselor. Before teaching at UNK, Chasek worked as a program director for a mental health care clinic and as Assistant Director of Counseling at UNK's

Counseling Care Center. Chasek specializes in mental health and addictions. Her research interests include addiction counseling, attitudes of providers about addictions counseling, counselor preparation and clinical outcomes. Chasek is a member of the American Counseling Association, is the membership chair and president-elect of the Nebraska Counseling Association, is on the State of Nebraska Board of Alcohol and Drug Counseling, is involved in the Association of Counselor Educators and Supervisors, and is a member of the International Association of Addictions and Offender Counselors, the Chi Sigma Iota Counseling Academic and Professional Honor Society International and Rutgers Alumni Association of Alcohol and Drug Studies.

#### **Dr. Anna Sheyett**

Dean of the School of Social Work, University of Georgia



Dr. Anna Scheyett became dean of the University of Georgia School of Social Work in 2016. Before joining UGA, Scheyett served as dean of the College of Social Work at the University of South Carolina. During her five years there, she established an impressive record of stimulating academic achievement while building financial support for the college. Prior to her tenure at USC, Scheyett served as associate dean for academic affairs at the University of North

Carolina at Chapel Hill School of Social Work. Her work experiences also include clinical and administrative positions in community mental health services. In addition to a master's and doctoral degree in social work, Scheyett holds degrees in biology and human genetics. Her background in both the natural and social sciences supports her longstanding interest in improving services and promoting recovery for those with severe mental illnesses. She has researched the subject for more than 25 years, with a particular focus on the intersection of mental illness and the legal system. Scheyett has served in numerous leadership roles, including serving as a member of the North Carolina and national boards of National Association of Social Workers, as a member of the board of the St. Louis Group for Social Work research, and is currently a member of the Board of the National Association of Deans and Directors of Schools of Social Work.

#### **Dr. Robert Leeman**

Department of Health Education and Behavior in the College of Health and Human Performance, University of Florida



Dr. Robert Leeman is an Associate Professor in the Department of Health Education and Behavior at the University of Florida and Adjunct Assistant Professor of Psychiatry at the Yale School of Medicine. He earned a bachelor's degree from Clark University, followed by an M.A. and Ph.D. in Psychology from the University of Pennsylvania. After his Ph.D., Dr. Leeman spent a decade at Yale School of Medicine, first as a post-doctoral fellow, then as a faculty

member. During his time at Yale, he also spent three years as a research scientist with the VA MIRECC in West Haven, CT before joining the faculty at UF. His primary research interest is in relationships between various difficulties with self-control and addictive behaviors, particularly alcohol use, though he also has also conducted research on opioid misuse, tobacco use and gambling. He has particular interests in impaired control over alcohol use (i.e., difficulty adhering to limits on use), disinhibition/impulsivity, relationships between alcohol use and sexual health behaviors/HIV risk, and cognitive biases.

## GUEST SPEAKERS

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#### **Dr. Jeanne-Marie Stacciarini**

Director of Diversity and Inclusion, College of Nursing, University of Florida



Dr. Jeanne-Marie Stacciarini teaches research methods in the Ph.D. program as well as psychiatric and mental health nursing and leadership in the BSN. In 2011, Dr. Stacciarini received the College of Nursing International Educator of the Year Award and in 2012-2013 she received the College of Nursing Teacher of the Year Award. Dr. Stacciarini's research interests are in the area of mental health promotion and health disparities in minorities, community-based

participatory research for minorities, rural and international populations. In recognition of her work with underserved populations, she received the Southern Nursing Research Society (SNRS) Award for Research in Minority Health (2012), the American Psychiatric Nurses Association Award for Excellence in Research (2014) and University of Florida Term Professorship Award (2017-2019) Dr. Stacciarini is a member of the American Academy of Nursing and she holds membership in the American Psychiatric Nurses Association, Sigma Theta Tau and the Southern Nursing Research Society. She is the College of Nursing director of diversity and inclusion and she is the EMBRACE program coordinator. She has been a mentor for the UF University Minority Mentor Program and member of the UF Ronald E. McNair Post-Baccalaureate Achievement Program Council.

#### **Dr. Ashley Wennerstrom**

Community and Population Medicine, School of Medicine, Louisiana State University



Dr. Ashley Wennerstrom is a faculty co-investigator for the Tulane Prevention Research Center (PRC). Dr. Wennerstrom's work focuses on the PRC's core project and its components related to Community Health Workers. She is also the principal investigator for the PRC's Special Interest Project titled NOLA LEADS – Leadership Education and Action on Health Disparities. Dr. Wennerstrom and fellow Tulane PRC staff member Catherine Haywood are dual Principal Investigators

on a National Institutes of Health (NIH)-funded Community Based Participatory Research study focused on intimate partner violence and birth outcomes. Dr. Wennerstrom is also leading a project, funded by the Patient-Centered Outcomes Research Institute (PCORI), that aims to address barriers that former prisoners face in accessing health care and support services for chronic conditions and behavioral disorders. Dr. Wennerstrom is the director of the Louisiana Community Health Worker Training Institute, co-founder and past chair of the Louisiana Community Health Outreach Network, the Community Health Clerkship Director for Tulane School of Medicine, a section councilor and treasurer for the Community Health Planning and Policy Development Section of the American Public Health Association (APHA), and co-chair of the policy committee for the Community Health Workers Section of APHA.

#### **Dr. Julie Smithwick**

Director of the Community Health Worker Institute at the University of South Carolina



Dr. Julie Smithwick is Director of the Community Health Worker Institute at the University of South Carolina. She has over 25 years of experience working with marginalized communities and families, cultivating solutions towards greater health equity. Trained as a Community Health Worker in Ecuador, South America, Dr. Smithwick is the founder and director of the Arnold School of Public Health Community Health Worker Institute at the University of South

Carolina. Prior to developing the CHW Institute, Dr. Smithwick founded and led PASOs, a community-based organization that engages with Latino communities throughout South Carolina to fill health and early childhood gaps. While leading PASOs' statewide team of Community Health Workers, Dr. Smithwick helped found the South Carolina Community Health Workers Association in 2014 and was asked to join the founding Board of Directors of the National Community Health Workers Association in 2016. Dr. Smithwick is a member of the state leadership team of the Alliance for a Healthier South Carolina and co-directs the South Carolina Health Equity Coalition. She is also on the Boards of Directors of various organizations including Eau Claire Community Health Centers, the Blue Ridge Institute for nonprofit leaders, and the Fund for Southern Communities Foundation.

#### **Dr. Lynn Grattan**School of Medicine, University of Maryland



Dr. Lynn Grattan has been leading NIH-funded research studies of the neuropsychological and behavioral impacts of a wide variety of neurological, neurosurgical, and neurotoxic insults on the human brain for more than 25 years. This includes studies of memory disorders, frontal lobe functions and dysfunction, and other domains of cognitive disruption as the result of neurologically related illness, injury, or toxin exposures in children, adults, and geriatric groups.

More recently, Dr. Grattan's research has focused on people living in coastal communities in distress due to the risk of exposure to marine toxins or other environmental hazards. She has conducted studies of putative toxin exposure on Maryland's Eastern Shore, ciguatera poisoning in the U.S. Virgin Islands, and is currently working with several Native American and non-Native American Communities in the Pacific Northwest who are at risk of Amnesic Shellfish Poisoning. Dr. Grattan has also led studies of the human health impacts and psychological resilience after the Deepwater Horizon Oil Spill in the Gulf of Mexico. The latter studies were designed and implemented using a Community Based Participatory Research model.

## PRESENTER ABSTRACTS

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#### Investigating Opioid and Alcohol Risk and Misuse Among Rural Agricultural Workers

Author: Christine Chasek, Ph.D.

In 2017, approximately 20.1 million people aged 12 or older had a substance use disorder related to their use of alcohol or illicit drugs, and an estimated 44.7 million adults aged 18 or older had a diagnosable mental illness in the past year (SAMHSA, 2017). Rural populations are not immune to these behavioral health issues. In fact, the USDA (2017) reported rising mortality rates among working age rural adults due to prescription drug misuse and heroin abuse. In addition, 19.1% of residents aged 18 or older of nonmetropolitan counties struggled with mental health issues in 2017 and nearly 1.7 million residents of nonmetropolitan counties experienced serious thoughts of suicide during the year. Availability of services, the stigma surrounding behavioralhealth in rural areas, and the lack of access to behavioral health care are main barriers to timely diagnosis and treatment of behavioral health disorders in rural settings (Rural Health Information Hub, 2019). Screening, Brief Intervention, Referral and Treatment (SBIRT) is one potential solution to increase behavioral treatment but its use has not been wide spread. Results from two behavioral projects utilizing an SBIRT model in rural areas will be presented. One project targeted SBRIT in a rural clinic setting. Screenings were carried out by healthcare providers to patients who presented for services. The other project targeted agricultural workers by providing screenings in agricultural work settings. Prevalence of behavioral health issues and use of substances in rural areas was determined. Results also indicated that by offering screenings in clinical and agricultural work settings rural residents had an opportunity to make get informed healthcare choices and stigma was reduced.

#### Death on the Farm: Characteristics and Contextual Factors in Farmer and Agricultural Worker Suicides in Georgia from 2008-2015

Author: Anna Scheyett, Ph.D.

Farmers and agricultural workers in the United States have been shown to be at elevated risk of suicide. Recent stressors such as weather disasters, crop prices, and uncertain international tariffs, may be exacerbating risk of suicide in this population, and thus make this an urgent area for exploration. This presentation will explore the issue by examining suicide data for farmers and agricultural workers from the Georgia Violent Death Reporting System, a statewide surveillance system that is part of the Centers for Disease Control and Prevention National Violent Death Reporting System. This data set combines information from death certificates, coroner/medical examiner reports, law enforcement reports, toxicology reports, and other sources to provide a comprehensive picture of all homicides, suicides, death by law enforcement, and unintentional firearm death. Results from analyses of quantitative data for farmers and agricultural workers who died by suicide will be presented to give a demographic picture of this population. In addition, thematic analyses

of the qualitative summaries of law enforcement and coroner/medical examiner reports will be discussed to identify contextual factors associated with suicides. To further explore the cultural context of farmer suicides, this presentation will also discuss findings from a survey of agricultural extension agents in Georgia. This survey examined two domains: 1) extension agents' views on the current stressors experienced by farmers in Georgia and 2) extension agents' level of comfort with discussing mental health issues in farming communities. Using these two studies, the presentation will provide potential strategies for intervention and next steps to consider for suicide prevention among farmers and agricultural workers.

#### Stressors, Resilience Factors and Applicability of New Interventions for Substance Misuse

Authors: Robert Leeman, Ph.D. and Mary F. Lane

Several stressors increase substance misuse, many of which are particularly applicable to rural populations. These include pain-related medical conditions, negative perceived health, insomnia, and psychiatric issues (e.g., anxiety), all of which have related to prescription opioid use and/or misuse. In recent years, community-based data collection, rurality was associated with opioid use. Opioid combined with marijuana misuse has been linked to particularly strong negative outcomes. While most of this effect was attributable to opioid misuse, marijuana use predicted depression and suicidality. Factors associated with alcohol misuse include negative affect, shame and lack of appealing alternative activities, cited by rural individuals in recent formative research. Fortunately, there is also strong evidence supporting resilience factors. For instance, familial factors may decrease substance misuse. Protective behavioral strategies (i.e., active, cognitive behavioral steps to reduce substance use and/or related consequences) have been shown to decrease substance misuse. However, certain types of strategies are more challenging to implement, perhaps necessitating interventions. Interventions may be viewed as a means of bolstering resilience. Interventions based on motivational interviewing point to the value of personalized feedback to motivate people's use of their own resources for change. Recent work points to mindfulness as a way of mitigating effects of trauma. Goal-setting in interventions (even among those without high intrinsic motivation) is also beneficial. Much of our research focuses on technology-based interventions including a very brief, web-based alcohol intervention and tools that inform users about blood alcohol content. However, given that reliable internet access is a challenge for many rural individuals, interventions that do not require regular and/or high-speed-internet access or a lot of cellular data are of particular value. Given the specificity of the rural context, our recent research includes formative interviews among rural smokers and an intervention that will utilize interactive voice response accessible via any kind of telephone.

## PRESENTER ABSTRACTS

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#### **CBPR: Rurality, Social Networks and Mental Well-being in Rural Latinos** Author: Jeanne-Marie R. Stacciarini, Ph.D., RN, FAAN

Aims: Latinos are the largest minority in the U.S. rural areas. Rural Latinos are exposed to several stressors such as immigration issues, language barriers, discrimination and low geographic mobility, which can detrimentally affect their mental well-being. This presentation will synthesize community-based participatory (CBPR) studies, for developing an intervention for promoting mental well-being with and for rural Latinos immigrants in North Florida.

Methods: This is part of a large CBPR study with rural Latino families living in North Florida. This presentation will describe five studies, with Latinos living in rural counties of North Florida, evaluating rurality, social isolation, social networks and mental well-being. Steps of an intervention targeting social determinants of health, to promote mental well-being, will also be presented. Studies were developed with rural Latino mothers, fathers, and adolescents, applying different methodologies such as interviews, mixed-methods, Geographic Information System (GIS), and social networks analysis (SNA). In addition, we will describe the community engagement performed with schools, churches, and public health departments throughout the different steps of the research.

Results: Rurality is linked to social isolation, and mental well-being in rural Latino immigrants. Social isolation seems to be an overarching theme and a considerable social risk factor for mental well-being among mothers, fathers, and adolescents. Rurality and social networks act as social determinants on mental well-being. Four types of personal networks were identified: closed-community, core-periphery, bi-factional, and multifactional. Church is considered a safe place for promoting mental well-being. Conclusion: Rurality and social environments can protect or impair mental well-being in rural Latino family members; they move in limited and disconnected social circles (family/school), and are often geographically, culturally, and socially isolated. Medical care alone cannot adequately improve health overall or reduce health disparities without also addressing where and how (relations) people live.

#### Community Health Workers: A Powerful Resource for Improving Behavioral Health and Building Community Resilience

Authors: Ashley Wennerstrom, Ph.D., MPH; Julie Smithwick, LMSW, CHW Recognizing common behavioral health disorders and providing appropriately tailored services remains a significant public health challenge. Members of underserved populations, in particular, may face substantial social, cultural, and financial barriers to receiving appropriate care and supportive services. Community health workers (CHWs)—frontline public health professionals who are trusted by the communities they serve—are a unique class of practitioners who are effective in providing personalized support for a myriad of common health issues and are increasingly

being employed to build resilience and support access to behavioral health services. In this presentation, we will describe the CHW model and roles as they relate to underserved populations and behavioral health, and explore several interventions that have trained CHWs to address behavioral health among underserved populations. Specifically, we will describe lessons learned from a post-disaster mental health outreach initiative, a CHW-led qualitative study assessing the behavioral health needs of an underserved Latino population, as well as two approaches to integrating behavioral health-focused CHWs into primary care health teams. We will outline how CHW activities including outreach, social support, overcoming stigma, health coaching, and cultural mediation facilitate access to services and contribute to community capacity building. We will disseminate lessons learned from our experiences and programs as well as practical tips for preparing CHWs to take on new roles in behavioral health.

#### Surviving the Storm: Individual Resilience in Agricultural Leaders after Hurricane Irma

Author: Lynn Grattan, Ph.D.

On September 10, 2017, Hurricane Irma made landfall in Southwest Florida as a category five storm. In the aftermath, there were fuel, food, and construction material shortages, as well as extensive crop damage and livestock deaths. The University of Florida Institute of Food and Agricultural Sciences (IFAS) county Extension agents served as early responders in various capacities during and through the aftermath of the storm. They were actively involved in emergency operations and control; leading and managing shelters; operating points of distribution for food and water for residents and livestock; helping to dispose of dead livestock; and providing emotional support to distraught farm owners. Essentially, they worked as first responders and managers of recovery in this disaster setting. It is well established that this kind of work is challenging and stressful for professional first responders. Nevertheless, the IFAS county Extension agents rose to the occasion and performed these extra duties for the days, weeks, and months following the hurricane despite their own personal and household losses. During this time period, we conducted a series of studies examining the capacity of 38 volunteer IFAS Extension agents for resilience after Hurricane Irma. This included assessments of individual, cognitive, personal, coping, and workplace factors that strengthened or impeded their ability to bounce back after the storm over the course of one year. The ultimate goal was to develop rationally based prevention and early intervention guidance for IFAS Extension agents to: 1) maximize their capacity for personal resilience and 2) increase their ability to effectively lead and support the members of vulnerable agricultural communities in the face of future disasters. Findings are interpreted within the context of the important interaction between personal and occupational dynamics in disaster resilience.

#### LIGHTNING ROUND SPEAKERS

5 SPEAKERS 5 SLIDES 5 MINUTES

#### Dr. Angela Lindsey, Assistant Professor of Family, Youth and Community Sciences at the University of Florida

Mental Health First Aid Workshops to Address Mental Health Needs Following Florida Hurricanes

Following hurricanes Irma and Michael, Extension agents from the University of Florida reported mental health needs within their communities and impacted stakeholders, specifically within Extension faculty and staff working in recovery. To address these needs, the Disaster Response and Recovery Mental Health training program was developed and delivered throughout Florida to prepare Florida Department of Agriculture and Consumer Sciences (FDACS) employees, State Agricultural Response Team (SART) partners, UF/ IFAS Extension faculty and staff and other community members active in disasters. The training combined Mental Health First Aid, a program designed by the National Council for Behavioral Health, with a supplemental curriculum focused on disaster mental health needs. Mental Health First Aid training provides attendees with an understanding of mental health and how to support those with mental health challenges. Research regarding mental health impacts following Hurricane Irma will be presented, along with quantitative and qualitative data from pre and post-test surveys completed at the trainings to show the need for and the efficacy of mental health first aid training.

#### Dr. Kim Dunleavy, Associate Clinical Professor of Physical Therapy at the University of Florida

Characteristics of seafood workers who select teamwork, movement and equipment modification options to address chronic low back pain

Chronic low back pain impacts health, productivity, and retention in the seafood industry and is a risk factor for substance misuse. Seafood workers often regard pain as "part of the job." The psychological factors may therefore be different than in other chronic pain populations. The purpose of this study was to establish whether psychological factors differed between individuals who preferred teamwork, movement or a variety of self-selected solutions. The group of clam workers included in this study reported different psychological constructs compared to other chronic pain populations. However, low to moderate ability to control or decrease pain is consistent with acceptance of pain as "part of the job." Different management strategies are, therefore, needed, compared to other chronic pain groups, and further investigation of individualized approaches, including teamwork and movement modification, are needed to establish if it is feasible to improve coping strategies and ability to manage pain.

#### Dr. Heidi Radunovich, Associate Professor of Family, Youth and Community Sciences at the University of Florida

Understanding the scope of the opioid epidemic for agricultural industries, and the roles of pain, depression and stress

There has been a recent recognition of the serious impact that opioid use and misuse has been costing our society, and lawmakers are now seeking solutions to manage this issue. Currently there is a lack of information available about how opioid misuse is

### LIGHTNING ROUND SPEAKERS

specifically affecting the functioning of agricultural industries, as well as the health and safety of agricultural workers and their families. The goal of this project is to improve our understanding of the impact of opioid misuse within the agricultural industries in Florida in order to inform policy and prevention/intervention efforts. Both quantitative and qualitative survey data are being gathered to inform our understanding of how opioid usage is impacting the functioning of agricultural industries in the state of Florida, as well as how pain, depression, and stress relate to opioid use for this population. The first step was to develop a quantitative survey regarding agricultural owners' and workers' use and experience with opioids, and to administer it along with standard measures of pain, depression, and stress. The initial results of this survey have informed the development of a structured interview that will be administered to a smaller number of participants to obtain qualitative information. Information regarding pilot project progress to date, and preliminary results will be provided.

#### Farah Arosemena, MPH, Program Manager at the Southeastern Coastal Center for Agricultural Health and Safety

Embedding health surveillance into SCCAHS: Contributing to a Southeast regional research data repository

The lack of aggregated longitudinal health data on farmworkers and fishers limits opportunities to identify emerging issues, develop and implement public health interventions, and target outreach materials. Although there is ongoing primary data collection through the Research Core and Pilot/Feasibility projects, none are utilizing methods to review patient medical records from Federally Qualified Health Centers (FQHCs), Migrant Health Centers, or hospital emergency services. SCCAHS will embed a health surveillance program into the Planning and Evaluation Core to better describe regional demographics and baseline clinical indicators of patients by MSFW and Fisher status. The leading objective will be to advance the understanding of public health needs and community capacity so that the center can contribute to a response, streamlining the availability of public health expertise to stakeholders.

#### Dr. Joseph Grzywacz, Chair of the Department of Family and Child Sciences at Florida State University

Methodological issues in mental health surveillance among seasonal and migrant Latino farmworkers

Poor mental health among seasonal and migrant farmworkers is not uncommon. Documented rates of elevated symptoms of poor mental health among farmworkers vary substantially. Estimates from the National Agricultural Workers Survey (NAWS) indicate that 8.7% of farmworkers reported high symptoms of depression, whereas regional samples from around the country have documented prevalences between 25% and 60%. In addition to natural variation in the population along with differential exposure to diverse hardship, wide variation in observed estimates of poor mental health reflect methodological issues in mental health assessment and data collection. This lightening presentation will outline critical threats to rigorous mental health research in the Latino farmworker community.

### SCCAHS RESEARCH PROJECTS

SCCAHS PILOT PROJECTS

**Dr. Gregory Glass**: Extent of Agricultural Pesticide Applications in Florida Using Best Practices

**Dr. Andrew Kane**: Occupational Health and Safety Surveillance of Gulf Seafood Workers

**Dr. Joseph Grzywacz**: PISCA: Pesticide & Heat Stress Education for Latino Farmworkers that is Culturally Appropriate

Dr. Linda McCauley: Heat Stress and Biomarkers of Renal Disease

**Dr. Paul Monaghan**: Using Social Marketing to Prevent HRI and Improve Productivity Among Farmworkers

**Dr. Kim Dunleavy**: Chronic Low Back Pain in Seafood Workers: A Pilot Intervention Study to Identify Modifiable Work and Movement Solutions

**Dr. Lynn Grattan**: Pilot Study of the Acute Psychological and Health impacts of Hurricane IRMA in UF/IFAS Extension Workers

**Dr. John Luque**: Pilot Study of Mobile App Monitoring to Prevent Heat-Related Symptoms Among Hispanic Farmworkers

**Dr. Gulcan Onel**: Uncovering Patterns of Mental, Physical, and Occupational Health Issues Among Migrant Farmworkers with Different Socio-cultural Networks: A Pilot Study Among Haitian and Mexican Farmworkers in Immokalee, Florida

**Dr. Heidi Radunovich**: Understanding the Scope of the Opioid Epidemic for Agricultural Industries

**Dr. Gregg Stanwood and Dr. Antonio Tovar**: A Novel Approach (sweat patches) to Monitoring Pesticide Exposure in Farmworkers

**Dr. Christopher D. Vulpe**: Heat and Pesticide Stress in the Kidney

## NOTES

## NOTES







#### LET'S CONNECT







