

Community-based Interventions to Enhance Infant Safe Sleep Practices

Background

- Sudden Infant Death Syndrome (SIDS) is the leading cause of post neonatal mortality ¹
- 3,400 cases of sudden unexplained infant death syndrome occur annually in the U.S. with SIDS as the largest contributor at 41% ²
- In Baltimore City, infant sleep-related deaths are one of the leading causes of infant death. In addition, there was a sharp increase in sleep related deaths this winter ^{3,4}
- The “Back to Sleep” campaign, which focused on infant positioning as the main risk factor for SIDS, reduced SIDS-related infant mortality by 30 to 50% but current rates have plateaued ^{1,5}

Objectives

To increase adherence to safe sleep practices by addressing limiting factors via community-based interventions

Methods

- Searches were conducted on the PubMed database
- Key terms: “*infant safe sleep intervention*” and “*safe sleep community nursing*”
- 5 most relevant articles were selected for review: 4 randomized controlled trials (RCT) and 1 non-randomized controlled trial

Melnyk Level Rating:

- 4 studies were level II and 1 study was level III

JHNEBP Evidence Rating:

- All studies were level II or III. Most studies were quality A or B. 1 study received a quality C rating for insufficient sample size and reliance on self-reporting.

Independent Variables:

- mobile health application, infant safe sleep device or safe sleep community baby shower

Dependent Variable:

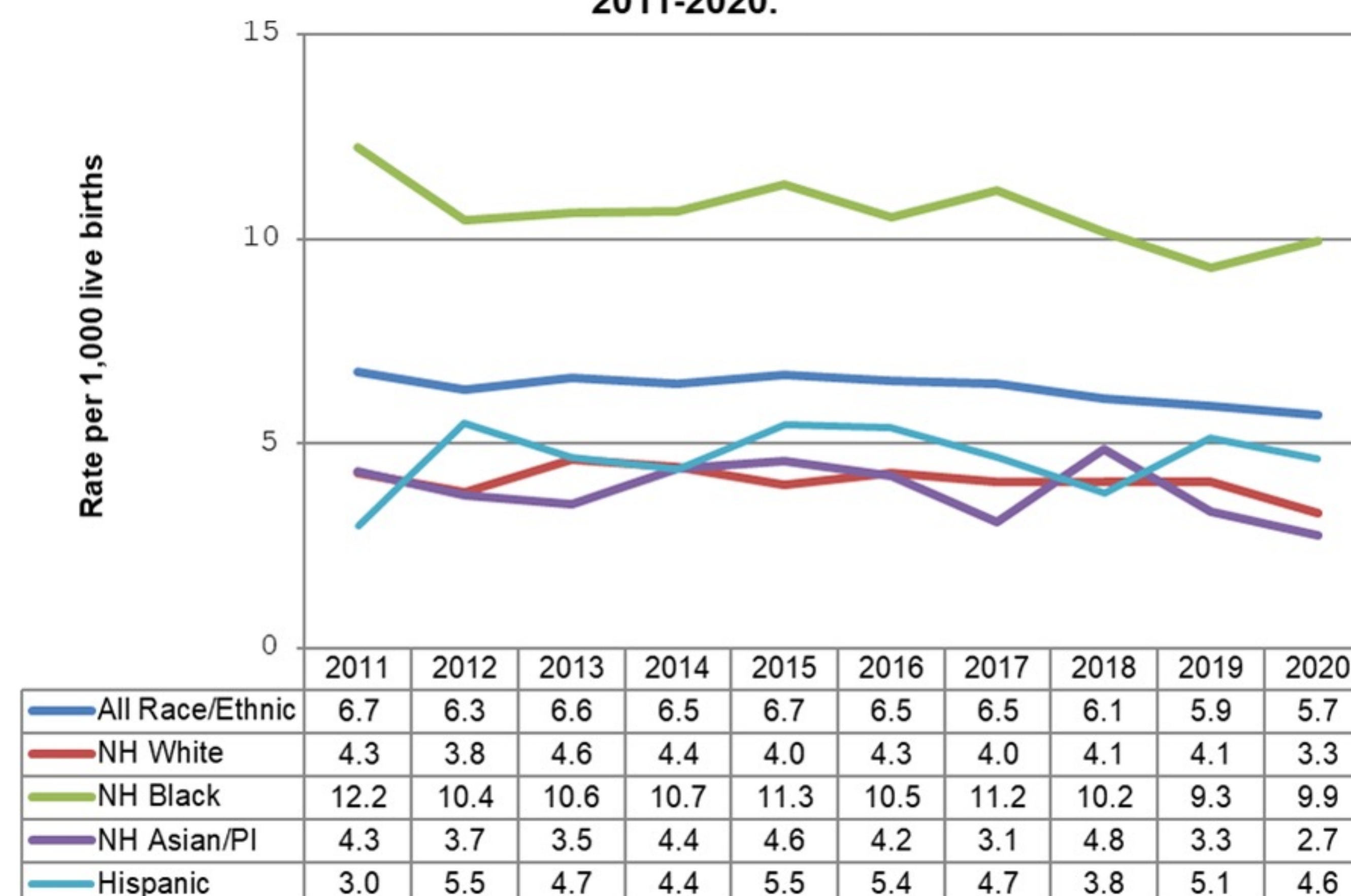
- intention and adherence to infant safe sleep practices



Findings

- Intent to have the baby sleep on their back increased from 78.7% to 98.6% in mothers that attended the shower ⁶
- In observation, 85% of mothers placed the baby to sleep on their back compared to 69% in the control group ⁷
- The provision of infant sleep devices increased safe sleep practices by almost 3 times, with more than 80% of infants noted sleeping on their back post-intervention ^{8,9}
- Mothers in the mobile health application for infant safe sleep education group were more likely to follow infant sleep position recommendations ¹⁰

Figure A. Infant Mortality Rates by Race/ethnicity, Maryland, 2011-2020.



Limitations/Conclusion

Limitations

- A few studies had a small sample size or limited demographics of participants

Conclusion

- The mobile health application increased the likelihood of adherence to infant sleep position and avoidance of bed sharing
- Community baby showers significantly increased maternal confidence and increased intention and frequency of infants supine sleeping
- Infant sleep device distribution increased infants sleeping on their back and overall safe sleep practices

Nursing Implications/CNL Role

Nursing Implications

- Further research is needed prior to the recommendation of a practice change
- Future studies should be conducted using the same interventions to increase validity and determine the greatest impact

CNL Role

- Use interdisciplinary communication to determine any gaps in knowledge and/or modifiable barriers to adherence
- Expanded safe sleep education to antepartum and reinforce during postpartum period
- Collaborate with interdisciplinary teams to advocate for evidence-based policy change
- Facilitate a culture of support for caregivers of infants

References

