

Title: Quality Improvement initiative for KMC in NICU

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Abstract

Background: Despite Kangaroo Mother Care (KMC) being considered a “game changer” in reducing newborn mortality and morbidity, there is still very poor coverage of eligible babies and duration of KMC is not optimal.

Objective: To assess if a Quality improvement (QI) initiative comprising of counseling, education and video demonstration to parents improves KMC duration in a level III NICU.

Methods: All low birth weight baby-mother dyads in NICU were included in the study. A baseline data was obtained from 13 mothers (Pre-intervention group). The next 24 mothers (intervention group) eligible for KMC were educated regarding benefits and method of providing KMC by video demonstrations and counseling by other mothers, doctors and nurses. The duration of KMC was recorded every day in KMC compliance chart. “Successful KMC” was defined as > 8 hours/ day of KMC by discharge. Statistical analysis was done by Student T- Test and Chi square test.

Results: The QI project improved “Successful KMC” from 61.5% to 79.1% (p=0.24). The mean duration of KMC in the first week (1.31 vs. 1.29 hours; p=0.003) and in last 3 days (6.99 vs. 4.43 hours; p=0.003) prior to discharge was significantly higher in the intervention group. The maximum number of hours of KMC was 25 % higher in the intervention group 10.08 hours vs. 8.97 hours(p=0.15).

Conclusions: Implementing prolonged KMC still remains a challenge. Education, counseling and video demonstration improved KMC duration marginally. The QI initiative needs to be sustained and further strengthened to improve the duration of KMC.