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FOLATE INTAKE AND THE RISK OF PANCREATIC CANCER IN COHORTS OF U.S. MEN AND WOMEN. *H.G. Skinner, D.S. Michaud, E.L. Giovannucci, E.B. Rimm,M.J. Stampfer, W.C. Willett, G.A. Colditz, and C.S. Fuchs. (Harvard University, Boston, MA, 02115)

Pancreatic cancer is the fourth leading cause of cancer deaths among men and women in the United States. Epidemiologic and laboratory data suggest that increased folate consumption may protect against various cancers. We examined the relationship of dietary folate intake to the risk of pancreatic cancer in two large prospective cohorts. Information on folate intake was assessed by food frequency questionnaire in 1984 in women and 1986 in men. Multivariate relative hazards were adjusted for age, time period, energy intake, cigarette smoking, body-mass index, diabetes, and height. During 24 years of follow-up, 301 incident cases of pancreatic cancer were identified in both cohorts. Compared to men consuming <300mg/day, the relative hazards of pancreatic cancer for increasing categories of total energy-adjusted folate intake were 1.15, 1.09, and 0.96 (95% CI 0.62, 1.48; P_{trend} = 0.56). Among women, compared to folate intake <200mg, the relative hazards for increasing categories of total energy-adjusted folate were 1.09, 1.02, and 1.15 (95% CI 0.65, 2.03; P_{trend}= 0.66). There was no significant interaction between folate and dietary methionine or alcohol consumption. Data from these two large prospective cohorts do not support an association between total energy-adjusted folate intake and the risk of pancreatic cancer.

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COMPARISON OF RISK FACTORS FOR COLON AND RECTAL CANCER. *E. K. Wei, E. Giovannucci, K. Wu, B. Rosner, C. S. Fuchs, W. C. Willett, and G. A. Colditz (Harvard University, Boston, MA 02115)

Predictors of colorectal cancer have been extensively studied, and some evidence suggests that risk associated with these risk factors may vary by subsite within the large bowel. Therefore, using data from two large prospective cohort studies, we examined previously established risk factors to determine whether they were differentially associated with colon and rectal cancer. Our study population included 87,203 women from the Nurses' Health Study (NHS) and 46,704 men from the Health Professionals Follow Up Study (HPFS). All exposure information was collected via biennial questionnaires, except for dietary variables that were collected every 4 years. During the follow-up period (NHS: 1980 to May 31,1998; HPFS: 1986 to January 31, 1998), we identified a total of 984 cases of colon cancer and 299 cases of rectal cancer. We used pooled logistic regression to estimate multivariate relative risks for the two outcomes separately. Then we used polytomous logistic regression to compare these estimates. In the combined cohort, age, gender, family history of colon or rectal cancer, height, body mass index, physical activity, intake of processed meat, and alcohol were significantly associated with colon cancer risk. However, only age, gender, and pack-years smoked before age 30 were associated with rectal cancer. In a stepwise polytomous logistic regression procedure, family history, physical activity, and height were associated with significantly different relative risks of colon and rectal cancer. Our findings support previous suggestions that family history, physical activity and height are not strong contributors to the etiology of rectal cancer.

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OBESITY AND RISK OF BILIARY TRACT CANCERS. *L. Sakoda, Y-T. Gao, A. Rashid, J. Deng, M-C. Shen, T-Q. Han, B-S. Wang, M. Althuis, J.F. Fraumeni Jr., and A.W. Hsing (Division of Cancer Epidemiology & Genetics, National Cancer Institute, Bethesda, MD 20892)

Except for a consistent link with gallstones, little is known about the etiology of biliary tract cancers, which encompass tumors of the gallbladder (GB), extrahepatic bile ducts (EBD), and ampulla of Vater (AV). To clarify the role of obesity, we evaluated the effects of body mass index (BMI, kg/m^2), derived from self-report of height and weight at various points in time – at ages 20–29, 30–39, 40–49, 50–59, and 5 years prior to study entry – for each tumor subsite. Conducted in Shanghai, China, where incidence of these malignancies has doubled in recent years, our population-based case-control study included 662 cases (389 GB, 200 EBD, and 73 AV) newly diagnosed with primary biliary tract cancers during 1997–2001 and 959 controls randomly selected from the general population and frequency-matched to cases on age and gender. The mean usual adult BMI was 23.1 kg/m^2. Obesity (established cutpoint for Asians, ≥ 25 kg/m^2) was associated with excess risk of GB cancer across adulthood in both men and women, with the highest risk seen for being obese at ages 20–29 (odds ratio = 2.2, 95% confidence interval: 1.1, 4.3; p_{trend}<0.001); even among cases without gallstones (n = 77), obesity remained a risk factor. Increasing BMI over time was also related to excess GB cancer risk. Yet, no discernable patterns associated with obesity were observed for EBD and AV cancers. Our results suggest that obesity, especially in early adult life, may confer substantial risk for GB cancer and that an increasing prevalence of obesity in China may contribute to the rising incidence of GB cancer in this population.

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NEIGHBORHOOD CONDITIONS AND WALKING BEHAVIOR. *J.L. Balfour, C.F. Mendes de Leon, J.L. Bienias, P.A. Scherr, and D.A. Evans (University of Michigan, Ann Arbor, MI, 48104)

Neighborhood socioeconomic context (SC) is associated with disease and disability in older adults. One explanation is that neighborhood conditions in low SC areas limit health-maintaining activities. This study examines the cross-sectional association between neighborhood conditions and walking behavior in a population-based study of 2155 adults aged 65 years and over living in 81 adjacent census block groups (BGs) in Chicago. Walking behavior was measured as the natural log of minutes walked for exercise and for other reasons (e.g. errands) in the past two weeks. Reported frequencies of 15 neighborhood characteristics (e.g. sidewalk problems, vandalism, and neighbors talking) were summed into three scales: physical infrastructure problems, safety concerns, and positive neighboring. Contextual neighborhood measures were created by aggregating scales to obtain BG-specific means. Hierarchical linear regression models of walking behavior on each contextual neighborhood measure were adjusted for age, gender, and education. Residence in a BG with higher levels of infrastructure problems or higher levels of safety concerns was associated with significantly lower walking behavior (β_{infra}=-0.18, p<0.001; β_{safety}=-0.32, p<0.001). After adjustment, positive neighboring was not significantly associated with walking. Contextual neighborhood measures showed stronger associations with walking than did individual-level neighborhood measures. This study is among the first to show empirical evidence of contextual influences on a health behavior of substantial importance to older adults. If replicated, such results may have important public policy consequences.