sions of the EQ-SD were assigned level 1 (no problems) as RLS was not considered to affect a patient’s basic care and mobility. For dimension with more than one mapped level, a rounded average was considered. Other dimensions were assumed to be captured by the IRLS instrument. Significant inverse correlation was reported between the changes in utility scores and the changes in IRLS sum scores ($p < 0.001$). The regression model explains 56% of the variance in the changes in the utility scores: change in utility score = 0.0049 - 0.0277*change in IRLS_sum_score. Similar results were found in the analyses for the changes from baseline to month 3. CONCLUSIONS: Changes in the EQ-SD derived utility scores can be reasonably estimated from the changes in the IRLS sum scores among patients with restless legs syndrome.

**PND24**

**CAN THE CHQ-PF50 BE USED TO MONITOR CHANGES IN BEHAVIORAL AND EMOTIONAL FUNCTIONING IN CHILDREN TREATED FOR EPILEPSY?**

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**OBJECTIVES:** To evaluate the appropriateness of the Child Health Questionnaire—Parent Form 50 (CHQ-PF50) in monitoring behavioral and emotional functioning in children with epilepsy treated with antiepileptic drugs (AEDs), by comparing and correlating it with the Child Behavior Checklist (CBCL).

**METHODS:** Clinical data from a double-blind placebo (PBO) controlled study of adjunctive therapy of levetiracetam (20–60 mg/kg/day) in children (4–16y) with partial onset seizures (POS), which included the CBCL and the CHQ-PF50 to assess behavioral and emotional functioning, were used. Pearson correlation coefficients between scores of the two instruments measuring similar concepts were calculated, and the two instruments were compared for item content, acceptability, reliability, validity and responsiveness to various factors. **RESULTS:** 78 patients had CHQ-PF50 and CBCL data at baseline and evaluation (12 weeks). Both questionnaires showed good acceptability in terms of return rates (81.6% at the lowest) and missing data (average/patient < 1%). All subscales except CHQ-PF50 General Health showed good reliability in terms of Crohnbach’s $\alpha$ ($r > 0.700$). All scores of the CHQ-PF50 measuring behavioral or emotional functioning (Behavior, Mental Health, Role/Social Limitations-Emotional/Behavioral and the Psychosocial Summary Score) showed large correlations with CBCL scores measuring similar concepts ($r = 0.821$ to $0.433$) at baseline but smaller correlations for change from baseline ($r = 0.470$ to $0.030$). CHQ-PF50 behavior-related scores seemed more responsive to the occurrence of behavioral adverse events than corresponding CBCL scores, although both showed limited sensitivity (small Standardized Response Means). The CBCL Externalizing score, however, appeared to be more sensitive when comparing treatment groups than the corresponding CHQ-PF50 Behavior score ($p = 0.011$ vs. $p = 0.871$ from ANCOVA). **CONCLUSIONS:** The CHQ-PF50 scores assessing behavioral and emotional functioning have shown good reliability, validity, and high consistency with the corresponding CBCL scores. However, the behavior score of the CHQ-PF50 appeared to be less sensitive in showing between-treatment group differences than the more specific and comprehensive Externalizing score of the CBCL.

**PND25**

**EVALUATION OF A BRIEF DEMENTIA SCREENING TEST FOR PARKINSON’S DISEASE (PD-BDST) IN A CLINICAL PRACTICE SETTING**

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**OBJECTIVES:** To evaluate patient and physician satisfaction with the use of a Brief Dementia Screening test for Parkinson’s disease (PD-BDST) in a clinical practice setting. **METHODS:** An observational, cross-sectional and multicenter study was conducted, including 471 PD patients. The PD-BDST and Mini-Mental State Examination (MMSE) were administered to patients. A patient satisfaction questionnaire rated with a visual scale from 0 to 10 was used to assess patient satisfaction. Physician satisfaction (n = 52) was measured using a satisfaction questionnaire rated with a Likert scale from 0 to 5. **RESULTS:** The mean PD-BDST score (±SD) was 18.5 ± 6.3, and 36.3% of patients presented scores compatible with dementia (PD-BDST score ≤ 15 points). There was a high correlation between the score of the Mini-Mental test (29.05 ± 5.4) and the PD-BDST scores ($r = 0.73$, $p < 0.001$). Mean satisfaction scores for patients and physician were 27.6 ± 7.4 and 3.60 ± 0.58, respectively. A total of 37.7% of patients reported not having any trouble completing the test, and 22.6% expressed difficulties in only one part of the test. The proportion of satisfied patients was 77.3%. Patients with the least risk of poor satisfaction were those with a PD-BDST higher score ($OR = 0.9$) and those reporting less difficulties completing the test ($OR = 0.8$). More than half of physicians presented a score higher than 3.73. The mean scores for PD-BDST applicability, handling and reliability of physicians were $3.3 ± 0.7$, $3.7 ± 0.6$ and $3.1 ± 0.5$. **CONCLUSIONS:** Previous studies have shown the PD-BDST to be a specific test to diagnose PD-related dementia able to distinguish between healthy controls, non-demented PD and demented PD. In the present study, PD patients found the PD-BDST satisfactory. Participating investigators considered the test to be valid, quick and simple to administer in a clinical practice setting.

**PND26**

**ARE THERE DIFFERENCES IN PATIENT SATISFACTION WITH INSOMNIA MEDICATIONS? PILOT RESULTS FROM A NOVEL REGISTRY**

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**OBJECTIVES:** Insomnia is prevalent in many populations, both as a primary disorder and as a symptom secondary to a medication or underlying condition. The objective of this study was to assess patient satisfaction with a variety of insomnia medications used in a community-based population in the U.S. **METHODS:** Patients are recruited from multiple sources including physician, pharmacy and online referrals and asked to report ongoing medications on the project website (www.iGuard.org). A random sample of patients are contacted to complete the Treatment Satisfaction Questionnaire for Medication Version 1.4 (TSQM), a 14-item reliable and valid instrument to assess patients’ satisfaction with medication, providing scores on four scales—effectiveness, side effects, convenience and global satisfaction. TSQM scores range from 0 to 100, with higher scores indicating higher satisfaction on the domain. Analyses were conducted to explore differences in patient satisfaction across insomnia medications. **RESULTS:** A total of
239 patients on eight different insomnia medications were included: alprazolam (30), amitriptyline (33), eszopiclone (30), melatonin (30), quetiapine (30), temazepam (27), trazodone (30) and zolpidem (29). The mean age (SD) of the patients was 49.3 years (SD = 11.8): 78.2% were female, 68.6% Caucasian, 23.0% Hispanic and 2.9% Black. The TSQM domains had good internal consistency, with Cronbach’s alpha for all domains exceeding 0.83. After adjusting for patient age, race, gender, self-reported severity and Bonferroni correction for multiple comparisons, patients on products for secondary insomnia expressed lower TSQM scores than patients on products for primary insomnia. Some differences were also observed when comparing TSQM scores for individual medication with the mean score from all patients. For example, patients on amitriptyline had a significantly lower score on effectiveness (p = 0.044) while patients on quetiapine had a significantly lower score on side effects (p = 0.0005). CONCLUSIONS: When selecting an insomnia medication, clinicians should consider the patient’s underlying condition as well as differences in patient satisfaction with insomnia medications.

NEUROLOGICAL DISORDERS—Health Care Use & Policy Studies

UTILIZATION PATTERNS OF ANTI-EPILEPTIC DRUGS: AN ITALIAN PRESCRIPTION DATABASE ANALYSIS

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OBJECTIVES: To assess the Antiepileptic Drugs (AED) usage and the prevalence of AED users in Campania, a region of approximately 5.8 million inhabitants in the south of Italy during the years 2005–2006. METHODS: We collected, from an electronic research database, all prescriptions for AEDs reimbursed in the years 2005–2006 in 8 local-health-authorities (70% of the overall population) of Campania. We calculated the number of subjects receiving more than a single AED prescription, to estimate the annual prevalence of AED users. Therefore we excluded users of morphine-like analogics (ATC-code N02A). Annual prevalence of AED use was assessed in the entire sample, stratified by drug type and age group. RESULTS: We identified 107,959 subjects. The estimated crude 1-year prevalence of AED use increased from 16.6/1000 in 2005 to 19.5/1000 in 2006 (54.4% female) in 2006. Prevalence increased with age for both genders. Prevalence of AED use increased from 5.9/1000 in 2005 to 8.7/1000 in 2006 for ‘new’ AEDs while was stable for ‘old’ AEDs (8.4/1000 in 2005, 8.2/1000 in 2006), excluding association between old-new and switchers. The most frequent regimens were all monotherapy: phenobarbital, gabapentin, valproic acid, carbamazepina, lamotrigina were the most common AED in monotherapy in 2005, pregabalin became first in 2006 when gabapentin went off-patent. CONCLUSIONS: The results of the study indicate an increasing prevalence of AED use with special reference to ‘newer’ compounds. The increase is mainly due to pregabalin, marketed in the end of 2004 with indications for epilepsy and neuropathic pain. Excluding pregabalin and gabapentin, commonly used for the treatment of neuropathic pain, older AEDs are the most frequent regimens. Probably older AEDs remain the first line treatment for epileptic disorders. This claim is in accordance with a previous study conducted in Italy from a General-Practitioners database (Savica et al., European Journal of Neurology, 2007).

TRENDS IN RESEARCH INTO CENTRAL NERVOUS SYSTEM DISORDERS: THE INFLUENCE OF AN AGING POPULATION

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OBJECTIVES: One of the consequences of an aging population is the emerging importance of genetically-linked disorders which develop in later life. Many of these disorders affect the central nervous system and result in progressive degeneration of higher functions and dementia. This research expands on observations described in a previous presentation (PNC53, ISPOR 2008) concerning the influence of genetic discoveries on the number of probable RCTs in Alzheimer’s disease (AD) and Huntington’s disease (HD) to explore other measures of interest. METHODS: A citation search was conducted in Medline for the years 1951 to 2005 (5-yearly time periods), Search filters for RCTs, economic studies (ES), and observational studies (OS) (www.sign.ac.uk/methodology/filters.html) combined with search strings incorporating the MeSH terms for each disorder were run to provide an estimate of interest in these disorders. The x-fold increases (2001–2005/1976–1980) were calculated and the data were analysed using logistic regression. RESULTS: There were 12,820,265 publications during 1951 to 2005, with 57,466 relating to AD and 8304 relating to HD. Over the past 30 years the interest in AD has been increasing, with 62-fold increases in the number of papers published within this disease area. In contrast, during the same time period publications in HD showed only a 4-fold increase. This disparity is particularly notable for probable RCTs, where there were 405-fold increases in AD but only 5-fold increases in HD. Interestingly the interest in AD predates the identification of several genetic linkages that occurred in the late 1990’s. Conversely, the discovery of huntingtin in 1993 appears to have had little effect on interest in HD. CONCLUSIONS: Improvements and advances in sanitation, nutrition and immunisation against infectious diseases have combined with other factors to reduce mortality and prolong life expectancies. One of the most important consequences of increased life expectancy is the emergence of genetically linked disorders which develop in later life. Discovery of genetic linkage does not appear to be a strong predictor of research activity, in the case of AD and HD.

EFFICIENCY PROFILE IN THE NEUROLOGICAL REFERRALS: EFFECTUATE REFERENCE SPECIALISTS: USE CASE-MIX SYSTEM ADJUSTED CLINICAL GROUPS

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OBJECTIVES: To determine the general referral and neurological rate per center and the adjusted efficiency indexes, through the retrospective implementation of the Adjusted Clinical Groups (ACG) in a primary care setting. METHODS: Design multicenter-retrospective study. Attended patients by five primary care teams (PCT) during the year 2006 were included. The main measurements were general parameters, age, gender, dependent (visits and episodes) and morbidity of each patient relative to each ACG. The referral rate was defined as the quotient between the number of referrals and the visits made. Efficiency Index (EI) was established dividing the observed by the expected referrals obtained by indirect standardization. Statistical significance: p < 0.05. RESULTS: Studied patients 80775 (use: 72.4%), 4.8 ± 3.5 episodes and 7.9 ± 8.2 visits/patient/year. Percentage of visits with a referral was 9.0% (confidence interval [CI]: 8.8–9.2); age: 44.8 ± 22.8 years (women: 54.6%).