

basic human structure (wellbeing), lines of resistance (coping), and stressors (WPV).

**Methods/Approach** We used a cross-sectional survey design with ED workers from six Midwestern EDs. A convenience sample completed the Coping Resources Inventory (CRI) and Freidman Wellbeing Scale (FWBS). Survey domains were coded using instrument guidebooks including reverse coding to generate overall survey scores. Sample scores were compared to national normative scores (CRI female: 176.96, CRI male: 1701.6, FWBS: 63.34) using two-tailed t-tests.

**Results** The majority of the 208 respondents were registered nurses (58.3%), full-time employees (79.1%), female (74.5%), and White (89.9%). Their mean years of experience was 12 years and age was 37 years. The sample's CRI score was 123.05. After comparing sample scores to their national normative sex-based scores, the sample's mean difference of 52.17 was significantly lower than the national normative score,  $t(207)=34.011$ ,  $p<0.001$ . The FWBS score for the sample was 68.31, which was significantly higher than the national normative score,  $t(207)=4.829$ ,  $p<0.001$ .

**Conclusion** Although use of coping skills after experiencing WPV was significantly lower than the general population, participants' overall wellbeing remained high. These findings can be explained by Neuman's System Model where wellbeing is part of the basic human structure, which develops across the lifespan and would remain intact following intermittent WPV incidents.

**Significance** Our findings represent ED workers' need to learn effective coping skills prior to and after exposures to WPV in order to maintain wellbeing. Stress inoculation training can aid EDs in developing workers' skills.

## Occupational safety

### 0042 WORK PRODUCTIVITY AND STRESS OF EMERGENCY NURSES WORKING WITH TRAUMA PATIENTS

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**Statement of purpose** Our research purpose was to examine the effects on the productivity and stress of emergency nurses working with acute trauma patients in the emergency department (ED) setting.

**Methods/Approach** A cross-sectional survey design was used. Participants were recruited from three trauma center EDs in the Midwest United States. Participants completed the Impact of Events Scale—Revised (IES-R) and Healthcare Productivity Scale (HPS) based on a trauma care experience within the preceding 30 days. Item responses to IES-R and HPS were summed to yield stress and work productivity scores. Descriptive statistics were calculated to describe the study sample. A 2-tailed Pearson correlation was calculated to explore the relationship between stress impact of providing trauma care and emergency nurses' work productivity.

**Results** Of the 255 respondents, the majority was White ( $n=231$ , 90.9%), female ( $n=206$ , 86.2%), treated both adult and pediatric patients ( $n=190$ , 74.5%), and had access to employer-provided Critical Incident Stress Debriefing (CISD) ( $n=147$ , 59%). About a third reported high stress ( $n=97$ , 38%) and 72 (28.2%) reported decreased work productivity. The correlation between stress and work productivity was not significant ( $r=-0.005$ ,  $p=0.933$ ).

**Conclusions** Although only mild to moderate stress and work productivity changes due to caring for trauma patients were reported, more research is needed to capture real-time stress/response or data reflecting the stress/work productivity changes immediately following the caring for a trauma patient. The availability of CISD may have been a protective factor to mitigate the negative impact of stress. Further investigation is warranted to study the impact of CISD and training on self-reported stress levels of emergency nurses.

**Significance** Identifying characteristics of trauma patient care leading to increased stress, particularly when coupled with decreased work productivity, is important for the safety of the trauma patients receiving clinical care.

**TweetHandle** Emergency nurses globally are committed to the care of traumatically injured patients. This care can adversely impact the mental health of emergency nurses and their overall work productivity. @glgillespie2 @UCnursing

## Homicide/Assault

### 0044 ASSESSING THE ACCEPTABILITY, FEASIBILITY, AND UPTAKE OF A COLLECTIVE IMPACT MODEL TO ADDRESS GUN VIOLENCE: A CASE STUDY OF CODE RED PA

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**Statement of purpose** Gun violence is a multi-faceted, complex public health problem, historically underfunded in research. With an uptick in funding gun violence research, we are better able to build the evidence around impactful community-based interventions, state laws, and policies. The collective impact model offers a promising strategy to implement change at a large scale with broad, cross-sector collaboration. Evidence suggests that in order for collective impact initiatives to be successful, five conditions must be in place: a common agenda, shared measurement systems, mutually reinforcing activities, continuous communication, and backbone support organizations.

**Methods/Approach** The current study applies implementation research methods to examine the success or failure of applying the collective impact model to address gun violence at a large scale. To do this, we use Code Red PA, a cross-sector, state-wide initiative in Pennsylvania with the collective goal of reducing gun violence in PA, as a case study. Given the diverse gun culture in Pennsylvania, and the overall complexity of the problem, a collective impact approach is well justified. We will collect data from in-depth, key-informant interviews, observations, and relevant documents, and examine outcomes related to the acceptability, uptake, and feasibility of adopting the tenants of collective impact.

**Results/Conclusions** Results from this study will inform how Code Red PA is successfully adopting a true collective impact model. Broadly, results will also inform how the collective impact model can be effectively applied to gun violence efforts in other states and municipalities.

**Significance** This is the first known study to examine the feasibility of a collective impact model to reduce gun violence. As new evidence related to the effectiveness of gun violence strategies become available, we need to understand how to best implement these strategies using the tenants of collective impact that are often required to address complex problems.