

TRENDS IN CANCER MORTALITY IN CENTRAL EUROPEAN COUNTRIES: THE EFFECT OF AGE, BIRTH COHORT AND TIME-PERIOD.
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Cancer mortality and population data for males and females in countries of Central Europe have been obtained from the World Health Organisation Mortality Database and analysed using age-period-cohort models. Data are available over at least twenty years and have been analysed for the following sites: cancers of upper aero-digestive tract (oral, oesophagus, larynx, lung); gastro-intestinal cancers (stomach and colo-rectum); female breast cancer, prostate, bladder cancer and all cancer sites together excluding non melanoma skin cancer. Birth-cohort and time-period effects are presented graphically. The group of eastern countries show consistent and continued increases in male lung cancer risk in contrast to neighbouring western countries, where after increases in older cohorts, the risk has stabilised or gone down in male cohorts born after around 1910. Steady and continuous increases have been observed in general also for women in both groups of countries. All tobacco- and alcohol- related cancers demonstrate very similar patterns: an initial decrease in cohort effect with a subsequent increase in more recently born cohorts. While all the countries considered demonstrate continuing decreases for both sexes in stomach cancer risk, cohort-based increases have been observed in eastern countries for colo-rectal cancer, prostatic and breast cancers. These data show the magnitude of increasing mortality from tobacco and alcohol related cancers in Central Europe and emphasise the importance and potential of Public Health measures to attempt to prevent such death rates continuing to rise.

10-YEAR SURVIVAL FROM CANCER IN UMBRIA, ITALY.

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In the 1978-1982 period, an "ad hoc" survey was carried-out on the aim to collect the data on cancer cases occurred in the Umbria region of Italy. 14,531 incident cases excluding epitheliomas (7792 males and 6739 females) were registered. For each case name and surname, age and sex, address, municipality of birth and of residence, year of diagnosis, cancer site (ICD IX) were recorded.

Now the authors are studying the ten-year survival rate. The follow-up is carrying-out by examination of:
 1) the Death Registries in the several municipalities (1978-1987 period), 2) the regional Registry of mortality (RENCAM, 1988-1993 period) and 3) the regional List of people covered by the National Health Service (at 12.31.1993).

The migrant cases are single out in the new residence municipality.

The preliminary data show, in males, a ten-year survival crude rate close to .10 for lung and gastric cancer, to .20 for prostate cancer and to .25 for colorectal one. In females the survival rate relative to breast and cervix cancer is about .50, whereas those for gastric and lung cancer are similar to those of males.

IN BREAST TISSUES, SOMATOSTATIN-14 RECEPTOR RATIO : 57 kD / 42kD IS INDEPENDENT OF PREVIOUS DESCRIBED TUMOUR MARKERS

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The *in vitro* cross-linking assay performed with total proteins from surgical breast biopsies of benign and malignant tumours (n=150) and the iodinated peptide $^{125}\text{I-Tyr}^{11}$ -somatostatin-14 shows two major specific complexes characterized by their molecular weights : 57 kD and 42 kD. Estrogen receptors, progesterone receptors, cathepsin D and the protein-products of the genes *PS2* and *NEU* were also measured. The densitometric ratio of 57 kD / 42 kD was compared to the other parameters by the principal components analysis. This ratio was not correlated with the above established breast cancer prognostic factors. This absence of correlation suggests that the ratio of complexes might provide independent informations of prognostic value.

MILK INTAKE AND BREAST CANCER INCIDENCE. Knekt P., Järvinen R., Seppänen R., Aromaa A., Maatela J., Hakulinen T., Teppo L. Social Insurance Institution, Finland, University of Kuopio, Finland, Finnish Cancer Registry, Karolinska University Hospital, Sweden.

Milk products have been suggested to have protective effect against cancer. In the present study the relationship between intake of dairy products and the incidence of breast cancer was studied among 3,988 initially cancer-free women, aged 20-69 years. Intakes of different dairy products were calculated from dietary history interviews. During a 20 year follow-up 54 breast cancer cases were diagnosed. Age-adjusted mean daily intake of milk was 664 g among breast cancer cases and 744 g among noncases. There was a significant inverse gradient between milk intake and occurrence of breast cancer, the relative risk being 0.35 (95% confidence interval = 0.16-0.73) between the lowest and highest tertiles of milk consumption. The associations in respect to other milk products were not significant. With the exception of lactose, nutrients provided by milk were not associated with breast cancer incidence, but considerable differences were found for food intake patterns in different milk categories. Adjustment for potential confounding factors (age, smoking, body mass index, parity, menopausal status, occupation, and geographical area) resulted only in a minor change to the milk intake/breast cancer relationship. Neither adjustment for intake of different food-stuffs and nutrients associated with milk consumption (e.g., energy, carbohydrates, protein, fatty acids, vitamins, and trace elements) altered the results. Our data suggests that there is a protective effect, dietary or habitational, associated with consumption of milk overwhelming the associations between different factors and risk of breast cancer.

RESPONSE TO ONCOLOGIC EPIDEMIOLOGICAL QUESTIONS IN UNDERGRADUATE MEDICAL STUDENTS.

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We have analyzed the responses of undergraduate medical students to questions about epidemiological data of oncology. Several questions were asked to 112 medical students to know the level of knowledge about different epidemiological aspects of neoplasms. So, answers to the "most frequent" cancer in men were: lung (83%), colorectal (9%); in women: breast (97,3%); and in both sexes: colorectal (47%), lung (28%), stomach (6%) and others (11%). The opinion about some cancer in decreasing mortality rate was: stomach (32%), breast (12%), cervix (9%), colorectal (3,5%) and others (10,5%).

rate of curability of cancer were asked to medical students. No defined opinion was answered in 10 % of students. Curability in a rate higher than 50 % was signaled by 19 % of students. A curability rate no more than 20 % was thinking in 30 % of students. Percentage of 28 % are able to signal that 20 to 40 % of cancer patients are curable.

Our results about knowledge in epidemiology of cancer in undergraduate medical students should be useful to establish areas of major objectives in cancer education.

LONG-TERM EVALUATION OF THE FIVE-DAY PLAN TO STOP SMOKING (FDP) IN NORTHEASTERN ITALY. Serraino D., Tassan M., Talamini R. and Franceschi S.

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This study was aimed at evaluating the efficacy of the FDP to help smokers to give up the habit and to identify the characteristics of those smokers who succeeded in quitting.

545 smokers (363 men, mean age 41 years, and 182 women, mean age 37 years) who participated in 8 courses of the FDP, held in northeastern Italy between October 1985 and April 1988, constituted the study group. They were followed up from 28 to 70 months after their participation in the FDP.

Overall, 18% of the 545 participants relapsed to cigarette smoking within 1 month after attendance of the course, 44% within 1 year and 59% after 5 years. Higher rates of relapse were recorded among women than among men (55% and 39% after 1 year, respectively, $p < 0.001$). Among men, older age and heavy smoking were significantly associated with a reduced probability of relapsing. Among women, a high level of education was the only significant predictor of smoking relapse.

These data indicate that the FDP is useful in helping smokers who are already predisposed to quit their habit, but its efficacy seems to be largely restricted to men, in particular to older and heavier smokers.