What is the optimal technique for thrombus removal in acute DVT?

Gerry O’Sullivan
Galway
Treatment Options-Venous Thrombolysis

- **Systemic**
  - high rate of bleeding problems
  - All the risk, few of the benefits

- **Catheter-directed (CDT)**
  - Simple
  - US assisted (EKOS)

- **Pharmaco-Mechanical Thrombectomy (PMT)**
  - Angiojet (BSCI)
  - AngioVac (AngioDynamics)
  - Aspirex (Straub)
  - Cleaner (Rex)
  - Penumbra Indigo
  - Trerotola (Arrow)
  - Others on the horizon
DVT treatment options - look at it another way..........

• Single session=
  – AngioJet
  – AngioVac
  – Penumbra Indigo
  – Arrow PTD
  – Cleaner

• Multi-session=
  – Catheter Directed Thrombolysis
  – Simple; US assisted (EKOS) or in combination with a PMT device
Contraindications for CDT may NOT apply for Single Session Rx
What does single session therapy mean?

- Removal of thrombus and all ancillary steps within 3 hours
- Not transfer to a step down unit
- Not the start of catheter directed thrombolysis
Single session: ideal patient

- Age irrelevant if they can hold still for 2-3h
- Popliteal vein open
- Not short of breath
- Negative CTPA
- IVC normal
- No contra-indications to thrombolysis
- Leg was “normal” beforehand
Single session patients: less desirable traits

- Popliteal vein completely occluded
- Non acute DVT (definitely >3/52)
- Unable to hold still
- Claustrophobic
- Large volume PE (CDT might be better as it will lyse PE also over 3 days)
What is the optimal technique for thrombus removal in acute DVT?

Gerry O’Sullivan
Galway