Effects of Music Therapy on Preterm Infants in the Neonatal Intensive Care Unit

Author Information:
Authors List:
Presenting Author: Ashley Wood
Presenting Author: Ashley Hodges Wood
Address: 3217 Mockingbird Lane
           Birmingham, Alabama 35226
           USA
           Ph: 205-975-6315
           Fax:
           Email: awood@uasom.uab.edu
Institution: University of Alabama at Birmingham

Abstract Information
Presentation Preference: SNRS Poster Presentation
Abstract Categories:
Interest Group: Parent-Child
Thematic Areas: Perinatal/Neonatal/Infancy
Introduction:
Much emphasis has been placed on techniques for reducing environmental stress and stimuli in the NICU. More recently, the use of structured stimuli (e.g. music) has been encouraged as a means of reducing environmental stress. The study purpose was to examine the effects of a 15-min live-music therapy intervention on heart rate, oxygen saturation, level of motor activity, behavioral distress, and behavioral state levels in premature infants in the neonatal intensive care unit.

Method(s):
The study used a 1-group repeated-measures crossover design, infants were randomly assigned order of music versus no-music conditions. The convenience sample included 20 infants born at 26 to 29 weeks' gestational age. Data were collected on 4 occasions over a 2- to 4-week period. On 2 occasions, the infants received 15 min of live music; the other 2 occasions, the infants did not receive the music intervention.

Results:
Results did not support the hypothesis that, during and for 10 min after exposure to a 15-min live-music intervention, infants would exhibit a greater decrease from baseline in heart rate, level of motor activity, and signs of behavioral distress than they would exhibit after exposure to a no-music condition. Results did not support the hypothesis that infants would exhibit a greater increase from baseline in oxygen saturation during and for 10 min after exposure to a 15-min live-music intervention than they would exhibit after a no-music condition.

Discussion:
Although no deleterious effects were identified, more research is needed before music therapy can be recommended for use with preterm infants in the NICU. Music is a noninvasive, nonpharmaceutical, relatively low-cost intervention. Future research with even further individualized music therapy interventions is needed. Comparisons of this study with other investigations indicate that music therapy interventions provided for a longer period and with increased frequency may also be of benefit.

Research Completed: Yes
Abstract History: NA
Financial Disclosure: Have a financial arrangement or affiliation with commercial companies whose products may be mentioned in this material? No
FDA Disclosure: 

Research Completed: Yes
Abstract History: NA
Financial Disclosure: Have a financial arrangement or affiliation with commercial companies whose products may be mentioned in this material? No
Non-Exclusive License: Cleared: Yes
Accepted Terms: Yes
Submitted By: awood@uasom.uab.edu