I read with interest the recent article in EJC by Enc and colleagues [1] in which they have attempted to tackle the controversial issue of impact of off-pump coronary artery bypass surgery (OPCAB) on the incidence of postoperative atrial fibrillation (AF). Based on the results of their retrospective study they have concluded that there is no reduction of AF rate with OPCAB. Interestingly, their study is inconclusive not because they have attempted to verify a hypothesis with a study design marred with inherent weaknesses but because they have ignored the current best available evidence while trying to justify their conclusion.

OPCAB is fast becoming a safe alternative to conventional myocardial revascularization. By avoiding cardiopulmonary bypass (CPB), OPCAB is a potentially more physiologic method to maintain the functional integrity of major organ systems with the possibility of reducing mortality and morbidity [2]. In recent years a large body of evidence has been presented in the medical literature on the safety and efficacy of OPCAB. We are currently practicing in an era of evidence-based medicine where a logical and comprehensive approach to evaluating clinically relevant research incorporates many different types of evidence including randomised clinical trials (RCTs), non-randomised clinical trials, and experimental data and analyses the information's content for its consistency, coherence and clarity [2]. In this era of evidence-based medicine double-blinded RCTs have been allotted the highest level of evidence [3]. Any research that ignores current best available evidence can only be termed biased.

I shall further take this opportunity to inform Enc and colleagues [1] and general readership of EJC that we have recently evaluated the current best available evidence on this topic taking into account all the published meta-analyses (Level Ia) as well as performed a meta-analysis of six RCTs published after these several meta-analyses [4]. The findings of our meta-analysis corroborated the findings of the already performed meta-analyses that found significant differences in the incidence of AF after OPCAB and conventional myocardial revascularization [2, 5]. The skeptics might say that a meta-analysis is however only as good as the studies it includes and the factors it takes into account. Well if that’s the case then perhaps it is time to undertake a large-scale multi-center RCT of OPCAB versus CPB with the development of post-operative AF as a primary endpoint. This may be the only definitive way to answer the question of whether OPCAB reduces the incidence of post-operative AF in patients undergoing coronary artery bypass surgery.

References

Reply to Raja

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We thank you for your interest in our article. We absolutely agree with you that off-pump coronary artery bypass grafting (OPCAB) is a safe alternative method for myocardial revascularization. OPCAB is a potentially more physiologic method with the possibility of reducing mortality and morbidity [1]. However, the recent meta-analysis reports that mortality, stroke, myocardial infarction, and...