Infant mortality is defined as the number of deaths within the first year of life. The infant mortality rate (IMR) is computed as the number of infant deaths in a calendar year per 1,000 live births recorded for the same period. For consistency with the national data, the denominators to calculate infant mortality rates were changed from race/ethnicity of parents to race/ethnicity of mother.

In 2003, 586 infants died before reaching their first birthday for an infant mortality rate of 6.5 deaths per 1,000 live births (Figure 2C-1). Despite the increase from the rate of 6.3/1,000 in 2002, the 2003 IMR was the second lowest rate recorded in Arizona since at least 1950 (the data for 1992-2003 are in Table 2C-1; the data for 1950-1992 are in Table 8C-2).

The 2003 mortality risk for infants varied by race/ethnicity. Infants of Asian mothers, followed by babies of White non-Hispanic mothers had the lowest infant mortality rates among the ethnic groups in 2003 (Figure 2C-2, Table 2C-2).

In 2003, Black infants continued to have the worst survival chances among the ethnic groups, followed by American Indians (Figure 2C-2). The risk of dying among Black infants was 2.3 times greater than the risk for Hispanics and 3.6 times greater than the risk for Asians. American Indian infants were 1.7 times more likely to die before their first birthday (7.5 infant deaths per 1,000 live births) in 2003 than Asian infants, the group with lowest IMR of 4.4 deaths per 1,000 live births.
Infants of Asian mothers, followed by babies of American Indian and White non-Hispanic mothers had the lowest mortality rates in the neonatal period (from birth to 28 days of age, NMR), among the racial/ethnic groups in 2003 (Figure 2C-3, Table 2C-3).

Three out of every four (76.8 percent) neonatal deaths in Arizona in 2003 occurred during the first week of life (Table SE-15).

The rate of postneonatal deaths (between 28 days and 365 days after birth, PNMR) for Black or African American infants decreased from 7.3 deaths per 1,000 live births in 2002 to 5.6/1,000 in 2003 (Table 2C-3). Still, the Black PNMR was the highest among the racial/ethnic groups in 2003, and it exceeded the PNMR for all groups by 155 percent (Figure 2C-4). The PNMR for infants of Asian increased from 0.9/1,000 in 2002 to 2.4/1,000 in 2003 and was the third highest among racial/ethnic groups.