

# Kids living near busy streets more prone to asthma: Study

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**NEW DELHI:** Children living next to busy streets have 1.2-1.7-fold higher chances of developing asthma, found a eight-city study across India published in the Journal of Asthma this month.

"Pollution is known to exacerbate asthma symptoms, but this study found it also raises the risk of healthy children developing asthma. Asthma prevalence was higher in the areas with high traffic density," said co-author Dr Virendar Singh, director of Asthma Bhawan in Jaipur.

The study, done across 18 centres in eight cities, compared asthma prevalence to traffic density near the homes of the children aged 6-7 years and 13-14 years. "In terms of absolute numbers, the study found that vehicular pollution increases the number of children with asthma by 50%," said Dr Singh.

In Delhi, 6.02% of the 3,706 children surveyed had asthma and 2.58% have severe asthma, showed data from the All India Institute of Medical Sciences,

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where the study was done. "When we compared the pollution data with the primary data collected, we saw that the number of people living with asthma was higher in areas which had high SPM (suspended particulate matter) levels," said Dr Singh.

Delhi comes second only to Kottayam, which had an astonishingly high 22.9% asthma prevalence rate. "Kottayam is an anomaly. The prevalence rate of asthma is extremely high and the study has no conclusive explanation for it," Dr Singh said.

Even though Delhi's air is

toxic, asthma prevalence among children is close to the national average of 5.35%. "There are two reasons for the prevalence not mirroring the pollution levels. One, we just compared the SPM levels as we did not have the data for other air pollutants at many of our centres. Second, pollution is only one of the environmental components which increase the risk of asthma," he said.

Parental smoking was a factor, with maternal smoking raising asthma risk 2.72 times in the children aged 6-7 years and 2.14 times in children aged 13-14 years as compared to children of non-smokers. The risk increased 1.9 and 1.21 times in the respective age groups when the father was a smoker.

"There is a higher correlation of asthma to parental smoking because of proximity. The children are exposed to vehicular pollution only when they step out of their homes, but the passive smoking happens inside the home. Also, the risk is higher when the mother is a smoker because children spend more time with their mothers than their fathers," said Dr Singh.