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Unusual mechanism of post-operative pacemaker lead dislodgement

Ralf Guenzinger^{1*}, Christof Kolb², Thomas Ried³, and Ruediger Lange¹

¹Department of Cardiovascular Surgery, German Heart Centre Munich, Technische Universität München, Lazarettstrasse 36, 80636 Munich, Germany; ²Department of Cardiovascular Diseases, German Heart Centre Munich, Technische Universität München, Lazarettstrasse 36, 80636 Munich, Germany; and ³Institute of Anaesthesiology, German Heart Centre Munich, Technische Universität München, Lazarettstrasse 36, 80636 Munich, Germany

* Corresponding author. Tel: +49 89 1218 2754; fax: +49 89 1218 4123. E-mail address: guenzinger@dhm.mhn.de

A permanent single-chamber pacemaker was implanted due to complete heart block after transapical aortic valve implantation. Post-operatively, the patient developed symptomatic complete heart block and was scheduled for a transvenous permanent single-chamber pacemaker. Upon the procedure, the patient presented with a central venous catheter in the right jugular vein and a sheath with a temporary pacemaker lead in the left jugular vein. We decided for puncture of the left subclavian vein for lead implantation. Under local anaesthesia, the pacemaker was implanted. After pocket closure, the temporary lead was extracted under fluoroscopy. Prior to intensive care unit transport, the sheath was also removed. Immediately, the patient developed symptomatic bradycardia while the transvenous lead came through the cervical skin (*Figure*). Obviously, the permanent lead had been placed via Seldinger's technique through the sheath which contained the temporary lead. After pocket reopening and permanent lead removal through the skin, a new permanent lead was implanted uneventfully.

Lesson to be learnt from the case: in rare cases, temporary sheaths containing a pacing wire may be punctured during permanent pacemaker implantation. Implanters should be aware of this complication and aim to minimize the risk by choosing an appropriate access route or retracting temporary sheaths prior to the implantation.

The full-length version of this report can be viewed at: <http://www.escardio.org/communities/EHRA/publications/ep-case-reports/Documents/Unusual-mechanism-of-post-operative-pacemaker.pdf>.

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