–42%/–44% when centres were grouped by the number of A-AF procedures performed. Total cost of A-AF (including 2 years post-procedure follow-up) was €10,163 (m-mat) or €9,632 (m-geo). Cost of follow-up represented only 8% on total cost of A-AF. **CONCLUSIONS:** The cost of AF ablation procedures is significant and is largely under-funded by the DRG tariff, which showed inadequate to remunerate hospitals in all Italian Regions.

PCV64

COST CONSEQUENCES AND RESOURCE UTILIZATION IN TRANSCATETHER AORTIC VALVE IMPLANTATION (TAVI) AS A SUBSTITUTION FOR HIGH RISK SURGICAL PATIENTS

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OBJECTIVES: TAVI is a novel interventional procedure and is considered as an alternative to surgery in high risk patients with severe aortic stenosis. For commissioning purposes, a cost consequences model was derived to look at the impact of substituting TAVI for high risk conventional surgery patients. **METHODS:** The cost consequence included hospital LOS on CITU, HDU and ward and pacemakers implantation costs. Twenty-five patients were retrospectively identified by clinicans with TAVI experience who might have been eligible to receive TAVI in the previous year of introduction of TAVI on the market. The patient specification was aligned with the TAVI device CE marking criteria. The average TAVI patient cost was obtained from a manufacturer sponsored economic model which used UK patient level data from their sponsored registry. The hospital's local database was used for unit costs. Costs were calculated based on mean values for CITU (critical intensive care unit), HDU (high dependency unit), ward and pacemaker implantation. We also calculated the mean cost per case based on the total length of stay (LOS) for CITU, HDU ward and pacemaker implants of each of the isolated AVR and AVR plus valvular disease (AVR + CABG) population. **RESULTS:** The total cost based on mean LOS values was £21,460 for isolated AVR and £23,032 for AVR + CABG. The cost per TAVI case based on total LOS was £24,721 compared to £49,982 for AVR + CABG. **CONCLUSIONS:** The cost consequence model was sensitive to long LOS on CITU and HDU in the AVR plus CABG group. Using a cost consequences model TAVI was at worst cost neutral and at best most likely to deliver substantial savings in this centre in this well defined patient population. This finding is significant in assessment of the "real" cost impact for substituting TAVI for high risk conventional surgery.

PCV65

HEALTH ECONOMIC ASSESSMENT OF FERRIC CARBOXYMALTOSE IN PATIENTS WITH IRON DEFICIENCY AND CHRONIC HEART FAILURE IN THE FAIR-HF TRIAL

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OBJECTIVES: Chronic heart failure (CHF) is associated with poor quality of life resulting from physical and psycho-social limitations. The FAIR-HF trial showed clinical and quality of life benefits of iron deficiency treatment in CHF patients using ferric carboxymaltose (FCM), an intravenous (i.v.) iron preparation. This study evaluated the cost-effectiveness of iron repletion using FCM in CHF patients, from the perspectives of the statutory health insurance (Germany) and the National Health Service (UK). **METHODS:** Using data from FAIR-HF, a randomized, double-blind, controlled clinical trial (n = 459), per-patient costs and clinical effectiveness of FCM were estimated. Economic assessment was based on published costs associated with New York Heart Association (NYHA) functional classes. Effectiveness was assessed as the number of QALYs gained, derived from EQ-5D scores. The ICER of FCM was determined compared to placebo. Time horizon of this within-trial analysis was 24 weeks. **RESULTS:** In the FAIR-HF trial, NYHA classes were significantly improved in the FCM group compared with placebo ($P < 0.001$). Estimated per-patient costs (excluding iron costs) were €2625 and €2919 (Germany), and £4155 and £4621 (UK), for FCM and placebo arms, respectively. Based on the reimbursed price for FCM in Germany and UK (€28 and £19 per 100 mg iron) and the mean iron dosage of the clinical study (1850 mg) plus administration costs, a net investment of €530 and £68 per patient would be required. FCM resulted in an estimated gain of 0.0254 QALYs over the study period. The ICER of FCM ranged from €20,872 to £2,682 per QALY gained for the FAIR-HF dosing regimen, compared to placebo. ICER-differences result from disparities in administration and medication costs. **CONCLUSIONS:** From the German and UK payers' perspective, managing iron deficiency in CHF patients using i.v. FCM can be considered cost-effective. Improved symptoms and better quality of life contribute to economic benefits seen with FCM.

PCV66

ECONOMIC PERFORMANCE OF DABIGATRAN ETEXILATE FOR PRIMARY VTE PREVENTION FOLLOWING TOTAL HIP AND KNEE REPLACEMENT SURGERY IN ITALY

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OBJECTIVES: To estimate cost/effectiveness and cost/utility of dabigatran etexilate (DBG) compared to standard care for the prevention of venous thromboembolism (VTE) secondary to total hip replacement (THR) or total knee replacement (TKR) in Italy. **METHODS:** A decision analytic, Markov-chain based model originally developed for the UK has been adapted to the Italian context. Clinical outcomes, including incidences of VTE and treatment-related adverse events, were extrapolated from head-to-head, phase III trials of DBG vs. enoxaparin. For the other low molecular weight heparins (LMWHs), indirect comparisons were performed on the basis of equal effectiveness assumptions. The adaptation involved cost and demographic characteristics, leaving clinical and utility data unvaried. Costs are taken from national observational studies, where available. Otherwise, current prices and tariffs are applied. Resources consumption where derived from practice guidelines or taken from those estimated for the UK model. According to the prevalent national practice, extended prophylaxis has been considered for both surgical procedures. Time horizon of the analysis is patients' lifetime. **RESULTS:** Compared to LMWHs, DBG is associated to an expected increase of 0.019 LYs and 0.014 QALYs per THR patient and of 0.024 LYs and 0.019 QALYs per TKR patient. DBG-related cost is lower than competitors in both procedures, with a mean difference ranging between €82 and €109 for THR, and 100 and 135 for TKR, depending on the considered comparator. Higher acquisition costs for DBG are completely offset and inverted by avoided administration expenses and, less importantly, by savings on VTE management. Probabilistic sensitivity analysis estimates that, for a willingness to pay threshold of £30,000 (~€33,500)/QALY, DBG is associated to a probability of being cost/effective of about 98% for THR and of 90% for TKR. **CONCLUSIONS:** On average DBG dominates LMWHs, as it's expected to be cost-saving and non-inferior in terms of efficacy and safety.

PCV67

COST-EFFECTIVENESS OF FONDAPARINUX VS. ENOXAPARIN IN NON-ST-ELEVATION ACUTE CORONARY SYNDROMES IN RUSSIA

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OBJECTIVES: To assess cost-effectiveness of fondaparinux versus enoxaparin in patients with non-ST-elevation acute coronary syndrome in Russia. **METHODS:** A decision tree model was created incorporating the outcomes associated with 2 antithrombotic approaches from OASIS-5 trial: enoxaparin (1 mg/kg every 12 hours) versus fondaparinux (2.5 mg/day). Probabilities of complications (e.g., myocardial infarction, stroke, major bleeding at 9, 30 and 180 days) were calculated. Data on resource utilization (staff, drugs, materials, laboratory, and equipment), diagnosis and treatment came from the hospital survey. Resources were valued in internal hospital prices based on obligatory medical insurance tariffs (as of 2008). The incremental cost-effectiveness ratio for fondaparinux per death avoided and per major bleeding episode avoided versus enoxaparin was quantified. Sensitivity analysis was performed. **RESULTS:** The cost analysis showed that fondaparinux would generate a cost saving of 1634 RUR (€43), 1902 RUR (€50) and 2167 RUR (€57) per patient at 9, 30 and 180 days respectively. When cost and clinical results were extrapolated to cost-effectiveness, fondaparinux was dominant (less costly and more effective in terms of death avoided and major bleeding episode avoided). The sensitivity analysis proved that costs of pharmacotherapy with fondaparinux and enoxaparin had the biggest impact on results. **CONCLUSIONS:** Fondaparinux is a more cost-effective option than enoxaparin in treatment of patients with non-ST-elevation acute coronary syndrome from the hospital perspective in Russia.

PCV68

POTENTIAL COST-EFFECTIVENESS OF A BIOMARKER TEST TO RECLASSIFY PATIENTS WITH AN INTERMEDIATE RISK BASED ON THE FRAMINGHAM RISK SCORE INTO A LOWER OR HIGHER CATEGORY TO OPTIMIZE STATIN THERAPY

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OBJECTIVES: The Framingham Risk Score is a well-accepted tool to estimate the 10-year risk of developing coronary heart disease (CHD). However, many patients fall into the intermediate risk category. Improved discrimination within this category is necessary to prevent CHD and side-effects of statins therapy efficiently. This economic evaluation calculated the potential lifetime cost-effectiveness of a novel biomarker test which helps to decide whether patients with an intermediate risk should be treated with statins. **METHODS:** Prognosis of patients with an intermediate risk was simulated with a Markov chain Monte Carlo model to estimate the potential lifetime costs and effects (life-years (LY)) for three strategies: treat all with statins, treat none with statins or use a test to select patients for statin treatment. Costs were calculated for the The Netherlands using a health care sector perspective. Values for all input parameter were derived from the literature. **RESULTS:** A strategy using a perfect test for a 55-year old man would be slightly more expensive than the treat-none option (€1966 vs. €1941) but less expensive than the treat-all option (€5374). The test and the treat-all option would be equally effective (24.45 LY) and more effective than the treat-none option (24.3 LY). An ICER of €170 versus treat-none indicates that it is a biomarker test with great potential. Results were sensitive to uncertainties regarding model parameters such as the sensitivity, specificity and costs of the test, as well as CHD risk, and the costs and effectiveness of statins. **CONCLUSIONS:** A test to reclassify patients in the Framingham intermediate risk group into higher and lower risk categories has the potential to optimize cost-effectiveness by preventing CHD and reduce the risk of drug side-effects. Values used in this model (e.g., test sensitivity and specificity) can be adjusted wherever needed to determine whether continued development of a biomarker is worthwhile.