



Equipment Operators Remove Debris From a Mountain of Rubble.

tive therapies. The registry will be informative regarding broad questions of health, but although it includes more than 71,000 registrants, analyses of follow-up data will not reveal the existence of relatively infrequent consequences unless the additional risks are very high. The long-term risks of cancer will be difficult to measure with any precision, although quantitative risk-assessment approaches should prove

useful for estimating the maximum potential burden of cancer. But even the full suite of research efforts in progress may never provide the evidence needed to answer all the questions that will be raised about the long-term health effects of the events of September 11.

An interview with Dr. Robin Herbert, codirector of the World Trade Center Medical Monitoring Program at

Mount Sinai Hospital, New York, can be heard at www.nejm.org.

Dr. Samet is a professor and chair of the Department of Epidemiology, and Dr. Geyh is an assistant professor of environmental health sciences, at the Johns Hopkins Bloomberg School of Public Health, Baltimore. Dr. Utell is a professor of medicine and environmental medicine at the University of Rochester School of Medicine and Dentistry, Rochester, NY.

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Drug Risks and Free Speech — Can Congress Ban Consumer Drug Ads?

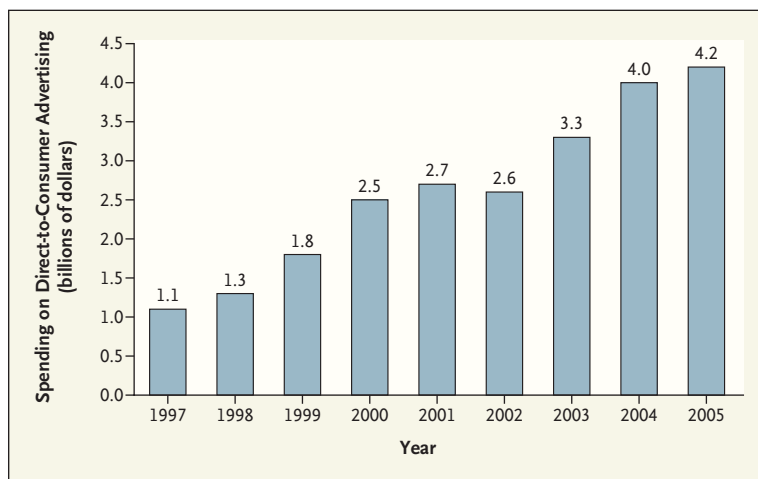
Miriam Shuchman, M.D.

In 2004, the discovery that Vioxx (rofecoxib) was a risky drug put direct-to-consumer pharmaceutical advertising in the spotlight. The image of Dorothy Hamill lacing up her skates and gliding over the ice despite her osteoarthritis offered a disturbing contrast to the public realization that millions of patients who were lured by the ad into taking Vioxx were risking stroke or myocardial infarction.

Now, 3 years later, legislation that — if it is not amended, as some legislators want — would allow the Food and Drug Administration (FDA) to block direct-to-consumer ad campaigns for new drugs has been introduced in Congress (see graph). There is popular support for a ban: in a telephone survey conducted in March 2007 by *Consumer Reports*, 59% of respondents “strongly agreed” that the FDA

should ban advertisements for drugs that had safety problems. But some legal scholars believe that such a ban would be overturned by the courts as unconstitutional. If Congress wants to turn its proposals into law, said Robert Post of Yale Law School, it needs to find a different way of approaching the issue.

The authority to ban direct-to-consumer advertising is included in two drug-safety bills that have



U.S. Spending on Direct-to-Consumer Advertising of Drugs, 1997–2005.

Spending on direct-to-consumer advertising increased by 296.4% from 1997 to 2005, during which time spending on promotion to physicians increased by 86.0% and spending on pharmaceutical research and development increased by 103.3%. Data are from the Government Accountability Office (report no. GAO-07-54, December 14, 2006).

been wending their way through the legislative process — one sponsored by Senators Edward Kennedy (D-MA) and Michael Enzi (R-WY) and the other by Representatives Henry Waxman (D-CA) and Edward Markey (D-MA) — that build on last year’s recommendation from the Institute of Medicine (IOM) that a special symbol be placed on the packaging of new drugs for their first 2 years on the market and that advertising to consumers be prohibited during that period.¹ Though the two bills aim to prevent large numbers of people from being exposed to new drugs with “not-yet-documented safety concerns,” as the IOM report puts it, that sort of justification may not be acceptable to the courts. The Kennedy–Enzi bill has been the subject of heated debate on the Senate floor, and Kennedy said that he had been working with Senators Tom Harkin (D-IA) and Pat Roberts (R-KS) “to refine our provisions on direct-to-consumer advertising, to make certain they are consistent with the Constitution.”

The courts view advertising as a form of “commercial speech” and have ruled in a series of cases dating back to the 1970s that banning advertising violates First Amendment protections of freedom of speech. In the 1975 case *Bigelow v. Virginia*, the Supreme Court ruled that since abortion was legal in New York, the state of Virginia, which still prohibited abortion, couldn’t stop newspapers from advertising the procedure. The next year, the Court ruled in *Virginia State Board of Pharmacy v. Virginia Citizens Consumer Council* that the state could not stop pharmacists from posting drug prices, with Justice Harry Blackmun writing for the majority that “the free flow of commercial information is indispensable.”

By 1980, the Court had developed a set of criteria, called the “Central Hudson test,” that are still used today for determining whether a ban on commercial speech is permissible. The test, named for a 1980 decision, examines whether the advertising

is misleading, whether banning it directly advances a substantial government interest (e.g., preserving public health), and whether the government’s interest could be advanced through a less restrictive route, such as by adding a special label. Though some scholars object to this test (Post has written that it “is so vague and abstract as to fail entirely to express any specific constitutional values”²), the Court has referred to it when overruling prohibitions on advertising of alcohol, tobacco, and medication.

In a 2002 case, *Thompson v. Western States Medical Center*, the Court overturned a federal law preventing pharmacists from advertising compounded drugs — drugs mixed specially to meet the needs of individual patients — in a ruling that is “about as on-point to the question of a [direct-to-consumer advertising] ban as you’re going to get,” according to Lars Noah, a law professor at the University of Florida in Gainesville. The majority in that case argued that even though Congress intended the law to protect public health, the ban on advertising of compounded drugs was unconstitutional. “If the Government could achieve its interests in a manner that does not restrict speech, or that restricts less speech, the Government must do so,” they wrote. The vote, however, was close — 5 to 4 — and Justice Stephen Breyer, who dissented, wrote later that “from the perspective of a First Amendment that seeks . . . to facilitate democratic self-government,” the Court’s decision seemed “backwards.”³

But to Daniel Troy, a Washington lawyer who was chief counsel at the FDA from 2001 to 2004, the Court’s decision in the

case is consistent with other rulings on commercial speech. “If I have the constitutional right to communicate where I sell tobacco . . . and to see the price of alcohol, do I not have the constitutional right to see information about a product that the FDA has found is safe and effective enough to put on the market?” he asks. Moreover, Troy adds, “the fact that there’s a doctor who intervenes, that people can’t just go into a drugstore and get these products on their own, I think would knock out any limit on drug advertising.”

In late April, a federal judge ruled that information linking doctors to the prescriptions they write is also a form of commercial speech. In overturning a state law in New Hampshire, Judge Paul Barbadoro said the state’s prohibition on the commercial use of prescription information — sold by data-tracking companies to pharmaceutical firms, which use it to tailor their marketing efforts to specific doctors — “unconstitutionally restricted speech without directly serving the State’s substantial interests.” A similar argument could be used to overturn a moratorium on drug advertising.

“To ban direct-to-consumer drug advertising for new drugs, there would have to be something particularly unsafe about the drugs,” asserts Yale’s Post. Of course, if a drug were known to be unsafe, the FDA would not approve it in the first place, but especially in the case of first-in-class drugs, the potential for rare but severe adverse events is often unknown until a substantial amount of real-world use has occurred. The IOM committee concluded that direct-to-consum-

er advertising contributes to widespread early use of new drugs, and an advertising moratorium would allow time for adequate postmarketing surveillance.

At present, real-life and longer-term safety studies are often in

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**Daniel Troy,
former FDA chief counsel**

progress when direct-to-consumer advertising for a new drug begins. In the diabetes field, for example, the first inhaled insulin (Exubera) went on the market last July, and consumers will begin to see advertisements for it this summer, despite the fact that safety studies are still under way. Some experts advocate caution in the use of inhaled insulin and other new diabetes drugs, reminding their colleagues and patients that earlier novel diabetes drugs have been withdrawn from the market because of severe adverse consequences.⁴

“It’s clear that you can’t have a blanket moratorium,” said a congressional staffer, but she thinks a ban would survive a legal challenge because the FDA would be able to apply it only to specific drugs in cases in which the

agency’s scientists believe that the public health is at risk. Outside Congress, however, both liberal and conservative experts on the First Amendment view the proposed ban as likely to fail, given the history of advertising bans and the current makeup of the Supreme Court. “It’s more likely than not that it will be struck down,” said Steven Shiffrin of Cornell Law School. Lawyers from groups such as the Washington Legal Foundation, a pro-business public-interest law center funded partly by drug companies, might bring the case that would topple it. The foundation’s Richard Samp points out that the First Amendment “protects not only the right to speak but also the right to hear,” and in the 1990s, the foundation used that argument to successfully challenge FDA rules prohibiting drug companies from distributing to physicians material about drugs’ off-label uses. Some worry that if Congress enacts a ban on drug advertising and it is then challenged, the courts may overturn it, creating a precedent that could block future attempts to regulate direct-to-consumer advertising of prescription drugs.

Some First Amendment scholars suggest that the legislators could reconfigure the proposed ban, enacting a broader scheme for new drugs in which they would be prescribed only under certain conditions during the first few years while further testing was conducted. Post believes that restrictions on use combined with a ban on advertising during a specified period would “probably” be constitutional. David Nathan, director of the Diabetes Center at Massachusetts General Hospital in Boston, has been thinking

along similar lines. He hopes that the government will order the industry to introduce drugs for diabetes and other common chronic diseases “in a limited-phase way” to allow for more uniform adverse-event reporting for a few years before widespread use, but he acknowledges that doing so would require changing the law.

In the view of the Pharmaceutical Research and Manufacturers of America (PhRMA), any such ban would be unconstitutional, said Scott Lassman, the organization’s senior assistant general counsel. PhRMA’s guidelines for voluntary actions by pharmaceutical companies, adopted in 2005, include recommendations that manufacturers educate doctors about products before advertising them to consumers and that they ask the FDA to review ads before they are aired, but these guidelines don’t suggest how long companies should wait before advertising a new drug to prospective patients. Bristol-Myers Squibb has said it will wait at least 1 year, and Pfizer has said it will wait at least 6 months. Tracking by TNS Media Intelligence, a marketing

information service, shows that companies are waiting an average of 15 months from the time a new drug is approved before advertising it directly to consumers.

Perhaps the best argument for revising the proposed laws regarding direct-to-consumer drug ads is that companies and regulators cannot ensure the accuracy of such ads during the early stages after drug approval, when a product’s associated benefits and risks aren’t fully understood.

In February, Novartis submitted a review to the FDA that pooled data from 29 clinical trials of Zelnorm (tegaserod), its drug for women with irritable bowel syndrome. The company’s analysis showed that among patients treated with the drug, 0.1% had a heart attack, a stroke, or severe chest pain, and one patient died, whereas the rate among patients taking a placebo was 0.01%, and none died. Though the drug has been on the market for more than 4 years, the FDA withdrew it this past March because it didn’t consider the drug’s benefits sufficient to justify exposing patients to even low

risks of a cardiac event. By that time, Zelnorm had become a popular treatment for irritable bowel syndrome despite having limited effectiveness. Why? Perhaps its success had something to do with its highly visible television ad campaign: attractive young women pulled up their shirts to reveal their bellies inscribed with the slogan “I feel better.” Although the drug was only 5 to 10% more effective than placebo for women and was not shown to work at all for men, the belly-baring ad seems to have worked wonders: U.S. doctors wrote 2.1 million prescriptions for Zelnorm in 2005.

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Dr. Shuchman is a national correspondent for the *Journal*.

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FOCUS ON RESEARCH

Back Surgery — Who Needs It?

Richard A. Deyo, M.D., M.P.H.

Back surgery is not the final common pathway for everyone with persistent back pain. It offers specific therapy for specific anatomical derangements associated with specific complexes of symptoms. When surgery ranges beyond carefully defined situations, we can expect disappointed patients.

A generation ago, “back surgery” usually meant removing the offending portion of a herniated disk (Fig. 1). Times have changed, and both the indications and the surgical techniques have expanded enormously. Indeed, clinical science has struggled to keep pace with innovation, creating uncer-

ainties about the efficacy and safety of some new surgical techniques. Patients and primary physicians now need a more sophisticated understanding of the diagnostic possibilities, treatment options, range of surgical techniques, and expected results.

The stakes in providing such

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