to reduce health disparities. METHODS/STUDY POPULATION: The systematic review was conducted in accordance with PRISMA and registered with PROSPERO. Searches were conducted in Ovid MEDLINE, PubMed, PsycINFO, CINAHL, and EMBASE between January-May 2020. Search strategies used the combinations of terms related to implementation science frameworks, cancer prevention and/or intervention, and all search algorithms were validated by a public health librarian. RESULTS/ANTICIPATED RESULTS: A total of 1,025 articles were screened and 84 were deemed eligible for full-text screening. After full-text screening, n=27 articles were included for data abstraction and synthesis. Of the 27 studies that used an implementation science framework, only one-third of studies (N=9, 33.3%) used an IS framework to address cancer-related health disparities. Of those nine studies, six of them used the Consolidated Framework for Implementation Research (CFIR) to guide, inform, and/or adapt the implementation of a cancer prevention intervention to target health disparities. However, the variability in how this framework was applied remains a DISCUSSION/SIGNIFICANCE OF FINDINGS: challenge. Recommendations for how various IS frameworks can be used to address cancer prevention disparities will be presented, such as, guiding principles on how to intentionally select domains within the CFIR that will capture input from key stakeholders in health disparities populations.

### 56326

### Heart to Heart: An Interdisciplinary Community Collaboration to Address Health Disparities Through Cardiovascular Disease Risk Assessments in Underserved Urban Neighborhoods

Michael E. Bales<sup>1</sup>, Jifeng Zhu<sup>1</sup>, Farid Aboharb<sup>2</sup>, Neville Dusaj<sup>2</sup>, Lior Shtayer<sup>3</sup>, Venkatesh Balaji<sup>3</sup>, Allegra Keeler<sup>1</sup>, \*Christine A. Ganzer<sup>4</sup>, Krista A. Ryon<sup>5</sup>, the H2H Consortium, Brett J. Ehrmann<sup>6</sup> and Julianne Imperato-McGinley<sup>2,7</sup>

<sup>1</sup>Clinical and Translational Science Center, Weill Cornell Medicine; <sup>2</sup>Tri-Institutional MD-PhD Program, Weill Cornell Medicine, Rockefeller University, Memorial Sloan Kettering Cancer Center; <sup>3</sup>Joan & Sanford I. Weill Medical College, Weill Cornell Medicine; <sup>4</sup>Hunter-Bellevue School of Nursing, School of Health Professions, Hunter College, CUNY; <sup>5</sup>Department of Physiology and Biophysics, Weill Cornell Medicine; <sup>6</sup>Division of Primary Care of the Weill Cornell Physician Organization, Weill Cornell Medicine; <sup>7</sup>Department of Medicine & Clinical and Translational Science Center, Weill Cornell Medicine

ABSTRACT IMPACT: Leveraging partnerships with faith-based institutions and community centers in at-risk NYC neighborhoods, the H2H Program breaks down barriers to engaging with the medical establishment and addresses the increasing burden of diabetes and CVD risk factors in the most vulnerable individuals. OBJECTIVES/GOALS: Screening for modifiable risk factors is critical for cardiovascular disease (CVD) risk reduction. Low-income, urban communities often encounter barriers to care. Communityacademic outreach partnerships are vital in addressing such disparities and promoting health equity and culturally targeted intervenhigh-risk populations. METHODS/STUDY tions among POPULATION: In 2010, the Weill Cornell Clinical and Translational Science Center along with Weill Cornell Medicine (WCM) and Hunter-Bellevue School of Nursing (HBSON) launched Heart to Heart (H2H), a community outreach program partnering with faith-based centers to offer free health screenings and education to some of New York City's (NYC) most vulnerable communities. Participants work with undergraduate, nursing, medical and dietician students to complete a demographics and health questionnaire

followed by vital signs and point-of-care blood testing. Participants then receive personalized health education, nutrition and lifestyle counseling by student volunteers, precepted by WCM Primary Care and HBSON faculty. Participants are provided information on local free or low-cost clinics as necessary for follow-up. RESULTS/ANTICIPATED RESULTS: To date H2H held 125 events and 5,952 screenings. Mean age of the participants was 54.3 (SD 39.6) and 3,682 (63.1%) were female. 74.2% identified as non-white. 42.1% were uninsured. 32.3% reported annual income of less than \$20k. 18.3% of participants reported not having seen a doctor in the past year. 40.7% reported preexisting hypertension, of which 74.5% were on medication and 78% with sub-optimal control. 15.7% had been previously diagnosed with diabetes, of which 75.8% were on medication and 41.4% with sub-optimal control (HbA1c <7). 37.7% had been diagnosed with dyslipidemia previously, of which 47.4% were on medication and 62.1% with sub-optimal control. Screenings revealed, 56.9% had undiagnosed hypertensive blood pressures, 4.7% had an elevated HbA1c >6.5, and 49.2% had dyslipidemia. DISCUSSION/SIGNIFICANCE OF FINDINGS: H2H screening revealed significant cardiovascular health disparities, many of which were poorly controlled or newly discovered. Cross-institutional academic partnerships can empower communities with knowledge of their health status and help facilitate access

#### 66534

### Evaluation plans for a summer child nutrition assistance program to better understand translation of policy to community health

to medical care to further address health risk factors.

Jiwoo Lee<sup>1</sup>, Jayne A. Fulkerson<sup>1</sup>, Lisa J. Harnack<sup>2</sup> and Weihua Guan<sup>3</sup> <sup>1</sup>School of Nursing, University of Minnesota; <sup>2</sup>Division of Epidemiology and Community Health, School of Public Health, University of Minnesota; <sup>3</sup>Division of Biostatistics, School of Public Health, University of Minnesota

ABSTRACT IMPACT: Study findings can guide improvements of the Summer Food Service Program to maximize the program's desired effects on child summer nutrition and related health outcomes. OBJECTIVES/GOALS: The Summer Food Service Program (SFSP) addresses food insecurity during summer months. Project specific aims are to: 1. Describe characteristics of children participating in the SFSP. 2. Determine the nutritional quality of the SFSP foods. 3. Evaluate changes in children's food insecurity, diet quality, and body mass index by SFSP participation. METHODS/ STUDY POPULATION: A single group, prospective, staggered cohort design will be used for the proposed study. Two cohorts of 30 (N=60) elementary students and their parents will be recruited during the 2021-22 and 2022-23 school year. Each participant will complete a measurement session at three time-points: Baseline (spring), Post-Program (program end), and Follow-Up (following spring). Parents will complete an online survey about household food insecurity and family socio-demographic characteristics. Children will complete three 24-hour dietary recall interviews, and their heights, weight and percent body fat will be measured. The menus of at least ten SFSP sites will be analyzed to determine the nutritional adequacy of the site menus by using the Healthy Eating Index-2015. RESULTS/ANTICIPATED RESULTS: Study hypotheses are as followed: Aim 1. Not all of the children participating in the SFSP are from food-insecure or low-income households. Aim 2. Meals served at the SFSP will be higher in sugar and fat and lower in fruits and vegetables compared to recommendations in the 2015-2020

Dietary Guidelines for Americans. Additionally, the Healthy Eating Index-2015 score of the SFSP menus will be lower than that of the National School Lunch Program menus. Aim 3. Consistent SFSP participation will have a positive effect on reducing food insecurity, but not on increasing diet quality and reducing body mass index and percent body fat in children. DISCUSSION/SIGNIFICANCE OF FINDINGS: Program user information will determine if the program is reaching the target audience. Program managers will utilize menu analysis results to improve their menu nutritional quality. Changes in food insecurity, diet quality and anthropometric measures will inform whether the program needs to be improved to prevent any untoward excess weight gain.

## Defining "rurality": Rural-urban disparities among COPD patients in national VA data

71016

Arianne Baldomero<sup>1,2</sup>, Ken M. Kunisaki<sup>1,2</sup>,Patrick Hammett<sup>1</sup>,David Nelson<sup>1</sup>,Carrie Henning-Smith<sup>3</sup>, Ann Bangerter<sup>3</sup>, Chris H. Wendt<sup>1</sup> and R. Adams Dudley<sup>1</sup>

<sup>1</sup>Minneapolis VA Health Care System; <sup>2</sup>University of Minnesota; <sup>3</sup>University of Minnesota

ABSTRACT IMPACT: Our research focuses on determining ruralurban disparities in chronic obstructive pulmonary disease (COPD) management to improve COPD health outcomes in rural areas. OBJECTIVES/GOALS: Several methods exist to distinguish rural from urban areas, but it is not clear which method relates most directly to rural-urban health care disparities. To address this, we compared different measures of rurality to measures of chronic obstructive pulmonary disease (COPD) processes of care among a national sample of veterans. METHODS/STUDY POPULATION: Retrospective analysis of patients with COPD (2016-2019 by ICD-10 codes) using national Veterans Affairs (VA) data. We assessed rurality by: 1) patient's residential address, 2) assigned primary care clinic address, and 3) drive time from the patient's residence to closest primary care clinic. Rurality designations of the residential address and primary care clinic address into urban, rural, and highly rural areas are based on the Rural Urban Commuting Area (RUCA) codes. The dependent variables were binary outcomes of: 1) documentation of a pulmonary clinic encounter and 2) evidence of spirometry to confirm the diagnosis of COPD. RESULTS/ ANTICIPATED RESULTS: Of 6,765,951 veterans, 1,157,002 (17%) had COPD (Table 1). Although approximately 40% of patients with COPD reside in addresses that are rural and highly rural, a large majority are assigned to primary care clinics in urban areas (82.8%) and reside within 30 minutes to the closest primary care clinic (76.7%) (Table 2). Compared to defining rurality based on patient's residential address or drive time to closest primary care, defining rurality based on the assigned primary care clinic address was associated with a larger disparity in rates of pulmonary encounter. In contrast, the drive time from the patient's residence to the closest primary care was the strongest predictor of receipt of spirometry (Figure 1 and Table 3). DISCUSSION/ SIGNIFICANCE OF FINDINGS: Estimates of the severity of rural-urban disparities varied based on the definition of rurality used. For two process measures, definitions of rurality based on where the patient received primary care generated more evidence of disparities than definitions based solely on the patient's residential address.

### 81941

# Evaluating race, socioeconomic status, and the effect of radiation treatment in patients undergoing autologous breast reconstruction

Edgar Soto, Grant Bond, Jeremy Botwsorth, Hua A. Fang, Rene P. Myers, Timothy W. King

University of Alabama School of Medicine

ABSTRACT IMPACT: Disparities are multifactorial in etiology we seek to elucidate the effects of social determinants of health such as race on the outcomes of autologous flap reconstruction. OBJECTIVES/GOALS: Immediate breast reconstruction has increased in recent years yet, racial and socioeconomic disparities in the receipt of postmastectomy breast reconstruction persist. We review the usage of autologous flaps for immediate breast reconstruction in a single institution with a diverse population to determine the effect of radiation on flap survival. METHODS/ STUDY POPULATION: The database of a Southeastern tertiary referral center was queried for patients who received autologus flaps for immediate reconstruction following mastectomy. Patients were stratified based on whether they received no radiation (TRAM), neoadjuvant radiation (TRAM + Pre-XRT), or post-reconstruction radiation (TRAM + PMRT). So far, we have identified 91 patients (157 breasts) meeting inclusion criteria from 2006 to 2017. Patient demographics and outcomes were compared based on radiation status. The primary outcome (reconstructive success) was defined as breast reconstruction without flap loss. Comorbidities, socioeconomic status, and method of reconstruction were collected. Statistical analysis included t-tests, chisquare tests and logistic regression were appropriate using R. RESULTS/ANTICIPATED RESULTS: At the moment, we focus on outcomes of transverse rectus abdominus flaps and are adding information on 4 other flap-based methods. There were 68 in the solely TRAM group, 33 in TRAM+Pre-XRT and 56 in TRAM+PMRT with equivalent demographics between all groups for Age, Race and BMI (Table 1). In terms of race most patients self-identified as White (68%), followed by Black (24%) and Other (8%), p=0.172. There was a statistically significant difference in the incidence of tobacco use with the type of radiation used (p=0.007) with the PTRAM+ PMRT group having the highest percentage. When analyzing major and minor complications based on radiation received or reconstructive success there was no significant difference regardless of radiation treatment with the group overall achieving a 97.4% success rate (p=0.229). DISCUSSION/SIGNIFICANCE OF FINDINGS: Despite the known racial disparities in healthcare and the deleterious effects of radiation therapy on wound healing, there was no significant difference found in the incidence of major or minor complications in patients receiving neoadjuvant or post-reconstruction radiation therapy regardless of patient demographics.

### 91756

### A participatory approach to develop regional health priorities for clinical and translational research

Shinobu Watanabe-Galloway, Paul Estabrooks, David Palm, Sean Navarrette, Heidi Keeler; Keyonna King and Emily Frankel University of Nebraska Medical Center - UNMC

ABSTRACT IMPACT: Regional health issues can be best addressed at the population-level and input from the communities is vital for prioritization of health issues. OBJECTIVES/GOALS: The Great Plains IDeA-CTR (GP IDeA-CTR) was developed to increase clinical and translational research (CTR) that can address regional health priorities. Here we describe a collaborative process used to identify regional health