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LETTER TO THE EDITOR

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Intravascular ultrasound versus angiography-guided, drug-eluting stent implantation: A meta-analysis of randomised control trials and systematic review. Data from registries in a meta-analysis of randomised control trials

Dear Editors,

We read with interest a meta-analysis published in the *International Would Journal* titled "Comparison of clinical outcomes between intravascular ultrasound-guided and angiography guided drug-eluting stent implantation: A meta-analysis of randomised control trials and systematic review" by Tan et al.[1] We had the following two observations to make.

The authors have included two studies, (a) Nakatsuma et al[2] and (b) Tian et al,[3] in the present meta-analysis of the randomised control trials. However, these two studies use data from registries/observational studies and not randomised control trials. The weight of these observational studies is significant based on the pooled results of outcomes, and hence, the inclusion of these studies needs to be justified.

The authors have used the fixed-effect method when heterogeneity was insignificant in the pooled estimate. However, this method is flawed. The model should be applied on the basis of understanding on how the studies were designed and not based on the results of the statistical test. For example, if an intervention was studied among different population groups using multiple trials, then heterogeneity prevails among the included studies, and hence, a random-effect model should be used at the beginning of the meta-analysis.

ORCID

Ashish Kumar https://orcid.org/0000-0003-4249-0055
Mariam Shariff https://orcid.org/0000-0001-8799-9678

Ashish Kumar
Mariam Shariff

Department of Critical Care Medicine, St John's Medical College Hospital, Bangalore, India

Correspondence
Ashish Kumar, Department of Critical Care Medicine, St John's Medical College, Bangalore, India.
Email: drashishkumar.u@gmail.com

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