



Yuenyongviwat V, Iamthanaporn K, Hongnaparak T, Tangtrakulwanich B. A randomised controlled trial comparing skin closure in total knee arthroplasty in the same knee: nylon sutures *versus* skin staples. *Bone Joint Res* 2016;5:185-190.

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Sir,

We have read this paper with great interest.¹

We congratulate the authors and the Editor as this is the first time that the efficacy and safety of skin staples and nylon sutures in the same knee have been compared in a prospective randomised study. The authors conclude that skin staples and nylon stitches had comparable results with respect to wound healing and patient satisfaction in total knee arthroplasty (TKA) wound closure in non-obese patients. The benefit of skin staples over nylon stitches is a decrease in operative time, but is more painful upon removal.

We have some comments on this study. First, in the Patients and Methods section, it was not stated whether the patients who were invited into this study had diabetes. It is well known that diabetes can delay wound healing and increase the risk of incision infection for poor blood sugar control.

Second, although the Hollander wound evaluation scores were recorded and did not differ between skin staple wounds and nylon-stitched wounds at different post-operative timepoints, there were no post-operative photographs showing the wound healing in different groups.

Third, in the Results, the authors found that the lower half of both skin-stapled and nylon-stitched wounds had a higher patient satisfaction score than the upper half of the wound but the authors provided no further explanation.

Lastly, skin staples did decrease the operative time but were more painful upon removal. In order to avoid pain, knotless barbed sutures (KBS) may be a better choice. Recent meta-analyses^{2,3} have demonstrated that KBS are preferable for TKA wound closure given their shorter wound closure time and lower total cost.

X-W. Liu, Attending Doctor of Knee Surgery,
Department of Knee Surgery,
Honghui Hospital, Xi'an Jiaotong University College of Medicine,
Xi'an, Shaanxi, 710054, China.

L. Xiao,
J-B. Ma.

1. **Yuenyongviwat V, Iamthanaporn K, Hongnaparak T, Tangtrakulwanich B.** A randomised controlled trial comparing skin closure in total knee arthroplasty in the same knee: nylon sutures versus skin staples. *Bone Joint Res* 2016;5:185-190.
2. **Zhang W, Xue D, Yin H, et al.** Barbed versus traditional sutures for wound closure in knee arthroplasty: a systematic review and meta-analysis. *Sci Rep* 2016;6:19764.
3. **Borzio RW, Pivec R, Kapadia BH, Jauregui JJ, Maheshwari AV.** Barbed sutures in total hip and knee arthroplasty: what is the evidence? A meta-analysis. *Int Orthop* 2016;40:225-231.

Conflict of Interest: None declared