



Letter to the Editor

Response to Letter to the Editor Regarding the Article “The Balloon-Assisted Double-Kissing T-Stenting Technique: Concept, in Vitro Model, and Case Examples”



We are thankful to the authors for their comments and commend them on developing their nano-inverted T-stenting technique (NIT).¹ Although our double-kissing T-stenting technique (DKT) obviously shares similarities with other 2-stent bifurcation approaches, we believe it differs from the NIT in many aspects² so that they are fundamentally 2 different approaches and not a variation on the same theme. First, the use of a main branch (MB) balloon to help position the side branch (SB) stent is of utmost importance with our technique and is also not mandatory in the traditional T-stenting technique. Furthermore, DKT is an SB stent-first strategy, whereas the traditional T-stenting is an MB stent-first strategy, as described in the European Bifurcation Club consensus.³ Second, the DKT involves first kissing balloon inflation with the stent balloon in the SB and the MB balloon, which slightly tilts the SB stent struts on the carina side toward the SB without crushing it. It also ensures a good opening of the SB stent for subsequent steps. In the NIT, there is no kissing balloon inflation at this point. Moreover, Rigatelli et al¹ described crushing of the SB stent struts toward the distal MB, which is something that the DKT aims to prevent; DKT is intended to push the SB stent crowns toward the SB upon deployment of the MB stent. Third, leaving the SB stent balloon in place to serve as a bumper balloon greatly facilitates advancement of the MB stent, a feature that is unique to our technique. Fourth, implantation of the MB stent without having previously crushed the SB stent results in an accordion effect of the SB stent. In the NIT, there is no accordion effect of the SB stent as the overhanging SB struts have already been crushed.

Regarding the concerns about SB ostium coverage, our experience is that it is rarely missed with the DKT. Operators performing the DKT should follow the steps of the technique; in case of doubt about the position of the proximal SB stent struts, overhanging a bit more into the MB will result in a classical mini-crush, a worst-case scenario that can still result in very good 2-stent architecture. Finally, we agree that the bench model does not demonstrate the feasibility of the technique in all angles, especially very narrow angles, as mentioned in the limitation section; this deserves further investigation.

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Declaration of competing interest

Louis Verreault-Julien reports speaker fees from Asahi and Shockwave Medical. Stéphane Rinfret reports being a consultant for Medtronic and Teleflex. Kevin Croce reports being a consultant for Boston Scientific, Abbott, Teleflex, Cardiovascular Systems Inc, Abiomed, Takeda, and Philips.

Funding sources

This letter was not supported by funding agencies in the public, commercial, or not-for-profit sectors.

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DOI of original articles: <https://doi.org/10.1016/j.jscai.2024.101928>, <https://doi.org/10.1016/j.jscai.2024.102197>.

<https://doi.org/10.1016/j.jscai.2024.102233>

Received 10 June 2024; Accepted 17 June 2024

Available online 22 July 2024

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