

#### **Development of the Essen Aortic Program**

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for the Essen Aortic Team

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Spe	eaker name:
	Raimund Erbel
I ha	ve the following potential conflicts of interest to report:
	Consulting
	Employment in industry
	Stockholder of a healthcare company
	Owner of a healthcare company
	Other(s)

x I do not have any potential conflict of interest



#### **Background**

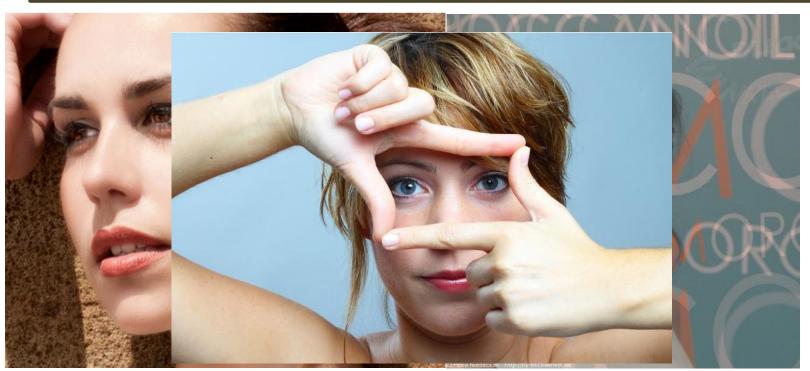
#### based on our own experience in Mainz

- 1st TEE in AD 1983 case report
- -- TEE in AD 1986 single center study
- -- TEE in AD 1989 European multicenter study
- -- 1st Diagn and Ther in AD European multicenter study 1993 and later in **Essen**
- --- 1st IVUS true lumen collapse/malperfusion 1994
- --- IVUS/ICE guided fenestration in AD 1996
- --- 1st TEVAR in AD in 1999
- Opening of Hybrid Room in a Catheterization Floor 2003
   as we still observed an unchanged high morbidity and mortality in acute AD



But what we need is a strong interdisciplinary approach in one team

looking together to the patient



Schnappschüsse Messe Düsseldorf by-blickwinkel.de

Photography & Videography blickwinkel-bremen.com



The high mortality of aortic diseases stimulated the cardiologists and cardiovascular surgeons

in Essen to find new diagnostic and therapeutic options.

#### **Diagnostic Improvement**

- TTE/TEE
- IVUS
- CT with 3D
- MRT
- Urgent aortography and coronary angiography
- Angioscopy

#### **Therapeutic Options**

- Intimal fenestration
- Endovascular stenting of aorta and side branches
- Frozen elephant trunk
- Open side branch graft stents
- Chimney technique
- Cerebro-, spinal protection

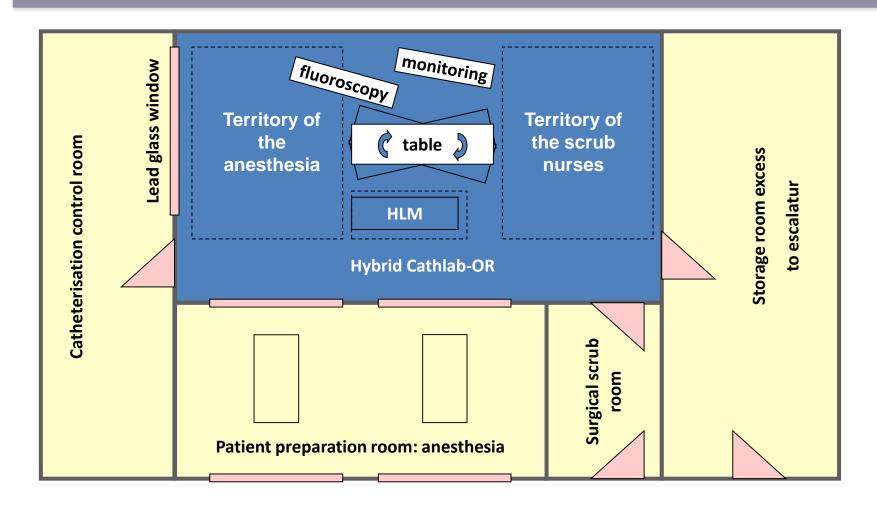
A successful approach only possible based on a HYBRID ROOM installation.



#### Essen Aortic Program based on the realization of a Hybrid Room

- 1995 initiated and proposed concept as part of the new Academic Heart Center
- 1997 financial support letter
- 1999 start of heart center build-up
  - 3 surgical theatres
  - 3 catheterization labs
  - 1 catheterization lab with OR equipment
- 2004 opening of the
  - West-German Heart Center Essen





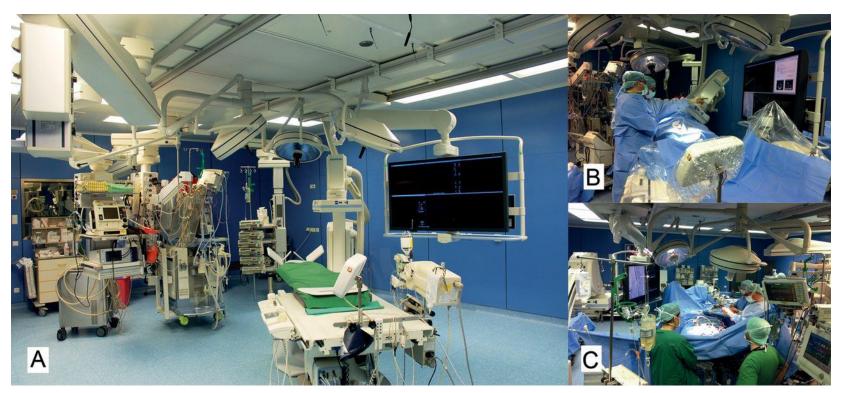






2003: 1st generation, 2010: 2nd generation

Artic C system floor mounted with DynaCT (Siemens, Germany) 2010.



Tsagakis K et al.

Eur J Cardiothorac Surg 43:397-404, 2013



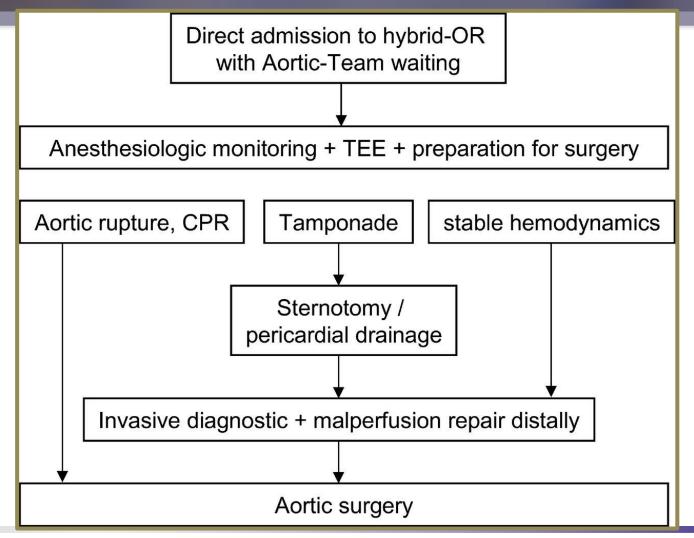
Based on the New West-German Heart Center structure

a new option was realized with direct transportation of

any patient with suspected acute aortic syndrome

to the Hybrid Room





#### **Hybrid Operating Room =**

Combines invasive diagnostics, surgical &endovascular treatment on the same table

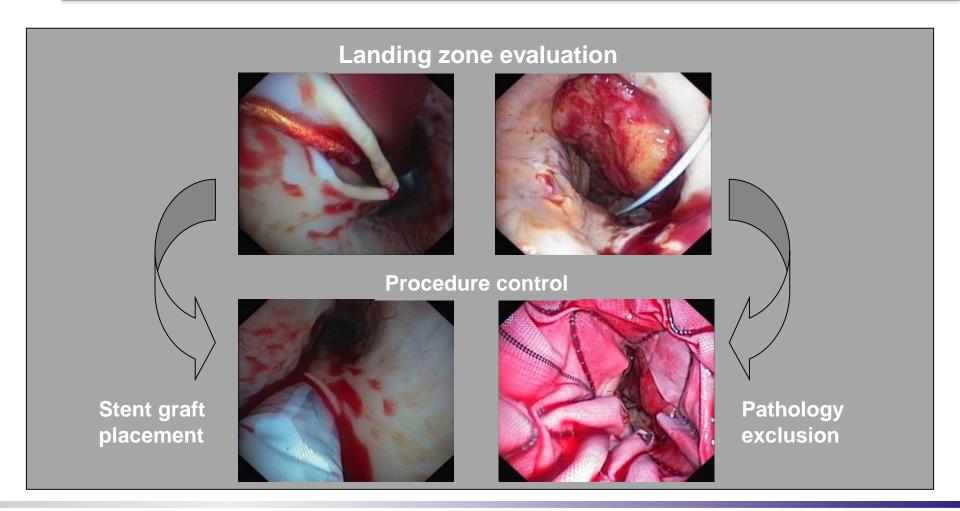
















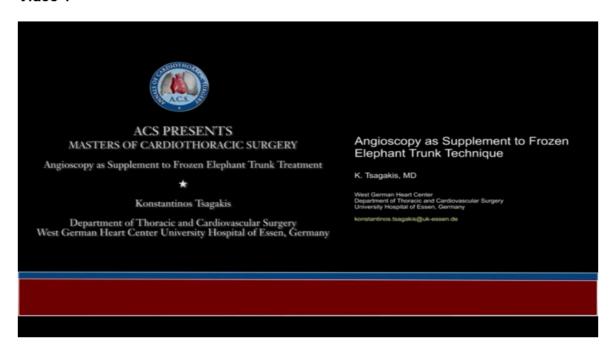
<< Prev Video 1

PMC full text: Ann Cardiothorac Surg. 2013 Sep; 2(5): 653-655.

doi: 10.3978/j.issn.2225-319X.2013.09.08

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#### Video 1





Tsagakis K. Angioscopy as a supplement to frozen elephant trunk treatment. Ann Cardiothorac Surg 2013;2(5):653-655. doi: 10.3978/j.issn.2225-319X.2013.09.08

#### The Essen Aortic Team Strategy

Cardiologists, Anaesthesiologists, Cardiovascular Surgeons

seems to be the ideal basis for forming Aortic Centers

as recommended by the new 2014 ESC guidelines

on Diagnosis and Therapy of Aortic Diseases



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