

PPM5

COMPARISON OF COSTS AND COST-EFFECTIVENESS OF OXCARBAZEPINE AND SODIUM VALPROATE FOR NEW/RECENT ONSET PARTIAL SEIZURES

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OBJECTIVE: to determine the comparative costs and cost-effectiveness of oxcarbazepine and sodium valproate in the treatment of new and recent onset partial epileptic seizures. **METHODS:** Low, moderate and high dose maintenance regimens were determined for each drug based upon prescription audit information captured in the prescribing physician's office. Unit drug costs based on wholesale acquisition costs were then used to compute a daily drug cost for each dosage level. A decision-analysis model using a Monte Carlo simulation was developed to evaluate the cost-effectiveness of oxcarbazepine and sodium valproate. The model contained the computed daily drug costs along with direct payer costs associated with initiation and maintenance of therapy, treatment of adverse events and switching from one drug to another due to poor seizure control or adverse events. The probabilities of maintaining seizure control and of experiencing adverse events were obtained from double-blind clinical trials comparing oxcarbazepine and sodium valproate. **RESULTS:** The average daily drug costs weighted over the three dosage levels were \$4.72 (\$1.49 to \$7.66) for oxcarbazepine and \$3.17 (\$2.45 to \$3.87) for sodium valproate. Total one year costs for oxcarbazepine, including costs of adverse events and costs of switching drugs due to poor seizure control or adverse events were \$3,511 for oxcarbazepine and \$5,931 for sodium valproate. The computed number of months on initial therapy was 9.95 for oxcarbazepine and 9.66 for sodium valproate. The analysis was carried out to four years using the same probabilities for adverse events and seizure control. The four-year costs were \$17,949 and \$23,144 with 25.8 and 24.3 months of therapy for oxcarbazepine and sodium valproate respectively. **CONCLUSION:** These findings suggest that oxcarbazepine results in lower expected total costs compared to sodium valproate when drug costs, evaluation and management, adverse events and costs of switching therapies are taken into account.

PPM6

VALIDATION OF THE 24 HOUR HEADACHE DISABILITY QUESTIONNAIRE (DISQ-24) IN A SAMPLE OF HEADACHE SUFFERERS

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OBJECTIVES: The Disq-24 was developed to measure headache disability on a 24-hour basis and was first utilized in a sample of migraine subjects who experienced

chronic daily headaches. The purpose of this study was to evaluate this instrument's psychometric properties. **METHODS:** The Disq-24 is a 14-item questionnaire with a 6-point Likert-type scale that measures disability with regards to three hypothesized dimensions: family/social (4-item), work activities (5-item), and emotions/feelings (5-item). This instrument was administered in a prospective, multicenter, randomized, double-blind, placebo-controlled, parallel group trial of 170 transformed migraine sufferers. Four scaling assumptions of summated rating scales (equal variances, equal weights, item-internal consistency and discriminant validity) and scale-level reliability were examined using the baseline data. **RESULTS:** The means and standard deviations of items within each scale were similar. However, item evaluation demonstrated a floor effect in all items ranging from 22% to 66%. Item internal consistency was generally high and ranged from 0.62 to 0.90. Cronbach's alpha ranged from 0.93 to 0.95 for the three dimensions and was 0.97 for the total score, exceeding the generally acceptable criteria of 0.70. Although each item was highly correlated with the hypothesized scale, the item-scale correlations did not discriminate significantly with other scales. **CONCLUSIONS:** Although the Disq-24 satisfied the equal variance, equal weights, and internal consistency assumptions of summated rating scales, item discriminant validity was not supported in the above analysis. This lack of support could be due to the small sample size and/or the existence of a unidimensional structure. The validity of the instrument warrants further testing in a headache population which is not restricted to chronic daily headache patients.

PPM7

A MODEL FOR PREDICTING THE INCIDENCE OF MIGRAINE IN THE IDAHO MEDICAID POPULATION

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BACKGROUND: Migraine headache affects approximately 9 million Americans. It is a chronic disease and is often associated with a high rate of disability. **OBJECTIVE:** The purpose of this research was to develop a model for predicting the incident number of migraine cases in the Idaho Medicaid population over a 5-year period. **METHODS:** Incident migraine cases between January 1994 and December 1998 were identified from the Idaho Medicaid claims database using migraine-specific ICD-9-CM codes or migraine-specific pharmacy claims. Data were collected on the total number of new migraine cases according to age, race, gender, and year. A negative binomial model was developed to predict incident migraine cases from the other variables. All model independent variables were treated as categorical variables. Two hundred sixty-six Medicaid recipients between the ages of 5 and 104 were included in the analysis. **RESULTS:** A test for