There Is No Such Thing As A Chronic TBAD: Why Our Thinking And Nomenclature Should Change

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Disclosure

• None
Case

• 65 year old woman
• Sudden chest pain for 2 days
• CT scan
• Admitted for BP and pain control
• Discharged after 1 week
....months later...

• Same patient now in your office
• No knowledge of prior history.
• Patient unaware of the term aortic dissection
• Being seen for “tear in the aorta” → CTA
5 years later...
5 years later…
In the Absence of TAA or TAAA

- Fattori et al:
  - Acute: <14 days,
  - Subacute: 14 days - 6 weeks
  - Chronic: > 6 weeks
- INSTEAD: Chronic upto 52 weeks
- Kuratani et al: 6 months
- General Consensus:
  - subacute: 14 days – 90 days
  - Chronic > 90 days!!
4D PC-MRI: Hemodynamic in the false lumen
Stable vs. Unstable TBAD

• Acquire velocity information over the entire aortic volume over time
• Measurement of stroke volume and velocity (not amount of FLT) in the false lumen correlate with the rate of aneurysmal formation
• Distal location of the tear and spiral flow $\rightarrow$ false lumen expansion

Enhanced 18F-FDG PET/CT uptake in the aortic wall and concomitantly increased biomarkers of coagulation and fibrinolysis, false lumen morphology → aneurysmal expansion.

TEVAR lowers the uptake
Conclusions

• The term chronic dissection is misleading if using plain old CTA
• AD should be classified based on individualized imaging taking into consideration the hemodynamic and metabolic activity or the aortic wall
• The idea is to predict aneurysmal dilation and propose pre-emptive intervention
• “... If hypertension is a silent killer, leaving dissection untreated is controlled mass murder ...!”