were cited by less than 10% of patients, with Tolerability being the lowest (0.93%).

Of the 58 people who participated in the second question, 72.4% agreed to accept the depot injection if indicated. Male patients were more likely to accept depot medication than female patients (75% vs. 69%).

This survey suggests that despite patient choice being promoted by user groups and government policy, many patients are still motivated to heed their doctor's advice. This may be particularly relevant when prescribing depot medications as shown by the number of patients willing to accept injections.

P0299

Atypical antipsychotics and their metabolic impact on psychiatrically hospitalized children and adolescents

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Objective: Atypical antipsychotic use in youth has increased. Adverse metabolic effects on weight, lipids, and glucose are evident in adults, but inadequately studied in youth. This report focuses on the metabolic effects of these agents in psychiatrically hospitalized youth.

Methods: Inpatient subjects were assessed at admission, 3 weeks, and discharge. Weight, body mass index, blood pressure, fasting glucose levels, high and low density lipoproteins (HDL and LDL, respectively), and triglycerides were measured.

Results: N=112 subjects, diagnosed as: Affective Disorders (26.4%), Disruptive Behavior Disorders (32.6%), Pervasive Development Disorders (9.3%), Psychotic Disorders (5.4%), and Others (26.3%). Ages ranged from 4-17 years. Patients received: risperidone (N=41), olanzapine (N=13), quetiapine (N= 15), aripiprazole (N=22), while 34 patients received no medication. Average length of hospital stay (LOS) was 55.9 days (1-289). For the sample as a whole, trends of statistical differences were noted in weight at the time of discharge (+3.79 lbs). Weight gain at discharge was significantly correlated with only olanzapine ($r=.553$, $p<0.0001$), multiple regression analysis controlling for LOS is also significant (Beta .558, $p < 0.0001$) for olanzapine. For the medication treated group, statistically significant increases in HDL are noted at three weeks (+ 5 mgs/dl, $p = 0.023$); at discharge the difference was not significant. A similar trend was observed for glucose. There was a statistical trend for decrease in triglycerides at 3 weeks (15 mg/dl, $p = 0.054$), discharge difference was non-significant (-9 mg/dl).

Conclusion: Certain agents may carry greater propensity for inducing certain metabolic changes, but further study is required.

P0300

Second generation antipsychotic medications induce type 2 diabete like syndrome by increasing hepatic glucose output and subsequently insulin secretion: Implications for mechanism of drug action

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Second generation antipsychotic drugs used to treat schizophrenia have been reported to induce weight gain and a Type-2 diabetes like syndrome in humans. Evidence indicates that these drugs induce this syndrome by promoting insulin resistance in peripheral tissues. However, supra-physiological levels of the drugs are required to cause this insulin resistance in model systems. Here we have investigated the effects of therapeutically relevant levels of 3 different antipsychotic medications (Haloperidol, Quetiapine and Clozapine) on glucose metabolism. We find that at these concentrations antipsychotic drugs do induce impaired glucose tolerance in rats which is associated with increased insulin secretion, but independent of weight gain (Clozapine>Quetiapine>Haloperidol). However, activation of Akt/PKB is normal and at these levels of drug there was no major effect on insulin action in fat cells. This suggested that the drugs were not inducing insulin resistance per se. Instead we show that the drugs stimulated hepatic glucose production, and the effect is at least in part mediated by a stimulation of glucagon secretion. We also find that the increased glucose production is responsible for increased insulin secretion and that blocking insulin secretion attenuates the activation of the enzyme Akt/protein kinase B in the hippocampus. This data provides new information on the mechanisms by which second generation antipsychotic drugs regulate glucose metabolism. Thus, the glucose production and the subsequent insulin release may form part of the therapeutic actions of the drugs by acting to restore defective Akt/PKB signalling that is associated with schizophrenia.

P0301

First- vs Second-generation antipsychotics in psychotic disorders: Efficacy and tolerability issues

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Objective: To compare the efficacy and tolerability of first- and second-generation antipsychotics (FGAs & SGAs, respectively) in the treatment of psychotic disorders.

Methods: PANSS scale was employed to measure disease severity and the efficacy of treatment. In all participants PANSS score was calculated on admission, before releasing the patient, and in case of any change in antipsychotic treatment schedule. Demographic data and comprehensive information on psychotropic medication status were collected for all patients.

Results: 377 patients (51,5% males) admitted to the Department of Old Age Psychiatry and Psychotic Disorders, Medical University of Lodz, have been recruited for the study. Eighty two percent of participants were suffering from schizophrenia. The average improvement in PANSS score amounted to 22,85%. The demographic and clinical characteristics of patients being prescribed FGA or SGA were comparable. No statistically significant differences in the efficacy of FGAs vs SGAs, as well as mono- vs polytherapy were observed. SGAs were better tolerated than FGAs. A higher initial severity of symptoms was the only predictor of a major, over 40% improvement in PANSS score. FGA and SGA therapies proved equally effective in generating such substantial decreases in symptoms' severity.

Conclusions: In our sample, the efficacy of FGAs and SGAs in the treatment of psychotic disorders was comparable. The tolerance of SGA therapy was better than for FGAs. Therapeutic success seems to be more dependent on adequate dosage than the class of an antipsychotic agent.

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P0302

Olanzapine in combination with aripiprazole for treatment of schizophrenia in breast cancer patients

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Background: Olanzapine and aripiprazole is effective, safe, and well tolerated for the positive and negative symptoms in schizophrenia. Hyperprolactinaemia is a frequent side-effect in the use of atypical antipsychotics. The endocrine and sexual side effects related to hyperprolactinaemia significantly impair in breast cancer patients.

Methods: The effect combination of a low doses olanzapine and aripiprazole were examined in a sample of 21 breast cancer patients who had the schizophrenia and olanzapine-induced hyperprolactinaemia. They were randomly assigned to experimental or control groups. They were interviewed by psychiatrists and tested using Positive and Negative Syndrome Scale (PANSS) at baseline and follow-up visits. Plasma prolactin level was assessed at baseline and at the end of the study. The patients of control group received olanzapine as their sole antipsychotic agent at a maximum dose of 5 mg once daily. The patients' experimental group received olanzapine at a maximum dose of 5 mg once daily in combination with aripiprazole at a maximum dose of 10 mg once daily.

Results: No differences between initial groups were identified. The results of our study suggest that after three weeks of schizophrenia treatment, 81,8% patients from the experimental group and 40% from the control group showed significant clinical improvement. At the end of weeks 3, serum prolactin levels were normalized (7.9+/-4.7 micrograms/L) in patients' experimental group.

Conclusion: These data show that combination of a low doses olanzapine and aripiprazole for treatment schizophrenia in breast cancer patients may result in enhanced antipsychotic efficacy while reducing adverse effects including olanzapine-induced hyperprolactinaemia.

P0303

Changes in the use of antipsychotics: Longitudinal data

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Naturalistic data on actual use of antipsychotics in different psychiatric settings are scarce. Following guidelines and recommendations an increase in the use of atypical antipsychotics should be anticipated and was confirmed in numerous studies. On the other hand various naturalistic reports have confirmed the ongoing use of typical antipsychotics from 20 to up to 80% in different countries. Since the actual prescription pattern can be influenced by legislation and insurance policies, Slovenia offers excellent place for the study of prescription patterns, since all registered antipsychotics are free for insured patients and there are no limits for psychiatrists to prescribe any single antipsychotic.

We have studied trends in prescribing antipsychotics in University Psychiatric Hospital from 1999 to 2006. Since the hospital covers almost half of the country and annually treats 3500 inpatients, our data are representative for inpatient situation in Slovenia. The data were collected retrospectively using computer records on the drug use.

The results show a systematic and solid decrease in the use of typical antipsychotics and increase in the use of atypicals. A 5-fold atypical/typical ratio increase was observed in acute psychiatric inpatients. A 3-fold decrease in the use of IM antipsychotics formulations was observed as well as the decrease in the use of depot formulations. Different trends were observed for newer antipsychotics generally their prescription rates follow the time on the market.

The observed changes can in part be explained by evidence-based knowledge although other issues might be important in prescribing patterns of antipsychotics.

P0304

Clozapine augmentation strategy in schizophrenia

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Since the introduction of the newer atypical antipsychotics (AA) in the nineties global antipsychotic market sales are dramatically increased. Over the period 1993-2003 a tenfold increase occurred that was paralleled by a decrease of prescribed conventional antipsychotics without, however, a clearly demonstrated improvement of efficacy. The prescription of clozapine remained more or less stable. Moreover, there was a threefold increase in the prescription rate of combination antipsychotics. Shortly after the introduction of the first AA, the prevalence of antipsychotic polypharmacy in patients with schizophrenia tripled suggesting inadequate efficacy or treatment resistance. Remarkably, the prescription of clozapine did not increase. These trends are reflected by the number of publications about the rationale for augmentation strategies in case of lack of responsiveness to clozapine.

Over the past decade about 40 open studies have been published in which clozapine was augmented with one of the AA's, particularly risperidone and (ami)sulpride. Of these cases reports, nearly all described a positive outcome. Seven controlled studies have been published using augmentation of clozapine with sulpiride (n=1), amisulpride (n=1), amisulpride and quetiapine (n=1) and risperidone (n=4), including 266 schizophrenic patients, partially unresponsive to clozapine in a dialy dose of 400-550 mg. In only 3 of these studies the plasma concentration of clozapine was measured that ranged from 400-800 μg/l. None of these studies showed a relevant improvement. In the study with sulpiride a response of 21 % was noted.

There is no database to conclude that augmentation of clozapine with AA's is clinically relevant.

P0305

Subjective experience of schizophrenic patients treated with antipsychotics: Clinical and pharmacological correlates

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Background and Aims: Subjective experience on antipsychotic drugs (APs) in schizophrenic patients has been the object of several recent studies and it has been connected to treatment adherence, quality of life and outcome. The current study was undertaken to investigate the role of clinical and socio-demographic

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