brought to you by TCORE

The results of cost-effectiveness illustrate that quetiapine is dominant in Russian patients with bipolar disorder who are initiating atypical antipsychotics therapy compared with aripiprazole, olanzapine or ziprasidone.

# PMH38

THE COST-EFFECTIVENESS OF QUETIAPINE, ARIPIPRAZOLE OR OLANZAPINE IN PATIENTS WITH BIPOLAR DEPRESSION IN THE RUSSIAN FEDERATION

Kulikov A. Komarov I

I.M. Sechenov First Moscow State Medical University, Moscow, Russia

OBJECTIVES: To explore the cost-effectiveness of quetiapine, aripiprazole or olanzapine in Russian Federation (RF) patients with bipolar disorder (BPD) depression episodes. METHODS: A cost-effectiveness analysis (CEA) was developed to estimate the cost-effectiveness of quetiapine compared with aripiprazole or olanzapine. CEA was undertaken from RF health care perspective using discount rate of 5%. The time horizon of the analysis was ne year for using preventive relapse rates and five years for QALY. Direct health care expenses associated with bipolar disorder and resulting follow-up costs were calculated using general tariff agreement of Russian obligatory insurance system and official national statistics. For reference, accepted exchange rate was 1 EUR = 40 RUB. RESULTS: Taking into account rates of prevented relapse following costeffectiveness ratios (CER) were obtained: 156,915 RUB (3,923 EUR) in quetiapine group, 429,362 RUB (10,734 EUR) in aripiprazole group and 221,879 RUB (5,547 EUR) in olanzapine group. Using QALY values CER were accounted for: 185,236 RUB (4,631 EUR) in quetiapine group, 478,433 RUB (11,961 EUR) in aripiprazole group and 254,100 RUB (6,353 EUR) in olanzapine group. **CONCLUSIONS:** Quetiapine in the treatment of BPD depression episodes is a dominant compared with aripiprazole or olanzapine.

COST-EFFECTIVENESS OF ATYPICAL ANTIPSYCHOTICS FOR THE TREATMENT OF RELAPSE PREVENTION FOR BIPOLAR DISORDER: THE RUSSIAN PERSPECTIVE <u>Kulikov A</u>, Komarov I

I.M. Sechenov First Moscow State Medical University, Moscow, Russia

OBJECTIVES: To assess the efficiency of the atypical antipsychotics used to reduce relapses in bipolar disorder, taking into account costs and effectiveness (measured as QALY). **METHODS:** The Russian health care system perspective and a 5 year temporal horizon have been used. An annual discount rate assumed was of 5%. Taking into account the last literature review on bipolar disorder, four fundamental aspects related with bipolar disorder management were analyzed: relapse rates, inpatient treatment, outpatient treatment and hospitalization rates. The health care direct costs corresponding to the drug acquisition costs have been analyzed together with the costs of inpatient diagnostics, costs of inpatient treatment and costs of hospitality relapses (stay and drug cost) updated with data from Russian health care system. **RESULTS:** Quetiapine or risperidone treatment presents the lower total costs (€13,562 and €13,097 respectively) compared with the other strategies (aripiprazole = €36,328 and olanzapine = €19,957). Quetiapine presents the higher efficacy (QALY) compared with the alternatives (quetiapine = 3.551, risperidone = 3.534, aripiprazole = 3.528 and olanzapine = 3.525). With these results one can emphasize that quetiapine or risperidone treatment is dominant with the cost-effectiveness ratio (CER) of 3819 and 3706, respectively, versus aripiprazole or olanzapine groups (CER 10,297 and 5,662 respectively). The incremental CER (quetiapine vs. risperidone) is €27,322 per QALY. **CONCLUSIONS:** The results of cost-effectiveness illustrate that quetiapine is dominant compared with aripiprazole or olanzapine. Also quetiapine therapy is within willingness to pay threshold in case of risperidone substitution in Russian patients with bipolar disorder who are initiating atypical antipsychotics therapy.

ONCE-A-DAY EXTENDED-RELEASE VERSUS TWO-TIMES-DAILY IMMEDIATE-RELEASE METHYLPHENIDATE FOR THE TREATMENT OF ADHD - A COST MINIMIZATION STUDY

Kachru N1, Sansgiry SS2

<sup>1</sup>University of Houston, College of Pharmacy, Houston, TX, USA, <sup>2</sup>University of Houston, Houston, TX, USA

Attention Deficit/Hyperactivity Disorder neurobehavioral disorder and one of the most prevalent chronic health problems affecting school-age children, representing a costly major public health problem. Keeping in view, the substantial economic burden, the objective of this study was to conduct a cost-minimization analysis of once-a-day extended-release (ER) was two-times-daily immediate-release (IR) methylphenidate for the treatment of ADHD patients. **METHODS:** Major literature databases were systematically searched to identify appropriate randomized clinical trials and meta-analyses to obtain costs associated with both the alternative formulations from a payers (third party) perspective. Medical costs included cost of drug, cost of assessments, cost of non-compliance, cost of injuries/accidents and cost of inschool administration and were obtained from published literature. All costs were adjusted to 2012 USD using consumer price index. The expected outcome was considered to be the same for both the formulations and a cost minimization analysis was performed using a decision tree approach. Multiple one-way sensitivity analyses were performed on all cost variables to evaluate the robustness of the results. RESULTS: The ER regimen of methylphenidate resulted in a total annual cost of \$4685 per patient which was less costly as compared to the IR regimen that resulted in a total annual cost of \$9524 per patient for the treatment of ADHD. One-way sensitivity analyses results were consistent. **CONCLUSIONS:** In our study Methylphenidate ER had 50.81% less annual economic burden as compared to the IR regimen for the treatment of ADHD patients.

COST-UTILITY OF TWO SHORT-TERM PSYCHOTHERAPIES IN THE TREATMENT OF DEPRESSIVE AND ANXIETY DISORDERS DURING A THREE-YEAR FOLLOW-UP

Maljanen T1, Härkänen T2, Virtala E2, Lindfors O2, Tillman P3, Knekt P2 <sup>1</sup>The Social Insurance Institution, Helsinki, Finland, <sup>2</sup>National Institute for Health and Welfare, Helsinki, Finland, 3The Social Insurance Institution, Turku, Finland

**OBJECTIVES:** Different types of psychotherapy, alone or together with pharmaceuticals, are used extensively in the treatment of depressive and anxiety disorders. However, only a few studies thus far have addressed the costutility of different psychotherapies. The aim of this study is to compare the direct health care costs and the quality of life of persons who have suffered from depression or anxiety and have been treated either with short-term psychodynamic psychotherapy (SPP) or solution-focused therapy (SFT). The follow-up period was three years. **METHODS:** A total of 198 outpatients aged 20-45 years suffering from mood or anxiety disorder were randomized to SPP or SFT. Patients' quality of life was assessed using Chubon's Life Situation Survey (LSS). The assessments took place at baseline and at 7, 12 and 36 months after the start of the therapy. All direct costs due to mental health problems incurred during the three-year follow-up period were taken into account in the analysis. **RESULTS:** During the first 7 months patients' quality of life improved considerably, with mean LSS scores increasing from about 79 to about 93 in both groups. This change was also statistically significant. After the 7<sup>th</sup> month some minor improvements continued to be observed in quality of life. At the end of the follow-up period the mean LSS scores were in both groups somewhat below 100, a threshold for very good life quality. The differences between the two groups were very small at every measurement point and not statistically significant. The direct costs were about equal in both groups. The small positive changes observed in the quality of life after the 7th month were at least partly due to auxiliary treatments whose costs were much higher than the costs of SPP or SFT. **CONCLUSIONS:** There is little appreciable difference in cost-utility between SPP and SFT.

HEALTH CARE AND SOCIAL SERVICE USE AND COST IN DEPRESSED AFRICAN AMERICAN ELDERS: RESULTS FROM THE BEAT THE BLUES RANDOMIZED CLINICAL TRIAL

<u>Pizzi LT</u><sup>1</sup>, Jutkowitz E<sup>2</sup>, Frick KD<sup>3</sup>, Suh DC<sup>4</sup>, Prioli KM<sup>1</sup>, Gitlin L<sup>5</sup>

<sup>1</sup>Thomas Jefferson University, Philadelphia, PA, USA, <sup>2</sup>University of Minnesota, Minneapolis, MN, USA, <sup>3</sup>Johns Hopkins Bloomberg School of Public Health, Baltimore, MD, USA, <sup>4</sup>Chung-Ang University, Seoul, South Korea, 5Johns Hopkins University, Baltimore, MD, USA

OBJECTIVES: To report health care and social service costs from a trial of nonpharmacologic depression support program in older African Americans, Beat the Blues (BTB). METHODS: Two-group randomized design in which the BTB group received the program and the control group did not receive the program. BTB employed licensed senior center social workers to meet with participants (up to 10 sessions). Components of BTB were depression education, care management, stress reduction, referrals and linkages, and behavioral activation. Both groups were followed for 4 months. Service use and costs at each time point included health care use for depression (outpatient calls and visits to physician, emergency department visits, hospitalizations), medications, alternative approaches to managing depression (massage, acupuncture), paid caregiving (homemaker, home health aide, and visiting nurse), and social services (meals, transportation, and social worker support). RESULTS: A total of 129 subjects were randomized (68 BTB, 61 wait-list control); the average age was 68.3 years, most were female (77.9%), not married (90.4%), not employed (92%), and had an average of 6.4 health conditions (range 1-19). In both groups, costs for health care use for depression and alternative approaches to managing depression were similar at baseline. Medication costs for BTB decreased from \$210 at baseline to \$159 at 4 months, whereas in the wait-list control group, medication costs remained roughly constant (\$186 at baseline and \$197 at 4 months). Both groups experienced a decrease in paid caregiving costs (\$69 in the BTB group vs. \$39 in the wait-list control group). The BTB group experienced an overall cost decrease of \$112 versus \$19 in the wait-list control group over the 4 months. CONCLUSIONS: Decreases in medication and caregiving costs resulted in a net lower cost in the BTB group during observation period. Larger scale translational studies are needed to understand the extent to which BTB influences specific types of costs.

MENTAL HEALTH - Patient-Reported Outcomes & Patient Preference Studies

USE OF A DECISION TREE MODEL TO ESTIMATE THE ECONOMIC BENEFITS OF REDUCING SCHIZOPHRENIA ILLNESS RELAPSE

<u>Furiak N</u><sup>1</sup>, Klein RW<sup>1</sup>, Gahn JC<sup>1</sup>, Camper SB<sup>2</sup>, Summers K<sup>3</sup>

<sup>1</sup>Medical Decision Modeling Inc., Indianapolis, IN, USA, <sup>2</sup>Endo Pharmaceuticals Inc., Chadds Ford,

PA, USA, <sup>3</sup>Endo Pharmaceuticals, Inc., Chadds Ford, PA, USA **OBJECTIVES:** To quantify the direct medical resources used and the corresponding burden of disease in the treatment of patients with schizophrenia. Because low-frequency administration (LFA) of risperidone guarantees adherence during treatment intervals and offers fewer opportunities to discontinue, adherence and persistence were assumed to improve, thereby reducing relapses of major symptoms. METHODS: A decision tree model including Markov processes with monthly cycles and a five-year maximum timeframe was constructed. Costs were adapted from the literature and discounted at a 3% annual rate. The population is a demographically homogeneous cohort of patients with schizophrenia, differentiated by initial