An insurance company perspective on smoking

MICHAEL J. COWELL

In April of 1964, within three months of the publication of the first report of the Surgeon General on Smoking and Health, State Mutual Life Assurance Company took what was then considered a bold step in the insurance industry. The company pioneered the concept of using a person's smoking habits as an insurance risk factor and introduced a special life insurance policy at discounted rates for those who did not smoke cigarettes.

State Mutual based its action on the belief that persons who choose not to smoke should not be made to subsidize insurance costs resulting from cigarette smokers' extra death claims. As a mutual company owned by policyholders, it had a tradition stretching back to the early 19th century of providing life insurance at cost.

State Mutual did not take this action out of a belief that smoking was immoral. Rather, the statistical evidence of much higher death rates among persons who smoke was so overwhelming that the company could no longer ignore it in pricing insurance.

This article discusses the key implications of incorporating the smoking risk in insurance underwriting; the principal findings from State Mutual's experience and that of other companies; and the changes that the company's efforts have brought about in the awareness of the smoking risk among insurance consumers.

1964: "IT CAN'T BE DONE"

In hindsight this move may not seem that bold. However, viewed in light of smoking habits in 1963, just before the Surgeon General's first report was published, it was a radical step. At that time, more than half the adult men and over 30% of adult women in the US smoked cigarettes. State Mutual's market 20 years ago was still predominantly male—like many traditional institutions, the company was only beginning to cultivate the newly emerging female insurance market. The concept of a premium discount for what was a minority of the market was viewed by many in the business as a risky venture at best, and reactions ran the gamut from healthy skepticism to outright ridicule. As recently as the year prior, the Society of Actuaries had sponsored a panel discussion on using smoking as a risk factor, the general consensus being that this was totally impracticable in underwriting life insur-

Fortunately for State Mutual, in spite of all the experts who said it could not be done—or that it could not be done cost effectively—the company's new policy was well-received in the marketplace. Within a year non-smoker policies accounted for 30% of State Mutual's new individual life insurance sales. Soon other companies began to recognize that smoking was a significant factor in life and

health insurance claims. With increased public attention in the late 1960s and early 1970s on the health effects of smoking, State Mutual's action was coming to be viewed as more than just a change in underwriting and pricing. What the company had pioneered was much more than a reclassification of risk. It was, in fact, the beginning of a change in the way that insurance companies would come to view smoking. Also, the offer was a financial incentive for those who had given up smoking, and an opportunity for those who had never started, to benefit from their favorable health habits.

By the mid 1970s, State Mutual had extended non-smoker pricing to virtually all its individual life and disability business and was beginning to develop statistically credible claims data. But other factors were also emerging. For one thing the nation's smoking habits were undergoing rapid change. Throughout the late 1960s and continuing into the 1970s, smoking among men declined by about one percentage point a year, falling below 40% by 1975 and below 33% by 1980 (Statistical Abstract of the US 1984). Among women, following a slight increase in the late 1960s, the incidence of smoking began to decline, and by 1975 had fallen below 30%. Data from the National Center for Health Statistics suggest that the incidence of cigarette smoking in 1984 was only slightly above 30% for men and below 30% for women.

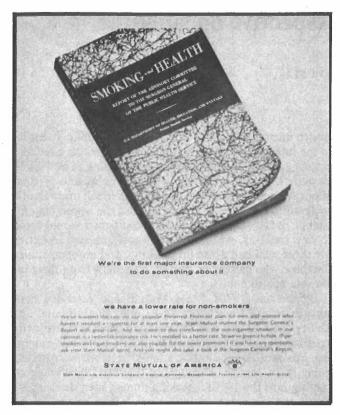
Another trend was the increasing number of major insurance companies offering non-smoker discounts—from a handful in the late 1960s to several dozen by the late 1970s. In addition to solid statistical data on mortality differences between smokers and non-smokers, companies were accumulating valuable experience in how to underwrite the smoking risk.

One of the most common questions about underwriting practices is the extent to which people misrepresent their smoking habits. No doubt a small percentage of clients are less than honest with themselves—and with the company. But, if anything, with the change in smoking habits over the past 20 years, there are far fewer casual smokers those smoking less than 10 cigarettes a day. And since men had traditionally smoked much more than women, it was they who led in quitting. Men make up the majority of the 33 million former smokers, who comprise 21% of the adult population. Another 75 million, or 46% of the population, claim to have never smoked, leaving 52 million, or about 32%, as current smokers. On the basis of the 600 billion cigarettes consumed in the US in 1984, it is estimated that these 52 million people smoked, on the average, about a pack-and-a-half a day. At that level of consumption it is difficult—though not impossible—to escape detection from an experienced underwriter.

STATE MUTUAL REPORT OF 1979

With that background in mind, it is worthwhile to con-

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Original advertisement that State Mutual ran in 1964 when the nonsmoker discount was introduced.

sider the key findings of State Mutual's 1979 study that became the basis for its report, "Mortality differences between smokers and non-smokers."* First, the company analyzed the death claims between 1973 and 1978 of individuals who had purchased policies issued between 1964 and 1968 on a so-called "regular" basis, meaning they didn't qualify as nonsmokers. State Mutual compared these to the deaths of those who were similar in all other respects except that they qualified for the nonsmoker policy. The analysis showed the following:

- Cigarette smokers were subject to mortality significantly higher than nonsmokers—specifically, two to two-and-a-half times, in the aggregate.
- Compared to nonsmokers, death rates for smokers were 15 times as high for respiratory cancer; almost four times as high for other respiratory diseases; and three times as high for heart disease
- These differences emerged at early durations. Contrary to what the company had believed, the extra death claims were not deferred to older ages.
- The differences were statistically significant at a level above 99.99%.
- They were far too large to be ignored for insurance underwriting and pricing purposes.

After the company published its report a number of other companies also presented their statistics. The only surprise was how closely their results paralleled State Mutual's. It came as quite a surprise to some of them that the mortality differences between the smokers and nonsmokers were as large as they were. Ironically, two other com-

* Cowell MJ, Hirst BL: Mortality differences between smokers and nonsmokers. Transactions of the Society of Actuaries 1980; 32:185-261. panies had taken a look at the statistics, but were reluctant to publish them. Until State Mutual issued its report, they simply could not believe the magnitude of the differences they were coming up with. Even now, more than 20 years after State Mutual made the distinction, executives of other companies who have only recently separated out nonsmokers express amazement at the extra mortality among the smokers.

One of the most talked about statistics emerging from the study was the difference in life expectancy between smokers and nonsmokers. State Mutual had for some time taken the position that aggregate life expectancy figures, based on a composite population of smokers and nonsmokers, were meaningless, because they did not reflect the experience of any homogeneous group. On the basis of population data and government studies in the US, Canada, Britain, Sweden, and Japan, the Surgeon General concluded that a nonsmoking man age 32 could expect to live eight to nine years longer than his smoking counterpart. State Mutual calculated that a healthy male nonsmoker age 32 just underwritten for life insurance would outlive an average smoker the same age by almost seven years.

Data on women were far more limited. On the basis of a much smaller sample size, similar mortality patterns were found between smoking and nonsmoking women, although the absolute numbers and the differences in longevity were not as significant as for men. Some of this has to do with the differences in smoking habits between the sexes. The typical woman smoker consumes fewer cigarettes than her male counterpart. This is not to say that smoking is not a problem among women; recent studies by the US Surgeon General have indicated that women smokers are, indeed, subject to the same risks as men. It is simply that smoking among women was not perceived as being as serious until they began to take up the habit in record numbers in the decades following World War II. State Mutual was also interested to learn from the Surgeon General's reports that smoking among women is slightly more prevalent at middle and upper income levels. In the managerial and professional ranks, female smoking patterns come closer to matching those of males. For example, a 1975 government survey found almost 40% of nurses smoking—one of the highest percentages among a group of predominantly female professionals. Among men, on the other hand, the incidence of cigarette smoking falls off at higher income and educational levels.

In their 1979 study of mortality differences between smokers and nonsmokers, the State Mutual authors acknowledged that they had only scratched the surface of what they believed would be a vast new area for investigation. Their data base is derived from the experience of healthy individuals selected for life insurance, a group whose life expectancies would be generally more favorable than those of the overall population. While their study should thus be interpreted with this caution in mind, they do demonstrate remarkable parallels between the excess mortality of smokers in the insurance population to that found in the general population.

REWARDING HEALTHY HABITS

These patterns of cigarette usage by occupational class

have considerable significance for insurance companies like State Mutual that target their markets to specific socioeconomic segments of the insurance buying public. One insurance company has gone so far as to announce that it is no longer actively soliciting life insurance among smokers. State Mutual is not convinced of the business wisdom of such a move. In 1961, State Mutual introduced discounts for nonsmokers as a means of pricing insurance more fairly. It was not the company's intention to encourage an underwriting system that excluded a significant segment of the market. Given their higher risk of sickness and death, it would seem that smokers have an even greater need for insurance than nonsmokers. State Mutual simply wanted to make sure that smokers paid for the higher insurance risk related to their habit.

The company foresees several additional insurance classifications that reward favorable health habits, without denying coverage to those who need it the most. State Mutual has extended nonsmoker discounts to individual disability insurance and to small groups of persons underwritten individually. It has also incorporated smoking habits as a risk factor in a new group health insurance program called "Wellcare." This novel approach to containing health care costs and helping people stay healthy encourages employers to pass along to employees the lower health costs that result from not smoking and from other favorable habits.

By following these examples, the insurance industry is accomplishing several objectives. First, it is providing financial incentives to those who maintain good health hab-

Current Mortality Charges Per \$1,000 of Insurance at Four Ages for State Mutual's Popular Universal Life Insurance Policy

Age	Male		Female	
	Non-Smoker	Smoker	Non-Smoker	Smoker
25	\$1.22	\$ 1.71	\$0.93	\$1.23
35	\$1.35	\$ 2.11	\$1.21	\$1.84
45	\$2.66	\$ 5.03	\$2.40	\$3.93
55	\$5.49	\$11.81	\$4.61	\$7.08

its. Second, the types of risk classification on which these incentives are based put primary emphasis for health under the personal control of the individual. A third objective—one that most insurance managers find appealing—is that segmenting the market along smoking lines has turned out to be a profitable business decision in terms of the quality and quantity of insurance that is sold to non-smokers (Table).

Lastly, there may well be a role for the insurance industry that goes beyond the traditional function of passively observing trends in sickness and death and putting a price on them in the form of life and health insurance premiums.

Emphasis on preventive medicine and greater acceptance of personal responsibility for one's health—staying healthy, as contrasted with seeking treatment for illness—will present insurance companies with a new challenge.

INSURANCE INCENTIVES FOR NOT SMOKING

In December 1984, the National Association of Insurance Commissioners (NAIC) recommended that insurance companies voluntarily offer a 25% to 50% insurance discount on health insurance for nonsmokers who keep their weight and blood pressure down.

The proposal represents a shift in the attitudes of the insurance industry and the belief that health care costs will not decrease until people take responsibility for their own health. Currently, many companies offer lower rates to nonsmokers for life insurance. But a great majority of health insurance companies have not lowered their rates for nonsmokers despite the known ill health effects to those who do smoke. Moreover, according to William P. Daves Jr, a member of the Texas State Board of Insurance and chairman of the NAIC Task Force on Health Promotion, "group health insurance is the only form of insurance left that doesn't calculate its rates according to risk factors."

The NAIC proposal is being tested by the Blue Cross and Blue Shield Company of Southwestern Virginia; for community rated groups, a 3% discount is offered if 80% of the subscribers are nonsmokers and a 7% discount is offered if all the subscribers do not smoke.

To promote the idea of adjusted rates for nonsmokers, Action on Smoking and Health (ASH) Executive Director John Banzhaf appeared at a press conference sponsored by the NAIC. He presented evidence that shows that smoking greatly increases health care costs by, for example, increasing hospital stays and worsening less serious health conditions. A George Washington University task force testifying with Banzhaf cited figures that showed how smoking increases the nation's annual health care costs by a minimum of \$11 billion.

Banzhaf said that the current policy was not only unfair but possibly illegal. He said the differential rates would end the mandatory subsidy of nonsmokers and provide smokers with an incentive to stop. Banzhaf also offered the NAIC three criteria concerning risk factors: the risk factor must cause a substantial increase in health care costs; it must be subject to easy and objective verification; it must be subject to change by the insured and, if changed, result in lower health care costs.

The NAIC consists of commissioners from all 50 states who regulate insurance rates and the insurance industry. Because their approval is required for most rate increases, and they are influential in proposing insurance legislation, the NAIC is capable of encouraging the adoption of the proposal by the health insurance companies.

In Congress, Senator David Durenberger (R-Minnesota) has put forward a bill entitled Medicare Cost Incentives for Non-Smokers (S-357), which calls for lower Medicare premiums for elderly persons who do not smoke than for those who do.

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(Sources: ASH Smoking and Health Review, Family Practice News, The New York Times)

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