Tobacco use can have negative health consequences, especially for mothers and babies. Smoking during pregnancy can contribute to adverse birth outcomes, such as low birth weight and birth defects. After pregnancy, exposure to tobacco smoke can increase an infant’s risk for sleep-related deaths, such as Sudden Infant Death Syndrome (SIDS). Due to the risks of smoking, the U.S. Department of Health and Human Services has set a goal to increase the proportion of females giving birth who did not smoke during pregnancy to 95.7% by 2030. To help reduce maternal tobacco use in Kansas, it is important to understand the burden of maternal tobacco use in the state, as well as barriers that mothers may face when trying to quit.

Smoking Before, During, and After Pregnancy

Among mothers with a live birth in 2017 or 2018, cigarette smoking rates dropped from the 3 months before pregnancy to during pregnancy but began to increase again in the months following pregnancy.

21.1% 9.9% 14.0%

3 Months Before During Postpartum

From the question: “In the 3 months before you got pregnant, how many cigarettes did you smoke on an average day?”

From the question: “In the last 3 months of pregnancy, how many cigarettes did you smoke on an average day?”

From the question: “How many cigarettes do you smoke on an average day now?”
In the three months before pregnancy:

Health Insurance Status

Nearly half (48.6%) of mothers whose primary health insurance was Medicaid in the month before pregnancy smoked cigarettes compared to 13.9% of mothers who had private insurance. About 1 in 3 (33.4%) uninsured mothers had smoked in the 3 months before pregnancy.

Age

A significantly higher percentage of mothers who were 20-24 years old smoked cigarettes (32.5%) compared to those who were 25 years and older (25 to 34 years: 18.2%; 35 and older: 14.3%) in the 3 months before pregnancy.

Race/Ethnicity

The prevalence of smoking in the 3 months before pregnancy was not significantly different between Non-Hispanic White (22.8%), Non-Hispanic Black (14.9%), Hispanic (18.2%), and Non-Hispanic Other Race (12.9%) mothers.

Current Smoking Rules Inside the Home

Significantly more mothers who smoked in the 3 months before pregnancy allowed smoking in their home after the birth (anytime, anywhere, some times, or some places) (6.9%) compared to mothers who did not smoke in the 3 months before pregnancy (2.2%).
Education

A significantly lower percentage of mothers with at least some college education smoked cigarettes during the 3 months before pregnancy (13.0%) compared to those with a high school diploma/GED (33.8%) or less than high school education (37.8%).

Pregnancy Intent

A significantly higher percentage of mothers who either had not intended to become pregnant (27.2%) or who were unsure of the intent to become pregnant (32.5%) smoked cigarettes in the 3 months before pregnancy compared to those who wanted to be pregnant then or sooner (15.9%).

Income

A significantly higher percentage of mothers living at less than 200% of the federal poverty level smoked cigarettes during the 3 months before pregnancy (<100%: 38.2%; 100% - 199%: 22.2%) compared to those with living at or above 200% of the federal poverty level (200% - 399%: 8.9%; >=400%: 4.3%).

WIC Status

Mothers who were enrolled in Women, Infants, and Childrens Nutrition Program (WIC) during pregnancy (35.1%) had a significantly higher prevalence of smoking in the 3 months before pregnancy, than those who were not enrolled in WIC (15.1%).
Social Support

 Mothers with 4-5 sources of social support (16.2%) were significantly less likely to smoke during the 3 months before pregnancy compared to mothers who had less than 5 sources of social support (0-1 sources: 29.9%; 2-3 sources: 26.5%).

Significantly fewer mothers who had social support from their partner during pregnancy reported smoking in the 3 months before pregnancy (18.7%) compared to mother with no social support from partner (41.4%).

From the question, “During your most recent pregnancy, who would have helped you if a problem had come up?” Write-in responses that fit into existing answer categories were recoded into those categories. Respondents who indicated “myself,” “no one,” or similarly indicated not having support, and who had not checked any other source of support, were recoded as “no one.” “Not applicable” was recoded as if the respondent had not checked the “someone else” write-in option. The total number of social support sources was calculated. Zero sources of social support = indicated having “no one” they could go to for help, and did not check any other source of support in the question. In calculating total number of social support sources, where a respondent indicated having two “other” sources (e.g., “neighbors and coworkers”), these were counted as two separate sources. Those who had not checked any of the responses were considered as not having answered the question, and excluded from analysis.

Urban/Rural Residence

Significantly more rural mothers (25.2%) smoked cigarettes in the 3 months before pregnancy, compared to urban mothers (19.2%).

What is PRAMS?

The Kansas Pregnancy Risk Assessment Monitoring System is a survey of Kansas women with a recent live birth. Each month, women who gave birth 2-3 months previously are sampled from Kansas’ birth records, and interviewed about their experiences before, during, and shortly after their recent pregnancy. After data have been collected on a year of births, the data are weighted to represent the population of Kansas women who had a live birth in Kansas during that year. PRAMS data are used to help guide programs and policies that benefit mothers and infants in Kansas.

For more information on PRAMS, visit: https://www.kdheks.gov/prams.

The Kansas Tobacco Quitline 1-800-QUIT-NOW (784-8669) offers a tailored phone counseling program for pregnant women free of charge who are interested in quitting tobacco.

Sources:

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