For vaccination with PCV13 versus PPSV23, incremental costs per patient were 29,138BRL (CM) and 28,978BRL (OC), leading to a budget impact of 844,074,277BRL (CM) and 87,846,588BRL (OC) for the same period. **CONCLUSIONS:** The addition of PCV13 to the immunization schedule in adults ≥18 years with comorbidities or immunocompromising condition would avoid more IFD cases, with an incremental cost varying from 37,846,568BRL to 793,005,843BRL over a 10 year period.

**PIN24**

**TRIGLASON COATED ANTIBACTERIAL SUTURE: A BUDGET IMPACT ANALYSIS FROM ITALIAN HEALTH SERVICE PERSPECTIVE**

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**OBJECTIVES:** Triglason coated antibacterial sutures (TCS) are designed to control the bacterial colonization of the suture line, a known risk factor for surgical site infections (SSI). A recently published meta-analysis came to the conclusion that TCS showed a significant advantage in reducing the rate of SSI by 30 per cent (relative risk 0.70, 95 per cent CI 0.57 to 0.85; P < 0.001). Subgroup analyses revealed consistent results in favour of TCS in adult patients, abdominal procedures, and clean and clean-contaminated wounds, whereas inconsistent results were observed in the setting of dirty or contaminated procedures.

**RESULTS:** TCS showed a significant advantage in reducing the rate of SSI by 30 per cent (relative risk 0.70, 95 per cent CI 0.57 to 0.85; P < 0.001). Subgroup analyses revealed consistent results in favour of TCS in adult patients, abdominal procedures, and clean and clean-contaminated wounds, whereas inconsistent results were observed in the setting of dirty or contaminated procedures.

**CONCLUSIONS:** Triglason coated antibacterial sutures are a cost-effective and effective strategy in reducing the risk of surgical site infections and the associated costs in clean, clean-contaminated and contaminated surgical procedures.

**PIN25**

**THE BUDGET IMPACT OF USING FIDAXOMYCIN FOR HOSPITALISED CD PATIENTS FROM THE DANISH HEALTH CARE PERSPECTIVE**

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**OBJECTIVES:** Analyse the budget impact in Region Hovedstaden in Denmark (Region H), if all Clostridium difficile (CD) hospitalised patients received fidaxomicin instead of vancomycin during one year.

**METHODS:** The Danish national patient database provided the number of hospitalised patients and length of stay (LOS) for CD patients (ICD-10: A047). A phase III trial provided the risk of first and second CD recurrence [Cornelly 2012]. Cost per hospital stay calculated by LOS multiplied by cost per bed day (DKK 6,000) plus drug costs, vancomycin (DKK 300), fidaxomicin (DKK 69) to 930 with fidaxomicin ((9.0% risk of 1st recurrence × 840 DKK 69)) to 930 with fidaxomicin ((9.0% risk of 1st recurrence × 840 DKK 69)) to 930 with fidaxomicin ((9.0% risk of 1st recurrence × 840 DKK 69)) to 930 with fidaxomicin ((9.0% risk of 1st recurrence × 840 DKK 69)).

**RESULTS:** A total of 70,850 patients were identified (Vancomycin: 68,714 patients, 10% for CABG; 30% for Colorectal Surgery; 15% for Hip Prosthesis; 34% for Limb Amputation and 8% for Small Bowel Surgery). Assuming all hospitalised CDI patients received fidaxomicin instead of vancomycin the number of recurrences decreases by 66% and the total number of days decreases by 35% compared to vancomycin usage. From the health care payer perspective fidaxomicin reduces recurrent infections, frees up available bed days, and may be cost neutral or cost saving depending on the assumed LOS, compared to vancomycin.

**CONCLUSIONS:** Fidaxomicin compared to vancomycin decreases the number of clinical symptoms. The time horizon was one-year considering dengue seasonality. We calculated the direct cost, public payer perspective and direct/indirect costs for laboratory confirmed dengue cases, treated in ambulatory or hospital settings (private and public sectors). A household interview was conducted 20-30 days after onset of clinical symptoms. The time horizon was one-year considering dengue seasonality. We calculated the direct cost, public payer perspective and direct/indirect costs for laboratory confirmed cases reported by notification system (SINAN) having possible under-reporting from passive surveillance. **RESULTS:** We screened 2,223 patients and 2,097 (94.3%) symptomatic dengue cases were included. The majority of patients were adults. 1,661 cases were diagnosed 2014-2018, vaccination with PPV23 could potentially reduce health care costs associated with this condition.

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groups in high risk. The aim of the study is to evaluate the economic consequences of the vaccination against HAV in population groups at high risk and to compare the results with the vaccination of all 1-year old children in the population.

METHODS: Cost-benefit analysis was performed based on epidemiologic data for the number of incidents in the high risk groups and the treatment cost of the HAV infection. Costs were compared with the cost of vaccination. Two vaccination scenarios were created: 1. Prophylactic one dose vaccination and 2. One initial and one buster dose application. The validity of the results was tested with sensitivity analysis using the vaccination coverage rate of all people in the high risk group (n=32,606) induces savings for the health care system because the cost of vaccination is less than the cost of the treatment of the people with HAV infection (n=4565). The cost of vaccination varies from €1 257.32 to €2 514.66 depending on the vaccination scenario. We estimated the manufacturer price of sofosbuvir, telaprevir and boceprevir in Norway, Denmark, Germany, Luxembourg, Portugal, Slovenia, Turkey, and the United States. Treatment costs were calculated for each treatment series included in clinical routine situations: 1, including individual daily dosage strength and length of recommended treatment for each antiviral. Interferon and ribavirin costs, any potential discounts or rebates negotiated with payors and potential follow-up courses of therapy for sofosbuvir were excluded from the study. Prices were extracted from IMS Life Sciences’ international pricing database POLI. All foreign currency was converted to USD using XE Currency Converter for comparison.

RESULTS: Costs of treatment with sofosbuvir varied significantly across the eight countries, being highest in the US at USD48,000 then Portugal at USD75,816 down to USD52,051 in Norway. Telaprevir and boceprevir treatment costs range from a low of USD21,534 and USD14,111 in Turkey respectively, to a high of USD456,850. Telaprevir and boceprevir treatment costs for HBV reactivation management were relatively small compared with vaccine program costs. Since the median length of stay in the hospital for HBV-infected patients was 25.3 days in case of HBV-resistant patients. The median hospitalization cost was found to be 40185 INR in case of HBV-sensitive patients while it was 126885 INR in case of HBV-resistant patients. The incidence of HBV reactivation is observed to be increasing the morbidity and cost burden on the patients substantially.

Conclusions: The increased length of hospital stay leads to an increase in the incidence of Nosocomial infections which further leads to the increased morbidity, mortality and cost burden on the society.

PIN30
PRELIMINARY ASSESSMENT OF THE COST OF TREATMENT FOR CHRONIC HEPATITIS C VIRUS INFECTIONS WITH SOFOSBUVIR AND FIRST GENERATION ANTIVIRALS ACROSS EIGHT COUNTRIES

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OBJECTIVES: The new wave of HCV drugs reaching the market in 2014 offer higher cure rates and shorter treatment times; however, the new antivirals have been met with concerns regarding the costs associated with the new drugs by payors and the WHO. We have set out to examine the costs of treatment with sofosbuvir, compared to first generation antivirals in eight countries, in a preliminary analysis of the US and European pricing data. We estimated the manufacturer price of sofosbuvir, telaprevir and boceprevir in Norway, Denmark, Germany, Luxembourg, Portugal, Slovenia, Turkey, and the United States. Treatment costs were calculated for each treatment series included in clinical routine situations: 1, including individual daily dosage strength and length of recommended treatment for each antiviral. Interferon and ribavirin costs, any potential discounts or rebates negotiated with payors and potential follow-up courses of therapy for sofosbuvir were excluded from the study. Prices were extracted from IMS Life Sciences’ international pricing database POLI. All foreign currency was converted to USD using XE Currency Converter for comparison.

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Conclusions: The increased length of hospital stay leads to an increase in the incidence of Nosocomial infections which further leads to the increased morbidity, mortality and cost burden on the society.

PIN31
TREATMENT OF MRSA PNEUMONIA: ECONOMICAL AND CLINICAL COMPARISON OF LINEZOLID VERSUS VANCOMYCIN

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OBJECTIVES: Infections with methicillin resistant Staphylococcus aureus (MRSA) pathogens represent a substantial economic burden for the health care system. Although the introduction of the antibiotics linezolid and vancomycin for the treatment of MRSA infections are generally negligible in relation to the total MRSA-related hospital costs, the prices of the drugs often influence the therapy decisions. The objective of this study was to compare the clinical routine situations in which the costs of stay on intensive care unit (ICU) and the clinical effectiveness of treatment with linezolid compared to vancomycin in patients with MRSA pneumonia. This was a retrospective analysis of reimbursement and medical data of adult patients who were treated in German hospitals between 2008 and 2012. Propensity score adjustment was applied to reduce the effect of confounding factors. Results: Of the 226 patients included received linezolid as initial therapy for 190 (83.9%) and 131 received vancomycin. The analysis of the total costs of stay on ICU did not reveal any major differences between the two treatment groups (cost ratio linezolid/vancomycin: 1.29; 95% confidence interval (CI): 0.84 – 1.98; p = 0.24). Analyses of clinical data showed a decreased likelihood of therapy failure (= resistance against second antibiotic) was observed (linezolid vs. vancomycin: 0.183; 95% CI: 0.052 – 0.647; p = 0.01) and a decreased risk of dying in hospital (Cox proportional hazard regression analysis; hazard ratio linezolid/vancomycin: 0.508; 95% CI: 0.305 – 0.846; p = 0.03) in the linezolid group. Conclusions: Despite higher drug acquisition costs, the total costs of stay on ICU were not significantly higher in patients receiving linezolid than in patients receiving vancomycin. The clinical effectiveness, on the other hand, was superior. Both, the rate of therapy failure and the all-cause hospital mortality rate were substantially lower in patients who received linezolid.

PIN32
FIXED DOSE COMBINATIONS OF NUCLEOSIDE REVERSE TRANSCRIPTASE INHIBITOR FOR NAIVE PATIENT WITH HIV INFECTION IN RUSSIA: COST COMPARISON ANALYSIS

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OBJECTIVES: To compare treatment costs for the fixed dose combination (FDC) tenofovir and emtricitabine (TDF/FTC) versus FDC abacavir and lamivudine (ABC/3TC) each in combination with efavirenz (EFV) in treatment-naive adults with HIV-1 infection in Russia. METHODS: A mathematical model was developed in Microsoft Excel to evaluate costs of treatment, including drug (1st and 2nd lines of therapy) and patient management costs. In the model individuals remained on their current regimen or moved to the 2nd line of therapy after the first 48 weeks on therapy. Transition probabilities were based on the proportion of patients with viral response measured as HIV-1 RNA < 50 copies per milliliter from the clinical trial with TDF/FTC + EFV vs ABC/3TC + EFV head-to-head comparison. Cost calculations were based on registered drug prices, reimbursement rates in public medical insurance and data on government procurement in Russia in 2014. Results: It was expected that after the 48 weeks of treatment 71.0% of patients in TDF/FTC + EFV group and 59.4% of ABC/3TC + EFV remain on the initial regimen. The total average costs per patient for 96 weeks of therapy, including drug (1st and 2nd lines of therapy) and patient management costs, were lower for TDF/FTC + EFV (€9,528) than for ABC/3TC + EFV group (€17,123). Conclusions: FDC TDF/FTC in 1st line therapy in treatment-naive adults with HIV-1 infection results in lower costs compared with FDC ABC/3TC + EFV for 96 weeks of treatment in Russian Federation.

PIN315
POTENTIAL RISK-SHARING AGREEMENTS FOR VACCINES

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OBJECTIVES: After each negotiation between a health care provider and a payer, financial risks exists that may jeopardize the payer’s budget. Risk-sharing agreements (RSAs) in medical care can be used to reassure payers on budget trajectory. This has grown during the recent years resulting from increased budget restric-