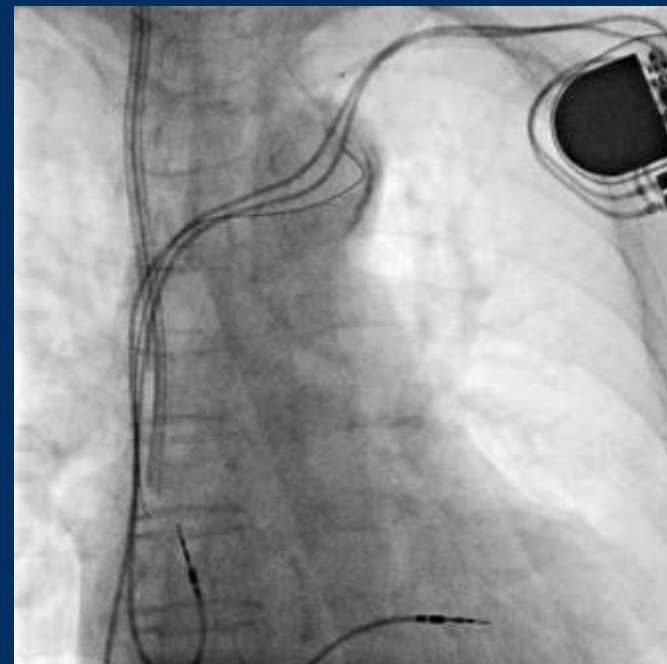
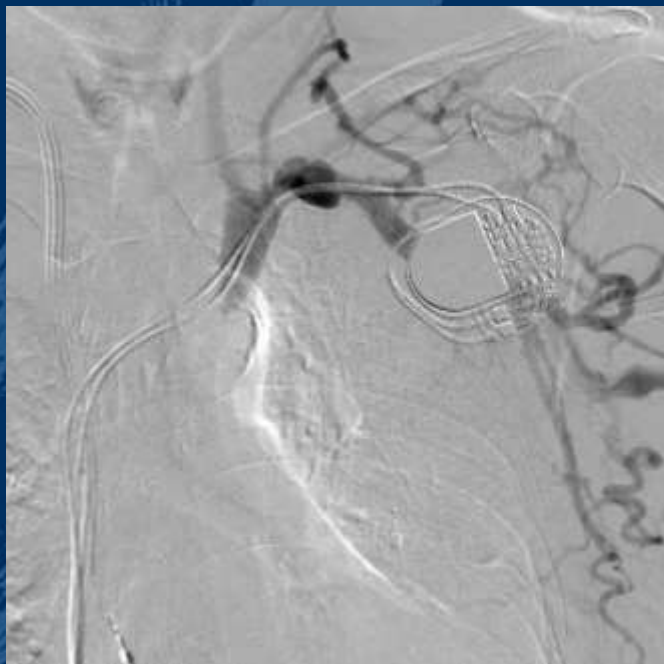




LINC



Recanalization of central vein CTO lesion after pacemaker implantation

Taipei Veteran General Hospital
National Yang-Ming University
Mar 15th, 2017

Ruey-Hsing Chou, MD.
Po-Hsun Huang, MD. PhD.



LINC

Disclosure

Speaker name: **Ruey-Hsing Chou**

.....

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



LINC

Case Presentation

84y/o woman, DM (+), CKD (+)

2015/11

SSS s/p PPM implantation

2016/06

s/p AV graft implantation

2016/08

Painful swelling while HD

2016/09

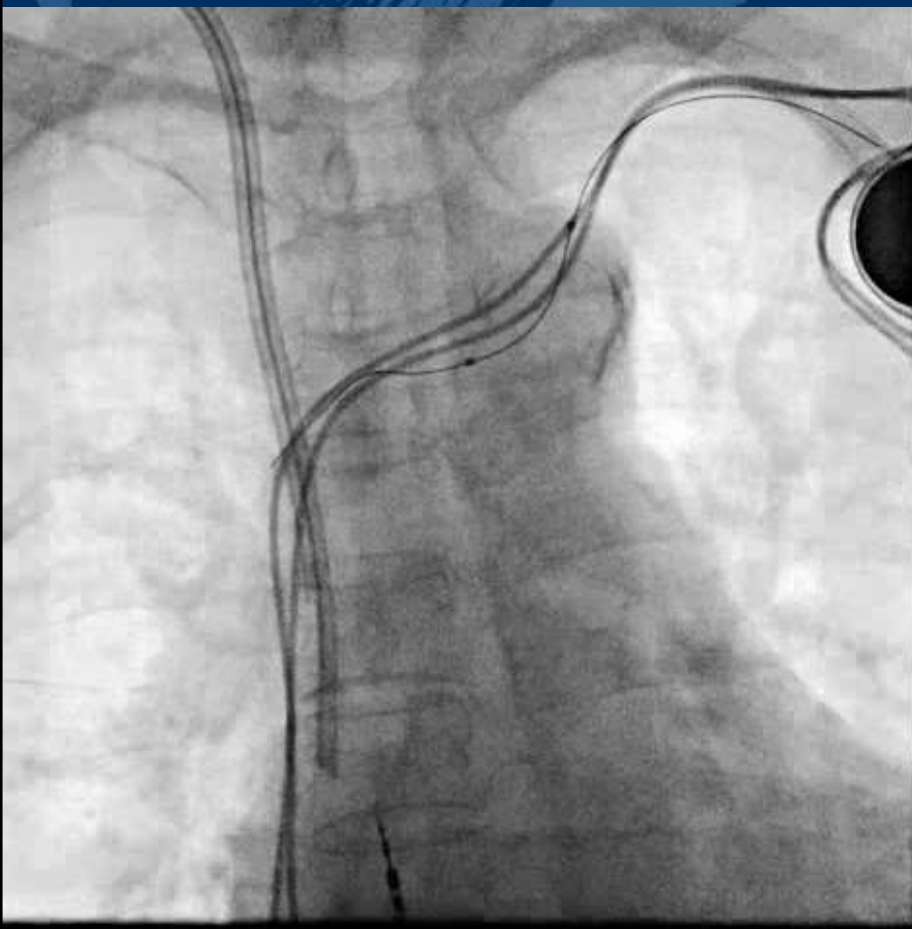
PTA



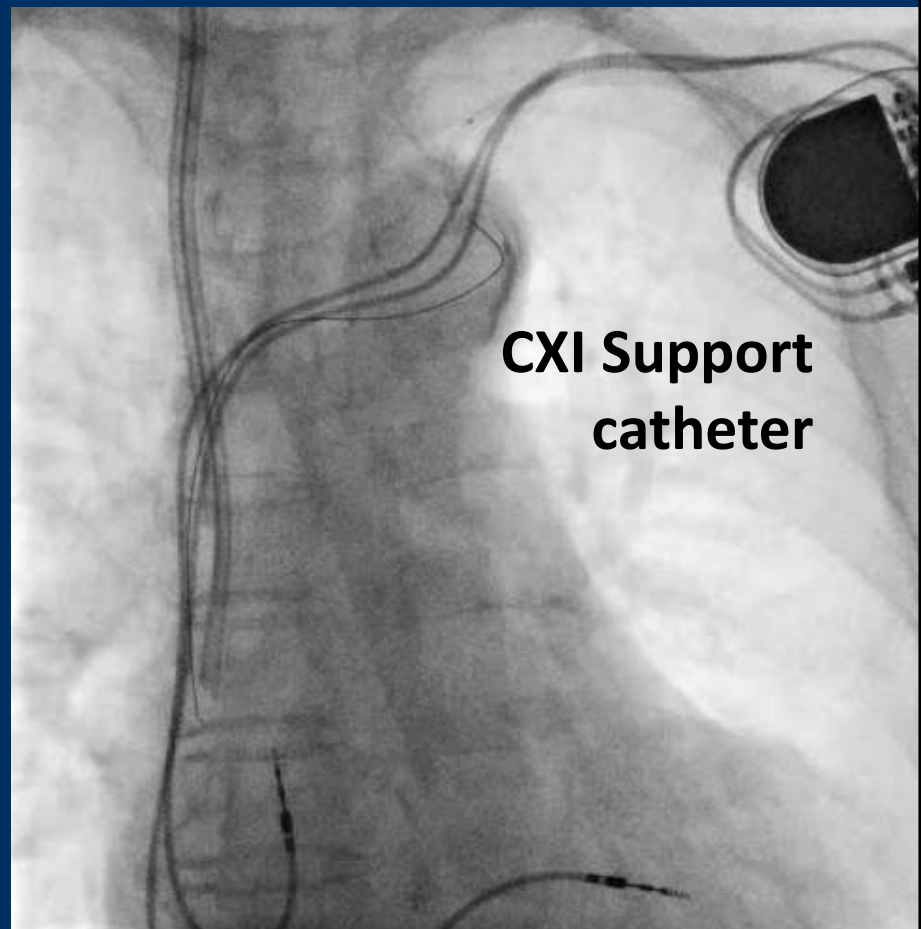


LINC

Brachiocephalic Vein CTO



Atrato GW punctured to IVC

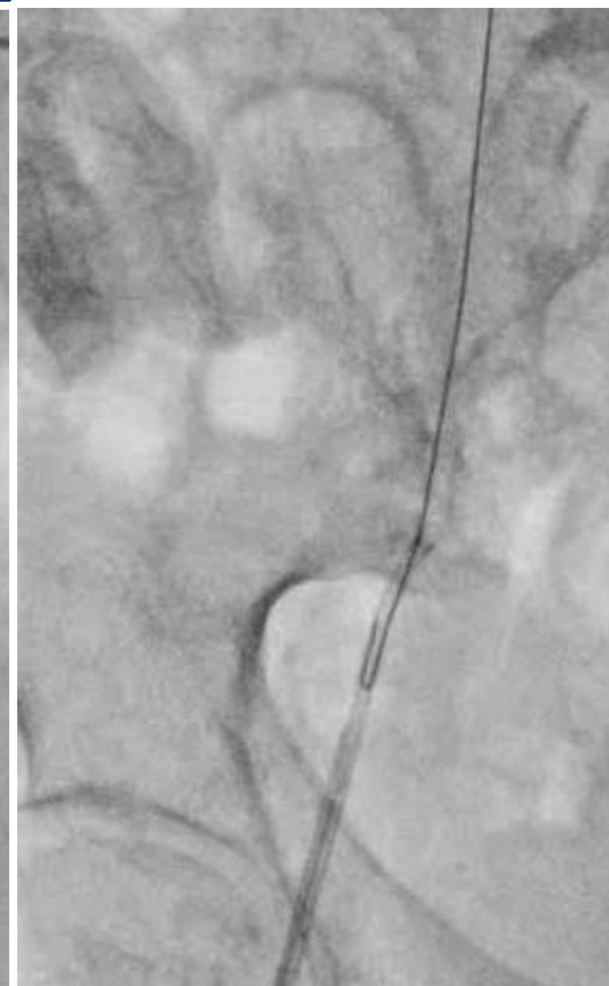
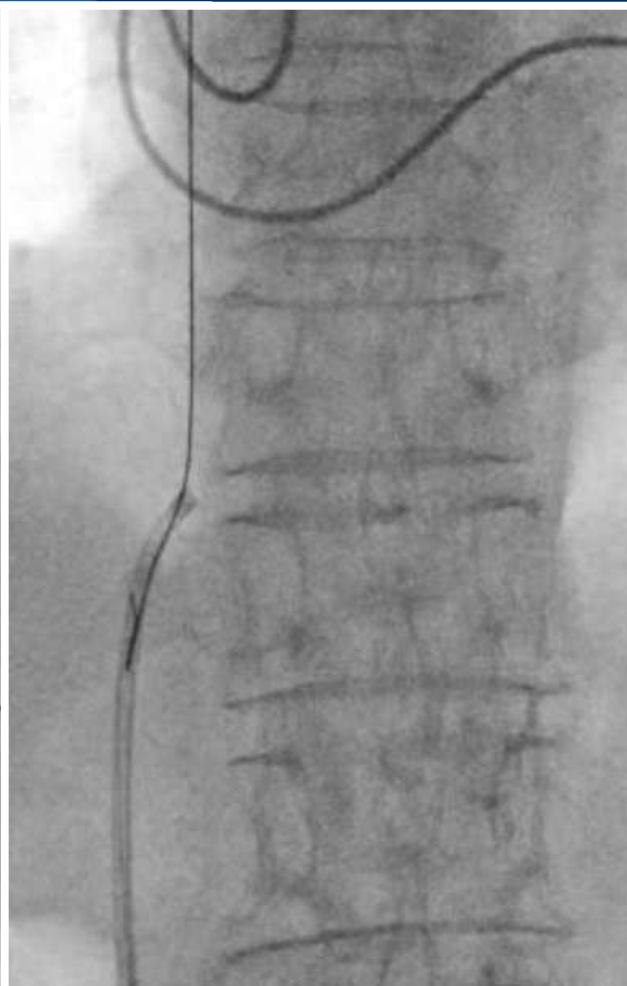
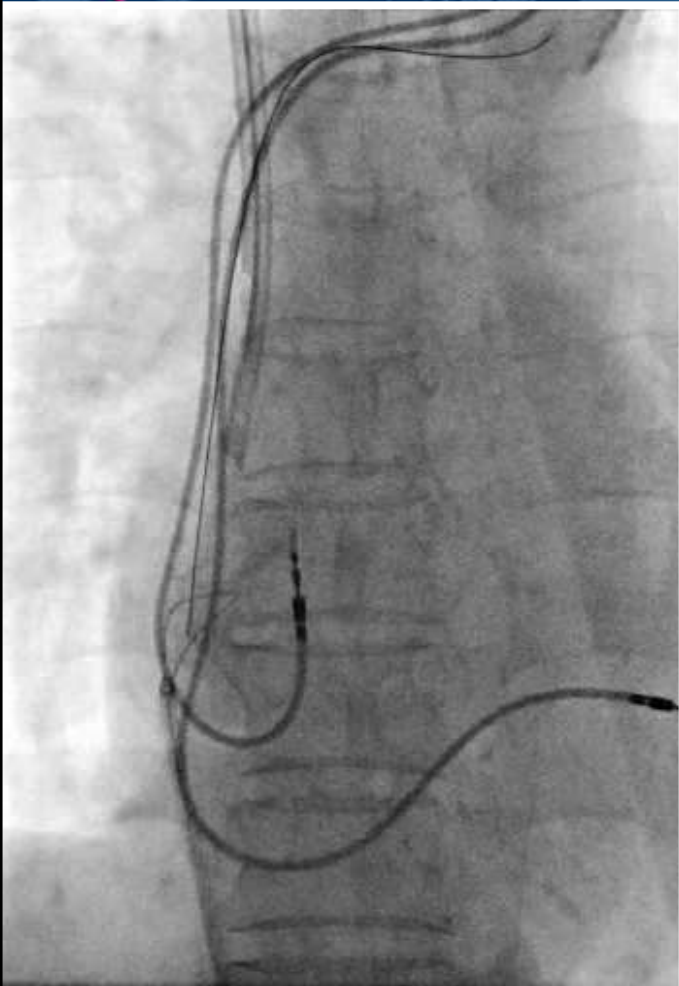


2.5mm BC still can't cross



LINC

Externalization via Femoral Vein



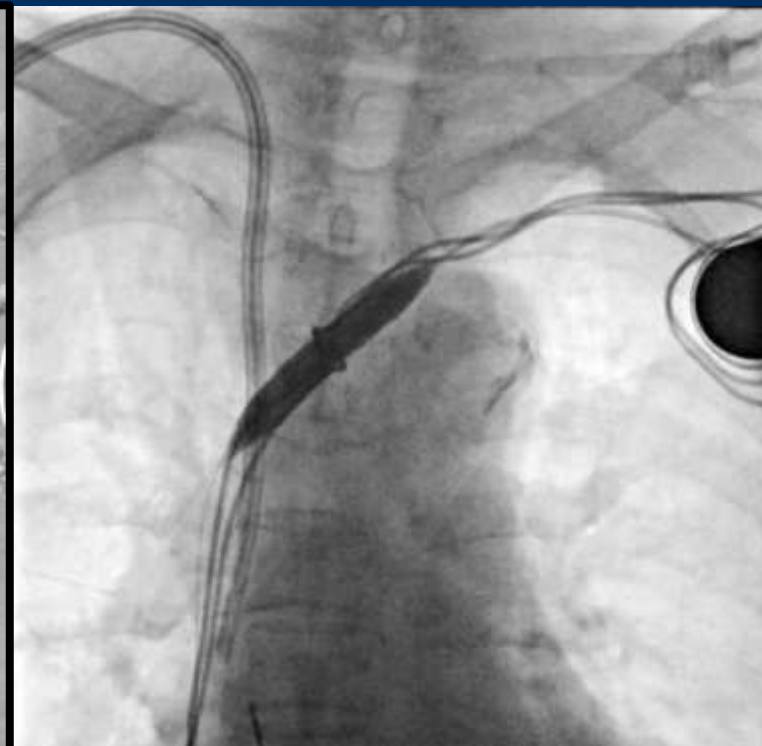
Looped Astato GW from IVC

Pulled out through FR 4/7 GC



LINC

Balloon Dilatation & Angiogram



10.0mm BC

Final Angiogram



Discussion

In 136 patients underwent PPM or ICD implantation, **19 cases (13.9%) developed venous obstruction** after 6 months follow-up.

- 14 cases (10.2%) of central venous stenosis
- 5 cases (3.6%) of total occlusion
- **0 case exhibited adverse symptom**

Korkeila P. *et al.* Pacing Clin Electrophysiol (2007)



LINC

Conclusions

Venous occlusion is common, but most asymptomatic.

AV shunt on ipsilateral arm largely increases the venous flow and leads to severe symptoms.

History of central venous procedure should be reviewed carefully before AV shunt creation.

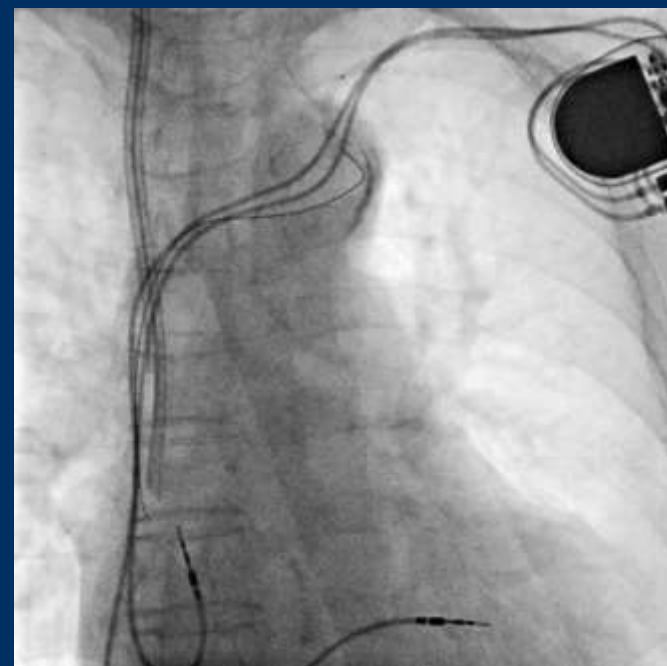
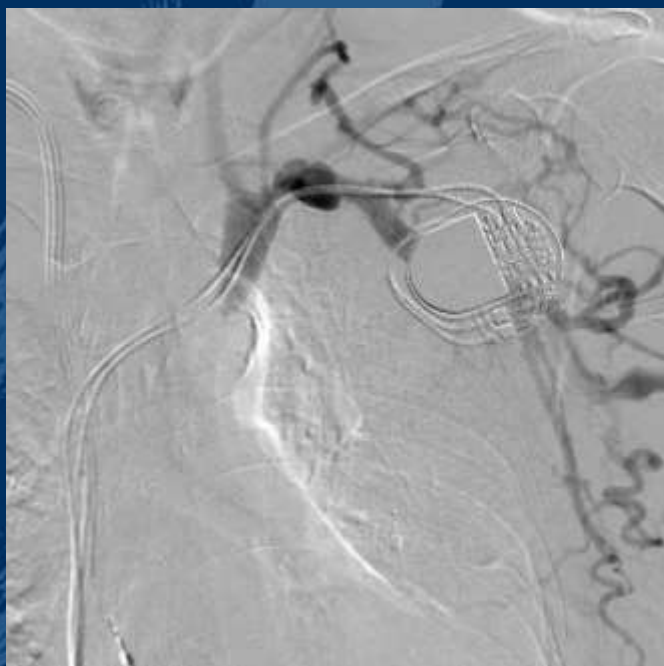


RH Chou, MD. thanatosrs@gmail.com

PH Huang, MD, PhD. huangbsvgh@gmail.com



LINC



Recanalization of central vein CTO lesion after pacemaker implantation

Taipei Veteran General Hospital
National Yang-Ming University
Mar 15th, 2017

Ruey-Hsing Chou, MD.
Po-Hsun Huang, MD. PhD.