THE prevalence of rheumatic heart disease (RHD) in Indigenous children living in the Top End is two to three times higher than that of children living in three other remote regions, and this may be related to poorer socioeconomic conditions, according to research published in the *Medical Journal of Australia*.

Researchers led by Dr Kathryn Roberts, a paediatrician at the Menzies School of Health Research in Darwin, conducted a screening study for RHD in Indigenous schoolchildren in the Top End of the Northern Territory, Central Australia, Far North Queensland (including the Torres Strait), and the Kimberley region of Western Australia.

They found that the prevalence of RHD is high in Indigenous children – 8.6 per 1000 – and is comparable to figures from developing countries.

However, there was a striking difference between the Top End results and those from the other three regions, the researchers found.

“The most striking difference is the higher prevalence of definite RHD in children from the Top End of the NT”, Roberts et al wrote.

“The prevalence of 15.0 per 1000 is two to three times higher than in the other regions we looked at, and nearly triple the previously published estimates of RHD prevalence in Top End children (5.8 per 1000).

“Our study suggests that this significantly underestimates the burden of disease in the Top End.”

The authors suggested that socioeconomic factors may influence the prevalence of RHD.

“We noted that the growth parameters of Top End children were significantly lower than of children in the other regions, and that the participating Top End communities had the highest number of people per household, a mean of 6.3 persons, compared with the Australian average of 2.6 persons per household”, they wrote.

“These observations suggest that the participating communities from the Top End were the most disadvantaged of the remote Indigenous communities we surveyed.

“Given that poverty-related factors, such as overcrowded housing, are known to be significant risk factors for acute rheumatic fever and RHD, extreme disadvantage would provide a plausible explanation for the higher prevalence of RHD in the Top End.”

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