in 2009-73% of all costs, cumulatively 300,805,52 EUR (2009-2013). Total average costs for patients with CF in 2009-2013 per 1 patient was 48,884,01 EUR. Year-by-year average costs for 1 patient were as follows: in 2009: 24,795,75 EUR, in 2010: 6,682,72 EUR, in 2011: 3,273,72 EUR, in 2012: 3,630,72 EUR and in 2013: 12,456,72 EUR. We also found negative significant statistical correlation between age of patients and costs. CONCLUSIONS: We performed first direct costs analysis in Polish CF center. Most data are needed to fully evaluate exact costs associated with CF treatment that could be used as solid background for decision making process at national level.

PSY48
ANALYSIS OF THE COST OF INVASIVE FUNGAL INFECTIONS IN PATIENTS WITH HEMOPHILE STEM CELL TRANPLANTATION
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OBJECTIVES: To analyze the cost of treating invasive fungal infections (IFI) in stem cell transplantation recipients. A retrospective cost study from the hospital point of view was performed in the major hematology clinic in Sofia for one year period. Bottom up cost analysis for the consumed health care resources and their cost was performed for all stem cell transplant patients. Medical resources included in the analysis was the clinical tests, medical devices, transplantation procedure: medicines, blood and blood formulating products, conditioning regime and cost of hospital stay. Cost of the resources was taken from the hospital tariff and insurance fund. Direct and indirect cost was calculated for the event described in the study, and for the patients when IFI appears. RESULTS: Every patient with hemopoietic stem cell transplantation is considered for highly risky for fungal infection appearing due to suppressed immune system. Antifungal prophylactic is obligatory for allogenic transplantation (n=27) and for susceptible patients with autologous transplantation (n=64). For allogenic transplantation prophylactic is performed with voriconazole and costs for drug in 2009: 73% of all costs, cumulatively 300,805,52 EUR (2009-2013). Total average costs for all patients was 48,884,01 EUR. Year-by-year average costs for 1 patient were as follows: in 2009: 24,795,75 EUR, in 2010: 6,682,72 EUR, in 2011: 3,273,72 EUR and in 2013: 12,456,72 EUR. Most influential cost factor was length of stay 8.4 days [2-9]. The in-hospital mortality was 2.2% and the mean age 54.8 years. Results of descriptive statistics were derived (mean ± standard deviation or [interquartile range]). Correlation coefficients (Pearson, Spearman) were calculated between age, gender, length of stay and cost. Conclusions: The number of organ systems involved (estimated per patient, based on the ICD-9-CM codes of associated diagnoses, further classified into SLE-specific organ systems). RESULTS: In 2013, 434 adult SLE patients were identified (82.0% female; mean age 42.3 ± 17.0 years), in 2009–2013 per patient the mean annual hospitalization cost was €8,741 (1,715–9,533). These patients generated 939 stays (2.2 [1-2] stays/patient; 27.9% unplanned admissions; 56.4% full hospitalizations with mean length of stay 8.4 days [2-8]). The in-hospital mortality was 2% and the mean total length/total stay was €4,069 (366-4,203). The number of organ systems involved was significantly (p<0.001) correlated to age (Pearson/Spearman: 0.40/0.38), number of stays/patient (0.21/0.26), total length of stay (0.57/0.59) and annual cost/patient (0.53/0.55). CONCLUSIONS: The analysis of real-world hospitalization data showed how the burden and complexity of SLE management increases as the organ systems involvement accrues. Extrapolating the HHD data to the total Belgian population, about 1,800 SLE patients might require hospital treatment every year, representing a substantial burden for patients and society.
INCREMENTAL COST-EFFECTIVENESS RATIOS WERE £17,700/LYG AND £27,200/QALY GAINED QALYS (2.57 versus 0.09) THAN BSC, AT AN INCREASED COST (£88,553 versus £21,208).

OBJECTIVES: Adults with Philadelphia chromosome-positive (Ph+) acute lymphoblastic leukaemia (ALL) who develop resistance or intolerance to first- and second-generation tyrosine kinase inhibitors (TKIs) are eligible for potential treatment with allogeneic hematopoietic stem cell transplantation (alloH SCT) if remission of the disease is achieved. The third-generation TKI ponatinib has been shown to be safe and efficacious in the treatment of Ph+ ALL and intolerance to previous TKIs (up to 47% achieved complete cytogenetic response (MCyR)). Accordingly, ponatinib followed by alloH SCT in those who achieve MCyR represents a potential therapeutic alternative to best supportive care (BSC) with standard chemotherapy only. METHODS: A Markov cohort model was constructed to assess the cost-effectiveness after dasatinib failure of ponatinib followed by alloH SCT in patients who achieve MCyR, versus BSC. Direct medical costs for ponatinib, BSC, alloH SCT, monitoring and follow-up, and adverse events were accounted for. Time horizon was 2 years and all costs were discounted. Probabilities, utilities, and costs were estimated from the published literature. Sensitivity analyses were performed to test the robustness of the results. RESULTS: Starting with the higher incidence of MCyR, the Markov cohort model predicted that treating patients with MCyR with ponatinib followed by alloH SCT is cost-effective compared to BSC with standard chemotherapy, with a cost per quality-adjusted life-years (QALYs) gained of £17,700/LYG and £27,200/QALY (2.57 versus 0.09) than BSC, at an increased cost (£88,553 versus £21,208).

CONCLUSIONS: Starting with the higher incidence of MCyR, the Markov cohort model predicted that treating patients with MCyR with ponatinib followed by alloH SCT is cost-effective compared to BSC with standard chemotherapy, with a cost per quality-adjusted life-years (QALYs) gained of £17,700/LYG and £27,200/QALY (2.57 versus 0.09) than BSC, at an increased cost (£88,553 versus £21,208).

OBJECTIVES: To assess the cost-effectiveness of romiplostim as treatment for adult ITP and alloHSCT. Methods: A cost-effectiveness analysis (CEA) was performed to compare the clinical and cost outcomes of patients who achieved MCyR with and without romiplostim rescue therapy. The analysis was conducted from the perspective of the Norwegian Health Service and assumptions were made about the long-term follow-up. The study was based on a 24-week interval defined by the MIN and MAX values of the triangular. For non-symmetric distributions, we used a normal distribution with mean/mode and maximum (MAX) values for parameters. These distributions have been used to assess the cost-effectiveness of ponatinib for 3L treatment of CP-CML compared with current treatment options in Sweden. METHODS: The cost-effectiveness model compares ponatinib, second-generation TKIs (dasatinib, nilotinib, bosutinib), and allo-SCT, with cost per life-years (LY) saved and cost per quality-adjusted life-years (QALYs) gained as outcome measures, and a lifetime time horizon. Resource use was estimated from the published literature and drug acquisition costs were derived from Pullarkat, 2009. Treatment cost and adverse event costs were derived from the published literature. The sensitivity analysis included uncertainty in treatment efficacy and costs, and the model was run in sensitivity analyses for all parameters, as well as a probabilistic sensitivity analysis, including the effect of the uncertainty in the effectiveness of ponatinib and the drug acquisition costs. RESULTS: The model suggests that treating 3L CP-CML with ponatinib provides substantially higher net cost-effectiveness than either of the other treatments. However, the incremental cost-effectiveness ratio (ICER) of ponatinib compared with alloHSCT is £255,700/QALY, and the probability of being cost-effective - P(CE) - is 0.14. Sensitivity analysis showed that the model is sensitive to the assumed drug acquisition costs for ponatinib and the assumed effectiveness of ponatinib compared with alloHSCT. CONCLUSIONS: The model suggests that ponatinib provides substantial cost-effectiveness for 3L CP-CML compared with current treatment options in Sweden. However, the incremental cost-effectiveness ratio (ICER) is high, and the model is sensitive to the assumed drug acquisition costs for ponatinib and the assumed effectiveness of ponatinib compared with alloHSCT.