
DES blamed for mothers' cancers

In any evaluation of the benefits versus the risks of recent drugs, DES must rate rock bottom. Not only did it not prevent miscarriages, the purpose for which it was prescribed, it caused vaginal and cervical cancer in daughters and birth defects in sons. Although DES has not been widely prescribed for about six years, problems are still emerging. A current study suggests that DES (diethylstilbesterol) has increased the risk of breast cancer and other hormone-related cancers in the women who took it.

Investigators at the University of Chicago are doing a follow-up study on women who participated in an experiment with DES between 1950 and 1952. A progress report, including results thus far, was obtained by Ralph Nader's Public Citizen Litigation Group through the Freedom of Information Act. Attorneys of the litigation group, representing the women who participated in that experiment, have filed a suit against the University of Chicago and Eli Lilly, a major manufacturer of DES.

Sidney Wolfe, a physician with the Health Research Group, described the University of Chicago results in a letter to Joseph Califano, Secretary of the Department of Health, Education, and Welfare. The study's progress report was dated Aug. 31 and filed Oct. 28, but was not scheduled to be discussed by NIH consultants until late January. Wolfe says, "This is too slow a process for findings with such extraordinary implications for the public health."

The University of Chicago DES Project, directed by Arthur Herbst, had been following the children of the participants in the 1950-1952 experiment. About two years ago a nurse working on the project observed that many of the women who had taken DES died of breast cancer. Estrogens are known to cause breast cancer in animals, and in 1976 Robert Hoover of the National Cancer Institute suggested an increased risk of breast cancer in menopausal women taking estrogen drugs. Thus, the investigators decided to look at the mothers, as well as the offspring.

By the time of the Aug. 31 progress report, 83 percent of the original participants had been studied. The breast cancer rate was significantly higher among those given DES than in the control group, Wolfe says. He reports two excess cases of breast cancer per 100 women who had received DES, and almost four times as many DES women, as control women, died of breast cancer.

The women who received DES also had a higher combined incidence of cancer of the breast, cervix, lining of the uterus, ovaries and colon. These cancers are all associated with hormones.

The women given DES developed their

cancers earlier than did the controls. Twenty-three in the DES group, but only seven controls, got breast cancer before the age of 50. Earlier onset of cancer, as well as more frequent cancer, is common among laboratory animals exposed to cancer-causing chemicals.

A spokesman for the University of Chicago said that the researchers disagreed with Wolfe on some of the figures. According to the researchers' numbers, for example, there were 1.5, instead of 2.0, excess cases of breast cancer and 1.7, instead of 2.8, excess cases of hormone-related cancers per 100 women. However,

Report says colleges too specialized

The general public has a preconceived notion that all students come out of college, regardless of the specific institution they attend, equipped with more or less the same skills, says Verne Stadtman, editor of the Carnegie Foundation for the Advancement of Teaching's latest study on college curricula. "All we're saying [in the report] is that they don't."

Stadtman said one of the most surprising findings in the two-and-one-half year survey was that "there no longer exists anything resembling a common curriculum for all students or for all colleges and universities." In fact, some colleges have completely eliminated all general-education requirements for graduation. In short, the foundation finds undergraduate general education a "disaster area" that has been "losing ground for more than 100 years." It "deserves more attention and merits less neglect," the report says.

General studies include courses in the arts and humanities and courses to hone academic skills such as English composition, mathematics and foreign languages. Such courses help round out and complete the "total man" concept, preparing individuals to grasp new knowledge, form individual ideas and appreciate cultural and historical aspects of our heritage, Stadtman says. Instead, courses focus on professional and vocational-oriented facts, the report says. Degree requirements may permit students to take a hodgepodge of courses that describe specific facts well, but omit a "full explanation of total situations." Partial theories substitute for coordinated understanding, the report says; technical conclusions substitute for ethical judgment. In their place the study calls for "integrative" courses that aim at helping students achieve a broad understanding of issues.

How did this come about? The study points to two major changes in education. First was a shift from colleges to universities, and the subsequent change from a single set of compulsory courses to a variety of disciplines, each with their separate course requirements. The second major change occurred in the 1960s when schools began competing for stu-

because of the pending lawsuit, the researchers would make no other comment.

Wolfe urges that doctors notify the estimated two million women who took the drug to encourage them to have frequent breast examinations. He also says that NIH should coordinate follow-ups at the medical centers that administered DES. The drug is still used in "morning-after" contraceptives and, in low doses, as a cattle-feed additive (SN: 2/12/77, p. 102). Wolfe recommends the contraceptive be transferred to an investigational new drug category to limit its use, and that estrogens be prohibited in livestock feed. □

dents, Stadtman says. In order to make programs more attractive to students, a trend developed of allowing individual faculty members, students, academic departments and other subcollege bodies to design courses. No longer is there a central office to oversee whether these courses actually meet the mission of the school, he said. In fact, the study says they often don't.

The report is fairly general, but does make three recommendations: first, return to honing basic skills; second, encourage work-related experiences in the real world; and third, set standards for, and encourage, high ethical ideals. □

Hair dyes and cancer: GAO asks for action

More than thirty-three million women and men use hair-dye products, many of which contain known or suspected carcinogens. A report released Dec. 14 by the General Accounting Office says "there is increasing evidence that some colors used in coal tar hair dyes — the dyes most widely used — may carry a significant risk of cancer to users." Exemptions in the federal Food, Drug and Cosmetic Act bar the Food and Drug Administration from banning or restricting use of these dyes containing cancer-causing colors, "if their labeling warns of possible skin irritation or blindness." GAO recommends that Congress repeal these exemptions.

The report, *Cancer and Coal Tar Hair Dyes*, also concludes that at least 21 products contain colors banned by FDA because they cause cancer in animals; 407 hair dyes contain two ingredients reported by the National Cancer Institute as causing cancer in animals; and another 8 coal-tar colors derived from benzidine, a known carcinogen, are used in 26 hair-dye products. GAO warns that these colors "may break down to benzidine in the body," and bacterial screening of 169 marketed hair dyes found that 150 were mutagenic and possibly carcinogenic. □