Technical Specifications

Neonatal Intensive Care: All Condition Readmissions with Gestational Age Reported

Eligible Population: Newborns with a gestational age <35 weeks, are residents of the State, and without a specified congenital anomaly as described in Table 1 (see Supporting Documents).

Numerator Statement: Number of infants with a gestational age between 23-34 weeks who were readmitted within 7, 14, 30, and 90 days of discharge. These time periods are assessed cumulatively, such that readmissions occurring within prior time periods are included.

Denominator Statement: Number of eligible newborns discharged from the NICU.

Adjusted Metric: Rates are adjusted for race, gender, education, insurance status, and complications (bronchopulmonary dysplasia [BPD], necrotizing enterocolitis [NEC], retinopathy of prematurity [ROP], intraventricular hemorrhage [IVH]). Gestational age is also included in the adjustment. Note that these variables may not be available in all datasets. The adjusted results of readmissions using all of these variables are described as Adjusted Model with complications of prematurity, which has the greatest face validity for practicing physicians, based on data that support the idea that each of these variables contributes in some way to a patient's risk for readmission. Also, the medical complication variables and/or gestational age may be excluded (Adjusted Model) from analyses that solely focus on the overall quality of care of the NICU, as some of the variation in readmission rates may occur because of differential rates of complications at the hospital level. However, these variables may be included for situations such as examining readmissions: (1) as its own measure of quality, independent of other potential measures of quality that may influence readmission rate; (2) as a measure of the outpatient system by itself, in which case these complications are part of the general health (and risk of readmission) of the infant at the time the infant enters care of the outpatient provider/system. Tables 1-5 (see Supporting Documents) provide information relevant to this section.