Coil embolization of inferior thyroid artery pseudoaneurysm

Mário Moreira, Paulo Donato, Luís Antunes, Joana Moreira, Anabela Gonçalves, Manuel Fonseca

Centro Hospitalar e Universitário de Coimbra
Coimbra, Portugal
Disclosure

Speaker name: Mário Moreira

I have the following potential conflicts of interest to report:

☐ Consulting
☐ Employment in industry
☐ Stockholder of a healthcare company
☐ Owner of a healthcare company
☐ Other(s)

☒ I do not have any potential conflict of interest
Case report

- Female, 84yo
- Sudden pulsatile mass in right side of the neck
- Jugular CVC attempted 2 weeks earlier
Case report

44mm Inferior thyroid artery pseudaneurysm
Femoral puncture: unable to catheterize thyrocervical trunk
- Right braquial puncture
- Azur® (Terumo®) Peripheral hydrocoil (6x17, 5x17, 4x7)
Compression
- can be used for a superficial pseudoaneurysm with a small sac size
- in our case, this could not be supported owing to the anatomic site

OR vs endovascular
- OR - bleeding control may be difficult and recurrent laryngeal or phrenic nerve injuries and wound site infection may occur
- Endovascular procedures allow to successfully repair the lesions with low complications rate
Discussion

Venturini et al. (2017) – True Aneurysm of the Inferior Thyroid Artery: A Case Report and Literature Review:

➢ Pseudoaneurysms:

- 4 cases after jugular CVC attempt
- 1 after blunt trauma – seat-belt injury – coil embolization
- 1 fine needle aspiration cytology for thyroid nodule
Discussion

• Coil embolization
• Covered stent V12; surgical drainage two days later to relieve compressive symptoms
• Surgery: ligation
• Percutaneous ultrasound-guided thrombin injection (after unsuccessful transcatheter coil embolization)
Closing remarks

- Vascular complication can occur after CVC placement, including pseudoaneurysm

- OR can be challenging in some patients/anatomic locations

- Endovascular exclusion/embolization is safe and effective
Coil embolization of inferior thyroid artery pseudoaneurysm

Mário Moreira, Paulo Donato, Luís Antunes, Joana Moreira, Anabela Gonçalves, Manuel Fonseca

Centro Hospitalar e Universitário de Coimbra
Coimbra, Portugal