The smaller the better?

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# Dear editor

With great interest, I have read the article written by Khraise et al<sup>1</sup> which retrospectively investigated the incidence and risk factors for postdural puncture headache (PDPH) after cesarean delivery in Jordanian women. Their main conclusions were that repeated puncture attempts and presence of tension headache before the cesarean delivery were risk factors for PDPH.

The presence of PDPH is a potential burden to the mother and the family, with a large, negative impact on the puerperal period. Moreover, the correct diagnosis of PDPH can be difficult. After analyzing 95 women with presumed PDPH, Stella et al found that the majority had tension and migraine headache, and preeclampsia was the cause of the headache.<sup>2</sup> Khraise et al found an association between tension headache and PDPH which could actually be a diagnostic issue.

The pathophysiology behind PDPH is complex and is suggested to involve leakage of spinal fluids through the punctured hole. Larger needles will cause bigger holes increasing the risk of developing PDPH. Other risk factors which have been identified are younger age, female gender, cutting needle tip, bevel direction (perpendicular to fibers of the ligaments), vaginal delivery and experience of the anesthetist (in training).<sup>3</sup>

In the study by Khraise et al, two different needles were used: a pencil-point 25-G and a traumatic 27-G Spinostar. A very interesting finding in this study is that the use of the traumatic 27-G Spinostar needle leads to repeated punctures, increasing the risk of developing PDPH. The positioning of fine needles can be difficult, and an introducer needle through which the 27-G spinal needle can be introduced is needed for guidance. The findings of this study pose the following question: although the anesthetists are creatures of habit, is it time to get rid of the 27-G needle?

### **Disclosure**

The author reports no conflicts of interest in this communication.

# References

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