1025 **Ultrasound-Guided Bamboo Spear Technique for Severely Calcified Lesion in the Proximal Superficial Femoral Artery: A Case Report**

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Background:?Endarterectomy is the first-line treatment for femoral artery revascularization in the inguinal region. However, in patients with comorbidities such as diabetes or those unsuitable for general anesthesia, endovascular therapy (EVT) is preferred. Among various EVT techniques, the Bamboo spear technique?direct arterial puncture with a metal needle followed by balloon angioplasty?has shown promise, especially when guided by ultrasound to enhance accuracy and safety.

Case Presentation:?A 60-year-old male on long-term dialysis presented with intermittent claudication. Angiography revealed a high bifurcation of the left common femoral artery and severe calcified stenosis in the proximal superficial femoral artery. Under ultrasound guidance in both longitudinal and transverse planes, a 20G needle was precisely inserted into the center of the calcified plaque. A guidewire was advanced through the needle, and the lesion was successfully dilated using scoring and drug-eluting balloons.

Results:?The patient was discharged on postoperative day 4 with improved ankle-brachial index (ABI), and complete resolution of claudication symptoms.

Conclusions:?The Bamboo spear technique is an effective EVT option for heavily calcified femoral lesions, particularly in patients with favorable anatomical conditions (e.g., non-obese and with clear vascular visualization). Ultrasound guidance plays a critical role in achieving precise puncture and safe lesion expansion, offering a viable alternative in cases where surgical endarterectomy is not feasible.