and net monetary benefit calculations. Sensitive variables include abiraterone costs and neutropenia costs of mitozantrone. Even assuming most patients are severely ill to match sites with sicker populations, the relative cost-effectiveness does not change; abiraterone favored and cabazitaxel always above tolerable thresholds. **CONCLUSIONS:** Abiraterone is the most cost effective given WTP of $100,000. Despite slightly higher survival with cabazitaxel, it is never cost-effective with high drug and neutropenia costs. Even for care sites with relatively ill patients, abiraterone remains cost-effective.

PCN73

ECONOMIC EVALUATION OF ANTITHROMBOTIC THERAPIES IN PATIENTS WITH CANCER IN MEXICO

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OBJECTIVES: Cancer is a risk factor to develop deep vein thrombosis (DVT), pulmonary embolism (PE) or relapse of these conditions. Alternatives to oral anticoagulants need to be evaluated. The objective of this study was to perform an economic evaluation of anticoagulant therapies in adult patients with cancer (solid tumors), from the Social Security Mexican Institute (IMSS) perspective. **METHODS:** One-year medical direct costs (2011 US$) and health consequences were estimated by a Markov model (one-week cycles). Effectiveness measures were reduction in cases of DVT and PE (per 1000 patients). A meta-analysis was performed to estimate transition probabilities. Alternatives considered in the assessment were: warfarin (5mg/day); dalteparin (not listed in Mexican formulary, 5000 IU/day); enoxaparin (40 mg/day); nadroparin (5700 IU/day); unfractionated heparin (UFH) plus warfarin (10000 IU/day+5 mg/day) and no prophylaxis. Resource use and costs were obtained through IMSS databases (dalteparin acquisition cost was provided by manufacturer). Univariate sensitivity analysis was performed. Acceptability curves were constructed. **RESULTS:** Estimated cases of DVT avoided were: warfarin 276 (CI 95% 271–281); dalteparin 47 (46–48); enoxaparin 107 (105–109); nadroparin 97 (95–99); UFH 127 (124–130) and no prophylaxis 317 (310–323). Regarding PE prevention, outcomes were: warfarin 116 (114–118); dalteparin 16 (16–16); enoxaparin 23 (23–23); nadroparin 15 (15–15); UFH 26 (25–27) and no prophylaxis 61 (60–62). Per patient annual costs were: warfarin $1908.32 ($1851.38-$1918.42); dalteparin $2298.82 ($2268.41-$2329.22); enoxaparin $3713.36 ($3634.27-$3792.46); nadroparin $2,648.14 ($2603.54-$2692.76); UFH $1884.90 ($1851.38-$1918.42) and no prophylaxis $2667.81 ($2619.18-$2716.42). For both DVT and PE, ICER's of dalteparin, enoxaparin and nadroparin were $1.72, $3.93; $10.70, $19.44, $4.15 and $7.35, respectively. In prevention of both DVT and PE, dalteparin is more effective and less costly than enoxaparin, nadroparin and no prophylaxis. **CONCLUSIONS:** Dalteparin is a potential cost-effective antithrombotic therapy in adult patients with cancer in Mexico.

PCN74

ECONOMIC EVALUATION OF EVEROLIMUS AS SECOND LINE TREATMENT IN METASTATIC RENAL CANCER IN MEXICO

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OBJECTIVES: To evaluate the cost-effectiveness of Everolimus as second-line of treatment compared with sorafenib in adult patients with metastatic renal cell carcinoma, from the perspective of the Mexican Public Health Institution. **METHODS:** We compare the results obtained in treating renal cancer patients with either sorafenib or everolimus, previously treated with sunitinib in Mexico. We developed a markov model in a two-year period among three possible health states (stable, progression and death). Overall survival and progression-free survival were used as effectiveness measures and the sources of this information were published articles. We considered the costs of drugs, best-supportive care and follow-up (stable disease and progression); drug costs of everolimus and sorafenib only apply to stable patients. The costs of medical resources correspond to the costs of medical care in tertiary care systems. All costs were calculated in 2010 Mexican pesos. An incremental analysis of cost and results in health was realized, to compare everolimus and sorafenib. A sensitivity analysis was also accomplished (deterministic and probabilistic). The discount rate applied to costs and effectiveness was 5%. **RESULTS:** Patients with everolimus obtained more overall survival (14.37 vs. 7.73 months) and progression-free survival (4.83 vs. 3.88 months) than those that used sorafenib. Everolimus resulted as the alternative with less average total cost than sorafenib: $391,765.00 and $454,802.00 respectively. Everolimus is a dominant option compared with sorafenib. Sensitivity analysis showed robustness in the results. **CONCLUSIONS:** Everolimus is the cheapest treatment option and saving of resources, which significantly increases the survival of patients and provides longer progression-free and more overall survival versus sorafenib.

PCN75

ECONOMIC EVALUATION OF BEVACIZUMAB FOR THE TREATMENT OF ADVANCED OVARIAN CANCER IN MEXICO

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OBJECTIVES: To evaluate whether the use of bevacizumab in first line treatment for patients with advanced ovarian cancer represents a cost-effective strategy for health institutions in Mexico. **METHODS:** Ovarian Cancer is the sixth most common cancer and second gynecologic malignancy worldwide, with approximately 190,000 new cases per year. Ovarian cancer is considered highly lethal for their growth characteristics, low symptoms and recurrence. A complete economic evaluation of cost-effectiveness was performed in women with ovarian cancer stage III and IV, classified as high risk, taking carboplatin + paclitaxel (CP) and bevacizumab+ carboplatin +paclitaxel (BCP) as comparators. The 1st cycle, carboplatin + paclitaxel are administered alone; from 2nd to 6th is added bevacizumab (7.5 mg/kg). From cycle 7, all patients with no evidence of disease progression received maintenance bevacizumab as monotherapy, giving a maximum of 18 cycles. The progression was emulated with a Markov model considering the stages of: progression free survival, progression and death in a 11.5 year time horizon. Costs are expressed in US dollars. **RESULTS:** BCP gained more months with progression free survival compared with CP (16.77 vs. 14.40). BCP obtained 40.89 months of overall survival versus 31.17 with CP, generating a 36% increase in overall life expectancy. The Incremental Cost Effectiveness Ratio (ICER) for BCP is $25,544 per year of additional life year gained with respect the use of CP. According to the International Monetary Fund, the Gross Domestic Product (GDP) for Mexico in 2011 was $9471. For a threshold of 3 times this value (3 GDP per capita: $28,413), the use of BCP in advanced ovarian cancer would be cost-effective. **CONCLUSIONS:** BCP is an alternative that substantially increases the patient overall survival expectancy. It also lies within the international cost-effectiveness threshold.

PCN76

ECONOMIC EVALUATION OF THE USE OF ERLOTINIB FOR NON-SMALL CELL LUNG CANCER (NSCLC) WITH EGFR MUTATION IN MEXICAN PUBLIC HEALTH INSTITUTIONS

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OBJECTIVES: Assess whether the use of Erlotinib as 1st line treatment in metastatic or advanced Non Small Cell Lung Cancer (NSCLC) patients with Epidermal Growth Factor Receptor (EGFR) mutation positive, is a dominant alternative from the perspective of public health system in Mexico. **METHODS:** It was developed a cost-utility analysis using a Markov model with monthly cycles stages: response to treatment, stable disease, disease progression and death in a time horizon of 5 years. The costing method is the direct medical costs and the main outcome measures were QALY's and total cost of treatment per patient. The drugs compared in the study were Erlotinib, Gefitinib and chemotherapy with Gemcitabine plus Carboplatin. Costs are expressed in US dollars. **RESULTS:** Erlotinib was the alternative that provided a greater number of QALY's (1.49) compared with Gefitinib (1.32) and chemotherapy with Carboplatin (1.07). Furthermore, treatment with Erlotinib was the least expensive with a cost per patient of $51,249 on a horizon of 5 years while the cost of Gefitinib was $ 53,817 per patient and the QT with Gemcitabine + Carboplatin $53,258 per patient. This implies that the dominant treatment for these patients (NSCLC and positive EGFR mutation) is Erlotinib with a cost-effectiveness average of $34,456. The dominance results of treatment with Erlotinib were consistent with sensitivity analysis, which provides robustness to the results. **CONCLUSIONS:** Considering the average annual costs, Erlotinib represents savings for the health sector from $402 (versus Gemcitabine + Carboplatin) to $514 (vs Gefitinib) for each patient according to its comparator in 1 year. Therefore, under the context of public health system in Mexico, treatment with Erlotinib was shown to be a cost-effective treatment and dominant over other treatment alternatives considered in this study for patients with NSCLC and EGFR mutation.

PCN77

COST-EFFECTIVENESS ANALYSIS OF RITUXIMAB USE IN TREATMENT OF CHRONIC LYMPHOCYTIC LEUKEMIA IN UKRAINE

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OBJECTIVES: The aim of this study is to assess efficiency of adding rituximab to fludarabine and cyclophosphamide (R-FC versus FC) for the treatment of previously untreated chronic lymphocytic leukemia in Ukraine. **METHODS:** A cost-effectiveness analysis was performed from a health care perspective over a 20 year horizon with 3% discounting rate. Markov model in Excel program (2007) with cohort simulation was applied. Three-state model (no disease progress, relapse, and death) was run using one month cycle time. The outcome data were retrieved from a randomized controlled trial publication. One-way sensitivity analysis was performed to assess robustness of the results. **RESULTS:** The incremental life expectancy increase was 3.27 months on R-FC in comparison to FC scheme. The expected costs associated with FC scheme are equal to $28,105 and with FC-R scheme to $41,850. R-FC was associated with incremental 1.3 quality-adjusted life-years (QALYs) compared to FC and resulted in an incremental cost-effectiveness ratio of $10,588 per QALY from health care perspective. Results were the most sensitive to unit drug cost for rituximab (costs deviation $1.77-3.88 per mg). **CONCLUSIONS:** The World Health Organization recommends to consider drugs cost-effective if their incremental cost per QALY is less than 3 gross domestic product per capita in the country ($6,700/per capita in Ukraine). Under these recommendations, R-FC scheme is seen as cost-effective in Ukrainian health-care setting.

PCN78

THE COST-EFFECTIVENESS OF TEMOZOLOMIDE IN THE ADJUVANT TREATMENT OF NEWLY DIAGNOSED GLIOBLASTOMA IN THE UNITED STATES

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OBJECTIVES: The objective of this research was to determine the incremental cost-effectiveness, from a US societal perspective, of adding temozolomide to the previous standard of care (radiotherapy only) for the adjuvant treatment of newly diagnosed glioblastoma. **METHODS:** A Markov model with a one-month cycle length and five-year time horizon was constructed in Microsoft Excel. All model parameters were obtained from relevant peer-reviewed literature based on systematic review. Transition probabilities were calculated using survival data from randomized controlled trials comparing temozolomide plus radiotherapy versus