Covered Endovascular Reconstruction of Aortic Bifurcation or CERAB-technique for treating extensive aortoiliac occlusive disease.

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Background: We developed the Covered Endovascular Reconstruction of Aortic Bifurcation or CERAB-technique for extensive and/or recurrent aortoiliac occlusive disease using V12 covered balloon expandable stents (Atrium Maquet Getinge Europe BV) to rebuild the aortic bifurcation.

Methods: Endovascular bifemoral recanalisation of the aortoiliac axes; placement and expansion of a 12 mm V12 Large Diameter in the distal aorta (9 Fr). Pick up of the already expanded V12 stent with an large balloon (adapted to the aortic diameter). The balloon is so positioned that the distal marker is about 15 mm proximal to the distal stent margin. After positioning and expansion, the distal stent part becomes funnel-shaped. Two iliac covered stent-grafts are then placed in this segment, in a "kissing-stent" configuration and inflated. Both stents are now making a very tight combination with the aortic stent, as were they moulded together, simulating a new bifurcation

Results: Two-centre prospective, non-randomised, follow-up study. We treated now 70 patients with acute, chronic or recurrent aortoiliac occlusive disease. Technical success rate up till now was almost 95%. Follow-up 52 – 1 months. 5 patients died of non-interventional causes . Five patients re-ocluded, mainly due to progressive distal peripheral disease. They received successfully thrombolysis and treatment of the outflow problems. The other patients showed no complications.

Conclusions: Covered Endovascular Reconstruction of Aortic Bifurcation or CERAB is safe and feasible and can be performed completely percutaneously. A larger population, longer follow-up, further haemodynamic investigation is needed. Distal peripheral outflow needs to be sufficient enough. It can be combined as a "hybrid" procedure. CERAB can be used for the treatment of recurrent or in-stent disease. It is even feasible to treat lesion that extend to the inexta and/or supral renal aortic region

TCT-544
The Potential Role of Statin in Patients with Critical Limb Ischemia.
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Background: Revascularization is the optimal treatment to avoid major amputation for critical limb ischemia (CLI) patients. Although previous studies report that statin administration is associated with a reduced risk for cardiovascular events, the efficacy for CLI patients is unclear. In this study, we aimed to compare the outcomes in CLI patients with statin administration and without statin administration after endovascular therapy (EVT).

Methods: This study is a subanalysis from Endovascular Treatment for Infra-inguinal Vessel, in patients with critical limb ischemia, - A Prospective, Multi-center, 12 month follow-up Registry in Japan: Olive Registry. From November 2009 to December 2011, a total of 310 patients with CLI who underwent EVT for infragingual artery disease were enrolled. The outcome measures were limb salvage and major adverse limb event (MALE). MALE was defined as major amputation or major reintervention including surgical procedure.

Results: The mean follow-up period was 294 ± 138 days. Sixty-five percent were male, 26% had statin administration. Rutherford class IV was found in 38 patients, V in 217 patients and VI in 55 patients. Kaplan-Meier survival curve showed the limb salvage rate at one year was 97.3% in the statin group, 89.7% in the without statin group (P=0.03). In adjusted model, limb salvage rate and freedom from MALE were statistically higher in the statin group (P<0.001).

Conclusions: Statin administration after infragingual angioplasty for CLI patients improved limb salvage rate and freedom from MALE.

TCT-545
The AURORA registry : 1 year results using interwoven nitinol stents for extensive distal femoropopliteal occlusive disease.
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Background: In the endovascular treatment of extensive disease in the distal superficial femoral and popliteal level, you can encounter flow limiting problems, where stent placement is needed after balloon angioplasty. At the moment most of the standard bare nitinol stents will have difficulties in these areas. With the introduction of the Supera stent (IDEV Technologies, Inc., Texas, US) we may have an answer in treating those problematic lesions

Methods: Because of the Superas new design; with 6 interwoven nitinol wires, it has extraordinary characteristics : very flexible, kink, fracture and crush resistant together with great radial force. We have treated more than 100 patients with extensive distal femoropopliteal disease (TASC II C & D) with heavy calcifications, occlusions, recurrent disease, stent fractures etc. These lesions, that not responded to balloon angioplasty and that needed stent placement, were all treated with placement of Supera stents.

Results: Results of the single centre prospective AURORA registry : Follow up done by ultrasound. Five patients died of non-interventional causes.. Six months primary patency was more then 90%. Twelve months primary patency was around 81%. We observed further more no stent fractures or flow limiting kinking in this very difficult "to stent" area (distal superficial femoral artery & popliteal artery). Average lesion length: 14 cm: average stent length : 18 cm. Technical success rate 96 %

Conclusions: The Supera stent can be a solution when the use of a "classic" nitinol stent is not indicated or favourable , especially in the femoropopliteal area. It has very good patency rates, despite the very difficult region to treat This self expandable stent system can be a necessary complement in your tool box due to its special characteristics

TCT-546
Safety and feasibility of one day discharge after endovascular revascularization of lower extremities in elderly.
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Background: The elderly have a high prevalence of peripheral arterial disease (PAD) and it seems that they may be less suitable for a one day discharge after endovascular revascularization (ER) mainly due to a higher ratio in hemorrhage complications. Therefore we sought to evaluate whether the advantages of one day discharge after ER on lower extremities can be safely extended for the elderly.

Methods: Between January 2008 and June 2012, 455 ER were performed on lower extremities with Rivalinin as an anticoagulant. The decision of deployment the vascular closure device (VCD) was left to the operator discretion. Patients 70 years old and older were included to the study group (n=235). The rest of the patients created the control group (n=220). The follow up was done at 24 hours and 30 days after