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UNIVERSAL

Routine Ultrasonography Guidance For Femoral
Vascular Access For Cardiac Procedures

Multicenter, Randomized, Open-Label Trial

OBJECTIVE: To compare ultrasonography guidance vs. no ultrasonography guidance for femoral arterial access for coronary angiography or intervention on a background of fluoroscopic guidance.

621
PATIENTS

INCLUSION CRITERIA:

Referral for coronary angiography or PCI with planned femoral access and palpable femoral pulse.



**FLUOROSCOPY AND
ULTRASONOGRAPHY (N=311)**

vs.



FLUOROSCOPY ALONE

PRIMARY ENDPOINT

Composite of Bleeding Academic Research Consortium (BARC) 2, 4, and 5 bleeding or major vascular complication within 30 days, occurred in 12.9% in the fluoroscopy and ultrasonography group and 16.1% in the fluoroscopy alone group (p=0.25).

SECONDARY ENDPOINT

Major vascular complications: 6.4% vs. 9.4%, p=0.18

First attempt at arterial puncture: 86.6% vs. 70.0%, p<0.001

CONCLUSION

Among patients undergoing coronary angiography with fluoroscopic guidance, routine ultrasonography to guide femoral arterial access did not reduce bleeding or vascular complications.

Jolly SS, AlRashidi S, d'Entremont MA, et al. Routine Ultrasonography Guidance for Femoral Vascular Access for Cardiac Procedures: The UNIVERSAL Randomized Clinical Trial. *JAMA Cardiol* 2022; Sep 18:[Epub Ahead of Print].

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