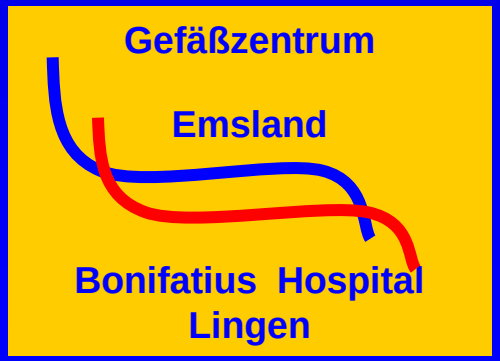
Behandlung der Beckenarterienverschlüsse- gemeinsam besser

Jörg Teßarek



Interessenkonflikt

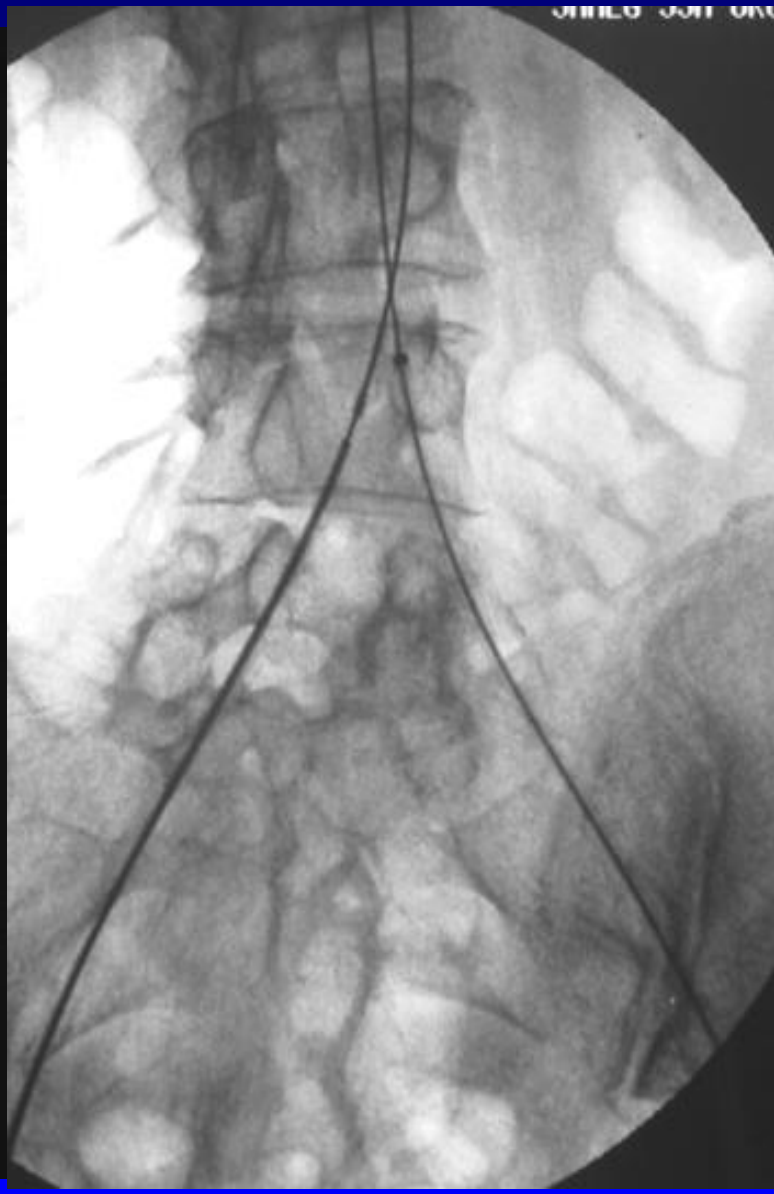
- Keiner
- Eigentlich auch kein Interesse am Konflikt mit den Vortragenden

- Daten zum Risko/ Nutzen der nicht kardialen Gefäßchirurgie: wann nicht!
- Daten zum Risiko/ Nutzen der Intervention: wann nicht!
- Was kann man wie wann machen
- Was ist mit der Interna?

Bei Verschlüssen – 1.Wahl Chirurgie

Raucherin, 66J
Stad. IIB <50m
Geplante TEP

AFC offen
Landezone bds.



Kissing Balloon, einseitige Stentapplikation
Prox. BCS, distal SE Stent

Inde, JE et al.; JVS, From the Society for Clinical Vascular Surgery 2009

Endovascular procedures for aorto-iliac occlusive disease are associated with superior short-term clinical and economic outcomes compared with open surgery in the inpatient population

4119 Patienten retrospectiv evaluiert: real world Szenario

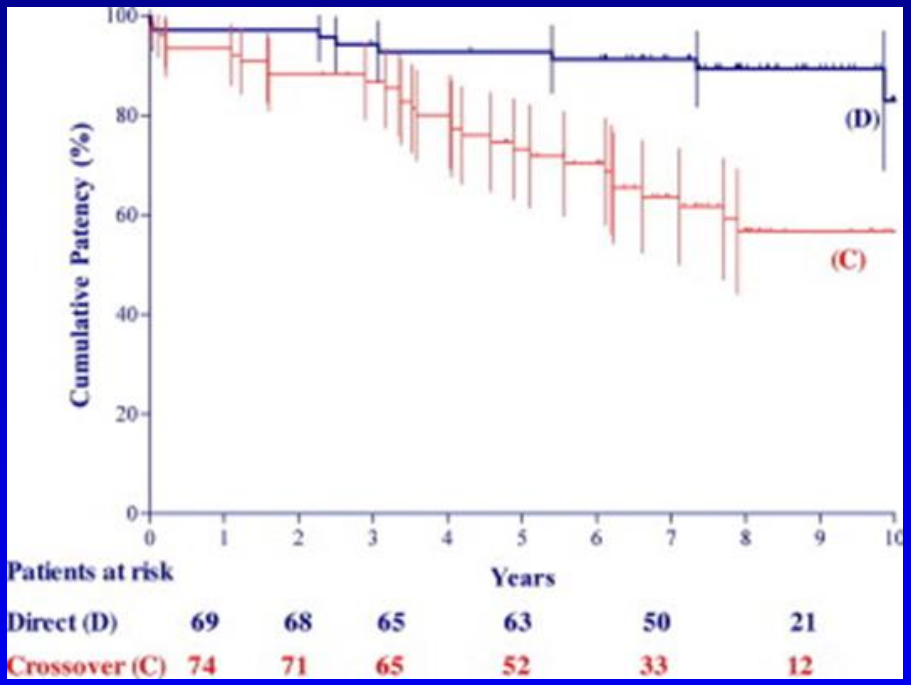
Results

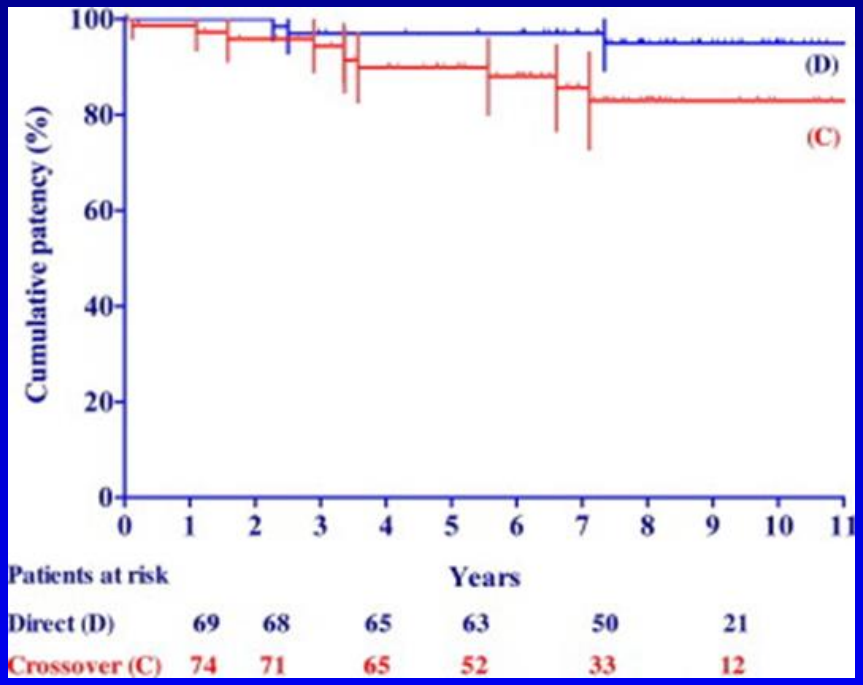
- Patients who underwent endovascular procedures were more likely to be ≥65 years of age (46% vs 37%), female (54% vs 49%),

- Endovascular patients were more likely to be non-elective (41% vs 20%), in the highest comorbidity index group (8% vs 5%), and with iliac artery disease (67% vs 33%), all $P \leq .05$.

- In bivariate analysis, endovascular procedures were associated with lower complication rates (16% vs 25%), shorter LOS (2.2 vs 5.8 days), and lower hospital costs ($13,661 vs $17,161), all $P < .001$. In multivariate analysis, endovascular procedures had significantly lower complication rates and cost, and shorter LOS.

Orthograd oder x-over





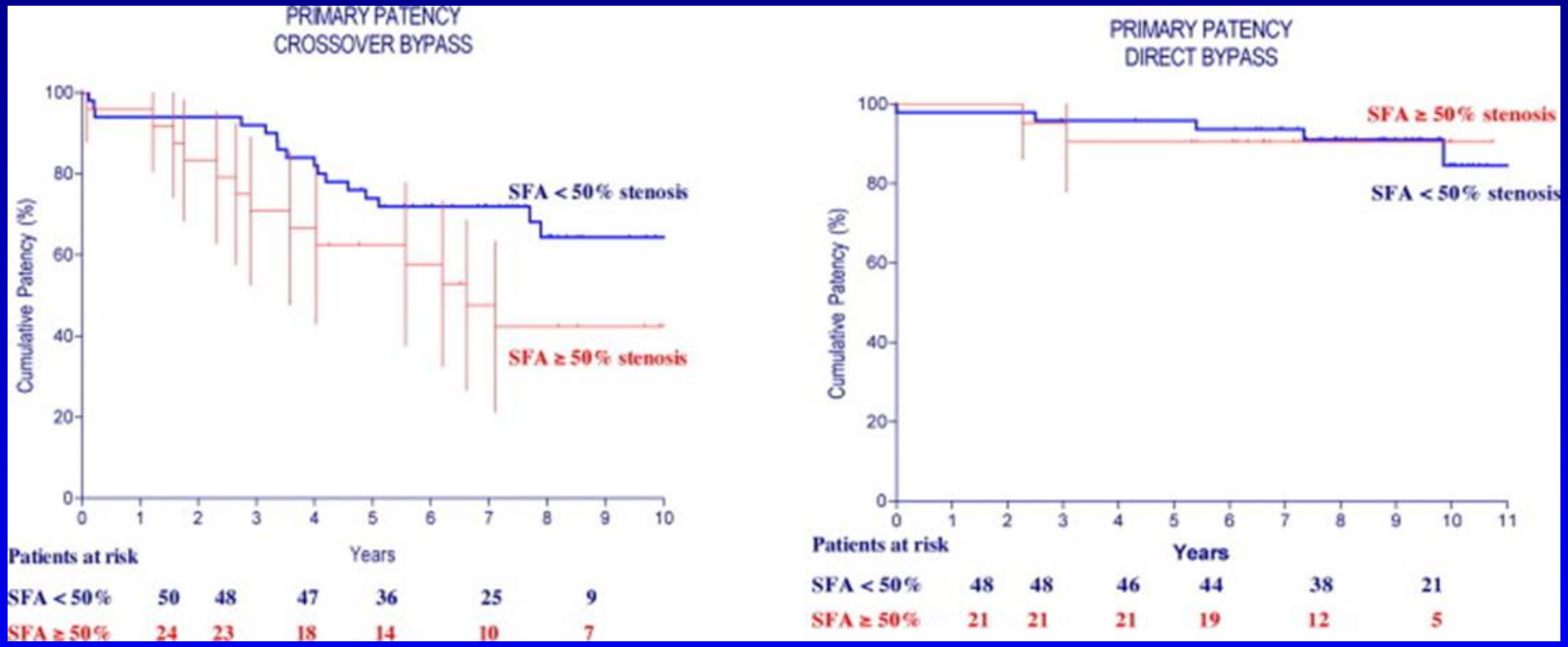
PP sek.Patency

Clinical research

Long-term results of a multicenter randomized study on direct versus crossover bypass for unilateral iliac artery occlusive disease

Presented at the 2007 Vascular Annual Meeting, Baltimore, Md, Jun 6-10, 2007.

Run off related outcome



Offenheit abhängig von der AFS

Postoperative complications and treatment-related outcomes after direct and crossover bypass

Outcome	Direct bypass N = 69	Crossover bypass N = 74	P value
Postoperative general complications	5 (7.1%)	2 (2.6%)	.26
Death	1 (1.4%)	0	
Myocardial infarction	1 (1.4%)	1 (1.3%)	
Myocardial ischemia	0	1 (1.3%)	
Acute respiratory failure	3 (4.3%)	0	
Postoperative femoral complications	3 (4.3%)	10 (13.4%)	.08
Hematoma	0	4 (5.4%)	
Lymphocele	2 (2.9%)	4 (5.4%)	
Superficial infection	1 (1.4%)	1 (1.3%)	
Graft infection	0	1 (1.3%)	
Length of hospitalization (d)‡	7 (4-10)	4 (2-7)	.03
Sexual dysfunction			
Erectile dysfunction	2/59 (3.4%)	3/67 (4.5%)	.95
Ejaculatory disorder	4/59 (6.8%)	0/67 (0%)	.04
Bypass patency at 5 y‡			
Primary patency	92.7 ± 6.1%	71.8 ± 10%	.001 (HR: 4.1)
Assisted primary patency	92.7 ± 6.1%	84.3 ± 8.5%	.04 (HR: 2.5)
Secondary patency	97.0 ± 3.0%	89.8 ± 7.1%	.03 (HR: 3.7)
Survival at 10 y	59.3 ± 17%	61.2 ± 9%	.59 (HR: 1.2)

Iliac Occlusions: Stenting or Crossover Grafting? An Examination of Patency and Cost

P.J. Whatlingaf et al., **JVS ,20**: **1:**2000**,pp** 36-40

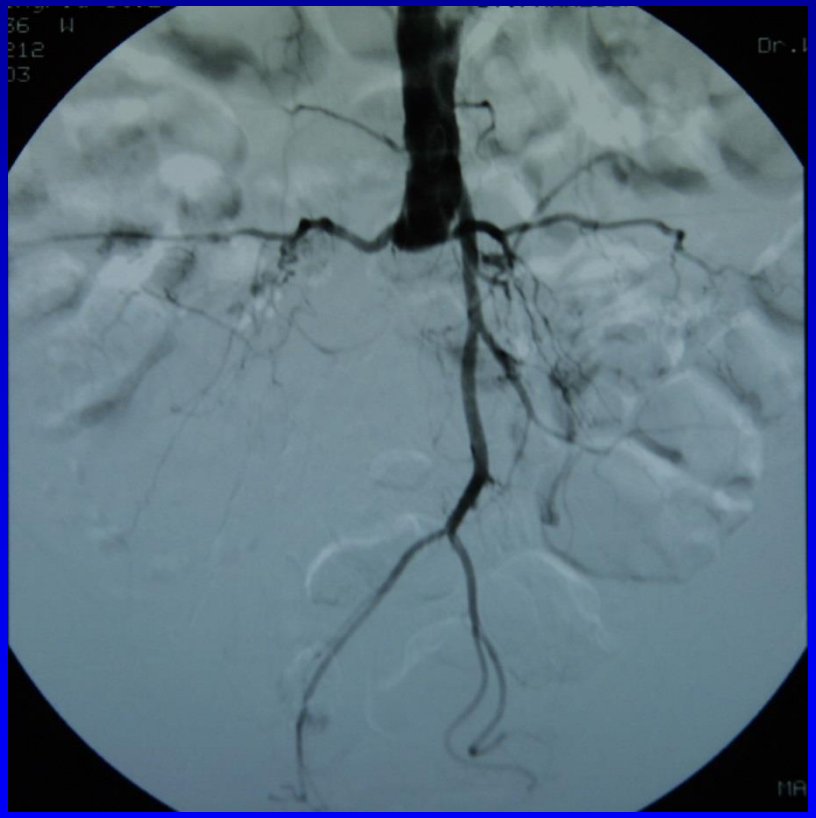
prospective observational study of all patients undergoing an iliac stent or femorofemoral crossover graft for iliac artery occlusion to assess the cost effectiveness of the two approaches

Results

The median length of stay following successful stenting was 1 day; the following crossover grafting was 4 days. The mean stay was higher in each group (2.5 and 5.8 days) and is a more accurate parameter for estimation of

cost, which for iliac stenting is estimated at £1912 versus £3072 for crossover grafting. The mean cost of those patients sustaining complications after stenting was £2481.

Wo hört der Verschluss oben und unten auf ??



- Orthotope Rekonstruktionen mit besserem Outcome
- Das geht als bifemorale Rekonstruktion
- Endo bds./einseitig in Kombination
- Patienten adaptiert

Run off related outcome

Kudo T, Chandra FA, Ahn SS

Long-term outcomes and predictors of iliac angioplasty with selective stenting.

J Vasc Surg. 2005 Sep;42(3):466-75

the significant independent predictors for adverse outcomes were … and stenotic ipsilateral superficial femoral artery (P = .0002)

Timaran CH, Prault TL, Stevens SL, Freeman MB, Goldman MH.

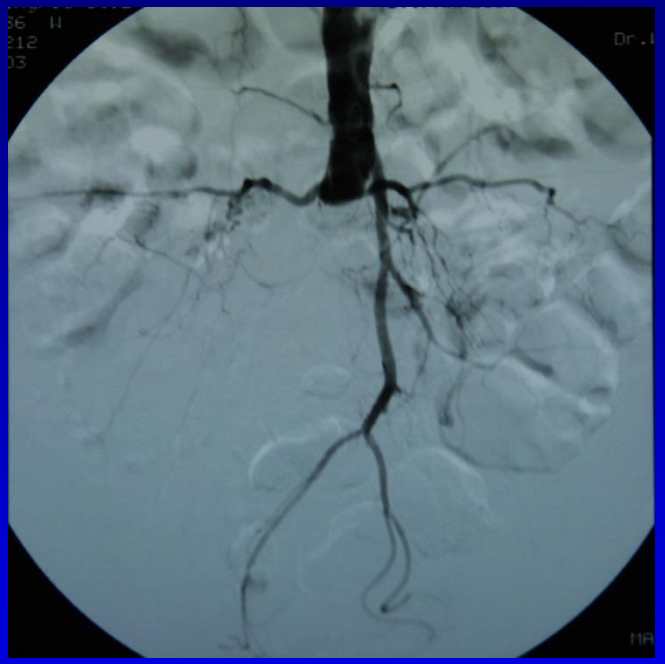
Iliac artery stenting versus surgical reconstruction for TASC (TransAtlantic Inter-Society Consensus) type B and type C iliac lesions.

J Vasc Surg. 2003 Aug;38(2):272-8.

…primary patency is less affected by poor runoff in patients undergoing surgical procedures!

Bei Verschlüssen – 1.Wahl Chirurgie

Dobutamin Echokardiographie oder Stress Szintigraphie bei 1880 Pat. mit geplantem gefäßchirurg. Eingriff.



101 Pat. mit nachgewiesener, akut behandlungsbedürftiger Belastungsischämie wurden für BMT oder BMT + ACVB

30 Tage Endpunkt: all cause mortality and MI

43% in der ACVB Gruppe

33% in der BMT Gruppe

Diese Erkenntnisse sind in die ESVS AAA guidelines 2011 mit eingegangen: jedes AAA auf EVAR Option prüfen

the DECREASE-V Pilot Study. *J Am Coll Cardiol*. 2007;49:1763–1769

Long-Term Results of Combined Femoral Endarterectomy and Iliac Stenting/Stent Grafting for Occlusive Disease

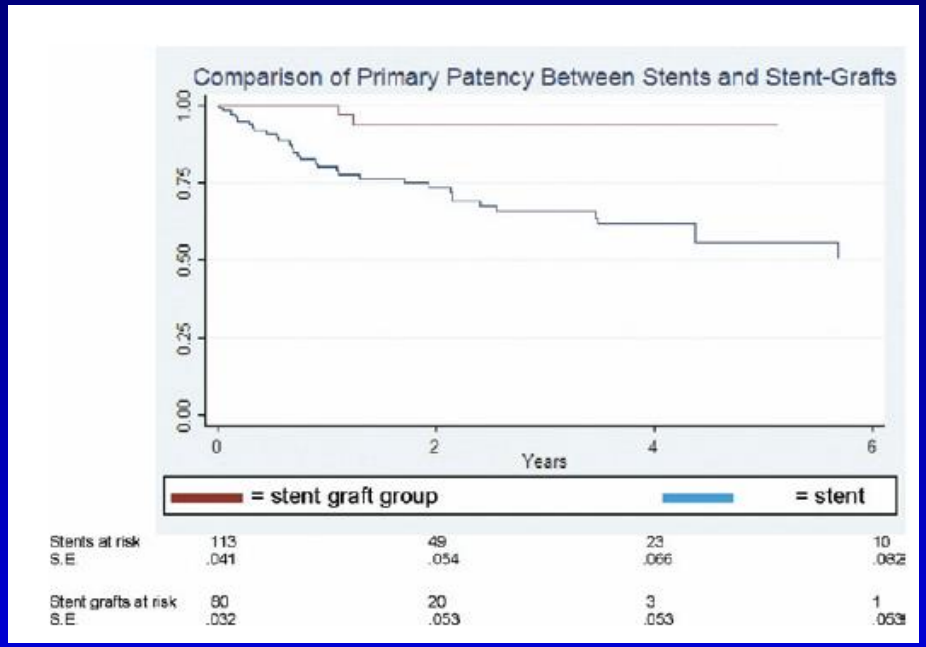
Robert Chang et al. Journal of Vascular Surgery, 2008, Volume 48, Number 2

Methods:

- 171 (22 bilateral) patients who underwent 193 CFA endarterectomies with patch angioplasty and primary stenting in a single combined hybrid open and endovascular procedure for treatment of TASC C and D iliofemoral occlusive disease were retrospectively reviewed.

- A variety of stents were used for this procedure, including bare metal SX, bare metal BX, and covered stents including Fluency, Viabahn and V12 stents.

Long-Term Results of Combined Femoral Endarterectomy and Iliac Stenting/Stent Grafting for Occlusive Disease

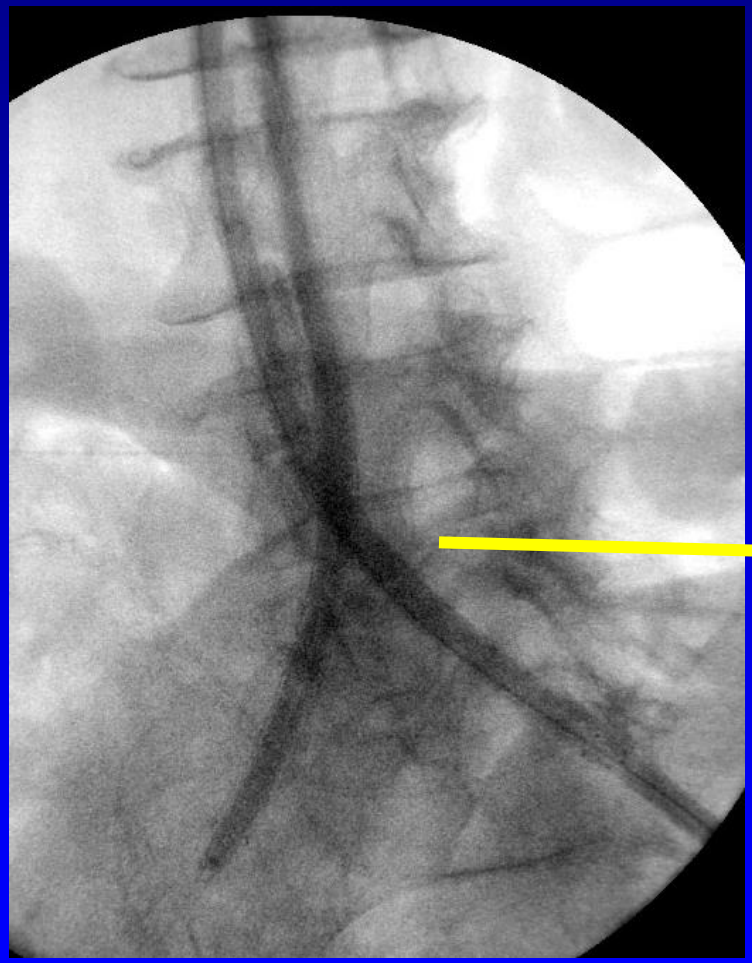


Results:

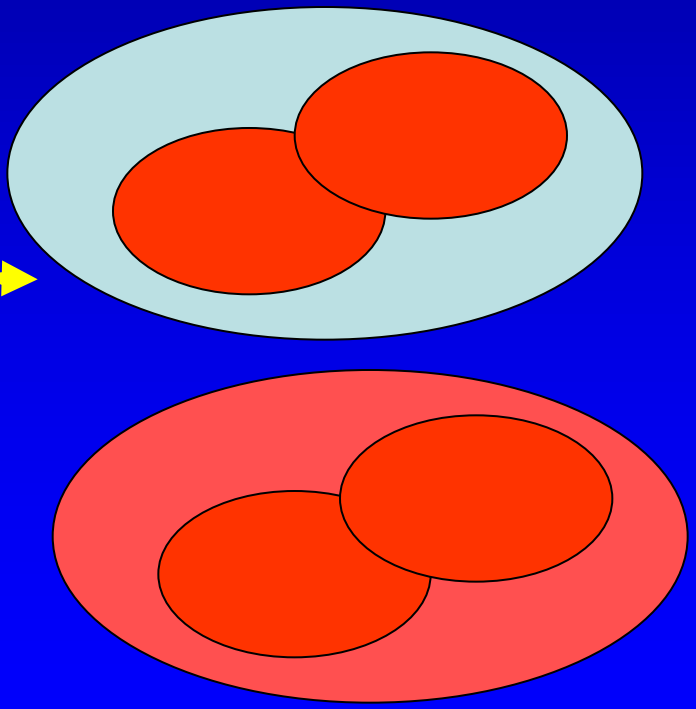
- 98% Technical success
- 100% type C and D lesions
- Covered stents were used in 41% of cases
- Bare metal stents were used in 59% of cases
- Patency rates at 5 years:
  - Primary patency was 60% ± 6%
  - Primary assisted patency was 97% ± 1%
  - Secondary patency was 98% ± 2%
- Covered stent group showed significantly higher primary patency at 5 years 87% vs. 53% ($p<.01$)

Conclusion:

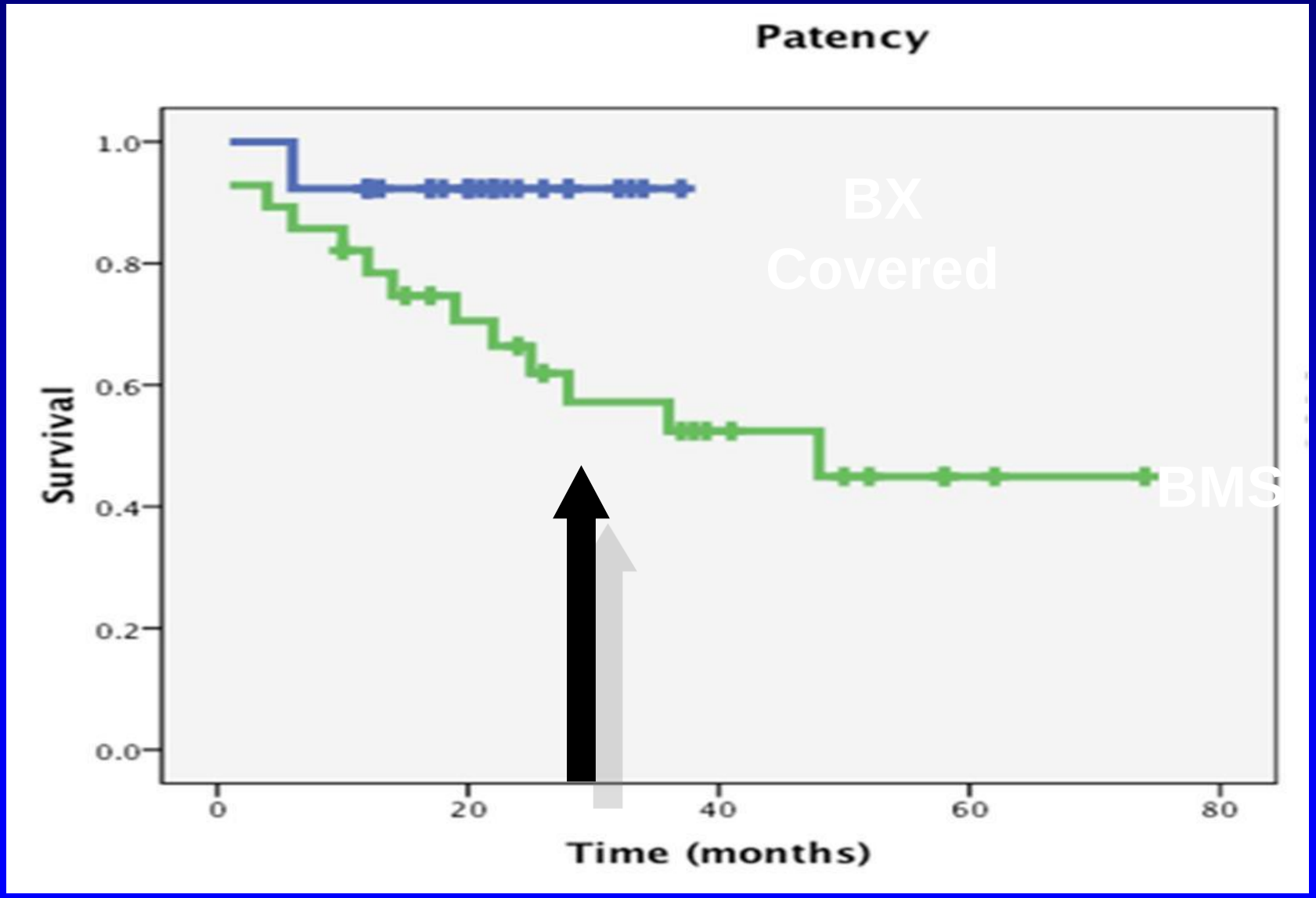
- Covered stents placed in the iliac position have improved primary patency compared with bare metal stents and may be the preferred device for this patient population.



- RE-Entrysysteme
- CS statt BE BMS (+€)
- Graft limbs (-€)



Life Table Analysis

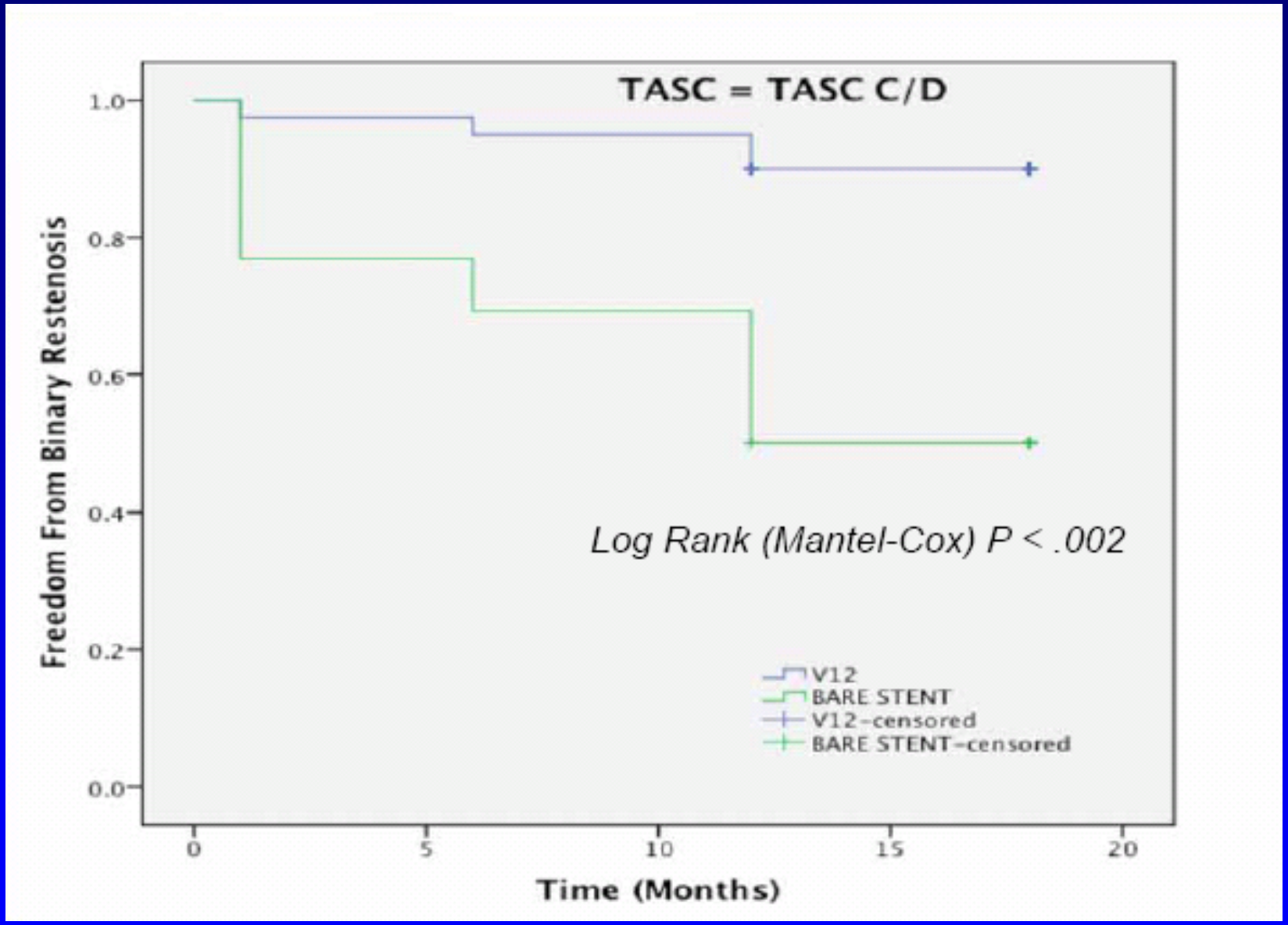


92% patency versus 54% at 29.5 months (+/-20.2) p=0.002

Ergebnisse aorto-biiliakaler Rekonstruktionen

- 106 patients treated with kissing stents
- 100% technical success
- No major procedure-related complications
- Self-expanding stents in 62 (58.5%) and balloon-expandable in 44 (41.5%)
- Follow-up 30.1 +/- 11.1 mo (range, 12-137)
  - Duplex imaging showed restenosis in 15 (14.8%) and occlusion in 4 (4%)
  - Primary patency at 36 months was 79.4%

Haulon S. Percutaneous reconstruction of the aortoiliac bifurcation with the "kissing stents" technique: long-term follow-up in 106 patients. J Endovasc Th 2002; 9: 363



Mwipatayi et al., JVS Accepted 6/2011

COBEST n=167 t=18 months

Bare Metal Stenting		Covered Stenting	
80,8	% primary patency >50%	94,7	% primary patency >50%
			p=0.037
	% secondary patency >50%		% secondary patency >50%
3,57	% amputation	1,2	% amputation
			ns
10,6	% complication	4,8	% complication
			ns
107.253	total BMS costs	94.802	Total CS costs

SAVINGS	**€ 12.450**

Das Becken gehört nicht in Chirurgenhände!

Iliakale Pathologien mit chirurgischem Behandlungsanspruch

- Stenosen und Verschlüsse (*Akut/ Chronisch)*
- Aneurysmata
- Perforationen
- Dissektionen (iatrogen)
- Gefäßverletzungen/Malformationen
- Emboligene Prozesse/ Tumorkomplikationen
- Gefäßinfekte (deutlicher Anstieg)
- Outcome of iliac artery balloondilatation; BJS, 1989, B. Hopkinson, P.Harris et al.

Das Becken gehört nicht in Chirurgenhände!

http://schambeinentzuendung.net/wp-content/uploads/2013/02/becken-300x199.jpg

Gender related diffenrences in outcome

Timaran CH1, Stevens SL, Freeman MB, Goldman MH

External iliac and common iliac artery angioplasty and stenting in men and women.

J Vasc Surg. 2001 Sep;34(3):440-6

…stratified analyses revealed that women with EIA stents had the poorest outcome,

with 61%, 47%, and 23% primary patency rates at 1, 3, and 5 years, respectively, (KM, log-rank test, P <.001).

Cox regression analysis identified EIA stenting (relative risk, 4.3; 95% CI, 2.3-7.9; P <.001) as an independent predictor of decreased primary patency in women

but not in men.

Longterm patency of bifurcation grafts for aortoiliac obstructive disease: a meta-analysis.

de Vries SO, Hunink MG; International Society of Technology Assessment in Health Care. Meeting 1997; 13: 61.

Limb based patency for patients with claudication was 91% and 87% at 5 and 10 years respectively,

87% and 82% for patients with ischaemia.

Patency reported in the older studies was markedly similar to that of more recent studies.

CONCLUSION: Our study suggests that mortality and systemic morbidity of aortoiliac bypass graft procedures have dropped since 1975 :

Risk of adverse development due to patient selection

- Peripheral Arterial Disease: The Magnitude of the Problem and its Socioeconomic Impact
- **Authors:** Gregorio Brevetti[1]; Massimo Chiariello[1]
- Current Drug Teargets- cardopvascular and hematological disorders, Volume 4, Number 3, September 2004 , pp. 199-208(10)

- …It emerges that peripheral arterial disease places a great burden on healthcare systems and on society as a whole. Some of these costs, including indirect and intangible costs (i.e. those related to lost productivity, and reduced quality of life, respectively) could be reduced if the condition were to be recognized and correctly treated at an early stage…

- **Keywords:** socioeconomic impact, PAD ;

Kostenevaluation: Getting Off Their Feet

- Folgekosten suboptimaler Behandlung der pAVK
- Lu Modell (UK) 133 Mio. GBP/ Jahr
- A.Shearer: Modellberechnung UK (ohne Schottland und Wales)
- Miteinberechnung sämtlicher Events
- 532.112 Mio GBP/Jahr

Zusammenfassung:

- Beide Verfahren haben ihre Daseinsberechtigung
- Sie sind komplementär
- Auch i.S. der Kostenreduktion
- Patienten/ASA adaptierte Behandlung mit dem Ziel der Risikominimierung
- TASC II: die Entscheidung sollte auch von den lokal erreichbaren Ergebnissen abhängen
- Nicht jeder kann alles …

Herzlichen Dank für
Ihre
Aufmerksamkeit!

e-mail: joerg.tessarek@hospital-lingen.de

Gefäßzentrum

Emsland

Bonifatius Hospital
Lingen