



Pricing of Breast Cancer Drugs in Southeastern Massachusetts

by

Congressman Bill Delahunt

and

**Special Investigations Division/Minority Staff
Committee on Government Reform
US House of Representatives**

July 2000

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Introduction **by Congressman Bill Delahunt**

When we started our first study on drug pricing a year ago, we didn't know what we would find. For years, the talk on the streets of the South Shore and the Cape & Islands has been that prescription medications are way too expensive, especially for people without superb health insurance.

Our original goal was to get past the anecdotes, past the emotion -- and begin to better educate ourselves about what local people with medical needs are really facing. The further hope was that this knowledge might also inform a serious policy debate, at home and in Washington.

Now that we have completed our fourth in this series, the pattern is astonishingly clear. Each of our studies has reached the same conclusion: the consumer of prescription medications in southeastern Massachusetts is being taken for a ride.

Whether the disparities involve drugs used commonly by area seniors, or comparative data in foreign nations, or the relative cost of medicines used by both people and pets -- the marketplace today in our region is demonstrably characterized by price discrimination at the hands of the pharmaceutical industry.¹

The focus of this study is on prescription drugs associated with the treatment of breast cancer, a heartbreaking ailment which affects nearly every family in the land. Nowhere in the United States is the incidence of breast cancer higher than in Massachusetts; and the Commonwealth ranks fifth nationally in mortality rates for the disease.² Even closer to home, breast cancer is significantly elevated in nine of the 15 towns on Cape Cod.³

The legislative priorities related to breast cancer in Congress currently range from Defense Department research to Medicaid coverage for treatment, from environmental links to clinical trial reimbursements, from the privacy of genetic information to health care for the uninsured. Meanwhile, a host of grassroots advocacy groups are working hard with public health officials in southeastern Massachusetts to address the many unanswered questions

¹ See Appendix A, summarizing three earlier drug pricing studies released by Rep. Delahunt. For full text of studies, see Congressional website online at <http://www.house.gov/delahunt/>.

² American Cancer Society, *Cancer Facts and Figures 2000* (online at <http://www.cancer.org/statistics/cff2000/data/incidenceState.html>).

³ Silent Spring Institute, *Breast Cancer Incidence in Massachusetts Towns, 1987-1994*, using data from the MA Cancer Registry, MA Department of Public Health. See Appendix B.

about patterns of local breast cancer incidence.⁴

This study examines a related, but narrower, piece of the puzzle. For the five medications prescribed most often for the treatment of breast cancer, we sought to determine how the price paid by local consumers compares with the price charged to institutional customers, such as insurance companies.

As in our past projects, great care was taken in conceiving and executing the study. Special thanks is due to the 13 pharmacies across our region which cooperated in the compilation of this data.⁵

The results of the study speak for themselves -- with breathtaking clarity. Women on the South Shore, on Cape Cod, on Nantucket and on Martha's Vineyard pay much more -- *an average of over 120 percent more* -- for the five studied breast cancer drugs than do the institutional customers favored by the pharmaceutical industry.

For one of the drugs we examined, a Bristol Myers-Squibb product called Megace, the disparity is *three times worse* -- over 375 percent. Our region also seems to enjoy the distinction of having the largest price disparity anywhere that analogous studies have been performed to date.

While merely a snapshot, this study is intended to add to a landscape that is anything but picturesque.

When we released our last study -- contrasting the cost of medicines for pets with the prices for drugs intended for humans -- the response from the pharmaceutical industry was nuclear. Within hours, the industry launched hyperbolic attacks on our work across the country.

As a former District Attorney, however, all I am interested in are the facts.

There is some common sense in their assertions that high drug prices are necessary to cover the costs of research and development, that for every drug approved for patient use, numerous others fail; and that the search for new and effective medication is a critical public health imperative.

In short, there is no question that new and more effective prescription drugs have significantly improved health care for millions of people. But for whom, and at what cost?

⁴ See Appendix C for relevant statement by Rep. Delahunt on floor of US House of Representatives, Congressional Record, Volume 145, No. 43 (March 18, 1999).

⁵ Location of participating pharmacies noted in Appendix D.

The kind of disparities we found locally are even more striking in the overall context of the pharmaceutical industry, which benefits from public largesse in the form of federal research at the National Institutes of Health, and tax breaks for R&D and even marketing.⁶

These breast cancer drugs, essential to the health of millions of ill Americans, are expensive -- especially because they are often prescribed in combinations or for durations of many years. The disease is physically debilitating, financially devastating, often fatal -- and tragically common.

It gives me no pleasure to report the clear conclusion of this report: that drug manufacturers charge more when their products are intended for use by local women with breast cancer who lack prescription drug coverage, or any health insurance at all.

The seriousness of this price discrimination is only further compounded by the particularly steep challenges that many women face in our current health care system.

Nationally, one in five women currently lack coverage -- and the number of uninsured and underinsured rises by a million each year. These women not only have limited access to affordable medications; they are also far more likely to postpone preventative care at earlier stages.⁷

For older women, the situation is particularly acute. Most Medicare beneficiaries are women, who are more likely than men to experience multiple chronic conditions, and more likely to live below the poverty level. They also spend much more on prescription drugs, and other out-of-pocket health care expenses, than their male counterparts.⁸

It was in this context that the Congress last month grudgingly took up the subject of prescription drugs. The debate on the House floor was, to put it mildly, disappointing. The plan -- the only plan -- allowed to come to a vote was so inadequate that I was obliged to oppose it.

The House Republican leadership is to be commended for finally focusing on the

⁶ Much of the early basic research that may lead to drug development is funded by the National Institutes of Health. It is usually only later, when the research shows practical promise, that drug companies become involved. The industry also enjoys tax advantages. Not only are its research and development costs deductible, but so are its massive marketing expenses. The average tax rate of major US industries from 1993 to 1996 was 27.3 percent of revenues. During the same period the pharmaceutical industry was reportedly taxed at a rate of only 16.2 percent. Marcia Angell, MD, *The New England Journal of Medicine*, *The Pharmaceutical Industry - To Whom Is It Accountable?*, Vol 342, No 25, (June 22, 2000).

⁷ The Henry J. Kaiser Family Foundation, *The Uninsured and Their Access to Health Care* (online at <http://www.kff.org/sections.cgi?section=kcmu>).

⁸ The Henry J. Kaiser Family Foundation, *Health Coverage and Access: Policy Issues for Women* (online at <http://www.kff.org/sections.cgi?section=women>).

question. But particularly after the work we have done with these studies of pricing on the South Shore and Cape & Islands, I could not in good faith vote for a plan that was so seriously flawed. The legislation before us in late June relied on insurance companies to provide drug coverage that the industry itself argued it would not be able to offer to seniors.

The legislation was based on the principle of subsidizing insurance companies, rather than beneficiaries. It failed to specify the real-life cost of premiums, deductibles or co-payments. And its proponents rammed through parliamentary rules preventing consideration of any alternatives, or even amendments.

All in all, this approach trivialized a critically important policy debate by transforming it into a cynically partisan food-fight.

If there is a silver lining, it is that even those who have resisted action are now coming -- if belatedly and reluctantly -- to recognize and respond to the public demand for action. I suppose that, in a contorted way, this constitutes progress.

If the United States Congress cannot effectively lead in this area, perhaps at least it can follow.

SUMMARY

Many women in Massachusetts who have breast cancer must pay high prices for lifesaving prescription drugs. This report, which was prepared at the request of U.S. Rep. Bill Delahunt, who represents the 10th Congressional District of Massachusetts, investigates the cause of these high prices. The report analyzes how price discrimination by drug manufacturers affects the cost of prescription drugs purchased by women with breast cancer in southeastern Massachusetts.

Breast cancer is the most common form of cancer among women in the United States. This year, approximately 180,000 women will be diagnosed with breast cancer, and over 40,000 will die. Many of these women lack coverage for prescription drugs and face severe financial problems affording the medications that they need to survive. In Massachusetts, an estimated 4,400 women will be diagnosed with breast cancer this year, and 1,000 will die from the disease.

This report investigates the pricing of five prescription drugs that are commonly prescribed to treat breast cancer. It compares the prices that women in southeastern Massachusetts without prescription drug coverage must pay for these drugs with the prices that drug manufacturers charge favored customers, such as HMOs and the federal government. The report finds that:

- Price discrimination by drug manufacturers forces women in southeastern Massachusetts to pay inflated prices for breast cancer drugs.** Women on the South Shore, and Cape and Islands with breast cancer who pay for their own drugs must pay an average of 121% to 125% more for the breast cancer drugs than the drug manufacturers' favored customers (Table 1). The drug with the highest price differential is Megace, manufactured by Bristol Myers-Squibb. Women in Rep. Delahunt's district must pay 378% more than favored customers for a one-month supply of Megace. Women who buy Tamoxifen, the most frequently prescribed breast cancer medication, must pay 75% to 92% more than favored customers.

Table 1: Women in Southeastern Massachusetts Are Forced to Pay Higher Prices for Breast Cancer Drugs than Favored Customers

Drug	Manufacturer	Price for Favored Customers	Price for 10th District Breast Cancer Patients	Price Differential for 10th District Breast Cancer Patients	
				(One Month Supply)	Percent
Megace (20 mg)	Bristol-Myers Squibb	\$39.60	\$189.31	378%	\$149.71
Tamoxifen (10 mg)	AstraZeneca/Barr	\$58.00	\$111.56/\$101.25	92%/75%	\$53.56/\$43.25
Arimidex (1 mg)	AstraZeneca	\$117.47	\$202.55	72%	\$85.08
Fareston (60 mg)	Schering-Plough	\$59.12	\$92.16	56 %	\$33.04
Femara (2.5 mg)	Novartis	\$155.15	\$195.88	26%	\$40.73
Average Price Differential				121%/125%	

- **Price discrimination by drug manufacturers costs women in southeastern Massachusetts thousands of dollars.** In dollar terms, the impact of price discrimination by drug manufacturers can be enormous. Not only are breast cancer drugs expensive, they must often be used daily for long periods of time. The report finds that for a year of treatment, a local woman without drug coverage will pay nearly \$1,800 more than a favored customer for the drug Megace and over \$1,000 more than a favored customer for Arimidex. Tamoxifen, the most frequently prescribed breast cancer drug, has a typical course of treatment that lasts five years. Women in Rep. Delahunt's district who purchase their own drugs must pay from nearly \$2,600 to over \$3,200 more for Tamoxifen than favored customers over this period.
- **Drug manufacturers, not pharmacists, are primarily responsible for the high prices paid by women in southeastern Massachusetts.** Drug manufacturers have argued that the differences between the low prices paid by favored customers and the high prices paid by consumers without drug coverage can be attributed in large part to pharmacy markups. The report investigates this contention and finds that it is drug manufacturer pricing strategies -- not pharmacy or wholesale markups -- that primarily cause the price differentials observed in this report. For the breast cancer drugs analyzed in this report, the average wholesale and pharmacy markup is only 24%. It is price discrimination at the manufacturer level that is the principal cause of the high drug prices paid by women in southeastern Massachusetts with breast cancer.

I. BREAST CANCER INCIDENCE AND TREATMENT

Breast cancer is the most common form of cancer for women in the United States. In 2000, approximately 180,000 women in the United States will be diagnosed with breast cancer, and over 40,000 will die.⁹ Over the course of a lifetime, one in eight women in the United States will be diagnosed with breast cancer.¹⁰ In Massachusetts, approximately 4,400 women will be diagnosed with breast cancer this year, and 1,000 will die.¹¹ Breast cancer is about 20% higher on Cape Cod than in the rest of the state. Cape Cod women 55-64 years old are at 29% greater risk of breast cancer than women of their age in the rest of Massachusetts.¹²

Initial therapy for breast cancer usually requires surgical removal of the tumor.¹³ Additional prescription drug therapy (known as adjuvant therapy) is often recommended to prevent the growth and spread of cancer cells throughout the body. There are two types of drug therapy for breast cancer: chemotherapy and hormonal therapy. Chemotherapy drugs kill cancer cells directly. Hormonal drugs function by curtailing the production of or blocking the effects of estrogen, a natural hormone that can accelerate the growth of breast tumors.

The breast cancer drugs used in adjuvant therapy are expensive, especially the drugs used in hormonal therapies. Breast cancer patients spend over \$1 billion annually on prescription drugs used to treat the disease.¹⁴ The costs are particularly high when patients are prescribed drugs in combination and directed to take the drugs over extended periods of time. Typical hormonal therapies are taken daily for up to five years.¹⁵

Many women with breast cancer do not have prescription drug coverage to pay their drug

⁹Cancer Journal for Clinicians, *Cancer Statistics, 2000* (Jan./Feb. 2000). This ranking excludes basal and squamous cell skin cancers and in situ carcinomas except urinary bladder. (Online at http://www.cancerjournal.org/articles...07-033/graphics/50_007-022_t01.gif).

¹⁰Katrina Armstrong, M.D., Andrea Eisen, M.D., and Barbara Weber, M.D., *Assessing the Risk of Breast Cancer*, *New England Journal of Medicine* (Feb. 24, 2000).

¹¹*Cancer Statistics, 2000*, *supra* note 1.

¹²Silent Spring Institute, *The Cape Cod Breast Cancer and Environment Study*, (December 1997).

¹³National Cancer Institute, *Cancer Facts: Therapy: Questions and Answers About Adjuvant Therapy for Breast Cancer* (1999) (online at <http://cancernet.nci.nih.gov>).

¹⁴Committee on Government Reform, Minority Staff, *Analysis of Sales of Prescription Drugs Used in Hormonal Treatment of Breast Cancer* (Oct. 1999).

¹⁵National Comprehensive Cancer Network and American Cancer Society, *Breast Cancer Treatment Guidelines for Patients* (1999) (online at www.nccn.org).

expenses. Overall, almost 60% of breast cancer patients are age 65 or over.¹⁶ These women usually receive health insurance through Medicare, which does not pay for most prescription drugs. While some women on Medicare have supplemental drug coverage, their coverage is often inadequate.¹⁷ Over 30% of women in the Medicare program -- approximately six million women -- have no prescription drug coverage of any kind.¹⁸

Women younger than 65 also often lack prescription drug coverage. The number of Americans without health insurance reached 44.3 million in 1998, a record high.¹⁹ Nationwide, 15% of women younger than 65 -- over five million women -- have no health insurance coverage at all.²⁰ Some analysts have estimated that there are over 20,000 women younger than 65 in the United States who have breast cancer and are in need of financial assistance to pay for treatment.²¹

For women with breast cancer who must pay for their own prescription drugs, the costs can be staggering. Because of the high costs of treatment, many women with breast cancer are forced to delay diagnosis and treatment, or forego appropriate care.²²

II. OBJECTIVE OF THE REPORT

Rep. Delahunt requested this report to investigate the high drug prices faced by women in his district with breast cancer who lack prescription drug coverage. In particular, he requested an

¹⁶National Cancer Institute, *Estimated U.S. Cancer Prevalence Counts* (1999).

¹⁷ Although Medicare beneficiaries can purchase supplemental "Medigap" insurance privately, the prescription drug coverage provided by these policies is often prohibitively expensive and inadequate. For example, one Medigap policy requires beneficiaries to meet a \$250 deductible, and then covers only 50% of the cost of prescription drugs, up to a maximum benefit of \$1,250. Health Affairs, *Prescription Drug Coverage, Utilization, and Spending Among Medicare Beneficiaries* (Jan./Feb. 1999). The best supplemental prescription drug coverage is available to those who have private sector, employer-based coverage. But only 24% of Medicare beneficiaries have this type of prescription drug coverage. National Economic Council, Domestic Policy Council, *Disturbing Truths and Dangerous Trends: The Facts About Medicare Beneficiaries and Prescription Drug Coverage* (July 22, 1999).

¹⁸Health Affairs, *Medicare Beneficiaries and Drug Coverage*, 252 (Mar./Apr. 2000).

¹⁹U.S. Census Bureau, *Current Population Reports: Health Insurance Coverage* (Oct. 1999).

²⁰*Id.*

²¹Testimony of Susan Braun, President and CEO, Susan G. Komen Breast Cancer Foundation, before the House Subcommittee on Health and the Environment (July 21, 1999).

²²*See* Testimony of Dr. Stanley Klausner, Director of Breast Services, Brookhaven Memorial Hospital, and Fran Visco, President, National Breast Cancer Coalition, before the House Subcommittee on Health and the Environment (July 21, 1999).

examination of whether drug manufacturers have adopted pricing strategies that force breast cancer patients without drug coverage to pay higher prices for breast cancer drugs than other purchasers.

Several studies have found that drug manufacturers engage in price discrimination. That is they charge lower prices for drugs used by favored customers, such as HMOs or the federal government, and higher prices for drugs used by individual consumers who must pay for their own drugs. For example, in 1998 the Congressional Budget Office conducted a detailed examination of prescription drug pricing and concluded that:

Different buyers pay different prices for brand-name prescription drugs. . . . In today's market for outpatient drugs, purchasers that have no insurance coverage for drugs . . . pay the highest prices for brand name drugs.²³

III. METHODOLOGY

A. Selection of Drugs

This report focuses on five leading drugs that are approved by the U.S. Food and Drug Administration (FDA) as out-patient hormonal treatments for breast cancer.²⁴ These drugs are:

- Tamoxifen, a hormone therapy manufactured by AstraZeneca (under the brand name Nolvadex) and by Barr Laboratories.²⁵ Tamoxifen is the most frequently prescribed breast cancer medicine in the United States, and is used to treat early and advanced breast cancer in pre- and post-menopausal women. The drug is also the only drug approved by FDA as a treatment to reduce the risk of breast cancer in women at high risk of developing the disease. Total sales of Nolvadex in 1998 were \$523.7 million.²⁶

²³Congressional Budget Office, *How Increased Competition from Generic Drugs Has Affected Prices and Returns in the Pharmaceutical Industry*, xi (July 1998).

²⁴This study does not include oral chemotherapy drugs that are used to treat breast cancer. These drugs are generally taken for a short period of time (six months or less). Moreover, because they are chemotherapy drugs, they fall into the narrow class of drugs that are covered by Medicare. Other breast cancer drugs, such as Taxol, are not included in this analysis because they are generally dispensed in a hospital setting, not via out-patient prescription.

²⁵Barr Laboratories manufactures a "licensed" generic version of Tamoxifen. This version is available as a result of a patent claim settlement with AstraZeneca that gave Barr the exclusive rights to distribute this generic version.

²⁶Zeneca, *Annual Report and Accounts and Form 20-F 1998 (1999)* (available online at <http://annualrep.zeneca.com/7.htm>).

- Femara, a hormone therapy manufactured by Novartis. Femara is a second-line therapy usually used to treat advanced breast cancer when treatment with Tamoxifen has failed. Total sales of Femara in 1998 were over \$150 million.²⁷
- Arimidex, a hormone therapy manufactured by AstraZeneca. Arimidex is another second-line therapy usually used to treat advanced breast cancer when treatment with Tamoxifen has failed. Total sales of Arimidex in 1998 were \$121 million.²⁸
- Megace, a hormone therapy manufactured by Bristol-Myers Squibb. Megace is generally a third-line therapy used in the treatment of advanced breast cancer when treatment with Tamoxifen and Arimidex has failed. Total sales of Megace in 1998 were \$121.9 million.²⁹
- Fareston, sold in the United States by Schering-Plough. Fareston is a first- or second-line treatment for advanced breast cancer. Total sales in 1998 were approximately \$17.4 million.³⁰

B. Determination of Local Consumers

In order to determine the prices that breast cancer patients without prescription drug coverage are paying for breast cancer drugs in southeastern Massachusetts, the minority staff and the staff of Rep. Delahunt's congressional office conducted a survey of 13 drug stores -- including both independent and chain stores -- in his district. Congressman Delahunt represents the 10th Congressional District in southeastern Massachusetts, including the South Shore, Cape Cod, and the islands of Nantucket and Martha's Vineyard. The locations of the stores are shown in Appendix D.

²⁷Forbes, *A New Career for Dr. Vasella* (Feb. 9, 1998).

²⁸*Annual Report and Accounts and Form 20-F 1998*, *supra* note 17.

²⁹Bristol-Myers Squibb, *Products over \$100 Million in 1998 (1999)* (available online at <http://www.shareholder.com/bmy/financials.cfm>). Megace is also available in a generic version. Consumers who purchase drugs in their generic versions sometimes pay less than those who purchase the brand-name version, although the Congressional Budget Office has found that the availability of a generic drug often does not decrease the cost of the brand-name product. See *How Increased Competition from Generic Drugs Has Affected Prices and Returns in the Pharmaceutical Industry*, *supra* note 14.

³⁰Orion Group, *Orion Group Annual Report 1998 (1999)* (available online at <http://www.orion.fi/ewww/index.html>).

C. Determination of Prices for Favored Customers

Drug pricing is complicated and drug companies closely guard their pricing strategies. In order to determine the prices that drug manufacturers charge their most favored customers, the minority staff used the prices on the Federal Supply Schedule (FSS).³¹ FSS prices are the prices at which many federal agencies can purchase drugs. They are negotiated by the federal government and the drug manufacturers.

According to the U.S. General Accounting Office (GAO), an investigative arm of Congress, “[u]nder General Services Administration procurement regulations, Department of Veterans Affairs contract officers are required to seek an FSS price that represents the same discount off a drug’s list price that the manufacturer offers its most-favored nonfederal customer under comparable terms and conditions.”³² As a result, according to GAO, “federal supply schedule prices represent the best publicly available information on the prices that pharmaceutical companies charge their most favored customers.”³³

D. Determination of Drug Markups

In order to assess whether the differences between the prices paid by women in southeastern Massachusetts and the prices paid by favored customers could be attributed to post-manufacturer markups, this report examined the markups charged by drug wholesalers and pharmacists. To determine these markups, the Wholesale Acquisition Cost (WAC) was obtained for the five drugs analyzed in this report. These WAC prices are the average prices at which drug manufacturers sell the drugs to wholesalers, who then resell them to pharmacists for retail distribution. The WAC prices were compared to the average retail prices for the drugs in the 10th district. The difference between the WAC prices and the retail prices for the drugs represents the post-manufacturer markup of wholesalers and pharmacists.

E. Selection of Drug Dosages

Prices were obtained for a monthly supply of each of the drugs. Fareston, Arimidex, and Femara are generally taken once daily, and 30 tablets represent a monthly dose of these drugs. Nolvadex is generally taken twice daily, and 60 tablets represent a monthly dose for most women with breast cancer. Eight Megace tablets are taken daily, and 240 tablets represent a monthly dose of this drug.

³¹There is no FSS price available for the generic version of the drug Tamoxifen, manufactured by Barr Laboratories. For the price comparison for this drug, the minority staff compared the retail price of the generic version of the drug with the FSS price for the brand name version, Nolvadex. Because favored customers most likely negotiate better prices for the generic than the brand name version of the drug, this is likely to be a conservative assumption, underestimating the true price difference.

³²U.S. General Accounting Office, *Drug Prices: Effects of Opening Federal Supply Schedule for Pharmaceuticals Are Uncertain*, 6 (June 1997).

³³Letter from William J. Scanlon, Director, GAO Health Financing and Public Health Section (Apr. 21, 1999).

IV. FINDINGS

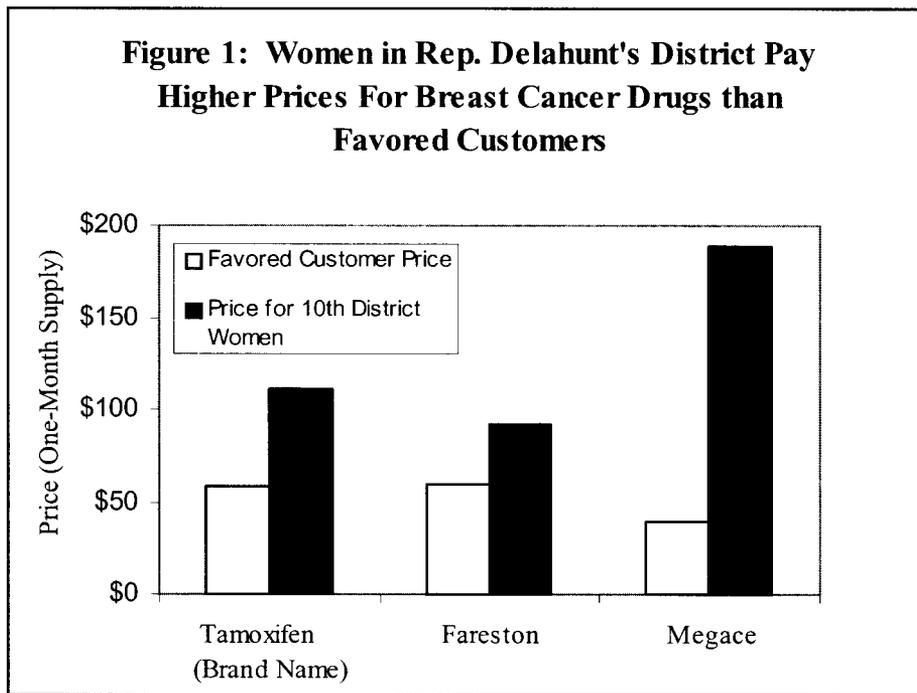
A. Price Are Higher For Local Consumers

The breast cancer drugs investigated in this study are substantially more expensive for women in southeastern Massachusetts than for favored customers such as HMOs and the federal government. For the five hormonal therapies for breast cancer, women without prescription drug coverage must pay an average of 121% to 125% more than the drug manufacturers' favored customers for a one month supply (Figure 1). This means that, on average, the prices paid by women locally are more than twice the prices paid by favored customers.

All five drugs are more expensive for women with breast cancer in Rep. Delahunt's district who lack drug coverage than they are for drug manufacturers' favored customers. The drug with the highest percentage price differential is Megace, the hormone treatment manufactured by Bristol Myers-Squibb. Favored customers pay only \$39.60 for a one month supply of Megace, while women in the 10th district who lack prescription drug coverage must pay \$189.31 -- over four times as much.

Two different price differentials are presented in this report for Tamoxifen because Tamoxifen is dispensed both under the brand name Nolvadex and as a licensed generic drug. The brand name version, Nolvadex, costs local women with breast cancer 92% more than the manufacturer's favored customers. The licensed generic costs 75% more.

Overall, three of the five drugs have price differentials of at least 70% (Figure 1). Femara, manufactured by Novartis, is the lowest with a 26% price differential.

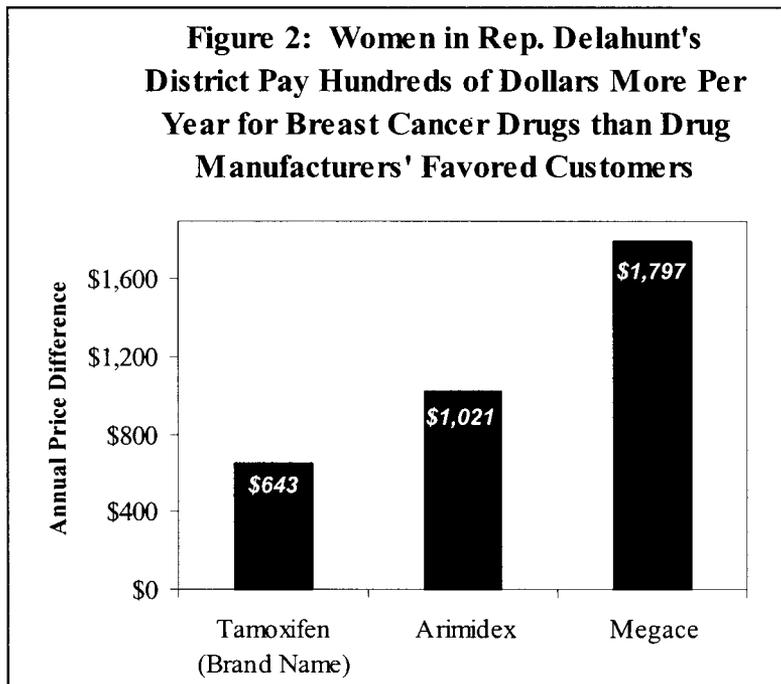


B. Price Differentials Are Substantial

These price differences translate into large sums in dollar terms. A patient who is diagnosed with breast cancer and undergoes therapy involving prescription drugs will typically take hormonal therapies daily for up to five years. Over the course of treatment, a women in Rep. Delahunt’s district with breast cancer and without prescription drug coverage could be forced to pay thousands of dollars more for these drugs than the drug manufacturers’ favored customers.

Tamoxifen, the most frequently prescribed breast cancer drug, is generally prescribed as the first-line hormonal therapy for breast cancer treatment. A monthly prescription for Tamoxifen costs an uninsured woman in southeastern Massachusetts over \$40 to \$50 per month more than a favored customer. On an annual basis, this represents a price difference from nearly \$520 to over \$640. For a full five year course of treatment, an local uninsured breast cancer patient would spend \$6,000 to nearly \$6,700 on the drug -- nearly \$2,600 to over \$3,200 more than a favored customer.

Some women who initially begin taking Tamoxifen have a recurrence of the disease, and switch to second-line therapies such as Arimidex. For these women, the price differences can be even larger. Arimidex is sold by AstraZeneca and is used to treat advanced stage breast cancer. A southeastern Massachusetts woman with breast cancer without prescription drug coverage pays over \$85 more than a favored customer for a monthly prescription of Arimidex. For one year of treatment, a local breast cancer patient would pay over \$2,430 for Arimidex, compared to \$1,410 for a favored customer. This is a price difference of over \$1,000. Megace has the highest price difference in dollars. A breast cancer patient in southeastern Massachusetts who pays for her own drugs would pay \$1,797 more than a favored customer for a one year supply of Megace (Figure 2).



C. Price Discrimination Is the Primary Cause of the Price Differentials

Drug manufacturers have argued that it is misleading to compare prices paid by individual consumers with what they describe as “wholesale level” prices paid by favored customers such as HMOs and the federal government. According to the manufacturers, the differential between these two prices is often largely explained by the markups charged by pharmacies.

This report assessed this contention by comparing the Wholesale Acquisition Cost for the five drugs, which is the average price that drug manufacturers charge drug wholesalers, with the average retail price for the drugs in southeastern Massachusetts. This comparison showed that the combined wholesale and pharmacy markup for these breast cancer drugs is an average of only 24%. This markup can explain only about one third of the difference between the prices local breast cancer patients and the prices paid by favored customers.

The drug manufacturers have also suggested that lower prices paid by favored customers are simply due to volume discounts given to those who purchase large amounts of pharmaceuticals. The findings in this analysis indicate that this does not account for the observed price differentials. Drug wholesalers, which purchase drugs for resale to pharmacies, purchase drugs in large volumes. But the Wholesale Acquisition Cost (WAC) at which drug wholesalers are able to buy the five breast cancer drugs examined in this report are 80% higher than the prices for favored customers.

These findings indicate that the high prices locally for breast cancer drugs are attributable primarily to manufacturer-level price discrimination. The drug manufacturers charge low prices for these drugs when they are sold to favored customers, such as HMOs and the federal government, but substantially higher prices when the drugs are intended for use by women with breast cancer who lack prescription drug coverage. The consequence of this price discrimination is that the women with breast cancer who can least afford high drug costs, such as women on Medicare and uninsured younger women, are forced to pay the most for the drugs that they need to survive.

Appendix A

Drug Companies Profit at the Expense of Older Americans

**By Congressman Bill Delahunt
May 1999**

RESULTS OF PRICE COMPARISONS:

This report, prepared by Congressional investigators based on data compiled by my office, shows that older residents of the South Shore and the Cape & Islands are charged far more for common prescription drugs than are insurance companies, health maintenance organizations, the federal government and other customers favored by drug manufacturers.

The report documents these price disparities -- *averaging 134 percent* -- and presents disturbing evidence about their causes. It reveals that local seniors who pay for their own medications are charged, on average, twice as much as favored larger customers. For certain medications, the disparity was *nearly 1700 percent* -- despite the fact that the differential for other consumer items was a modest 22 percent.

In addition, the study demonstrates that pharmaceutical manufacturers, not drug stores, appear to be responsible for the discriminatory prices older local residents are forced to pay for medications.

Average Retail Prices for the Five Best-Selling Drugs for Older Americans in Massachusetts Are More Than Twice as High as the Prices That Drug Companies Charge Their Most Favored Customers.

Prescriptio Drug	Manufacturer	Use	Prices For Favored Customers	Retail Prices for Mass Seniors	Price Differential For Massachusetts Senior Citizens
Zocor	Merck	Cholesterol	\$34.80	\$115.21	231%
Norvasc	Pfizer Inc.	High Blood Pressure	\$59.71	\$128.21	115%
Procardia XL	Pfizer Inc.	Heart Problems	\$68.35	\$144.94	112%
Prilosec	Astra/Merck	Ulcers	\$59.10	\$121.15	105%
Zoloft	Pfizer, Inc.	Depression	\$115.70	\$237.00	105%
Average Price Differential					134%

Prescription Medications in Southeastern Massachusetts:

An International Price Comparison

By Congressman Bill Delahunt

November 1999

RESULTS OF PRICE COMPARISONS:

With the prescription drug industry booming globally, this study examines whether the price disparities exist once you cross our international borders.

Our research concludes that, on average, *seniors in our region pay nearly twice the price* charged uninsured older people in the Mexican cities of Monterrey and Guadalajara, and the Canadian provinces of Ontario, British Columbia and Nova Scotia. For Prilosec, a popular ulcer medication, for instance, an uninsured senior on the South Shore or the Cape & Islands would pay *120 percent more than a Canadian senior, and 277 percent more than a Mexican senior.*

Seniors in Rep. Delahunt's District Pay Significantly Higher Prices for Prescription Drugs Than Consumers in Canada or Mexico.

Prescription Drug	U.S. Dosage and Form	Canadian Price	Mexican Price	Mass. Price	Canada-Mass. Price Differential		Mexico-Mass. Price Differential	
					Percent	Dollar	Percent	Dollar
Zocor	5 mg, 60 tab.	\$46.17	\$67.65	\$115.21	150%	\$69.04	70%	\$47.56
Prilosec	20 mg, 30 cap.	\$55.10	\$32.10	\$121.15	120%	\$66.05	277%	\$89.05
Procardia XL	30 mg, 100 tab.	\$74.25	\$76.60	\$144.94	95%	\$70.69	89%	\$68.34
Zoloft	50 mg, 100 tab.	\$129.05	\$219.35	\$237.00	84%	\$107.95	8%	\$17.65
Norvasc	5 mg, 90 tab.	\$89.91	\$99.32	\$128.21	43%	\$38.30	29%	\$28.89
Average Differential					98%		95%	

Drug Manufacturer Prices Are Higher for Humans than for Animals

**By Congressman Bill Delahunt
February 2000**

RESULTS OF PRICE COMPARISONS:

This study examines the prices charged for medicines used by both people and animals. The first group of drugs reviewed contains popular medicines approved for use by both people and animals -- based on the cost of the active ingredient per gram. The average price differential for these drugs exceeded 100 percent.

Drug Manufacturers Charge More for Popular Drugs Used by Humans than for the Same Drugs Used by Animals.

Drug Name	Manufacturer of Human Version	Human Use	Manufacturer Price (One Month Supply)		Price Differential
			Animal Market	Human Market	
Bactroban	SmithKline Beecham	Antibiotic	\$9.98	\$31.56	216%
Augmentin	SmithKline Beecham	Antibiotic	\$18.00	\$56.40	213%
Lodine	American Home Products	Arthritis	\$37.80	\$108.90	188%
Stadol	Bristol Myers Squibb	Pain Relief	\$25.48	\$61.11	140%
Lasix	Hoechst Marion Roussel	High Blood Pressure	\$4.80	\$9.60	100%
Vasotec	Merck	High Blood Pressure	\$51.30	\$78.55	53%
Lanoxin	Glaxo Wellcome	Heart Failure	\$6.36	\$25.65 (\$4.08)	303% (-56%)
Amoxil	SmithKline Beecham	Antibiotic	\$16.20	\$15.30	-6%
Average for Eight Drugs					151% (106%)

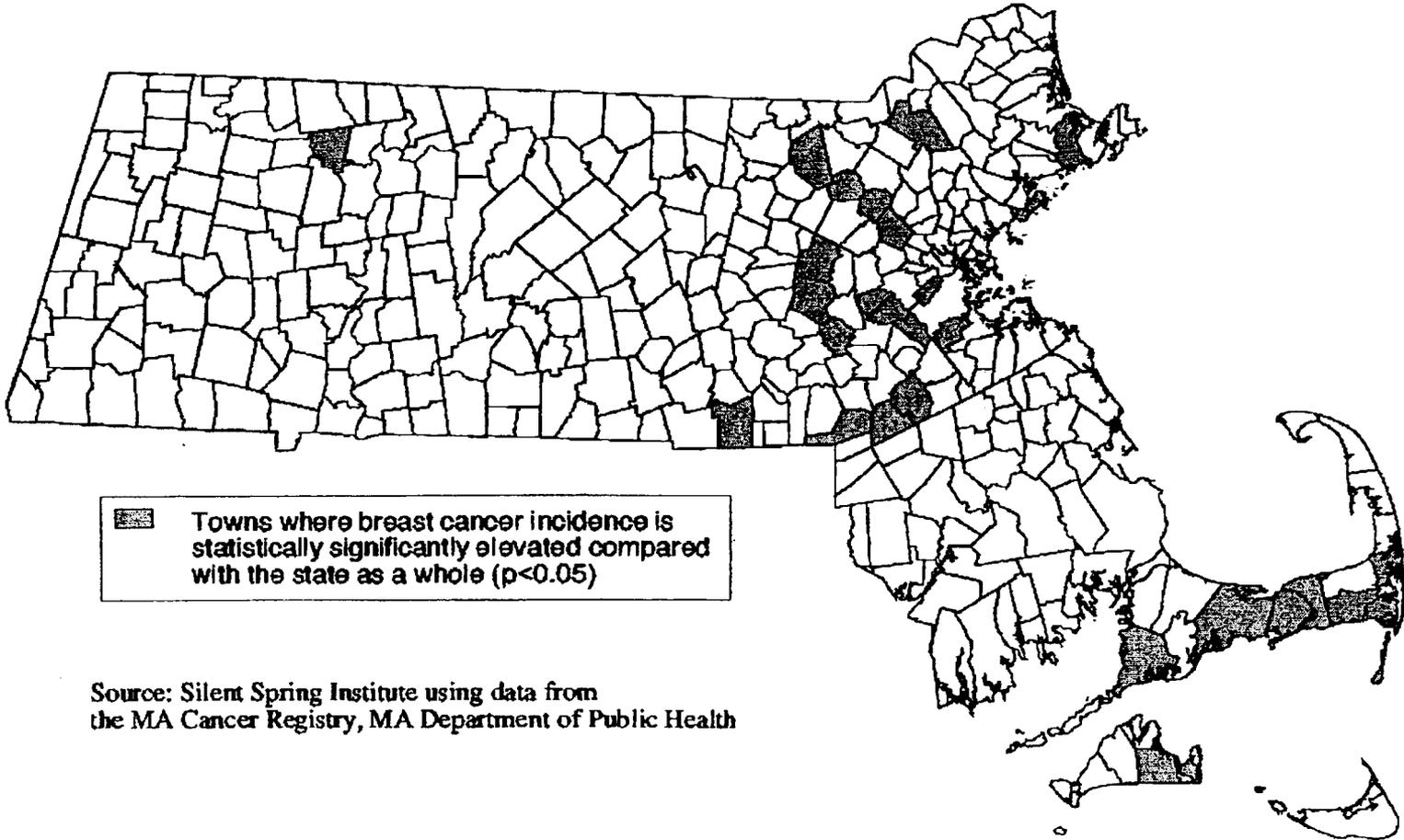
The study also looked at a second group of "directly comparable" medications. These are prescription drugs approved and dispensed in identical dosage and form for both humans and animals, and manufactured by the same or related company. The average price differential was over 130 percent.

Drug Manufacturers Charge More for Directly Comparable Drugs When the Drugs Are Used by Humans than When the Drugs Are Used by Animals.

Drug Name	Manufacturer	Human Use	Manufacturer Price (Monthly Supply)		Price Differential
			Animal Market	Human Market	
Medrol	Pharmacia and Upjohn	Arthritis; Allergies; Asthma	\$3.90	\$20.10	415%
Winstrol	Sanofi	Anemia; Renal Disease	\$5.40	\$19.20	256%
Lodine	American Home Products	Arthritis	\$37.80	\$108.90	188%
Robaxin	A.H. Robins	Pain Relief	\$15.00	\$31.20	108%
Vasotec	Merck/Merial	High Blood Pressure	\$51.30	\$78.55	53%
Cleocin	Pharmacia and Upjohn	Antibiotic	\$17.10	\$22.20	30%
Robinul	A.H. Robins	Ulcers	\$29.40	\$29.98	2%
Fulvicin U/F	Schering	Antifungal	\$38.40	\$36.60	-5%
Average for Eight Drugs					131%

Appendix B

Breast Cancer Incidence in Massachusetts Towns, 1987-1994



Appendix C



United States
of America

Congressional Record

PROCEEDINGS AND DEBATES OF THE 106th CONGRESS, FIRST SESSION

Volume 145

WASHINGTON, THURSDAY, MARCH 18, 1999

No. 43

House of Representatives

THE HONORABLE WILLIAM D. DELAHUNT

OF MASSACHUSETTS

MR. DELAHUNT -- Mr. Speaker, standing in front of our nation's Capitol today was Mary Ann Waygan, a woman from Cape Cod, Massachusetts, who joined with Senators Chafee, Mikulski, and Smith in introducing the Breast and Cervical Cancer Treatment Act. As an original cosponsor of the House version of this legislation, I would like to share with you her eloquent testimony of those affected by this tragic disease.

Hello, my name is Mary Ann Waygan and I am the coordinator for the CDC Breast and Cervical Cancer Initiative for Cape Cod, Massachusetts.

Before I begin, I would like to thank Senators Chafee, Mikulski, Snowe and Moynihan for sponsoring this legislation. I would also like to thank Senator Smith for his support of this bill.

Clearly, the single largest problem facing the Breast and Cervical Cancer Screening Program today is finding resources and caregivers to provide treatment to the women who are diagnosed with breast or cervical cancer. The lack of treatment dollars is one of the biggest policy

gaps in the program--and the problem is only getting worse.

The barriers to recruiting providers for charity care are growing, and funding for the treatment is an ad-hoc system that relies on volunteers, state workers and others to find treatment services. In the community, we go to tremendous ends to find treatment--and raise money to help pay for it. I've organized luncheons, bake sales, raffles--you name it. Anything to raise money for women who could not afford to pay out of pocket for treatment. Despite these efforts, all too often, we come up short.

Funding for treatment through the CDC program is the biggest problem I face as a coordinator and frankly a barrier to screening and detection. Funding for treatment is tenuous at best. Without passage of the Breast and Cervical Cancer Treatment Act, future funding for treatment for these women will remain uncertain.

I want to tell you one story in particular that clearly illustrates the problem some of these women face. A woman who lives in Buzzard's

Bay, Massachusetts who was diagnosed with breast cancer through the CDC program.

Arlene McMann is a married woman in her early forties with two teenage sons and no health insurance. When Arlene was diagnosed with breast cancer through the CDC screening program, she was devastated--not just with the diagnosis, but with the fact that she had no way to pay for the treatment she needed.

Faced with that situation, she and her husband were forced to use the \$20,000 they had been saving for years to pay for their children's college tuition. In less than a year, that money was gone. After that, she and her husband were forced to go into debt to pay for her ongoing chemotherapy/radiation treatment and other procedures including a craniotomy and gall bladder surgery. They are now more than \$40,000 in debt, were forced to move into a much smaller house and lost their dream of sending their sons to college without going into further debt.

The additional stress and pressure placed on Arlene and her husband by this situation has turned a difficult situation into an almost unbearable one. To make it even worse, Arlene recently found out that the cancer has spread to her hip, pelvis, lungs and liver.

Through all of this, Arlene has showed tremendous resolve. Despite being in pain and discomfort and forced to use a wheelchair, Arlene desperately wanted to be here today to share her story with you directly. She thought it was

important for everyone to understand not just what the cancer had done to her, but what the effect of having to take on this incredible financial burden had done to her physical health, mental strength and family resources.

Due to her condition, Arlene's treatment finally is being paid because she qualified for disability. But to this day, Arlene is convinced that her cancer would not have spread had she been able to afford regular visits to an oncologist.

Arlene's energy and determination to fight this disease and remain positive are amazing. I feel lucky to know her and to have worked with her. I only wish that as the program coordinator, I could have done more--that I could have assured her that any treatment she needed would be paid for and that she wouldn't have to spend time dealing with bank statements, mortgages or packing boxes on top of everything else.

In summary, we hear over and over again that early detection saves lives. In actuality, early detection alone does nothing but find the disease; detection must be coupled with guaranteed, quality treatment to actually save lives.

We must pass the Breast and Cervical Cancer Treatment Act to make sure that screening and treatment always go together.

I would like to thank the National Breast Cancer Coalition for its leadership role in working to get this legislation passed and thank the members of Congress here today for sponsoring and supporting this legislation.

Appendix D

Prescription Drug Pricing Survey Locations in the 10th Congressional District in Massachusetts



Library of Congress, Geography and Map Division
May, 2000