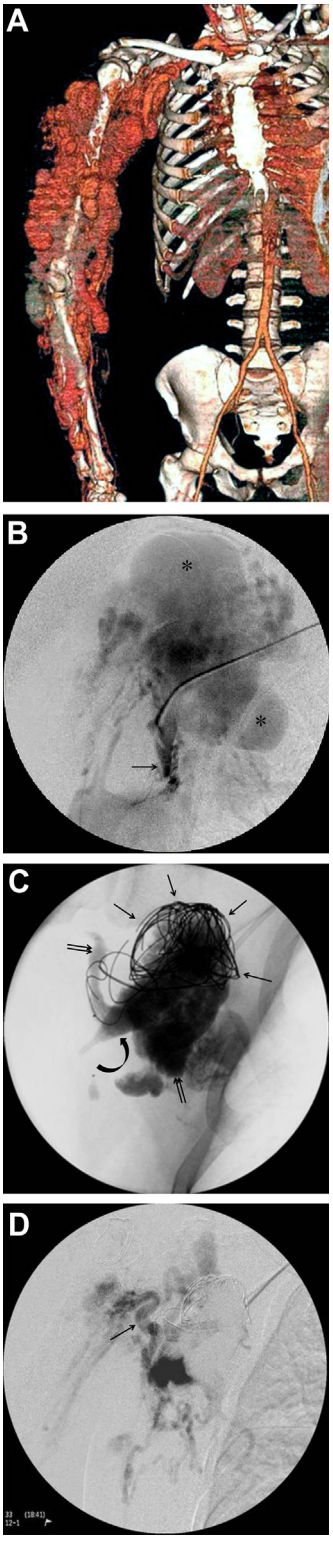
VASCULAR IMAGES

Giant arteriovenous fistula in Parkes Weber syndrome

Andres R. Plasencia, MD,[a] and **Alejandro Santillan, MD,**[b] *Lima, Peru; and New York, NY*

A 37-year-old male with known Parkes Weber syndrome involving the upper limb characterized by cutaneous warmth, pale discoloration, bruit, and nonhealing ulcerative lesions of the posterolateral forearm and fourth finger presented with symptoms of brachial plexus compression including sharp pain, paresthesias, and paresis with decreased grip strength. Parenteral narcotics were administered without complete pain resolution. A right upper limb computed tomography angiogram and an angiography showed a high-flow arteriovenous fistula at the axillary level with a cluster of giant varices (*A*/Cover and *B*). In the first stage of embolization, twenty-three 30 × 100-mm Vein of Galen coils (Boston Scientific/Target Therapeutics, Inc, Fremont, Calif) and 2 number 12 Gold-Valve detachable balloons (Nycomed Ingenor, Paris, France) were deployed at the site of the fistula. The second stage of embolization consisted in reaching the fistula site with a 3F microcatheter (Microferret; Cook Inc, Bloomington, Ill). Then, a transient circulatory arrest at the axillary artery was achieved using a 20-mm polyethylene balloon (Mansfield Scientific Co, Watertown, Mass) to inject 50% *n-BCA* (Histoacryl; Braun, Melsungen, Germany) under flow control (*C*) producing a marked decreased in fistula flow (*D*). Postoperative analgesia was not needed by the patient and a significant recovery of sensation, motor movements, skin color, and temperature was obtained. Parkes Weber syndrome is a rare disease [1,2] characterized by the presence of high-flow arteriovenous fistulas, limb hypertrophy, varices, and ulcerations that may lead to major amputation.[3,4] In this case, a dramatic improvement of vascular and neurologic symptoms was observed after endovascular treatment.



REFERENCES

1. Parkes Weber F. Angioma formation in connection with hypertrophy of limbs and hemi-hypertrophy. Br J Dermatolog 1907;19:231.
2. Straface G, Biscetti F, Ghirlanda G, Flex A. Images in vascular medicine. Parkes Weber syndrome: bone involvement visualized by computed tomography angiography. Vasc Med 2009;14:91-2.
3. Robertson DJ. Congenital arteriovenous fistulae of the extremities. Ann R Coll Surg Engl 1956;18:73-98.
4. Young AE, Ackroid J, Baskerville P. Combined vascular malformations. In: Mulliken JB, Young AE, editors. Vascular birthmarks: hemangiomas and malformations. Philadelphia, PA: Saunders; 1988. p. 246-74.

Submitted Jul 30, 2012; accepted Aug 21, 2013.

From the Interventional Neuroradiology Service, Clinicas Tezza e Internacional, Lima[a]; and the Department of Neurological Surgery, Division of Interventional Neuroradiology, New York Presbyterian Hospital, Weill Cornell Medical Center, New York.[b]

Author conflict of interest: none.

E-mail: andresplasencia2000@yahoo.com

The editors and reviewers of this article have no relevant financial relationships to disclose per the JVS policy that requires reviewers to decline review of any manuscript for which they may have a conflict of interest.
J Vasc Surg 2014;60:233
0741-5214/$36.00
Copyright © 2014 by the Society for Vascular Surgery.
http://dx.doi.org/10.1016/j.jvs.2013.08.041