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## Letters

### Determining cancer causes

"Non-smoking-related cancers on rise" (SN: 2/12/94, p.102) raised a question in my mind about the methodology used by the authors. Essentially, they attempted to adjust for the effects of smoking by dividing the data into smoking-related cancers and non-smoking-related cancers. They defined smoking-related cancers as those of the mouth, larynx, lung, pharynx, and esophagus. All other cancers were defined as non-smoking-related. This methodology places smokers in both groups and is a valid approach only if smoking is not associated with any other forms of cancer.

I read in the Feb. 14 TIME a summary of a survey of 170,000 people that showed "smokers have up to twice the risk of developing colon cancer as non-smokers." How can these two studies both be valid?

This also raises the possibility that other "non-smoking-related" cancers may be related to smoking. Assuming the data were

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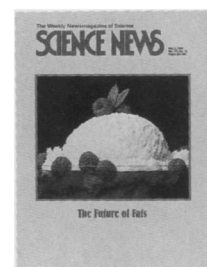
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available, shouldn't the authors have at least "checked" their results by also dividing their data into strictly smoking and nonsmoking categories and determining whether the results were similar?

Joseph R. Visalli  
Schodack, N.Y.

Say Debra Lee Davis and her team: "The category of smoking-related cancers we used included all cases of lung cancer and oral cancers, although not all of these cases are smoking-related. Because the National Cancer Institute data we analyzed do not include information on smoking, we could not divide the data in smoking and nonsmoking categories to develop more precise estimates of the fractions of various cancers associated with smoking.

"New cases of non-smoking-related cancer have increased steadily over this century in successive birth cohorts. Those with the greatest increase in non-smoking-related cancer, namely, men of the Baby Boom generation, have neither lived nor smoked long enough to develop smok-

ing-related colorectal cancer, which has been found in one recent study to be elevated only in men who had smoked 40 years or more."

— J.A. Raloff

### Gene patents: Patently absurd?

Mr. Daly would grant patent rights to scientists and researchers who identify genetic fragments because they spent a lot of time and money investigating them ("Righting patent wrongs?" SN: 2/19/94, p.115). This is rubbish. It would be like granting James Watt a patent on the concept of steam or allowing Isaac Newton to patent gravity.

Kenneth Mitchell  
Citrus Heights, Calif.

### CORRECTION

In "Scrambled Earth" (SN: 4/9/94, p.235), the article refers to relatively cool mantle rocks slowing down seismic waves. It should have said that cooler rocks speed up seismic waves.

MAY 7, 1994

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