Abstract


Vitamins and sleep: an exploratory study.


The University of Alabama, Department of Psychology, Sleep Research Project, Box 870348, Tuscaloosa, AL 35487-0348, USA.

STUDY OBJECTIVE: We analyzed archival data from an epidemiology study to test the association between vitamin use and sleep.

DESIGN: Random digit dialing was used to recruit 772 people ranging in age from 20 to 98 for a study of people's sleep experience. These individuals completed a set of questionnaires about their sleep, health, and daytime functioning. Five hundred and nineteen of these participants had available vitamin use data.

SETTING: Home.

PARTICIPANTS: Five hundred and nineteen people participated. Recruitment applied minimal screening criteria and no attempt was made to favor people with or without sleep disturbance.

INTERVENTIONS: This survey included no intervention. Participants completed 2 weeks of sleep diaries and a set of questionnaires. Of particular salience to the present study, participants reported their vitamin use in listing all medications and nutritional supplements being used currently.

MEASUREMENTS AND RESULTS: For those individuals taking a multivitamin or multiple single vitamins, sleep diaries revealed poorer sleep compared to non-vitamin users in the number and duration of awakenings during the night. After controlling for age, ethnicity, and sex the difference in number of awakenings was still marginally significant. The rate of insomnia, conservatively defined, and consumption of sleep medication were also marginally significantly higher among individuals taking multi-/multiple vitamins compared to those not taking vitamins.

CONCLUSIONS: Disturbed sleep maintenance was associated with multi-/multiple vitamin use. Five equally plausible explanations were advanced to explain this association including vitamins cause poor sleep, poor sleepers seek vitamins, and unidentified factors promote both poor sleep and vitamin use. These data are considered preliminary. Methodological characteristics of future studies were described that hold the promise of more clearly illuminating the association between vitamins and sleep.

PMID: 17825610

FREE FULL TEXT