VALPROATE-INDUCED REPRODUCTIVE DISORDERS

The relation of antiepileptic therapy to the occurrence of reproductive endocrine disorders in 238 women with epilepsy has been studied at the University Hospital, Oulu, Finland. Age ranged from 18 to 45 years (mean, 33 yrs); the mean duration of therapy was 9 years. Menstrual disturbances occurring in 20% of patients were unrelated to the type of epilepsy but were significantly more frequent in those treated with valproate alone than in patients receiving other AEDs. Polycystic ovaries and elevated serum testosterone concentrations were found in the majority of women who were taking valproate and especially in those beginning treatment in adolescence; 80% receiving valproate before age 20 years were affected, compared to 27% of women treated with other AEDs. (Isojarvi JIT et al. Polycystic ovaries and hyperandrogenism in women taking valproate for epilepsy. N Engl J Med Nov 4 1993;329:1383-8). (Reprints: Dr Isojarvi, Dept of Neurology, University of Oulu, SF-90220 Oulu, Finland).

COMMENT. Polycystic ovaries, hyperandrogenism, obesity, menstrual disturbances, and hirsutism, characteristic findings of the polycystic ovary syndrome, may be secondary to valproate therapy for epilepsy. Women who begin treatment in adolescence are especially at risk. The authors voice concern regarding the use of valproate in adolescent and young women with epilepsy, and alternative antiepileptic medications should be selected for female patients in these age groups when possible.

Impaired fatty acid oxidation in 12 children taking valproic acid and at low risk for hepatotoxicity (>2 years of age and monotherapy) is reported from the University of Chicago (Kossak BD et al. Neurology Nov 1993;43:2362-8). The valproate-induced metabolic abnormalities resembled those found in inborn errors of mitochondrial B-oxidation and were not corrected by L-carnitine supplementation. These findings refute the hypothesis of "carnitine insufficiency" as the cause of valproate hepatotoxicity, and the routine supplements of carnitine in patients taking valproate are not advised.

VON HIPPEL-LINDAU DISEASE AND PHEOCHROMOCYTOMA

Nineteen percent of 82 unselected patients with pheochromocytoma studied at the University of Freiburg, Germany, and the University of California, San Diego, were found to be gene carriers of von Hippel-Lindau disease. Thirty-eight percent of carriers of von-Hippel-Lindau disease had pheochromocytoma as the only manifestation of their syndrome. In 12 of 14 families with von Hippel-Lindau disease, pheochromocytoma, retinal angiomatosis, and hemangioblastoma of the central nervous system occurred in the absence of renal, pancreatic, and epididymal lesions, which suggests a