

Major dietary patterns and the risk of colorectal cancer in women.

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BACKGROUND: Several foods and nutrients have been implicated in the development of colon and rectal cancers. In this study, we prospectively assessed the associations between major dietary patterns and the risks of these 2 cancers in women. **METHODS:** Using dietary information collected in 1984, 1986, 1990, and 1994 from 76 402 women aged 38 to 63 years without a history of cancer in 1984, we conducted factor analysis and identified 2 major dietary patterns: "prudent" and "Western." We calculated factor scores for each participant and examined prospectively the associations between dietary patterns and colon and rectal cancer risks. **RESULTS:** The prudent pattern was characterized by higher intakes of fruits, vegetables, legumes, fish, poultry, and whole grains, while the Western pattern, by higher intakes of red and processed meats, sweets and desserts, french fries, and refined grains. During 12 years of follow-up, we identified 445 cases of colon cancer and 101 cases of rectal cancer. After adjusting for potential confounders, we observed a relative risk for colon cancer of 1.46 (95% confidence interval, 0.97-2.19) when comparing the highest with the lowest quintiles of the Western pattern (P value for trend across quintiles, .02). The prudent pattern had a nonsignificant inverse association with colon cancer (relative risk for fifth quintile compared with the first, 0.71; 95% confidence interval, 0.50-1.00; P for trend across quintiles, .31). We did not observe any significant association between dietary patterns and rectal cancer. **CONCLUSION:** We found a significant positive association between the Western dietary pattern and the risk of colon cancer.

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