

Demonstration (crazy arch case) Type A dissection

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Disclosures

I have the following potential conflicts of interest to report:

Educational Program	W.L Gore & Associates Covidien
Consultant	Covidien
Stockholder	LeMaitre

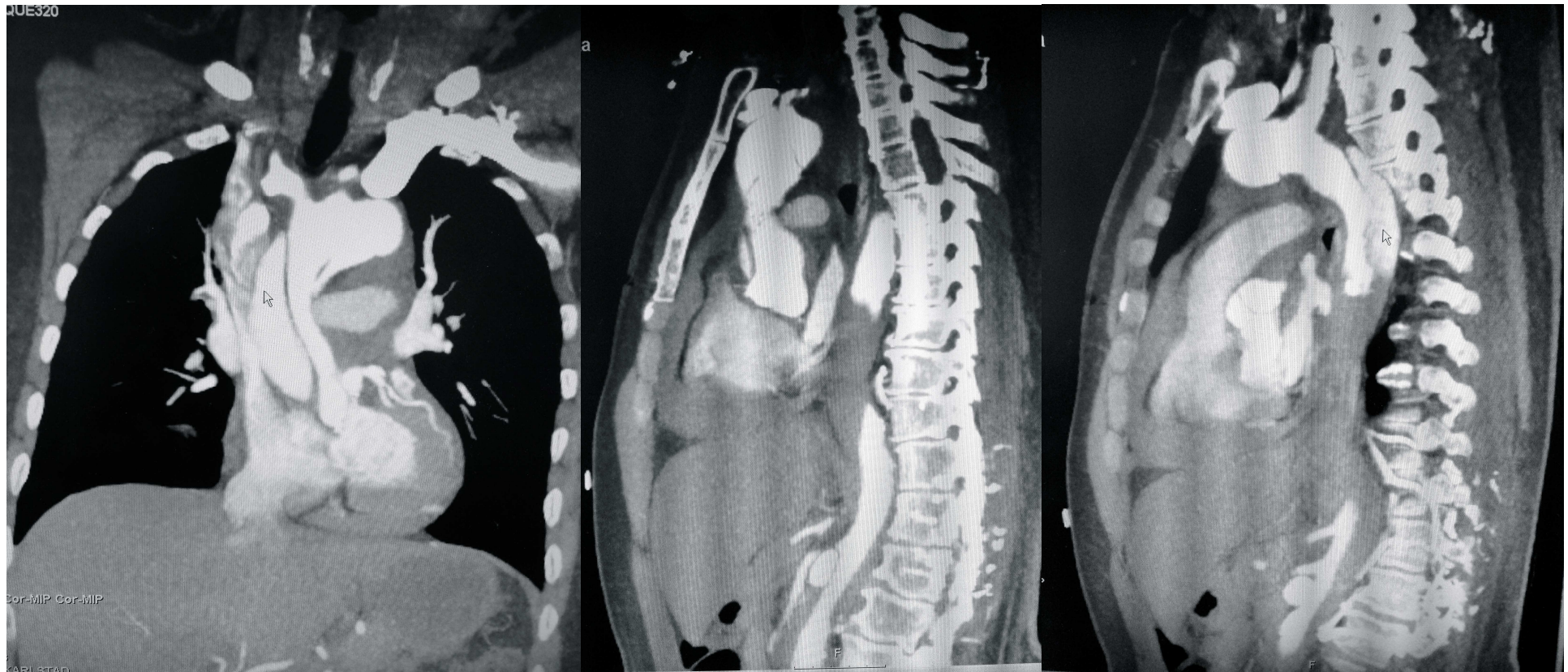
Clinical presentation @ regional hospital

- 57 Y.O. Woman
- History: Hypertension, Turner's syndrome.
- No former heart disease.
- Sudden onset of chest pain that irradiated dorsally followed by nausea, paleness and sweating

Clinical presentation @ regional hospital

- In the Emergency Room: EKG with no specific changes but coronary infarction was suspected and aspirine and clopridogel was given
- Acute CTA was performed

Type A dissection with heart tamponade



Clinical presentation @ regional hospital

- Circulatory collapse
- US: beginning heart tamponade

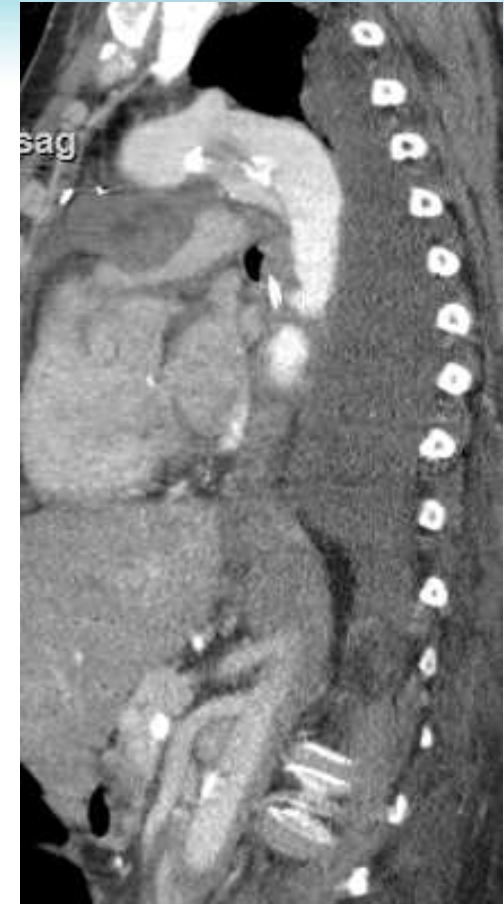
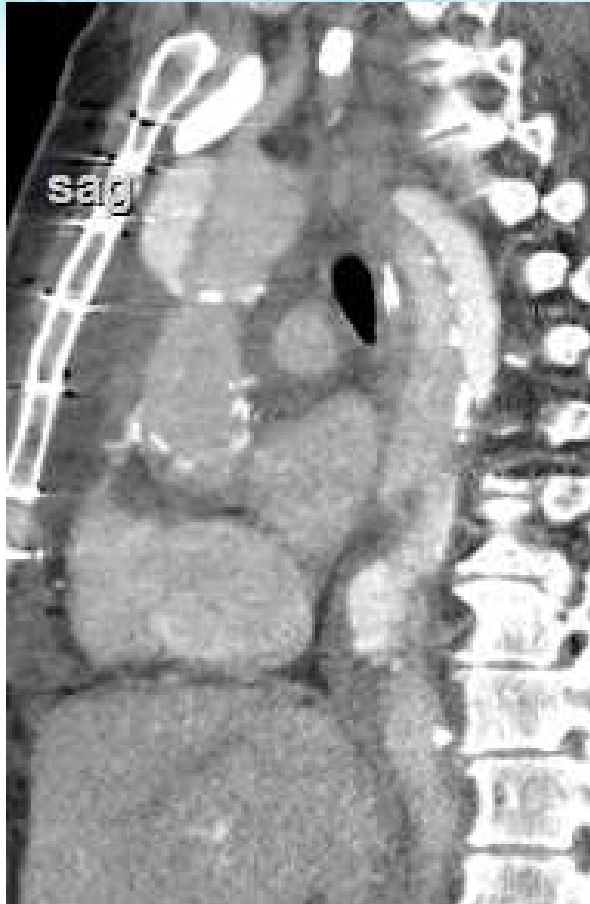
Initial treatment @ regional hospital

- Subxiphoid pericardial window in the OR
- During transport to the helicopter ramp patient once again suffered circulatory collapse
- Back in the OR a stenotomy was performed
- Pulsative bleeding from the aortic root was controlled by a patch
- Helicopter transport with open chest to the tertiary center

Treatment @ tertiary center

- At arrival internal heart massage was performed due to ventricular fibrillation
- Support by heart lung machine in 7 minutes
- ECC with deep hypothermia (25°)
- Resection of the ascending aorta and implantation of a short ascending graft

Postoperative CTA



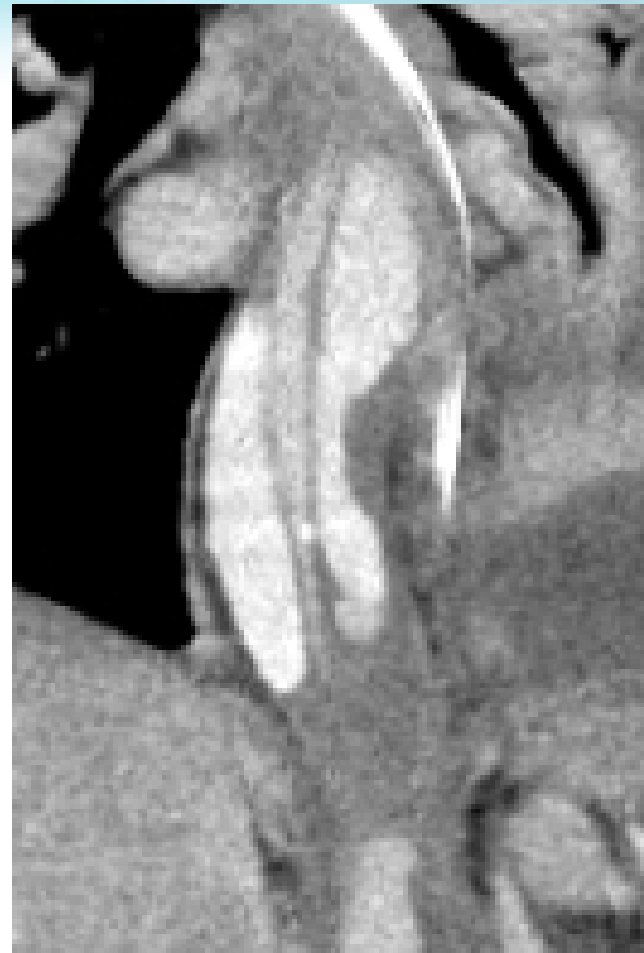
Postop care @ tertiary center

- Neurological intact
- Discharged to the regional hospital @ day 8

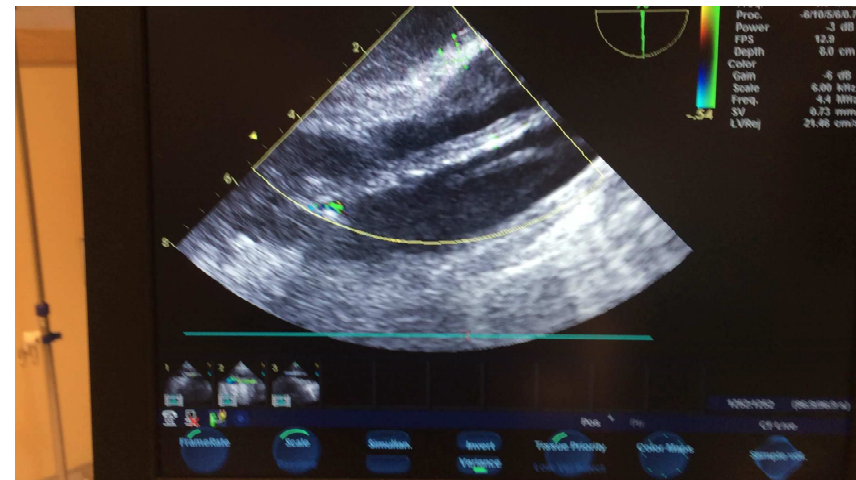
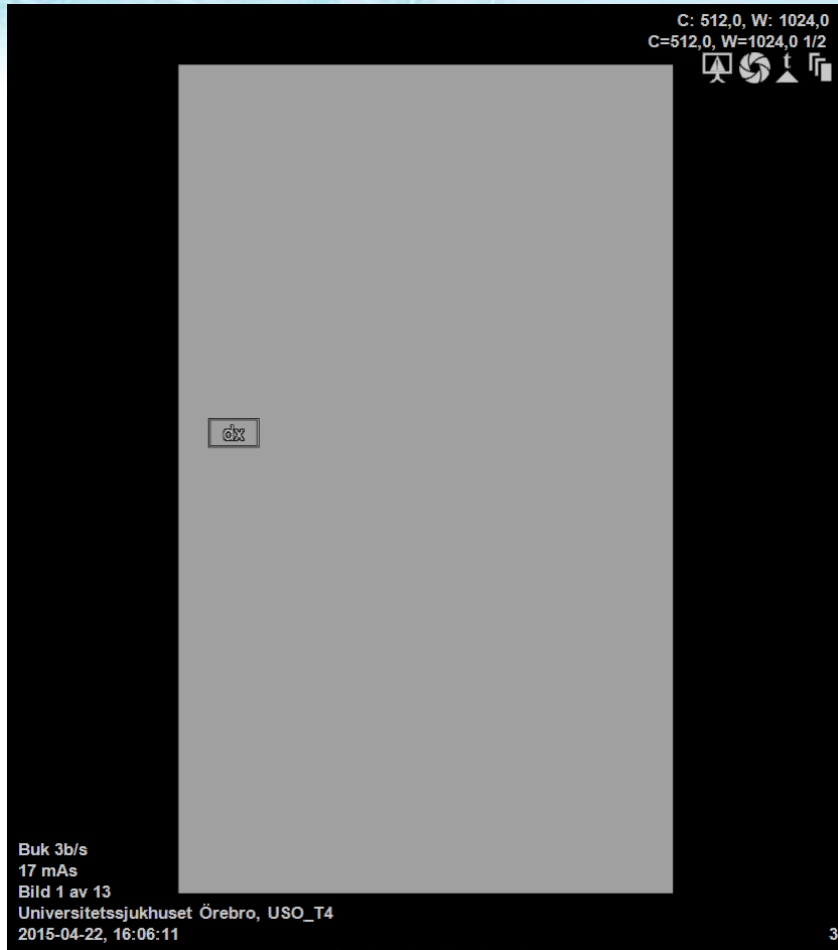
Postop care @ regional center

- Deterioration of organ functions
- Need for hemodialysis
- GI bleeding
- Decreased peripheral circulation
(Ankle pressure=30mmHg)
- Transported back to tertiary center @ day 21

Preoperative CTA



Preop angiography and TEE

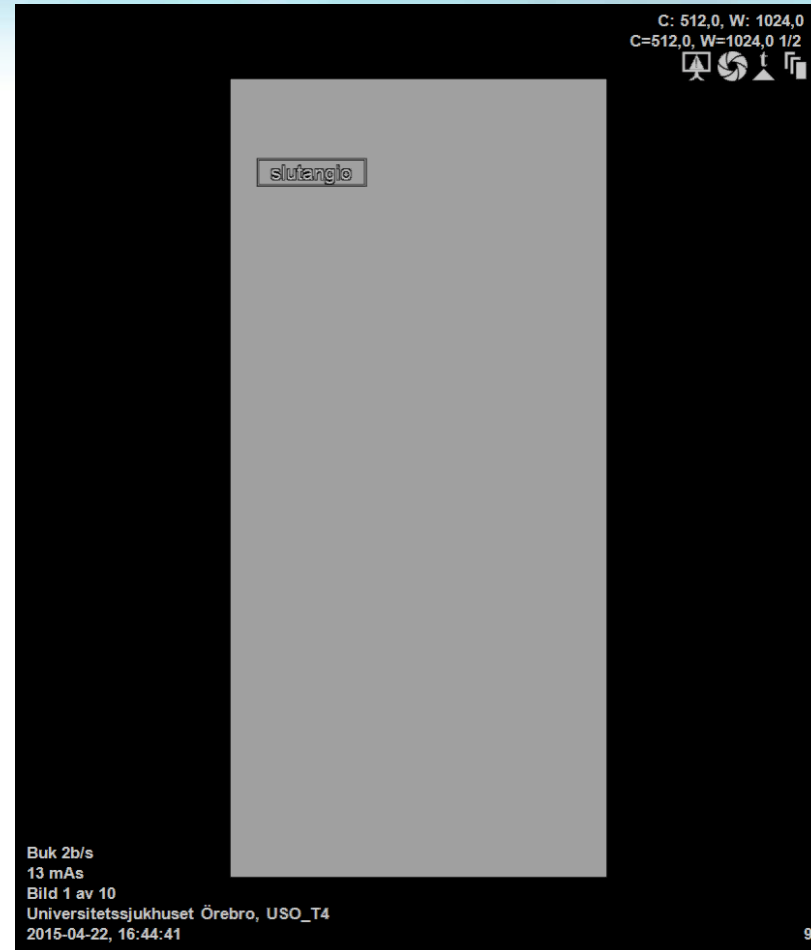
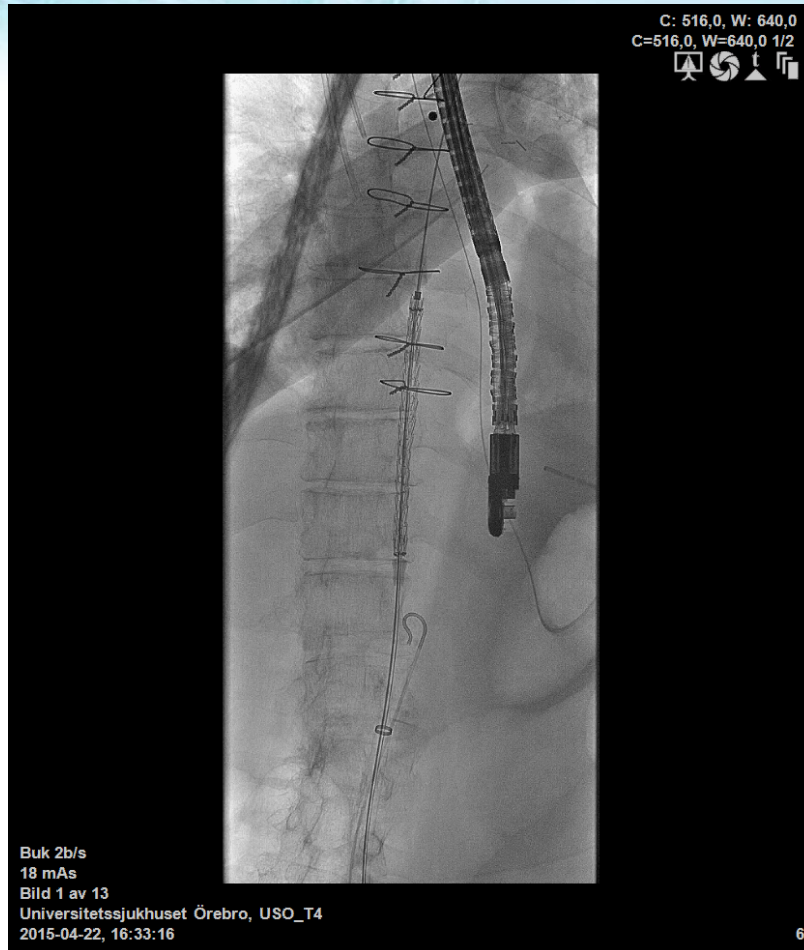


What is stupidity?

Stupidness = having or showing a lack of ability to learn and understand things

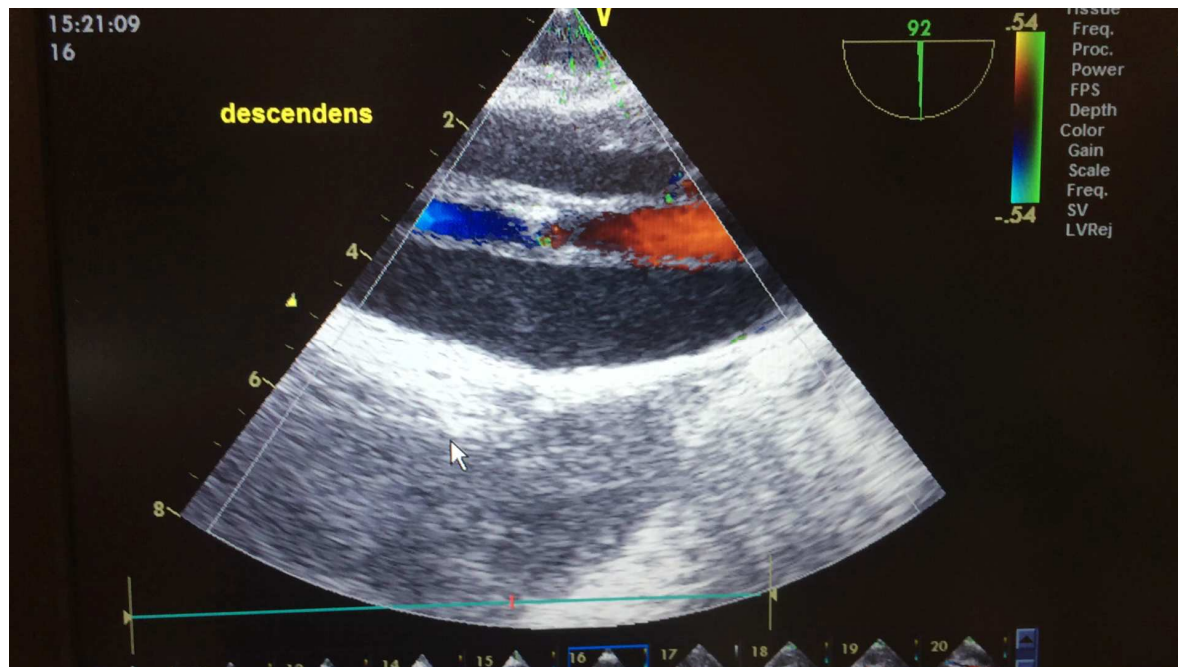
Encyclopædia Britannica

Stentgraft deployment



Postoperative examination

- No permanent increase of ABI
- Continued organ dysfunction @ day 25



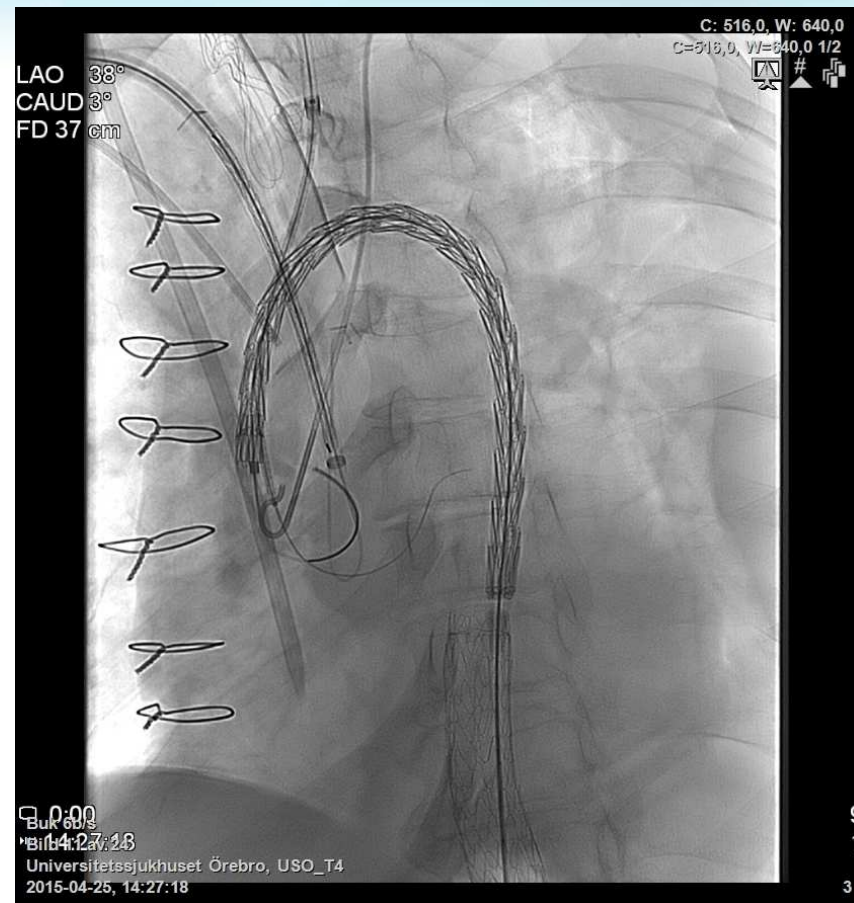
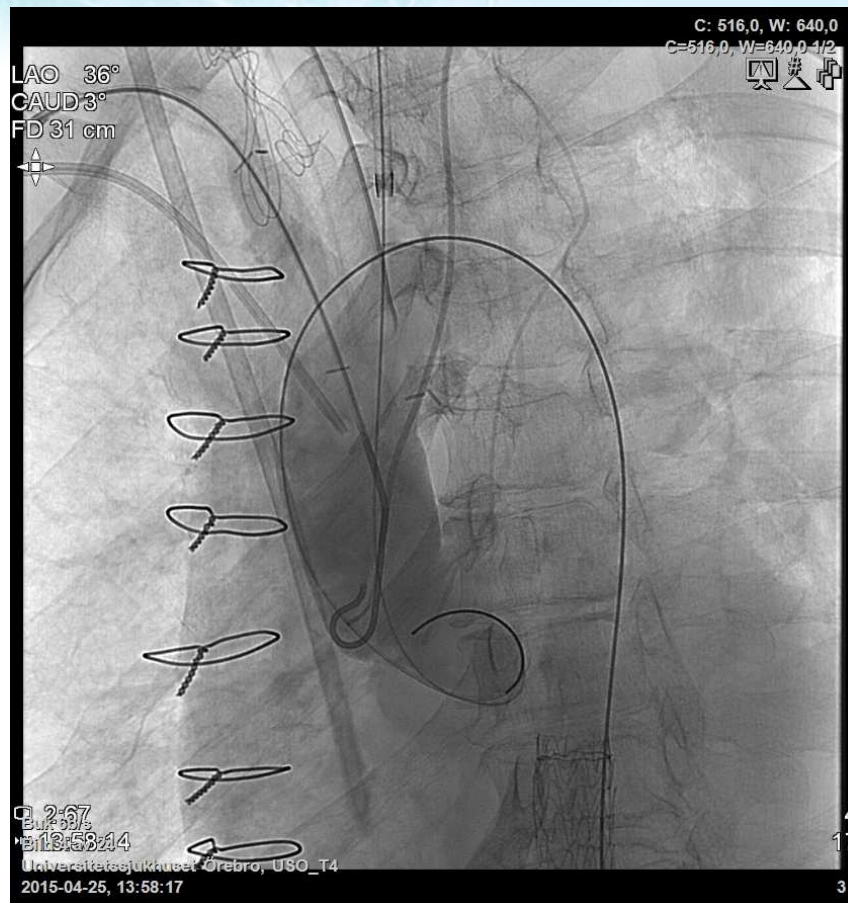
Second Procedure Plan

- Aortic arch debranching to cover all entries proximal of the stentgraft
- No additional chest surgery
- Chimney technique to preserve the brachiocephalic trunk and the left carotid
- Left carotid-subclavian bypass

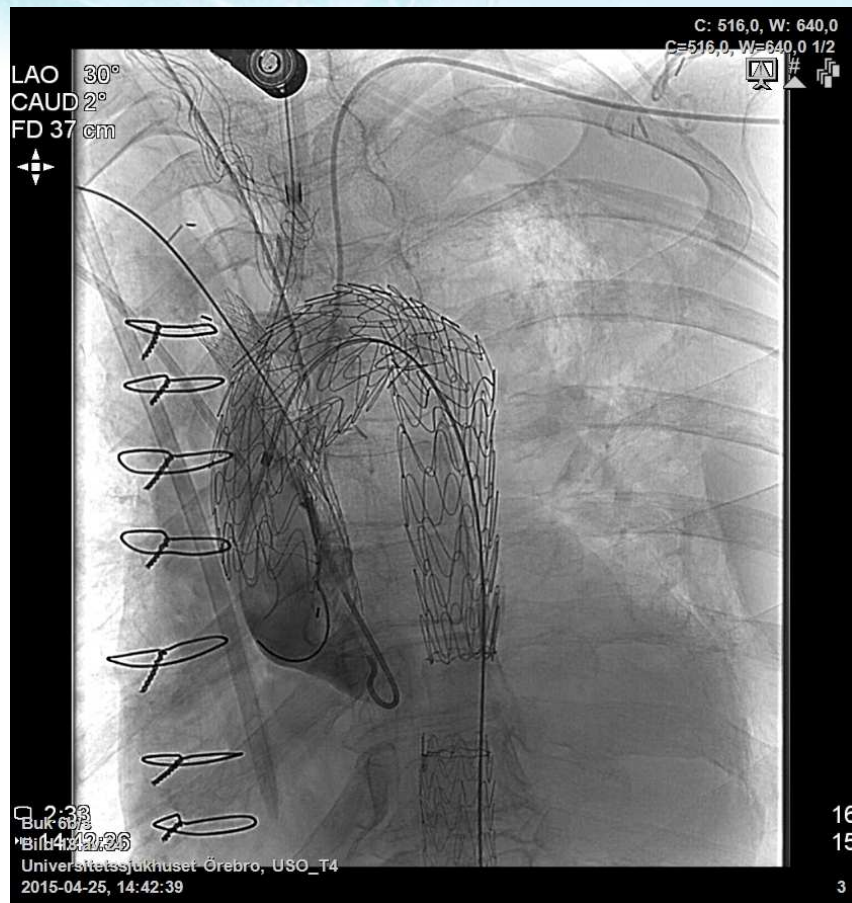
Second procedure



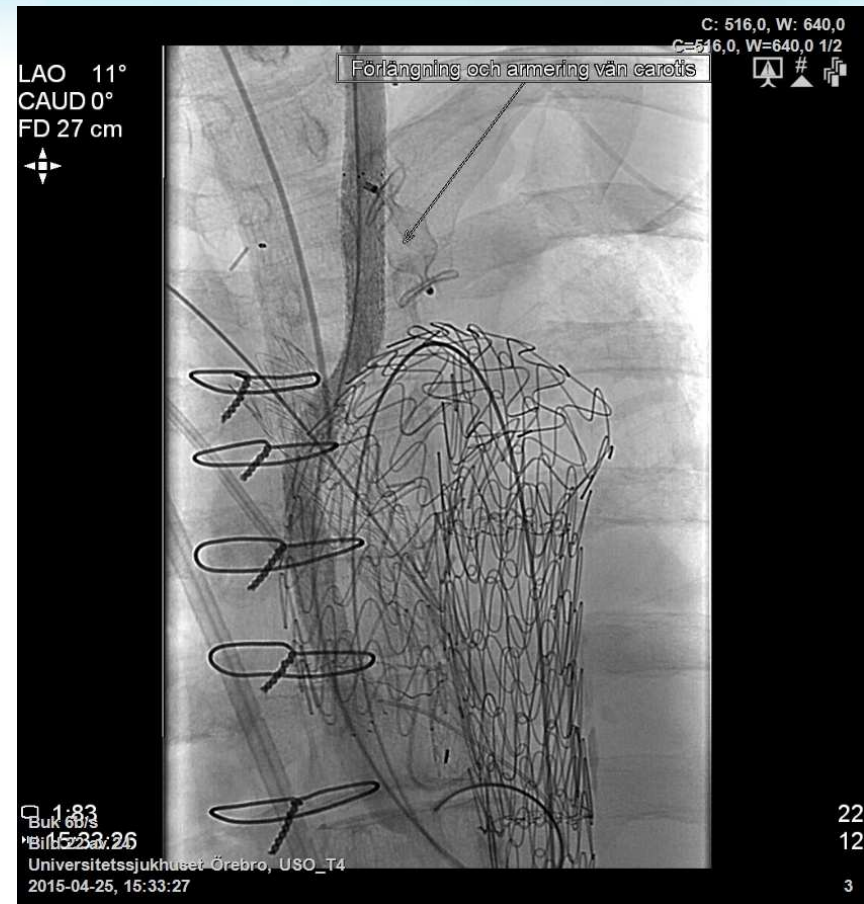
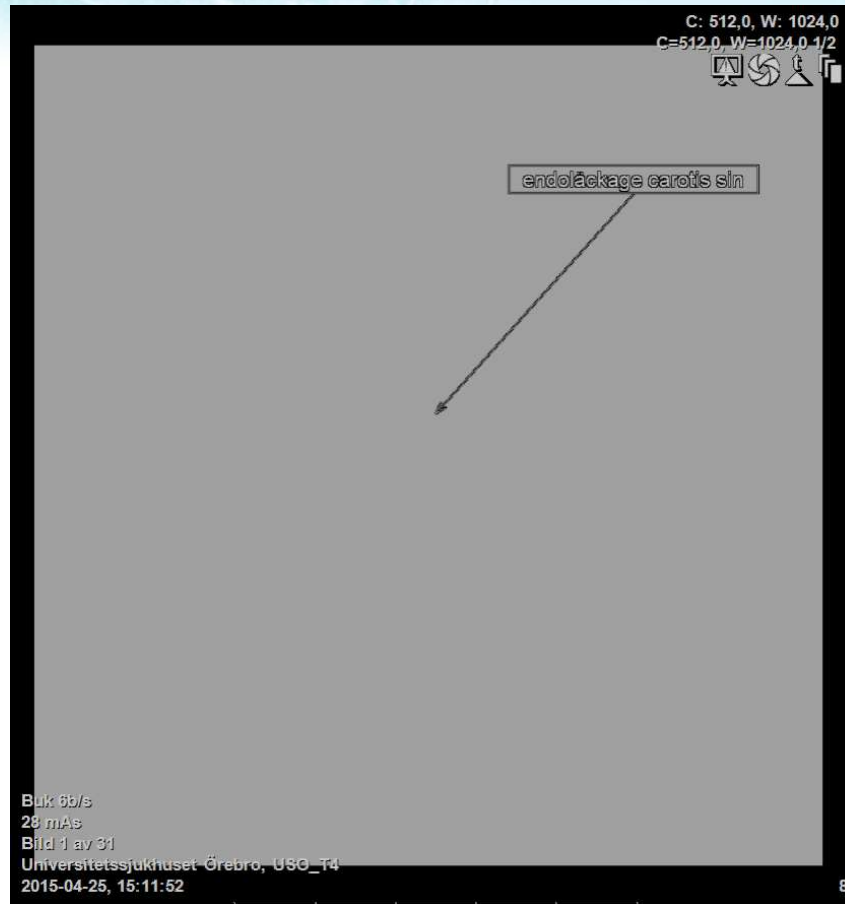
Second procedure



Second procedure



Second procedure

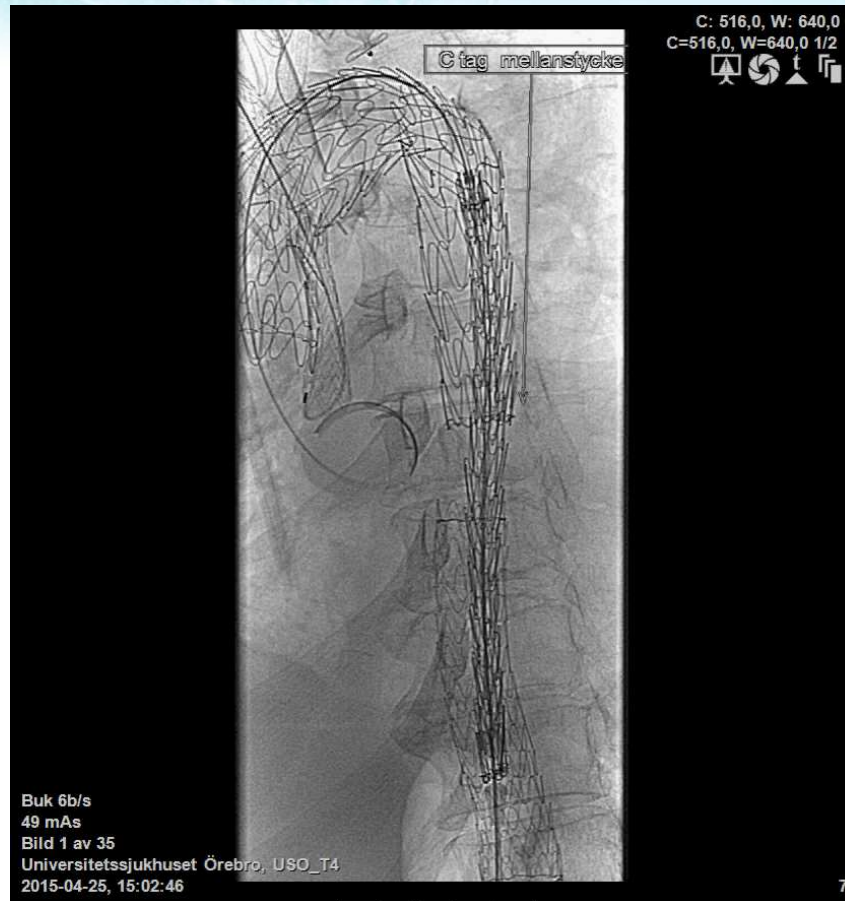


Second procedure



- Reversed Gore limb PXE121000 in the trunk
- Gore Viabahn 7x10cm with 8x5cm extension in the left carotid

Second procedure



Postop care @ tertiary center

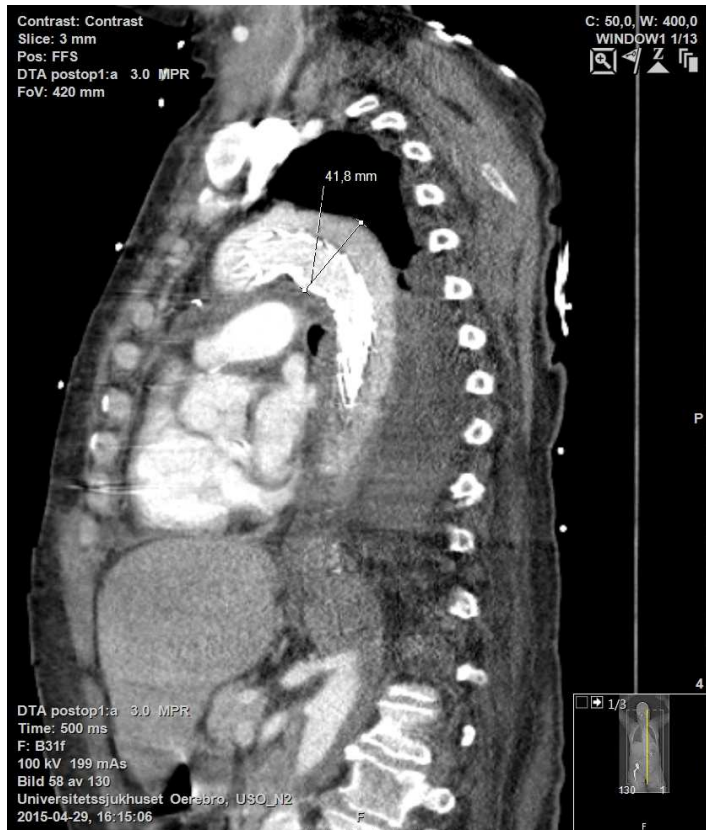
- Improvement in general condition
- Discharged to the regional hospital @ day 32

Postop care @ regional hospital

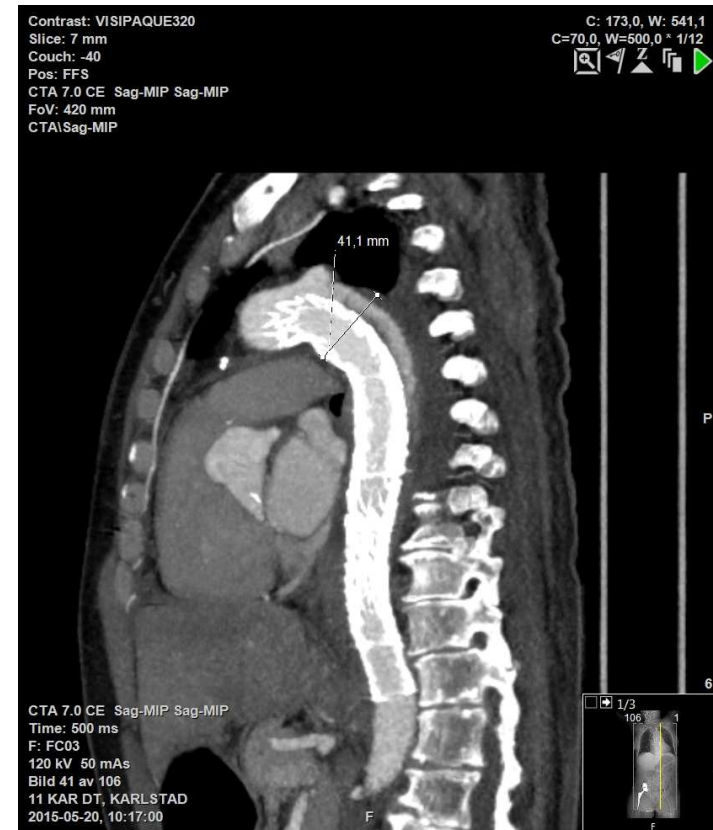
- Gradually further improvement
- Free from dialysis
- Discharged to a rehab center @ day 51
- Discharged to home @ day 74

Follow-up CTA

postop



30-day



Follow-up CTA



Conclusion

- There are no short-tracks – Treat the proximal entry(ies) first
- Chimney technique is a feasible tool but type I endoleak is a problem
- Try to expand the sealing zone by coming close to the coronary ostiums
- The value of team approach

