

OFFICIAL JOURNAL OF THE ZEENAT QURESHI STROKE INSTITUTE

Delayed Coil Migration: Uncommon Cause of Ischemic Stroke and Retrieval Technique

Mohammad Rauf Afzal, MD^{1*}, Mohtashim Arbaab Qureshi, MD¹, Muhammad Shah Miran, MD², Gustavo J. Rodriguez, MD¹, Alberto Maud, MD¹, and Rakesh Khatri, MD¹

¹Department of Neurology, Paul L. Foster School of Medicine, Texas Tech University Health Sciences Center El Paso, El Paso, TX, USA

²Zeenat Qureshi Stroke Institute, St. Cloud, MN, USA



Video.Velocity microcatheter (Penumbra) was advanced over a synchro 2 standard microwire (Stryker) across the displaced coil loop and was retrieved using Trevo 3 mm \times 20 mm stent retriever device (Stryker) into an intermediated 4 max Neuron catheter (Penumbra).

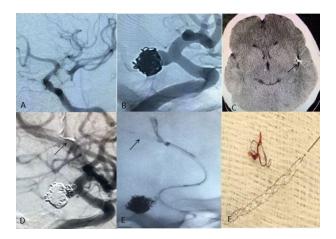


Figure 1. (A) Aneurysm obliterated after initial coil embolization. (B) Residual aneurysm at 18 months follow-up. (C) Metal artifact in the lateral sulcus. (D) Displaced coil in the left distal M2 of middle cerebral artery. (E) Stent retriever deployed adjacent to the errant coil. (F) Coil with integrated thrombus.

A 51-Year-old woman had balloon assisted coil embolization with two microcoils for a residual of a previously ruptured right posterior communicating artery aneurysm [Figure 1(A) and (B)]. The patient presented after two weeks with aphasia and right hemiparesis. Computed tomography revealed migrated coil [Figure 1(C)] confirmed by cerebral angiography [Figure 1(D)]. The coil was successfully retrieved using Trevo 3 mm \times 20 mm stent retriever (Stryker) [Figure 1(E) and (F), Video) with complete recovery.

Cerebral ischemic events can rarely result from spontaneous delayed displacement of coils and stent retrievers may be used in appropriate cases [1,2].

Vol. 9, No. 6, pp. 36-37. Published December, 2017.

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Address correspondence to: Mohammad Rauf Afzal.

^{*}Corresponding Author: Mohammad Rauf Afzal MD, Department of Neurology, Paul L. Foster School of Medicine, Texas Tech University Health Sciences Center El Paso, 4800 Alberta Ave., El Paso, TX 79905, USA. Tel.: (919) 914-1285. mohammad.afzal@ttuhsc.edu

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Acknowledgements

None.

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