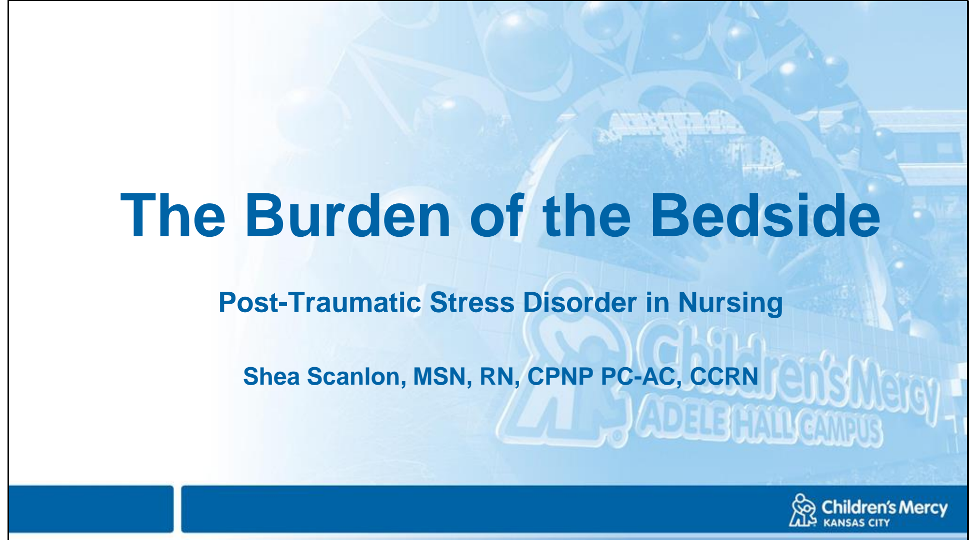
Slide 1



Slide 2

Disclosure

- No financial disclosure or conflicts of interest with the presented material in this presentation.

Slide 3

Objectives

- Analyze literature on PTSD in nursing and impact on nurses leaving the bedside.
- Identify high risk experiences that are more likely to lead to the development of PTSD in nursing.
- Identify at least 2 changes in your individual practice or in your work environment to reduce stress and foster resilience.

Slide 4

Nursing "Shortage"

- Largest healthcare profession in the US and the world
  - 2.9 million employed registered nurses
  - 700,000 employed licensed practical/vocational nurses
- Missouri: 1032-1222 employed nurses per 100,000 population
- Bureau of Labor Statistics projects a need for at least 175,000 new RNs each year through 2029 to fill positions

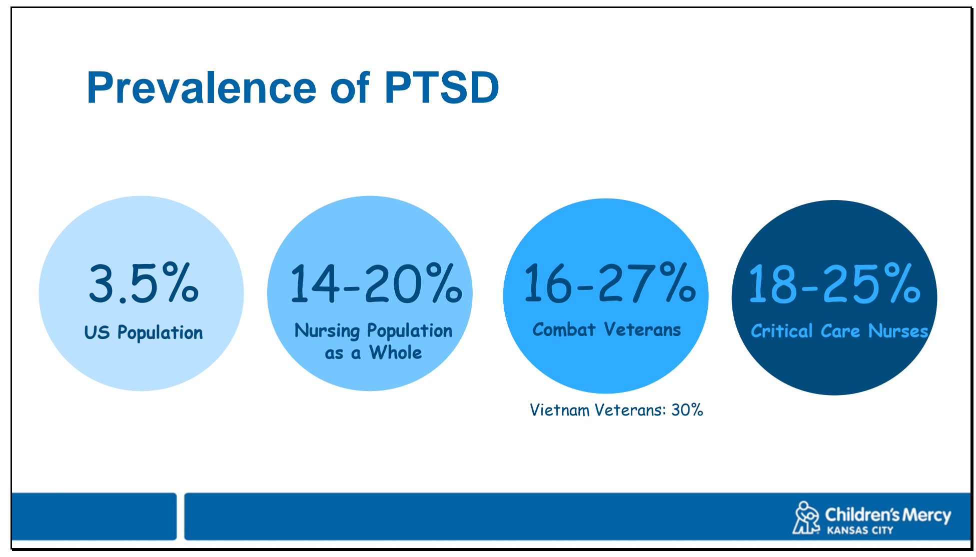
Slide 5

Why Do Nurses Leave the Bedside?

- Changing family dynamics
- Changing interests
- Desire different hours
- Advanced degrees: double edge sword
- Number one reason critical care nurses leave:
  - Stress

Children's Mercy KANSAS CITY

Slide 6



Slide 7

Literature Review

- Single hospital study in Atlanta, GA of ICU and floor nurses: **24% of ICU nurses** tested positive for PTSD symptoms;**14% of floor nurses**. Extended to Atlanta Metro where **29% of ICU nurses** surveyed positive for PTSD. (Mealer, Shelton, Burg, Rothbaum, & Moss, 2007)
- 810 nurses from University of Colorado: **22%** had symptoms of PTSD, **18% met full diagnostic criteria** for PTSD, and 86% met criteria for BOS. Of the 18% with PTSD, 98% had concurrent BOS. (Mealer, Burnham, Goode, Rothbaum, & Moss, 2009)
- ICU & ED nurses from 3 centers in California: **33%** of nurses met criteria for PSTD. Only 15% did not experience any PTSD symptoms. (Dominquez-Gomez & Rutledge, 2009)
- In a study of **sexual assault nurse examiners**, **24**% screened positive for PTSD. (Townsend & Campbell, 2009)

Slide 8

- In a study of ER nurses and workplace violence, 94% experienced at least one symptom of PTSD after a violent work event; 17% were considered to have scores high enough to represent probable PTSD, 25% with clinical suspicion. (Gates, Gillespie, & Succop, 2011)
- In a survey of **pediatric nurses**, **21**% met criteria for PTSD. This study found little difference between the **ICU (25%)**, **ER (29%)**, **floors (20%)**, **and oncology nurses (19%).** (Czaja, Moss, & Mealer, 2012)
- In the Netherlands, study of 15 different hospitals revealed that 87% of ER nurses were confronted with trauma over the last 6 months. Of them, **24.3%** met criteria for PTSD. (Adriaenssens, de Gucht, & Maes, 2012)
- Psychiatric nurses vs community nurses found prevalence of only 6.7% of psych nurses met PTSD diagnostic criteria, 0 community nurses. (Zerach & Shalev, 2015)
- Austin, TX screened hospital and pre-hospital providers and found **33%** of all respondents screened positive for PTSD, **40%** of pre-hospital providers and **25%** of nurses. (Luftman et al., 2017)

Slide 9

- South Korea researchers looked at nurse personality type and PTSD. Type D personalities were most likely to have PTSD with a rate of 18.2%. They also found that Type D personalities are more common in nursing than the general population. (Cho & Kang, 2017).
  - Type D personalities: negative affect, worried, low confidence, more stressed.
- In a study of cardiothoracic transplant nurses in the UK, as many as 48% of nurses experienced PTSD. (Sanchez, Simon, & Ford, 2019)
- A study of nurses across various departments found high rates of psychiatric symptoms. 79% positive for depression, 64.6% positive for anxiety, 87.8% positive for BOS, and 19.9% positive for PTSD. (Hamed, Elaziz, & Ahmed, 2020)
- COVID studies in progress

Slide 10

Physician Studies

- In a study of emergency department physicians, 16% met criteria for PTSD. (DeLucia et al., 2019)
  - In a study of residents, PTSD prevalence in medicine and pediatrics was 5.2%, surgical residents 22%, emergency room residents 29%.
- In an unpublished study that was presented at the American Psychiatric Association annual meeting in 2021, researchers found that the overall PTSD rate among health care workers was 39.3%, with rates of non-physican HCW's ~49.5%. (Bayazit et al., 2021)

Slide 11

All Over The Board

- Some researchers measured symptomology while some looked for nurses who met diagnostic criteria.
- Some include APPs, others don't.
- Variety of measurement tools to assess PTSD among nurses
- Specialty areas look different in different places
- Years of practice appears to be associated: unclear direction
- Leadership: protective or contributory?

Children's Mercy KANSAS CITY

Slide 12

Professional Consequences

- Higher rates of burnout
- Decreased job satisfaction
- Poor communication
- Increased absenteeism
- Loss of productivity
- Career changes: higher turnover
- Decreased quality of care

Slide 13

Personal Consequences

- Lack of enjoyment
- Lack of interest in leisure activities
- Decreased self-esteem
- Difficulty maintaining friendships
- Marital distress & divorce
- Alcohol and drug use
- Increased risk of suicidal ideation

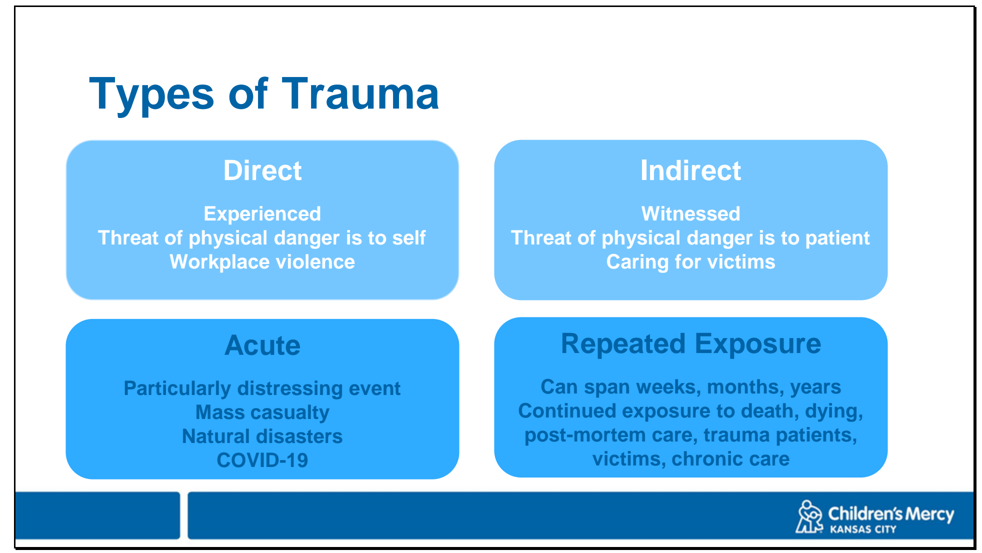
Slide 14

History of PTSD

- Early terms: shell shock, Soldier's Heart, battle neurosis, nervous shock, combat stress reaction
- 1952: DSM I - Gross Stress Reaction after WWII
- 1978: DSM III - Post Traumatic Stress Disorder
- 2013: DSM V – Trauma and Stressor Related Disorders
  - Inclusion of repeated traumatic exposure

DSM: Diagnostic and Statistical Manual of Mental Disorders

Slide 15



Slide 16

Diagnostic Criteria

- Criterion A: Stressor (1)
- The individual must have been exposed to death, threatened death, actual/threatened injury, or actual/threated violence
  - Direct exposure
  - Witnessing the trauma
  - Learning that a relative or close friend was exposed to trauma
  - ***Indirect, repeated exposure to the details or victims of trauma***
    - ***usually in the course of professional duties***

Slide 17

Criterion B: Intrusion Symptoms

- The event is chronically re-experienced (1)
  - Unwanted and upsetting memories
  - **Nightmares**
  - **Flashbacks or “reliving” the trauma**
  - Emotional distress after exposure to triggers
  - Physical reactions after exposure to triggers

Slide 18

Criterion C: Avoidance Symptoms

- Avoiding trauma-related triggers (1):
  - Avoiding trauma-related thoughts or feelings
  - **Avoiding trauma-related reminders**
    - Avoiding activities, people, or places that remind one of the traumatic event
  - **Overcompensating**

Slide 19

Criterion D: Mood and Cognition

- Negative thoughts or feelings that began or worsened after the traumatic exposure (2)
  - Inability to recall key features of the trauma
  - Overly negative thoughts about self or the world
  - Exaggerated blame of self or others
  - Negative affect, emotionally numb
  - Decreased interest in activities
  - Feeling isolated
  - Difficulty experiencing joy
  - Depression and anxiety

Slide 20

Criterion E: Alterations in Arousal

- Trauma related arousal and reactivity that began or worsened after the traumatic exposure (2):
  - **Irritability**
  - **Aggression**
  - Risky or destructive behavior; drug and alcohol use
  - Hypervigilance, jumpy, easily startled
  - Difficulty concentrating
  - **Difficulty sleeping: trouble falling or staying asleep**

Slide 21

Additional Criterion

- Criterion F: Duration
  - Symptoms last for more than 1 month
- Criterion G: Functional Significance
  - Symptoms create distress or functional impairment
    - Social, occupational, etc.
- Criterion H: Exclusion of Outside Causes
  - Symptoms cannot be explained by medication, substance use, or other illness

Slide 22

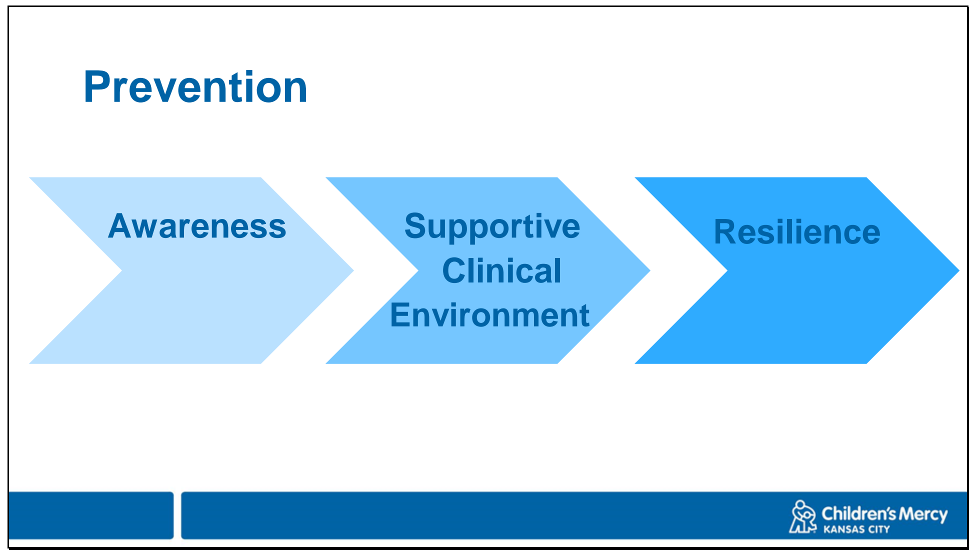
Symptom Summary

- Upsetting memories
- Nightmares
- Flashbacks
- Emotional reaction to triggers
- Physical reaction to triggers
- Avoidance
- Overcompensating
- Memory alterations
- Negative outlook
- Emotionally numb
- Isolation

- Depression
- Anxiety
- Irritability
- Aggression
- Risky behaviors
- Jumpy
- Hypervigilance
- Attention deficits
- Insomnia
- Change it appetite
- Change in communication
- Emotional outbursts

- Poor decision making
- Denial
- Feeling overwhelmed
- Grief
- Guilt
- Muscle tenseness
- Rapid heart rate
- Increased physical pain
- Loss of emotional control
- Feeling on edge
- Personality changes
- Developing phobias

Slide 23



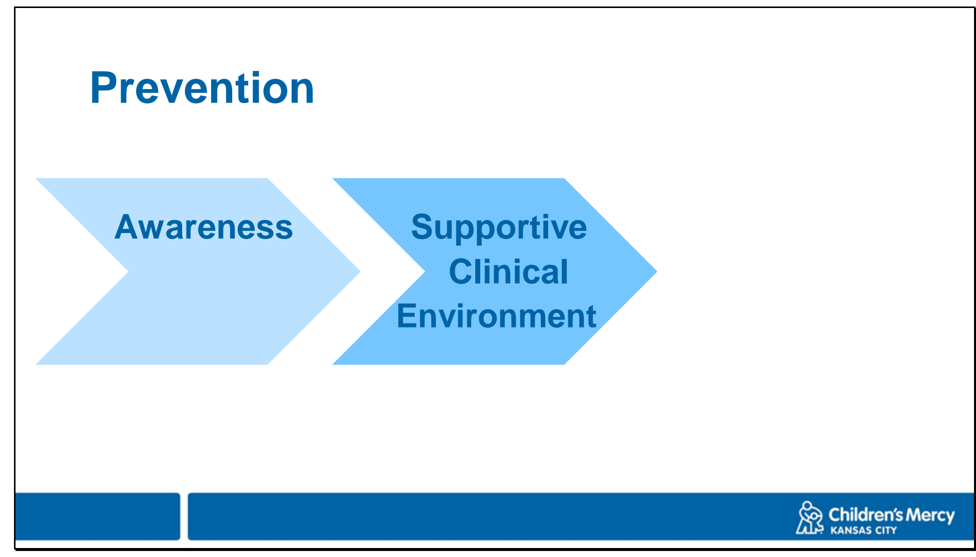
Slide 24

Slide 25

Breaking the Silence

- In a study of over 500 nurses, only 20% had ever been educated on PTSD in healthcare workers.
- Nurses need education on their vulnerability
  - Signs and symptoms
  - Risk factors
  - Coping behaviors
- Leadership education to detect PTSD in nurses and how to help
  - Identify at risk staff
  - Awareness of resources

Slide 26



Slide 27

High Impact Stressors

- Work conditions contribute to development of PTSD:
  - Feeling over-extended → Increase resources when needed
  - Poor team interactions → Team building & conflict resolution training
  - Poor support of psychosocial factors → No tolerance policies

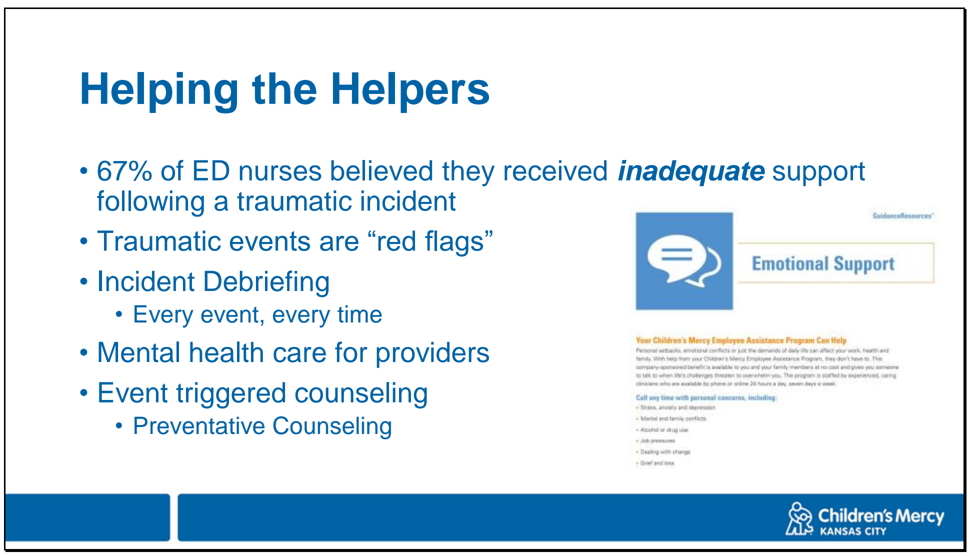
Slide 28

Change the Culture

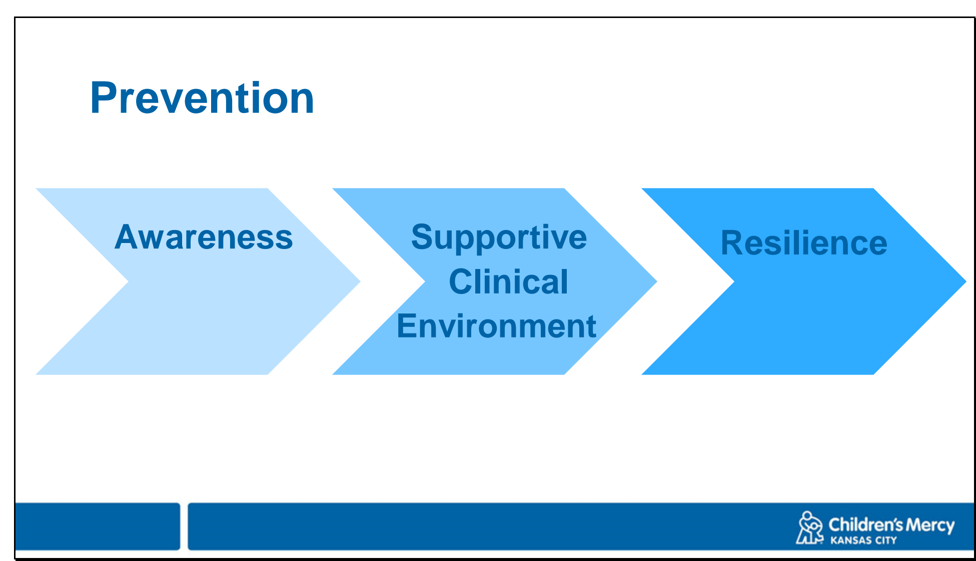
- Acknowledge the trauma
  - Stop normalizing things that aren't normal
  - Don't punish for having a normal reaction to an abnormal situation

Children's Mercy
KANSAS CITY

Slide 29



Slide 30



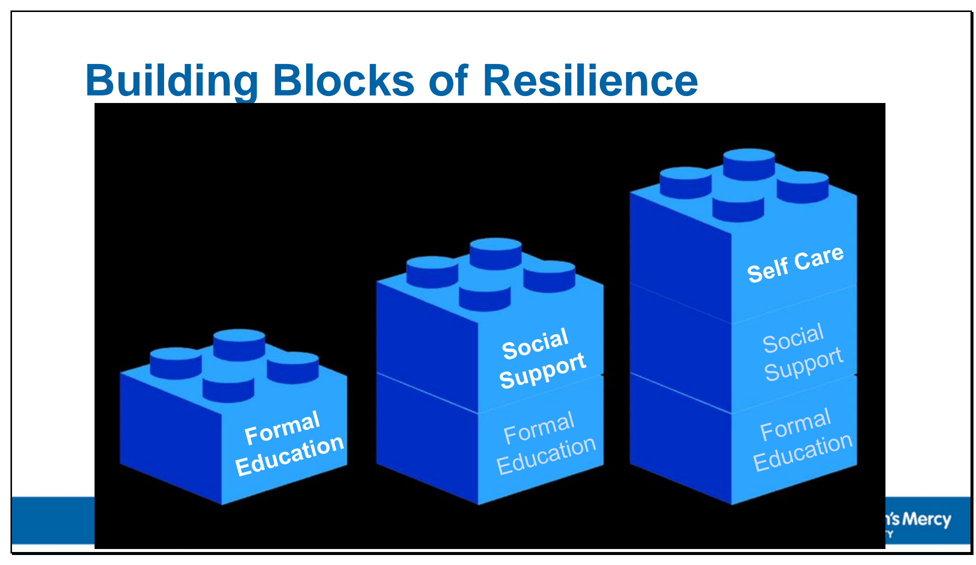
Slide 31

Resiliency: More than a Buzzword

- The ability to overcome adversity and continue normal development.
  - Ability to maintain healthy and stable psychological function after exposure to extreme stressors
- Can be inherent or learned
- Resiliency training can also minimize burnout

Slide 32

Building Blocks of Resilience

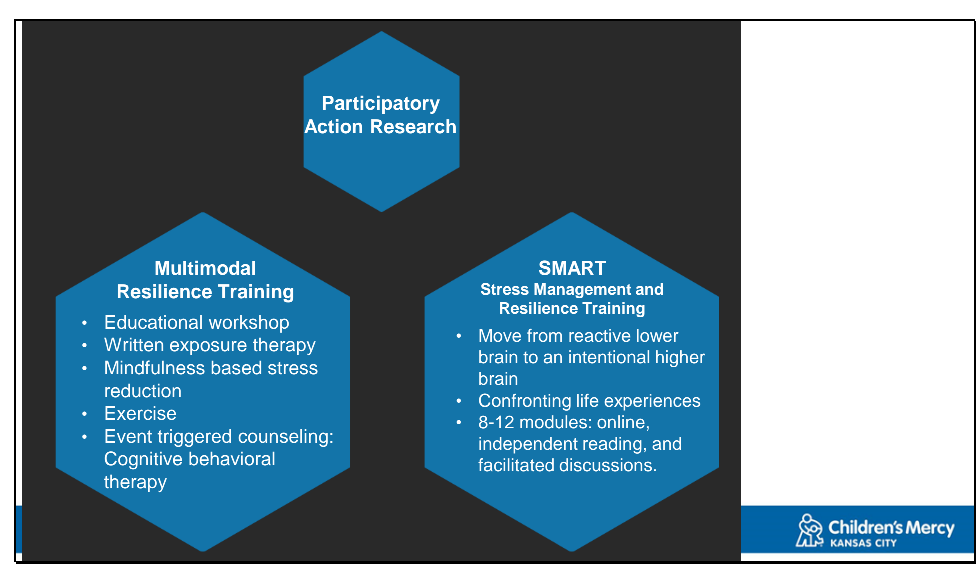


Slide 33

Formal Education Programs

- Resilience is an organizational task, not just an individual goal
  - Not being resilient is not a personality fault
- Currently being researched, developed, and perfected
- Data shows they are successful, feasible and accepted
- General goals of formal education programs:
  - Identify stressors
  - Awareness of personal triggers
  - Utilize cognitive flexibility

Slide 34



Children's Mercy
KANSAS CITY

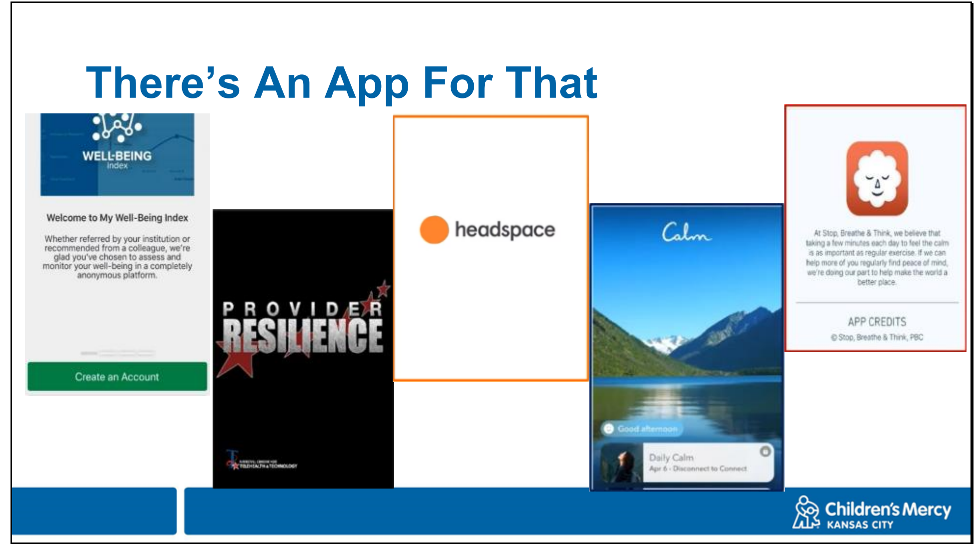
Slide 35

Social Support and Fostering Relationships

- Mentoring programs
- Debriefings
- Meaningful recognition
- Unit gatherings or retreats
- Social support networks

Slide 36

Slide 37



Slide 38

We have to create an environment in which we can train and retain our nurses with their souls intact.

Children's Mercy
KANSAS CITY

Slide 39

Questions or Comments?

sheascanlon@gmail.com

For comments, questions, or copies of the reference list.

Slide 40

References

Adriaenssens, J., Gucht, V., & Maes, S. (2012). The impact of traumatic events on emergency room nurses: Findings from a questionnaire survey. International Journal of Nursing Studies, 49. 1411-1422. doi: 10.1016/j.jinurstu.2012.07.003.

Alden, L.E., Regambal, M.J., & Laposa, J.M. (2008). The effects of direct versus witnessed threat on emergency department healthcare workers: Implications for PTSD criterion A. Journal of Anxiety Disorders, 22. 1337-1346. doi: 10.1016/j.janxdis.2008.01.013

Bayazit H, Ozel M, Arac S, Dulgeroglu-Bayazit D, Joshi A. Posttraumatic stress disorder among healthcare workers during COVID-19 era. Presented at: APA annual meeting May 1-3, 2021. Abstract/Poster 5224.

Beck, C. (2011). Secondary traumatic stress in nurses: A systematic review. *Archives of Psychiatric Nursing, 25*(1). 1-10. doi: 10.1016/j.apnu.2010.05.005

Burdick, K., Owegi, R., Bauer, R., & Cannon, E. (2020). Pandemics and PTSD: Caring for the caregivers. *Medsurg Nursing*, *29*(6), 365-370.

Cho, G., & Kang, J. (2017). Type D personality and post-traumatic stress disorder symptoms among intensive care nurse: The mediating effect of resilience. *PLoSONE, 12*(4). doi: 10.1371/journal.pone.0175067

Delgado, S. (2017). Building resilience in critical care nurses. *American Journal of Critical Care, 26*(3), 184-192. doi: 10.4037/ajcc2017662

DeLucia, J. A., Bitter, C., Fitzgerald, J., Greenberg, M., Dalwari, P., & Buchanan, P. (2019). Prevalence of Post-Traumatic Stress Disorder in Emergency Physicians in the United States. *The western journal of emergency medicine*, *20*(5), 740–746. https://doi.org/10.5811/westjem.2019.7.42671

Duncan, D. (2020). What the COVID-19 pandemic tells us about the need to develop resilience in the nursing workforce. *Nursing Management, 27*(3), 22-27. doi: 10.7748/nm.2020.e193

Gates, D., Gillespie, G., & Succop, P. (2011). Violence against nurses and its impact on stress and productivity. *Nursing Economics, 29*(2), 59-66.

Hamed, R., Elaziz, S., & Ahmed, A. (2020). Prevalence and predictors of burnout syndrome, post-traumatic stress disorder, depression, and anxiety in nursing staff in various departments. *Middle East Current Psychiatry, 27*(26). doi: 10.1186/s43045-020-00044-x

Haugen, P.T., McCrillis, A.M., Smid, G.E., & Nijdam, M. (2017). Mental health stigma and barriers to mental health care for first responders: A systematic review and meta-analysis. *Journal of Psychiatric Research, 94,* 218-229. doi: 10.1016/j.jpsychires.2017.08.001

Helmreich, I., Kunzler, A., Chmitorz, A., Kunig, J., Binder, H., Wessa, M., Lieb, K. (2017). Psychological interventions for resilience enhancement in adults. *Cochrane Database of Systematic Reviews, 2*. doi: 10.1002/14651858.CD012527

Helmreich, I., Kunzler, A., Chmitorz, A., Kunig, J., Binder, H., Wessa, M., Lieb, K. (2017). Psychological interventions for resilience enhancement in adults. *Cochrane Database of Systematic Reviews, 2*. doi: 10.1002/14651858.CD012527

Slide 41

Kelly, Krester. & Wei, H. (2018). Building nurse resilience. *Nursing Management, 49*(6), 42-45. doi: 10.1097/01.NUMA.0000533768.28005.36

Kerasiotis, B., & Motta, R. (2004). Assessment of PTSD symptoms in emergency room, intensive care unit, and general floor nurses. *International Journal of Emergency Mental Health, 6*(3), 121-133.

Laposa, J.M., Alden, L.E., & Fullerton, L.M. (2003). Work stress and posttraumatic stress disorder in ED nurses/personnel. Journal of Emergency Medicine, 29(1). 23-28. doi: 10.1067/men.2003.7

Lavoie, S., Talbot, L., Mathieu, L., Dallaire, C., Dubois, M.F., & Courcy, F. (2016). An exploration of factors associated with post-traumatic stress in ER nurses. *Journal of Nursing Management, 24,* 174-183. doi: 10.111/jonm.12294

Le Beau Lucchesi, E. (2019, May 7). For nurses, trauma can come with the job. *The New York Times.* Retrieved from https://www.nytimes.com/2019/05/07/well/live/for-nurses-trauma-can-come-with-the-job.html

Luftman, K., Aydelotte, J., Rix, K., Ali, S., Houck, K., Coopwood, T., … Davis, M. (2017). PTSD in those who care for the injured. *Injury International Journal of the Care of the Injured, 48*, 293-296. doi: 10.1016/j.injury.2016.11.001

Magtibay, D., Chesak, S., Coughlin, K., & Sood, A. (2017). Decreasing stress and burnout in nurses: Efficacy of blended learning with stress management and resilience training program. *Journal of Nursing Administration, 47,* 7/8. doi: 10.1097/NNA0000000000000501

Mealer, M., Conrad, D., Evans, J., Jooste, K., Solyntjes, J., Rothbaum, B., & Moss, M. (2014). Feasibility and acceptability of a resilience training program for intensive care unit nurses. *American Journal of Critical Care, 23*(6). doi: 10.4037/ajcc2014747

Mealer, M., Hodapp, R., Conrad, D., Dimidjian, S., Rothbaum, B., & Moss, M. (2017). Designing a resilience program for critical care nurses. *AACN Advanced Critical Care, 28*(4), 359-365. doi: 10.4037/aacnacc2017252

Mealer, M., Jones, J., & Moss, M. (2012). A qualitative study of resilience and posttraumatic stress disorder in United States ICU nurses. *Intensive Care Medicine, 38,* 1445-1451. doi: 10.1007/s00134-012-2600-6

Mealer, M.L., Shelton, A., Berg, B., Rothbaum, B., & Moss, M. (2006). Increased prevalence of post-traumatic stress disorder symptoms in critical care nurses. American Journal of Respiratory and Critical Care Medicine, 175. 693-697. doi: 10.1164/rccm.200606- 735OC

National Council of State Boards of Nursing. (2018). NCSBN's environmental scan: A portrait of nursing and healthcare in 2020 and beyond. *Journal of Nursing Regulation, 10*(4), S1-S35. doi: 10.1016/S2155-8256(20)30022-3

PTSD United. (2017). PTSD statistics. Retrieved from http://www.ptsdunited.org/ptsd-statistics-2/

Slide 42

Sanchez, M., Simon, A., & Ford, D. (2019). PTSD in Tx Nurses. *Journal of Heart and Lung Transplantation, 38*, S93

Schuster, M., & Dwyer, P. (2020). Post-traumatic stress disorder in nurses: An integrative review. *Journal of Clinical Nursing,* 1-19. doi: 10.1111/jocn.15288

Thew, J. (2018, June 5). Creating nurse resilience programs that work. *Health Leaders.* Retrieved from https://www.healthleadersmedia.com/nursing/creating-nurse-resilience-programs-work

Tigari, B., Forouzi, M., & Ebrahimpour. (2019). Relationship between posttraumatic stress disorder and compassion satisfaction, compassion fatigue, and burnout in Iranian psychiatric nurses. *Journal of Psychosocial Nursing and Mental Health Services, 57*(3), 39-47. doi: 10.3928/02793695-20181023-02

U.S. Department of Veterans Affairs. (2018). PTSD and DSM-5. Retrieved from https://www.ptsd.va.gov/professional/treat/essentials/dsm5_ptsd.asp

Wright, D.B. (2018, February 2). I left nursing because of secondary traumatic stress. *Reflections on Nursing Leadership.* Retrieved from https://www.reflectionsonnursingleadership.org/features/more-features/i-left-nursing-because-of-secondary-traumatic-stress

Vahedian-Azimi, A., Hajiesmaeili, M., Kangasneimi, M., Fornes-Vives, J., Hunsucker, R., Rahimibashar, F., …Miller, A. (2019). Effects of stress on critical care nurses: A national cross-sectional study. *Journal of Intensive Care Medicine, 34*(4), 311-322. doi: 10.1177/0885066617696853