



# Letter to the Editor: reporting and analyses of sex/gender and race/ethnicity in randomized controlled trials of interventions published in the highest-ranking anesthesiology journals

Briana Lui<sup>1</sup> & Robert S White<sup>\*,2</sup>

<sup>1</sup>Weill Cornell Medicine, Center for Perioperative Outcomes, Department of Anesthesiology, 428 East 72nd Street, Suite 800A, New York, NY 10021, USA

<sup>2</sup>Weill Cornell Medicine, Department of Anesthesiology, 525 East 68th Street, Box 124, New York, NY 10065, USA

\*Author for correspondence: Tel.: +1 917 693 0464; Fax: +1 212 746 8563; [rsw9006@med.cornell.edu](mailto:rsw9006@med.cornell.edu)

**“We agree with Belgic *et al.* that researchers should be more cognizant of such patient covariates, and we urge researchers to pay greater attention to social determinants of health as a whole when designing studies”**

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We read with great interest the original article entitled ‘Reporting and analyses of sex/gender and race/ethnicity in randomized controlled trials of interventions published in the highest-ranking anesthesiology journals’ by Begic *et al.* [1]. The authors found that among 732 studies, the majority failed to analyze and report results for sex/gender and race/ethnicity. We agree with Belgic *et al.* that researchers should be more cognizant of such patient covariates, and we urge researchers to pay greater attention to social determinants of health as a whole when designing studies.

In recent years, several major anesthesiology studies have demonstrated significant disparities in intraoperative anesthesia care and outcomes. Using data from the National Anesthesia Clinical Outcomes Registry, Andrea *et al.* [2] found that patients with lower socioeconomic status (measured as either insurance status or median income) received inferior anesthesia care as compared with more affluent patients. Specifically, Medicaid patients were less likely than commercially insured patients to receive postoperative nausea and vomiting prophylaxis [2]. Using data from the State Inpatient Databases (Healthcare Cost and Utilization Project, Agency for Healthcare Research and Quality), La *et al.* [3] found that the patients undergoing total hip arthroplasty received different types of anesthesia depending on hospital safety net burden status (measured as the proportion of cases billed to Medicaid or without insurance). Patients who received care at medium and high safety net burden hospitals (as defined by proportion of Medicaid or Uninsured patients) were more likely to be administered general anesthesia rather than regional anesthesia (regional anesthesia use has been previously shown to be associated with greater patient survival and decreased hospitalization costs as compared to general anesthesia) [4,5]. Persistent health disparities have also been found across a range of surgical procedures, with vulnerable populations experiencing increased in-patient mortality, postoperative complications, lengths of stay and re-admissions [6–8]. Similar observed inequalities in care and outcomes have been shown for obstetric anesthesia [9–13] and pain medicine [13].

We therefore commend Begic *et al.* for their important and timely findings and recommend that researchers recognize the impact of social determinants of health on disparities in anesthesiology and how this may impact health outcomes.

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