Fewer kids being exposed to second-hand smoke, but dangers are acute, studies say

BY FREDERIK JOELVING, REUTERS JUNE 30, 2010



Exposure to second-hand smoke is known to cause lung problems, asthma, ear infections and contribute to sudden infant death syndrome (SIDS).

Photograph by: Photos.com, canada.com

American kids can breathe a sigh of relief, according to a study out today in the journal *Pediatrics* that finds their exposure to second-hand smoke at home has dropped significantly since the mid-1990s.

But two other reports in the journal show that early-life exposure could lead to behavioural and health problems later in life.

Exposure to second-hand smoke is known to cause lung problems, <u>asthma</u>, ear infections and contribute to <u>sudden infant death syndrome</u> (SIDS). <u>Smoking during pregnancy</u> has also been linked to a host of psychological problems in children, such as <u>attention deficit/hyperactivity disorder</u> (ADHD) and antisocial behaviour. But scientists have had a hard time teasing out the direct effects of tobacco versus lifestyle factors and mental health in the home.

In one of the three studies in the journal *Pediatrics*, Dr. Marie-Jo Brion of the University of Bristol, U.K., and colleagues tried to disentangle those factors by analyzing two long-term studies from Britain and Brazil.

Both studies had started in the early 1990s. Among British mothers, 16% reported smoking during pregnancy, compared with 29% in Brazil.

The researchers initially found that at age four, the kids whose mothers smoked had higher levels of hyperactivity, peer problems and bad behaviour, such as bullying, cheating and lying. The kids didn't have more emotional problems, however.

After accounting for the parents' psychological health, economic position and whether the father smoked, only the bad behaviour remained highly associated with having a mother who smoked, with odds increased up to 82%.

Brion said her results weren't bulletproof evidence that exposure to tobacco in the womb causes behaviour problems directly, but that it was likely to do so.

Even if a prospective mother doesn't smoke, being around others who do could still affect her unborn child, according to the second study in *Pediatrics*.

Researchers from the University of Hong Kong studied 6,800 school-aged children whose mothers weren't smokers. If their dads smoked daily, however, they tended to weigh more compared to those kids who weren't exposed to second-hand smoke in the womb or after birth. On average, they packed on an extra pound or so.

The third study in *Pediatrics* shows that fewer kids are being exposed to smoke in the home. Dr. Gopal K. Singh of the U.S. Department of Health and Human Services in Rockville, Maryland, and colleagues report that overall, about 5.5 million American children, or 7.6%, were exposed to second-hand smoke in the home in 2007. By contrast, that number was 35% in 1994.

"That was a fairly dramatic drop," Singh said. "It is a positive message in the sense that exposure rates have declined." However, he and colleagues note that the 7.6% figure falls short of the 2010 revised national target for reducing childhood exposure to tobacco smoke at home, which is set at 6%.

Almost 8 in 10 households have smoking bans now, according to Singh, which is nearly twice the number seen in the early 1990s. "That's a big difference in attitude," he said.

In their study, Hawaiian/Pacific Islander children had the lowest exposure rates, while Black children had the highest. Children from poorer households and with less-educated parents were at highest risk. Singh said the decline in second-hand smoke had been much slower in these groups.

Some states stuck out. For instance, less than 2% of kids in California and Utah lived with smokers, while more than 17% did so in Kentucky and West Virginia.

While the study did not test smoking during pregnancy, national data show that around 1 in 10 pregnant women light up at some point, according to Gary A. Giovino of the School of Public Health and Health Professions at the University at Buffalo, New York.

"The problems of smoking and pregnancy have come down substantially over the years," said Giovino, who was not involved in any of the new studies. "But we still have a long way to go."

© Copyright (c) Reuters