

GENETIC TESTING AND INSURANCE: APOCALYPSE NOW?

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I. INTRODUCTION

Deciphering the mysteries of the human genome holds the potential for great benefits in medicine and for society in general. At the same time, the ability to reveal innate differences among people poses a threat to many of our egalitarian institutions. Insurance, to the extent it levels the financial risk associated with death, illness, and injury by spreading the burden of the unfortunate few among the many who are insured, is one such institution.

Even now, before the expected boom in genetic testing,¹ there is strong evidence insurers are discriminating against those genetically predisposed to illness. At least one study indicates insurance discrimination

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1. Michael McGinnis, director of the United States Office of Disease Prevention and Health Promotion, predicts by the year 2000, most people will be getting genetic health profiles. McAuliffe, *Predicting Diseases*, U.S. NEWS & WORLD REPORT, May 25, 1987, at 64-65. At least one insurance industry representative believes genetic testing probably will become standard medical practice within a decade and may render obsolete traditional underwriting parameters such as cholesterol, coronary risk profiles, and family histories. Pokorski, *The Genetic Testing Debate: New Technologies Present New Challenges in Risk Selection*, 20 J. INS. MED. 57, 57 (1988). In 1989, Congress initiated the Human Genome Initiative and allocated approximately \$100 million annually to map and sequence human genes. Annas, *Mapping the Human Genome and the Meaning of Monster Mythology*, 89 EMORY L.J. 629, 643 (1990).

poses a greater problem for such persons than bias in the workplace, schools, and other areas of differential treatment.²

The dilemma that genetic testing poses for insurers is not lost on the industry itself. The industry has started to formulate a collective position concerning genetic testing. It is warning individual companies against hasty actions that could provoke negative reactions by the public and the government. The industry hopes genetic testing will reduce unexpected losses, thereby increasing companies' return on investment and reducing premium costs for many customers. However, the industry's vision of genetic testing also has an apocalyptic side. It fears the issue will spin out of control and drag the industry into a regulatory death struggle.³ As the chairman of an industry task force said, "The new genetic tests being developed can either be the greatest aid to underwriting we've ever seen or our worst nightmare."⁴

Proponents of universal health insurance have already added genetic testing for disease to their battle cry for nationalized health care.⁵ They argue the new technology will allow insurers to "weed out" the higher risks and create a "caste system based on vulnerability."⁶ A study by the Office of Technology Assessment ("OTA") concludes the use of genetic medical tests for diagnostic purposes will aggravate the shortcomings of the nation's

2. See generally P. Billings, M. Kohn, M. de Cuevas & J. Beckwith, *Genetic Discrimination as a Consequence of Genetic Screening* (n.d.) (unpublished manuscript) [hereinafter P. Billings]. The Harvard Medical School researchers solicited reports of genetic discrimination in letters and advertisements placed in a journal and in newsletters sent to professionals and individuals with genetic conditions. *Id.* at 1. Out of 41 incidents that met the authors' criteria for their survey, 32 were related to insurance and 7 were employment related. *Id.* at 32.

3. "Insurers have no current interest in nor enthusiasm for using genetic tests." Address by Robert Pokorski, Gannett Found. and the Found. for Amer. Comm. meeting, at 1 (Nov. 30, 1989) (The Potential Impact of Genetic Testing on Private Insurance) [hereinafter Pokorski Address]. "They have no desire to initiate new screening tests rife with uncertainty and controversy." *Id.* at 8. (Robert Pokorski is medical director of the Lincoln National Life Insurance Company and a member of the American Council of Life Insurance ("ACLI") Genetic Testing Committee).

"If insurers rush into the use of genetic testing without considering all its ramifications, our industry can self-destruct. . . . [T]he premature use of genetic tests by insurers and the publicized harm to individuals that may result from such use might force tight government controls over the entire underwriting process." Address by Ian M. Rolland, ACLI Medical Section meeting, at 9-10 (June 11, 1989) (Demands on the Medical Director in the 1990s) [hereinafter Rolland Address]. (Ian M. Rolland is chief executive officer of Lincoln National Life Insurance Company and chairman of an ACLI task force on genetic testing.)

4. Rolland Address, *supra* note 3, at 8.

5. Kaplan, *Genetic Testing* (National Public Radio, Morning Edition, Sept. 19, 1989).

6. *Id.*

health care system, that is, the problem of the uninsured and underinsured as well as inadequate coverage for catastrophic and long-term health care.⁷

The problem for the private health insurance industry is compounded by setbacks in what has been touted as an alternative to a national system of health care—the creation of high-risk pools intended to provide affordable health coverage for individuals rejected by insurers. At least nineteen states have adopted such pools and more than half of those have started operations since 1986.⁸ The trend toward self-insurance by cost-conscious employers, however, has undercut the risk pools. Self-insuring employers have been deemed exempt from state assessments on insurers that typically subsidize risk pools. This massive loophole, which has few prospects for closure in the near future, has prevented the National Association of Insurance Commissioners ("NAIC") from endorsing state adoption of risk pools. Unexpectedly high losses in some states and other problems also have discouraged the trend toward risk pools.⁹

A survey of Americans conducted by Louis Harris and Associates Inc. found overwhelming sentiment against the use of genetic tests to deny employment or insurance to those likely to have serious or fatal diseases in the future.¹⁰ Three-quarters of the respondents said life and health insurers would not be justified in refusing to insure people even if genetic tests showed they were likely to have a fatal disease later in life.¹¹

The Harris survey indicates Americans would be favorably disposed to extend protection against job and insurance discrimination to persons genetically predisposed to disease. Congress and many state legislatures have created laws restricting discrimination in employment and insurance based on race, gender, and disability.¹² Some states already have approved laws preventing insurers from considering such specific inherited

7. U.S. CONGRESS OFFICE OF TECHNOLOGY ASSESSMENT, MEDICAL TESTING AND HEALTH INSURANCE 21 (1988) [hereinafter OTA STUDY]; see Capron, *Which Ills to Bear? Reevaluating the "Threat" of Modern Genetics*, 39 EMORY L.J. 665 (1990). Genetic technology will force a reexamination of the purpose of health insurance. *Id.* at 694. If its purpose is to spread an individual's health care cost across his or her lifetime, narrow groupings based on genetic risk make sense. *Id.* If the purpose is to "manifest solidarity" in the face of misfortune, such narrowing of insurance pools is unacceptable. *Id.* at 694-95.

8. See *infra* notes 65-86 and accompanying text.

9. *Id.*; see also MODEL HEALTH INS. POOLING MECHANISM ACT (1984).

10. Hamilton, *The Giant Strides in Spotting Genetic Disorders Early*, BUSINESS WEEK, Nov. 18, 1985, at 85, 85.

11. The 1985 survey involved 1254 adults. *Id.* They were asked whether employers should have the right to test for genetic disease that might occur years in the future, (86% no, 11% yes); whether an employer should have the right to refuse to hire someone whom tests show is likely to have a serious disease, (82% no, 15% yes); whether employers should be able to bar people genetically prone to stress-induced heart attacks or strokes from stressful jobs, (61% no, 35% yes); and whether insurers would be justified in refusing to insure the lives or health of people likely to have fatal genetic diseases, (75% no, 21% yes). *Id.*

12. See *infra* notes 196-209 and accompanying text.

conditions as Tay-Sachs and sickle cell gene.¹³ Insurers must determine to what extent similar measures will be implemented as people are determined to be genetically predisposed to serious illness.

In the insurance industry's first assessment of the potential role of genetic testing, the Genetic Testing Committee of the American Council of Life Insurance ("ACLI") said insurers should anticipate resistance to the use of genetic tests.¹⁴ One reason is the public's belief that innate, unalterable differences should not be the basis for discrimination.¹⁵ The report suggests genetic testing could be absorbed comfortably as an extension of existing insurance underwriting practices if it did not play so powerfully to certain preconceptions.¹⁶ The report says such preconceptions include the mistaken belief that people have a right to affordable private insurance and that large numbers of people will be disqualified through the use of genetic tests.¹⁷

The industry's key argument for the use of genetic testing is analogous to that used by the industry to justify testing for the AIDS virus. The stakes, however, are higher.¹⁸ The basis of the argument is that barring insurers from access or use of genetic test results will invite applicants who know they are at high risk of death or illness to purchase insurance at rates that do not reflect that risk.¹⁹ So-called adverse selection will drive premium rates higher for everyone and create a heightened subsidy effect.²⁰ This will destabilize the insurance industry and possibly drive low-risk individuals out of the market entirely.²¹

The ACLI report stresses the total impact of genetic tests on insurance risk classification will become clear only after decades of experience and

13. *Id.*

14. Pokorski, *Public and Government Relations Issues*, in REPORT OF THE GENETIC TESTING COMMITTEE TO THE MEDICAL SECTION OF THE AMERICAN COUNCIL OF LIFE INSURANCE: THE POTENTIAL ROLE OF GENETIC TESTING IN RISK CLASSIFICATION 7, 9 (1989).

15. *Id.*

16. *Id.*

17. *Id.* "[I]t is important to emphasize the need for public education in the next decade. Studies continue to show that a significant number of people think that risk classification is unfair. Unless public awareness of the need for risk classification is raised, these perceptions could worsen if genetic tests were ever used to classify risks." *Id.* at 17.

18. See *infra* notes 139-41 and accompanying text. In fact, insurers see genetic testing as bringing a new level of the type of scrutiny that AIDS testing caused. See Rolland Address, *supra* note 3, at 11 ("AIDS focused public attention on risk classification and our need to test. Genetic testing will take over where AIDS leaves off.").

19. See Pokorski, *supra* note 14, at 9.

20. *Id.* at 11-12.

21. Battista, *Genetic Data: Impact on Underwriting*, in REPORT OF THE GENETIC TESTING COMMITTEE TO THE MEDICAL SECTION OF THE AMERICAN COUNCIL OF LIFE INSURANCE: THE POTENTIAL ROLE OF GENETIC TESTING IN RISK CLASSIFICATION 23, 24 (1989).

technological refinement.²² The potential impact, however, seems great. At least one authority reported as many as seventy-six incidents of genetic disease per 1000 live births.²³ This number includes chromosomal disorders like Down's Syndrome, so-called single gene disorders such as hemophilia and adult polycystic kidney disease, and diseases caused by more than one gene such as some types of diabetes and congenital heart disease.²⁴ Insurance premiums are based on extremely low death rates for some population groups, particularly persons who are not yet middle-aged. Even a small increase in the total number or value of policies attributable to high-risk persons could cause a sharp increase in standard premium rates for those groups.²⁵

This Article examines the role of insurance in this country as it pertains to genetic testing and critically evaluates the arguments employed by the insurance industry in defense of its underwriting practices. Part II describes the role of private insurance, how insurers screen for health problems, and the trend toward state-created high-risk insurance pools. Part III discusses how genetic testing works and the prospects for its proliferation. Part IV describes the relationship between genetic testing and adverse selection and evaluates the dangers predicted by the insurance industry. Part V traces the history of insurance regulation in view of the industry's arguments against government interference and examines the trend toward limits on risk classification. Part VI suggests genetic testing carries the seeds for insurance reform but demands greater sophistication in the public debate over the role of private insurance.

II. INSURANCE IN THE UNITED STATES

In the United States private insurance occupies a central role in providing access to health care and individual financial security.²⁶ Life and disability insurance are important options for Americans wanting to safeguard their families.²⁷ Private health insurance has been the centerpiece of

22. *Id.* at 25.

23. *Id.* at 23.

24. *Id.*

25. *Id.* at 23-24.

26. American public policy generally has relied on private insurance carriers to provide individual financial security. Americans buy almost half of the private insurance sold in the world. See Wortham, *Insurance Classification: Too Important to be Left to the Actuaries*, 19 U. MICH. J.L. REF. 349, 353 (1986); see also Oppenheimer & Padgug, *AIDS: The Risks to Insurers, the Threat to Equity*, HASTINGS CENTER REP. 18, 18-19 (1986).

27. Wortham, *supra* note 26, at 353.

payments for health care since the 1930s, and the great majority of Americans rely on private insurance to gain access to medical care.²⁸

Inadequacies in health care have led to criticism of the private insurance system. Approximately thirty-seven million Americans have neither health insurance nor access to government medical programs.²⁹ Another eighteen million people have inadequate health insurance.³⁰ The plight of these roughly fifty-five million people has led to continuous calls in Congress for a universal health care program.

Unlike most other American industries, the insurance industry has a social purpose. This is reflected by the overall regulation of insurance, the federal tax subsidy given employer-provided benefit plans, and state-mandated benefits in the case of health insurance.³¹ The special tax treatment, in particular, has helped make employee group plans the predominant type of health insurance.³² Compensation paid to employees in the form of wages is subject to income tax, but compensation in the form of health benefits is not taxed.³³ Buying an individual health policy requires payment in after-tax dollars, but coverage through one's employer is tantamount to paying with pretax dollars.

Of those who have private health insurance, an estimated ninety percent are covered through group insurance plans rather than by individual policies.³⁴ Nearly half of the people with life insurance are also covered under a group plan.³⁵ The tax subsidy, cheaper per capita administrative costs, and generally better than average health of insured groups—particularly employee groups—combine to make group insurance significantly less expensive than individual policies.³⁶ The advantages of group health plans flow to those who need them least because participants tend to be healthier and fully employed.

An important element of employee-based group plans is that the employer typically pays most or all of the premium costs at a flat rate per employee. If workers paid the premium themselves, the younger, healthier

28. Oppenheimer & Padgug, *supra* note 26, at 18-19. The government health care programs supplement some inadequacies in the private system, most notably Medicaid for the poor and Medicare for the elderly and disabled. *Id.* at 18.

29. The United States Bureau of the Census estimates the number of uninsureds at 37 million; however, other estimates put the number as low as 31 million. See OTA STUDY, *supra* note 7, at 161.

30. *Id.* at 162. Uninsured is defined as "a 1 percent expectation that out-of-pocket expenses for medical care will consume more than 10 percent of family income." *Id.* Other measures result in estimates of 11 million and 38 million. *Id.*

31. See Oppenheimer & Padgug, *supra* note 26, at 19.

32. *Id.*; see also OTA STUDY, *supra* note 7, at 43-44.

33. *Id.*

34. Clifford & Luculano, *AIDS and Insurance: The Rationale for AIDS-Related Testing*, 100 HARV. L. REV. 1806, 1808 (1987).

35. *Id.*

36. OTA STUDY, *supra* note 7, at 43.

employees might opt for less expensive coverage.³⁷ The flat rate works as a cross subsidy with premiums charged for younger and healthier workers subsidizing the older and less healthy employees.³⁸ This represents exactly the type of danger insurance companies see in genetic testing—mandatory subsidies of higher-risk persons by lower-risk individuals.³⁹ Although employer-paid health insurance represents compensation, the employee never sees the funds, and the hidden nature of the payments help to mute any criticism of the cross subsidy.

Group life or group health insurance is generally issued without regard to the age or medical status of individual group members.⁴⁰ Premium rates are usually based on an evaluation of the risk of the entire group or on actual claims of the group in previous years.⁴¹ In contrast, individuals and members of very small groups are not considered "part of a well defined, homogeneous and generally healthy group."⁴² Insurers carefully scrutinize applicants for individual and small group policies before deciding whether to offer insurance and at what terms.⁴³ To accomplish this, insurers typically screen applicants using combinations of questionnaires, physician statements, and medical examinations.

A. *Health Insurance Testing*

A survey conducted by the OTA shows the scrutiny private health insurers give to individual applicants.⁴⁴ The survey found eight percent of individual applicants are rejected outright and another twenty-eight percent either pay more than the standard premium or receive substandard coverage that typically excludes certain illnesses or types of coverage.⁴⁵ Coverage may be denied due to the applicant's medical problems or because the person is outside the insurer's guidelines for acceptable risk due to such factors as the person's age, financial status, or occupation.⁴⁶ Most companies will not insure persons whose probability of disease exceeds the norm for their age and sex by three times.⁴⁷

37. *Id.*

38. *Id.*

39. See Pokorski, *supra* note 14, at 47.

40. See Clifford & Iuculano, *supra* note 34, at 1809 & n.17.

41. See Clifford & Iuculano, *supra* note 34, at 1809; see also OTA STUDY, *supra* note 7, at 5.

42. OTA STUDY, *supra* note 7, at 5.

43. *Id.*

44. *Id.* at 55-92.

45. *Id.* at 62.

46. *Id.* at 65.

47. *Id.*

All commercial insurers require each individual applicant for health insurance to complete a health history questionnaire.⁴⁸ Insurers have different policies about gathering additional information.⁴⁹ The next step is to obtain statements from the applicant's attending physician, but that is required of only about one-fifth of applicants.⁵⁰ An answer on the questionnaire, information about the applicant gleaned from a national databank shared by insurers, or factors such as advanced age can trigger a request for a physician's statement.⁵¹

The survey found actual testing and administering of physical exams are unusual.⁵² An estimated four percent of all applicants are required to undergo the type of blood and urine screening many physicians routinely use as part of a general physical exam.⁵³ Some thirty-eight percent of the insurers surveyed said they never require such screening.⁵⁴

Testing for the AIDS virus has become much more common; however, it is far from routine. The survey found seven out of sixty-one insurers test all individual applicants for the AIDS virus.⁵⁵ Approximately half of the insurers test at least some applicants for the virus,⁵⁶ although the criteria for employing such tests run the gamut, ranging from whether applicants exhibit actual symptoms of AIDS to whether they reside in a high-risk locale.⁵⁷ Participants in group plans do not ordinarily face such scrutiny from insurers.

A recent federal law should help protect persons genetically predisposed to disease from insurance discrimination in the workplace.⁵⁸ The comments of members of Congress who passed the Americans With Disabilities Act ("ADA") in 1990 make it clear the law is intended to prevent employers from discriminating against those shown through genetic testing to be at greater risk of future disease and impairment.⁵⁹ Such protection would extend to hiring and promotion decisions, and also would prohibit employers from discriminating by restricting health insurance benefits.⁶⁰ Victims of such discrimination, however, would be able to receive back wages only.⁶¹ The limitation of such a private right of action

48. *Id.* at 68.

49. *Id.* at 69.

50. *Id.*

51. *Id.* at 72-73.

52. *Id.* at 73.

53. *Id.* at 74.

54. *Id.*

55. *Id.* at 81.

56. *Id.* at 80-81.

57. *Id.*

58. Americans with Disabilities Act of 1990, Pub. L. No. 101-336, 104 Stat. 327 (1990).

59. See 136 CONG. REC. H4628, H4627-28 (daily ed. July 12, 1990).

60. *Id.* at H4628.

61. *Id.*

could severely compromise the purpose of the law,⁶² particularly when employers that are becoming increasingly concerned about health benefits costs have an incentive to screen out those more prone to medical problems.⁶³

B. *Risk Pools and Self-Insuring*

The NAIC drafted a model act establishing a high-risk reinsurance pool.⁶⁴ The act was made in response to calls for a national system of health care.⁶⁵ Connecticut and Minnesota established the first programs in 1976.⁶⁶ At least nineteen states have now adopted such plans with the trend clearly accelerating.⁶⁷ Only seven of the programs were operating prior to 1987.⁶⁸

The details of the various plans differ. About half of the plans include supplemental coverage for Medicare beneficiaries, but the rest do not.⁶⁹ The basic pattern is similar: persons are eligible if they have been rejected by insurers or if they can only obtain insurance at exorbitant rates.⁷⁰ Premiums are capped at rates usually ranging from 125 percent to 150 percent of the average group premium rate offered for comparable coverage.⁷¹ Deductibles typically range from \$200 to \$1000, with correspondingly different premiums.⁷² Participants must pay twenty percent of covered expenses to a stop-loss ceiling ranging from \$1500 to \$3000 for an individual.⁷³ Lifetime benefit caps range from \$250,000 to \$1 million.⁷⁴

Insurers operating in the state are usually assessed for shortfalls in the pool, with some notable exceptions.⁷⁵ Most of the states allow insurers to claim a tax credit against state premium or income taxes equal to the assessment so that the pools are really subsidized by taxpayers.⁷⁶

62. *Id.*

63. See OTA STUDY, *supra* note 7, at 4.

64. Wortham, *supra* note 26, at 397.

65. *Id.*; see also *supra* note 9 and accompanying text. The NAIC has never endorsed the model act.

66. See OTA STUDY, *supra* note 7, at 170; see also *Comprehensive Health Insurance for High-Risk Individuals*, Communicating for Agriculture, Inc. (1988) (with updating summaries).

67. OTA STUDY, *supra* note 7, at 169-80.

68. *Id.*

69. *Id.*

70. *Id.*

71. *Id.*

72. *Id.*

73. *Id.*

74. *Id.* at 171.

75. *Id.* Maine taxes hospital revenue from patient services. *Id.* at 169. Illinois uses general revenues. *Id.* Wisconsin partially subsidizes its plan through general revenues. *Id.*

76. *Id.* at 169-80.

Risk pools reflect a growing concern for the thirty-seven million Americans who are uninsured. The AIDS epidemic, as well as the development of genetic tests and other tools enabling identification of high-risk individuals, have also stimulated interest in risk pools. In 1988, former President Reagan instructed the Secretary of Health and Human Services to formally encourage states to adopt risk pools as part of a response plan to the AIDS crisis.⁷⁷ Risk pools, however, are at best a partial solution because those who belong to such plans number fewer than 50,000.⁷⁸

The plans offer little assistance to the large number of uninsureds and underinsureds whose main problem is insufficient funds to pay for insurance. Risk pools still require participants to have the means to pay insurance premiums that are substantially higher than group rates. Under Connecticut's plan, for example, a thirty-five-year-old woman would have to pay more than \$1200 a year for a policy with a \$1000 deductible, a twenty percent coinsurance charge and a \$1 million benefit cap.⁷⁹

Meanwhile, the trend toward self-insuring and the unexpectedly high cost of risk pools in some states has blunted earlier enthusiasm for them.⁸⁰ Judicial interpretation of the Employee Retirement Income Security Act of 1974 ("ERISA") has also exempted self-insurance plans from state regulations, including mandatory assessments for the high-risk pools.⁸¹ The result, say insurers, is that self-insuring undercuts the risk pools and places insurers at a competitive disadvantage by forcing them to shoulder the entire cost of such pools.⁸²

Self-insuring is one of the major changes in health insurance in recent years.⁸³ As employers have become more cost conscious their use has increased dramatically. A 1986 survey found sixty percent of employers selfinsure compared to forty percent in 1982.⁸⁴ Self-insuring can reduce administrative costs, give companies investment income from cash that formerly would have been held by insurers, and allow employers to benefit more directly if they can reduce insurance claims.

Some states have discovered risk pools are more costly than anticipated and fail to bridge most of the overall gap in health care coverage.⁸⁵ Concern over this trend prompted the NAIC to create a special committee to

77. See *Comprehensive Health Insurance for High-Risk Individuals*, *supra* note 66, at 5.

78. See generally *id.* Claims totalled \$61 million in 1988. Minnesota has the most participants with more than 14,000. No other program has more than 4000 policyholders.

79. OTA STUDY, *supra* note 7, at 169.

80. See Clifford & Iuculano, *supra* note 34, at 1822.

81. *Id.* at 1823.

82. *Id.* at 1824.

83. OTA STUDY, *supra* note 7, at 111.

84. *Id.*

85. *Id.* at 32.

study the problems.⁸⁶ Other concerns are that influxes of AIDS patients will dramatically increase costs and that insurance companies and small employers will continue to use the pools to unload high-risk individuals, a process referred to as "risk dumping."⁸⁷

III. GENETIC TESTING

The new methods in genetic testing are a tremendous breakthrough in the long history of detecting inherited diseases. It is a history that has already demonstrated tremendous medical benefits as well as the potential for abuse.

In 1934, Norwegian physician Ashborn Folling discovered that fresh urine from some mentally retarded children changed color in the presence of ferric chloride.⁸⁸ Improved tests and the discovery that infants with phenylketonuria could be treated with a dietary regimen to compensate for the genetic disorder led to widespread mandatory testing of newborns in the 1960s.⁸⁹ Today, newborns in all states are screened for genetic conditions amenable to effective treatment.⁹⁰

A similar movement for mandatory testing for sickle-cell anemia began in the early 1970s with little success. Almost immediately, employers and insurers began discriminating against both those who had the illness and many more who carried the sickle cell gene but did not have the disease.⁹¹ Mandatory laws were hastily scaled back and replaced with voluntary programs in many states.⁹²

Currently, widespread testing for genetic conditions is limited to newborns and fetuses.⁹³ In all states, newborns are screened for one or more genetic conditions amenable to effective treatment, including metabolic disorders such as phenylketonuria that are detected through biochemical assays that react to chemicals produced by the disorder.⁹⁴ A sec-

86. Mary Jane Cleary, South Dakota Director of Insurance, personal communication, December 14, 1989 (Ms. Cleary chairs the NAIC committee); Carol Olsen, staff attorney of the NAIC, personal communications, December 13, 1989; Rod Warner, North Dakota Department of Insurance Market Conduct Examiner, personal communications, January 12, 1990.

87. Minnesota officials have proposed institutionalizing "risk dumping" by allowing employer group plans and insurers to place high risk and high cost enrollees into the state pool. Such a change would require new assessment procedures and a payroll tax is one method suggested. *See Comprehensive Health Insurance for High-Risk Individuals*, *supra* note 66, at 5-6.

88. P. REILLY, GENETICS, LAW, AND SOCIAL POLICY 44-49 (1977).

89. *Id.*

90. M. Hewitt & N. Holtzman, The Commercial Development of Tests for Human Genetic Disorders, (Feb. 1988) (unpublished Office of Technology Staff Report).

91. P. REILLY, *supra* note 88, at 65, 74.

92. *Id.*

93. *See* M. Hewitt & N. Holtzman, *supra* note 90, at 4.

94. *Id.* at 5.

ond technique is chromosomal analysis, a test that identifies gross chromosomal abnormalities. This technique is used to detect Down's Syndrome.⁹⁵

The recombinant DNA technologies developed in the late 1970s produced new techniques for looking directly at the genes themselves.⁹⁶ DNA is a macromolecule that consists of two chains bound together at numerous points by chemical bridges of different compositions, producing a double helix.⁹⁷ The new technology enables researchers to analyze the chemical connectors that bind the double chains and determine their type.⁹⁸ Through various techniques, researchers have developed methods to detect abnormal sequences within the double helix that are associated with particular diseases.⁹⁹ As research continues, use of so-called genetic probes to find such abnormalities will become less expensive and less time consuming.¹⁰⁰ At the same time, more will become known about the roles particular abnormalities play in relation to diseases.¹⁰¹ Both developments will make genetic testing more useful as a medical diagnostic tool.¹⁰²

One type of testing couples DNA analysis with research of families in which a particular genetic disease occurs.¹⁰³ By comparing DNA material from healthy family members with that from members known to have the disease, the genetic abnormality can be isolated.¹⁰⁴ Other members of that family then can be tested to see whether they carry the unusual gene.¹⁰⁵ This technique, called linkage analysis, is used to determine who is likely to have Huntington's disease, cystic fibrosis, a common type of muscular dystrophy, hemophilia A and B, or other illnesses.¹⁰⁶ The family-based linkage analysis is needed for these diseases because the precise genetic abnormality causing the illness can vary from family to family.¹⁰⁷ Because each test involves multiple family members and relatively complicated techniques, they are expensive.¹⁰⁸

Researchers will more likely use a direct genetic test, such as that used to detect sickle cell anemia.¹⁰⁹ Once a disease-causing gene has been located and chemically identified, genetic probes can test for it without any

95. See Lappe, *The Limits of Genetic Inquiry*, 17 HASTINGS CENTER REP. 5, 5-6 (1987).

96. See OTA STUDY, *supra* note 7, at 133.

97. *Id.* at 134.

98. *Id.*

99. *Id.* at 139-40.

100. *Id.* at 139.

101. *Id.*

102. *Id.*

103. *Id.* at 138; see also *Potent Tool Fashioned To Probe Inherited Ills*, N.Y. Times, Aug. 11, 1987, at C1, col. 3.

104. OTA STUDY, *supra* note 7, at 138.

105. *Id.*

106. *Id.*

107. *Id.*

108. *Id.*

109. *Id.* at 139.

analysis of family members.¹¹⁰ Aside from sickle-cell anemia, the direct tests now available are limited to relatively rare diseases, although technological difficulties limiting the use of such tests are being overcome.¹¹¹

Despite the rapid pace of breakthroughs in technology and research and the government-sponsored push toward producing a human genetic map, obstacles still hamper the widespread use of genetic testing.¹¹² Interpreting the results of genetic tests can be difficult and primary-care physicians have little exposure to genetics in medical school.¹¹³ Although some of the more rare diseases can be predicted with some confidence based on genetic tests, more common ailments like heart disease and various cancers depend on many factors, such as multiple genes, diet, lifestyle, and environmental influences.¹¹⁴

Despite these obstacles to wide-scale genetic testing, companies involved in the research and sale of genetic tests are working intensively to bring them to market. Many expect dramatic growth in the use of genetic tests. One influential publication predicts close to a \$1 billion market by 1992.¹¹⁵ This prediction does not even compare to 1986 sales of only \$250 million.¹¹⁶ The growth in testing is expected to occur for relatively common diseases such as Alzheimer's, cancer, diabetes, and heart disease.

Some of the research produced promising results. One study analyzed particular variations in DNA located near a gene that is associated with the production of a certain type of cholesterol.¹¹⁷ The authors concluded persons having a particular variation at that genetic location were at least ten times more likely to have coronary heart disease than those who did not.¹¹⁸ In comparison, thirty-five-year-old men who have high cholesterol are considered approximately four times more likely to have heart disease.¹¹⁹ Similar research is under way for various cancers, mental illness, and AIDS.¹²⁰

Some companies have established clinical service laboratories that offer testing for such disorders as Huntington's disease, cystic fibrosis, adult polycystic kidney disease, and hemophilia.¹²¹ Tests for more com-

110. *Id.*

111. *Id.*

112. *Id.* at 140.

113. *Id.*

114. See McAuliffe, *supra* note 1, at 65.

115. *Id.*

116. M. Hewitt & N. Holtzman, *supra* note 90, at 3.

117. OTA STUDY, *supra* note 7, at 151.

118. *Id.*

119. *Id.* at 151-52.

120. McAuliffe, *supra* note 1, at 66-67.

121. M. Hewitt & N. Holtzman, *supra* note 90, at 1, 3.

mon diseases are being developed.¹²² The sale of genetic testing kits constitutes a relatively small market now, but it is expected to grow quickly as tests are further refined and simplified.¹²³

A survey of a dozen companies working on genetic testing found they overwhelmingly expect genetic clinics, health department clinics, and health department screening programs to be important sites for genetic testing in the short term, compared to primary-care physicians, insurers, or employers.¹²⁴ But more than two-thirds of the companies said they expect insurers to use genetic test results in their evaluation of prospective clients by the year 2000.¹²⁵

IV. ADVERSE SELECTION

As genetic testing becomes incorporated into American medicine, it will become a part of the insurance underwriting process through health history questionnaires, attending physician statements, and limited direct testing.¹²⁶ Although the insurance industry views such testing with more apprehension than enthusiasm, it seems inevitable genetic testing will become a factor in underwriting decisions as physicians' use of it increases.¹²⁷ The test results will become part of the patient's medical record and an applicant will have to acknowledge the results when filling out medical questionnaires.¹²⁸ Genetic testing results also may be revealed through physicians' statements.¹²⁹

Genetic testing offers both an opportunity and an incentive for some people to misrepresent their medical condition to insurers. After coverage has been purchased successfully, the insured is likely to receive benefits even if it later becomes evident the insured knew genetic tests showed a higher risk of illness. Insurance companies often deny coverage for preexisting conditions or, in the case of life insurance, if important medical information is intentionally omitted from the application.¹³⁰ Genetic testing adds some new twists to these prohibitions.

122. *Id.* at 1.

123. *Id.* at 5.

124. *Id.* at 18.

125. *Id.* at 21-22; *see also supra* note 1.

126. Insurers' use of tests will depend primarily on the infusion of these tests into medical practice. The Lincoln National Life Insurance Company outlined its criteria for use of new medical tests, which included they be understood, accepted, and used by the medical profession. OTA STUDY, *supra* note 7, at 21, 121 n.45.

127. "[A]t some point in the future insurers may be forced to consider using genetic tests if their use becomes standard practice within the medical community." Pokorski Address, *supra* note 3, at 17.

128. OTA STUDY, *supra* note 7, at 19.

129. *Id.*

130. *See id.*, *supra* note 7, at 44-45.

It is doubtful genetic predisposition to a disease would be considered a preexisting condition as currently defined. Model regulations issued by the NAIC define a preexisting condition as:

"the existence of symptoms which would cause an ordinarily prudent person to seek diagnosis, care or treatment" or "a condition for which medical advice or treatment was recommended by a physician or received from a physician within a 5-year period preceding the effective date of coverage of the insured person."¹³¹

Most experts agree that even prior infection with the AIDS virus does not constitute a preexisting condition under this definition, as long as a person is asymptomatic.¹³² Similarly, a person diagnosed with a genetic condition that is certain to result in an illness may not have a preexisting condition.

Furthermore, even if a genetic trait is considered a preexisting condition, or people misrepresent their medical history, most states require health and life insurers to pay claims after a waiting period.¹³³ The period is typically two years from the beginning policy date for life and individual health insurance policies.¹³⁴ This "incontestability clause" seems especially short in the context of genetic tests that may predict illness decades into the future.

Insurers anticipate special difficulties in gaining access to results of genetic tests.¹³⁵ Much genetic testing currently takes place in specialized genetic counseling centers rather than in offices of primary physicians.¹³⁶ The counselor has a duty of confidentiality that extends to physicians.¹³⁷ Thus, physicians' statements may not contain genetic test data.¹³⁸ Obtaining the information from counselors or others who may have conducted tests, such as the military or employers, may be difficult.¹³⁹ Special laws treating genetic information as more sensitive than other medical data and restricting insurers' access would create a similar problem. Such informational gaps would provide an additional opportunity

131. *Id.* at 84 (quoting 1 NAIC MODEL LAWS, REGULATIONS AND GUIDELINES: INDIVIDUAL ACCIDENT AND SICKNESS INSURANCE MINIMUM STANDARDS ACT (1986)).

132. *Id.*

133. See Clifford & Iuculano, *supra* note 34, at 1818.

134. *Id.*

135. Battista, *supra* note 21, at 28.

136. *Id.*

137. See Kobrin, *Confidentiality of Genetic Information*, 30 UCLA L. REV. 1283, 1307-15 (1983).

138. See *id.* at 1308.

139. Battista, *supra* note 21, at 28; see also Fletcher & Wertz, *Ethics, Law, and Medical Genetics: After the Human Genome is Mapped*, 39 EMORY L.J. 747, 806 (1990). More than 90% of American geneticists who participated in one poll opposed giving insurers genetic screening results without the patient's permission. *Id.*

for persons to conceal information about their own genetic conditions and those of family members.

Individuals who know they are more likely to become ill may exploit that knowledge by purchasing more insurance coverage than they normally would; thus, they are engaging in adverse selection.¹⁴⁰ The fear that persons who know they are infected with the AIDS virus will take advantage of the insurance system in this manner drove insurers towards their testing programs.¹⁴¹ A corresponding fear in the context of genetic testing has insurers adamantly opposed to any restrictions on their use of genetic test results.¹⁴²

Evidence shows adverse selection is already occurring among those with diseases.¹⁴³ As the insurance industry suggests, it seems inevitable individuals facing an abnormally high risk of sickness will hedge against the possibility by tipping the insurance odds their way, especially if the financial security of their families is at stake. As genetic testing becomes more effective it will provide an earlier warning of potential health problems. For many people who are more genetically prone to illness, however, this creates a greater possibility for insurance discrimination and the obvious response—adverse selection.

The insurance industry fears restrictions on its use of genetic test data will encourage adverse selection at a level that will jeopardize the availability of private insurance.¹⁴⁴ Good risks would subsidize bad risks, driving the cost of premiums higher. This would cause good risks to flee to other insurers or leave the market altogether. Further premium hikes would be required to pay for the increased proportion of bad risks. The cycle

140. See Clifford & Iuculano, *supra* note 34 at 1817.

141. "Thus, the very nature of AIDS renders the usual protections against adverse selection minimal at best. Blood tests taken before the commencement of coverage that are positive for ... [the AIDS virus] might prompt an insurer to utilize a pre-existing condition exclusion." *Id.* at 1820. A 1985 survey by the ACLI and Health Insurers Association of America found that AIDS-related life insurance claims heavily concentrated in the first two years after issuance of policies (44% of claims amounts). *Id.* at 1817. Three hundred and twenty-five member companies responded to the survey. *Id.* at 1817 n.5. "This pattern strongly suggests that these individuals knew or suspected that they had been infected by the AIDS virus prior to the time they purchased insurance." *Id.*

142. See generally Pokorski, *supra* note 14.

143. The coordinator of the Huntington's Disease Research Center believes some of his patients who test positive then apply for more insurance without informing the insurer, or their primary care physician, of their condition. Interview with Richard Myers, Coordinator of the Huntington's Disease Research Center, in Boston, Massachusetts (March 21, 1989).

See also P. Billings, *supra* note 2, at 9 ("Because of fear of discrimination, several respondents withheld or 'forgot' to mention potentially important medical or family history information to physicians, employers, insurers and others. Even insurance agents advocated that clients give incomplete or dishonest information on insurance application forms.").

144. See generally Pokorski Address, *supra* note 3.

would repeat itself in an "assessment spiral" that would financially destroy insurers and make insurance cost prohibitive.¹⁴⁵

The industry's analysis, however, is exaggerated and flawed in several key respects. First, it is premature to paint a doomsday scenario when the extent of any adverse selection is unclear. Indeed, insurance companies already encounter adverse selection and at current levels it apparently is not an insurmountable problem.¹⁴⁶ Genetic testing will not create more illness and should cause a reduction in future medical costs through early prevention. Because good risks already are subsidizing bad risks, genetic testing should have an effect only to the extent it brings more poor risks into the market or causes them to purchase more insurance.

Second, it is not clear in a system rampant with adverse selection whether the loss of good risks to competitors will be a problem. Theoretically, all insurers would be equally vulnerable to adverse selection. Assuming persons predisposed to illness will look for the best price, no company should be able to corner the market on good risks for very long. The industry should reach a price equilibrium that reflects the industry-wide level of adverse selection.

The "assessment spiral," therefore, depends on how many good risks will leave the insurance market entirely if premiums increase. Without knowing the extent premiums will increase, if at all, and the elasticity of the demand for insurance, such predictions are impossible to make. It seems certain, however, that while insureds might readily reject one insurer for another with a better price, they are less likely to leave the market entirely.

Finally, the insurance industry's gloomy forecast ignores measures that would guarantee those prone to serious illness with some degree of insurance protection. For example, a state could bar insurers from discriminating against life insurance applicants on the basis of genetic tests but allow a \$100,000 coverage limit. Such a rule would limit the effects of adverse selection on insurers.

V. THE REGULATION OF INSURANCE

The regulation of the insurance industry in the United States is left in the hands of the states, a system the industry has historically guarded with zeal.¹⁴⁷ Within this regulatory system, insurers are particularly vehement about protecting their freedom to separate those they insure into different

145. Pokorski, *supra* note 14, at 47.

146. See OTA STUDY, *supra* note 7, at 5.

147. See Hiam, *Insurers, Consumers, and Testing: The AIDS Experience*, 15 LAW, MED., & HEALTH CARE 212, 213 (1987).

risk or underwriting categories, whether for automobile insurance, health insurance, life insurance, or other types of coverage.¹⁴⁸

An early system of state regulation of the insurance industry was perpetuated by the 1868 Supreme Court ruling in *Paul v. Virginia*.¹⁴⁹ The Court found the industry was not subject to federal regulation through the commerce clause.¹⁵⁰ After enormous change in both the insurance industry and constitutional law, the Court changed its position in 1944. In *United States v. South-Eastern Underwriters Association*,¹⁵¹ the Court concluded Congress could regulate insurers.¹⁵² The industry responded quickly, winning enactment of the 1945 McCarran-Ferguson Act, which allowed states to continue regulating insurance.¹⁵³ The Sherman Act, Clayton Act, and Federal Trade Commission Act would only apply to the extent state regulatory law was lacking.¹⁵⁴

Today, state insurance authorities typically regulate the terms of insurance policies and review premium rates, the quality of insurers' investments, and the amount of companies' reserves and surplus.¹⁵⁵ Other business aspects, such as marketing methods and confidentiality practices, receive less scrutiny from state regulators because they are often handicapped by limited resources.¹⁵⁶

Insurers have traditionally retained autonomy in risk classification decisions, subject only to the requirement that a distinction between groups be statistically verifiable.¹⁵⁷ The traditional view, adopted by the insurance industry as well as many state regulators, scholars, and courts, is the ideal premium charged to members of any single group should match the insurance loss and expenses attributable to each group, plus a "reasonable" profit for insurers.¹⁵⁸ Insurers defend the pure dollar-for-dollar matching model and oppose state interference in risk classifications, maintaining that "unfair discrimination" state statutes require this approach.¹⁵⁹

148. "Of all the aspects of insurance, the one where insurers resist outside interference the most strenuously is underwriting." *Id.* at 214; see also Wortham, *supra* note 26, at 354 (Insurers "jealously guard" underwriting discretion).

149. *Paul v. Virginia*, 75 U.S. (8 Wall.) 168 (1868).

150. *Id.* at 183.

151. *United States v. South-Eastern Underwriters Ass'n*, 322 U.S. 533 (1944).

152. *Id.* at 553.

153. 15 U.S.C. §§ 1011-1015 (1988).

154. *Id.*

155. See, e.g., IOWA CODE §§ 505.8, .15 (1991).

156. Hiam, *supra* note 147, at 213.

157. See Wortham, *supra* note 26, at 370.

158. Bailey, Hutchison & Narber, *The Regulatory Challenge to Life Insurance Classification*, 25 DRAKE L. REV. 779, 781 (1976) [hereinafter Bailey].

159. Clifford & Iuculano, *supra* note 34, at 1809-11. "[I]nsurers have a positive duty to separate insureds with identifiable, serious health risks from the pool of insureds without those risks. Failure to do so represents a forced subsidy from the healthy to the less healthy." *Id.* at 1811.

Invoking these statutes for this purpose overlooks their history and original purpose.¹⁶⁰

A. Unfair Discrimination

The unfair-discrimination statutes predate the McCarran-Ferguson Act.¹⁶¹ Roughly half the states had enacted statutes prohibiting unfair discrimination by 1945.¹⁶² The McCarran-Ferguson Act began a wave of new state insurance law as states and insurers sought to head off federal regulation by quickly preempting the field.¹⁶³ One result was adoption by every state of some version of the National Association of Insurance Commissioners' Model Unfair Trade Practices Act, which contained the prohibition against unfair discrimination.¹⁶⁴

Prohibition of unfair discrimination was directed at the once everyday practice among life and fire insurance agents of giving rebates to favored clients.¹⁶⁵ Prohibiting such rebates satisfied three groups: (1) it relieved consumers infuriated by the rebating favoritism;¹⁶⁶ (2) it removed a source of competition that had cut into the profits of many insurance agents;¹⁶⁷ and (3) it gave insurers greater control over the pricing and sales process.¹⁶⁸

Many advocates of absolute insurer discretion argue the unfair discrimination statutes not only require a statistical basis for discriminating among insureds, but also require or promote the greatest number of risk classifications that are financially and administratively feasible.¹⁶⁹ Proponents of this so-called "fair discrimination" have used statutes,

160. See Wortham, *supra* note 26, at 381.

161. 15 U.S.C. §§ 1011-1015 (1968).

162. See Bailey, *supra* note 158, at 782.

163. *Id.* at 793.

164. *Id.* at 782-83. The model act describes some unfair practices as follows:
Making or permitting any *unfair discrimination* between individuals of the same class and equal expectation of life in the rates charged for any contract of life insurance or of life annuity or in the dividends or other benefits payable thereon, or in any other of the terms and conditions o[f] such contract.
[and]

Making or permitting any *unfair discrimination* between insureds of the same class for essentially the same hazard in the amount of premium, policy fees or rates charged for any policy or contract of insurance other than life, or in the benefits payable thereunder, or in any of the terms or conditions of such, or in any other manner whatsoever.

Id. at 783 (citing Unfair Trade Practices Act, IOWA CODE § 507B.4(7)(a), (b) (1975)) (emphasis added).

165. Wortham, *supra* note 26, at 384-85.

166. *Id.* at 384.

167. *Id.* at 384-85.

168. *Id.* at 385.

169. *Id.* at 381.

which were enacted ostensibly to protect consumers from insurers' abusive practices, to shield insurers themselves from state regulation.

The approach experienced mixed success in blunting state attempts to regulate insurers' underwriting practices. The Kansas Supreme Court adopted the industry's fair discrimination approach in *Blue Cross, Inc. v. Bell*.¹⁷⁰ The court blocked the state insurance commissioner's attempt to force Kansas Blue Cross and Blue Shield to use a community rating factor and reduce rates for Medicare and Medicaid supplemental coverage.¹⁷¹ The court drew analogies to public utility cases.¹⁷² It stated, "The touchstone of public utility law is the rule that one class of consumers shall not be burdened with costs created by another class."¹⁷³ Other state decisions, however, have supported the idea that state regulators, acting with general regulator authority and without a specific state law, may interfere with insurers' risk classification practices to achieve public policy goals.

In Pennsylvania, the commonwealth court upheld the insurance commissioner's order disapproving subsidized supplemental coverage for Medicare recipients for failure to include a community rating factor.¹⁷⁴ That court also upheld, in *Hartford Accident & Indemnity Co. v. Insurance Commissioner*,¹⁷⁵ the commissioner's prohibition against gender-based discrimination in automobile insurance rates.¹⁷⁶ The court noted the prohibition against unfair discrimination meant more than simple actuarial justification, and stated the commissioner could look to the state policy against gender-based discrimination in evaluating "fairness."¹⁷⁷

Similarly, the Massachusetts' Supreme Judicial Court upheld the state insurance commissioner's decision to allocate losses sustained in a high-risk pool to all classes of automobile insurance policyholders.¹⁷⁸ The court said a legislative policy extending such insurance to all eligible persons at

170. *Blue Cross, Inc. v. Bell*, 227 Kan. 426, 435, 607 P.2d 498, 505 (1980).

171. *Id.* at 442, 607 P.2d at 510.

172. See, e.g., *Jones v. Kansas Gas & Elec. Co.*, 222 Kan. 390, 565 P.2d 597 (1977).

173. *Blue Cross, Inc. v. Bell*, 227 Kan. at 439, 607 P.2d at 508 (quoting *Jones v. Kansas Gas & Elec. Co.*, 222 Kan. at 401, 565 P.2d at 606).

174. *Capital Blue Cross v. Commonwealth Ins. Dep't*, 34 Pa. Commw. 584, ___, 383 A.2d 1306, 1309-10 (1978).

175. *Hartford Accident & Indem. Co. v. Insurance Comm'r*, 505 Pa. 571, 482 A.2d 542 (1984).

176. *Id.* at 585, 482 A.2d at 549.

177. *Id.* at 582, 482 A.2d at 547 (state had adopted equal rights amendment). For support, the court quoted the NAIC's Task Force Report on automobile rating (although never approved by the NAIC) that said: "Public policy considerations require more adequate justifications for rating factors than simple statistical correlation with loss ... such as causality, reliability, social acceptability, and incentive value in judging the reasonableness of a classification system." *Id.* at 584-85, 482 A.2d at 548.

178. *Massachusetts Auto. Rating & Accident Prevention Bureau v. Commissioner of Ins.*, 384 Mass. 333, 335-36, 424 N.E.2d 1127, 1129 (1981).

reasonable rates justified the commissioner's acts as did the requirement that rates be "reasonable" as well as "nondiscriminatory."¹⁷⁹

More recent decisions in Massachusetts and New York concerning AIDS testing by insurers go against what seemed to be a modern trend giving regulators greater discretion in restricting classifications.¹⁸⁰ In *Life Insurance Association v. Commissioner of Insurance*,¹⁸¹ the court said the commissioner could not prevent insurers from testing for the AIDS virus without explicit legislative authority.¹⁸² The court distinguished underwriting practices—classifying insureds into risk groups and electing not to insure some risks—from the content of policies, premium charges, and other areas in which state statutes authorized regulation.¹⁸³ The court stated, "The basic principle underlying statutes governing underwriting practices is that insurers have the right to classify risks and to elect not to insure risks if the discrimination is fair."¹⁸⁴ The court added that insurers generally are free to solicit information from applicants to evaluate risks.¹⁸⁵ The court further noted that when the legislature had wanted to restrict underwriting practices in the case of racial differences, blindness, deafness, and exposure to DES, it had passed specific legislation.¹⁸⁶

In a New York case, *Health Insurance Association v. Corcoran*,¹⁸⁷ the court stated the basis of insurance is pooling risk "with one risk classification not subsidizing a significantly higher risk group."¹⁸⁸ The court held the insurance commissioner could not prevent insurers from using AIDS tests in making their insurance decisions.¹⁸⁹ It said state law by implication authorizes risk classification based on actuarial differences and permits insurers to inquire into material facts to assess risk.¹⁹⁰ Although the Massachusetts and the New York AIDS cases weakened the power of those states' insurance commissioners, both cases imply insurers have no similar immunity against legislatures that restrict underwriting classifications.¹⁹¹

179. *Id.* at 344-46, 424 N.E.2d at 1134-35.

180. See *infra* notes 181-90 and accompanying text.

181. *Life Ins. Ass'n. v. Commissioner of Ins.*, 403 Mass. 410, 530 N.E.2d 168 (1988).

182. *Id.* at 413, 530 N.E.2d at 170.

183. *Id.* at 414-15, 530 N.E.2d at 171.

184. *Id.* at 415, 530 N.E.2d at 171.

185. *Id.* at 416, 530 N.E.2d at 171.

186. *Id.* at 416, 530 N.E.2d at 172.

187. *Health Ins. Ass'n v. Corcoran*, 140 Misc. 2d 255, 531 N.Y.S.2d 456 (N.Y. Sup. Ct. 1988).

188. *Id.* at 262, 531 N.Y.S.2d at 461.

189. *Id.* at 259, 531 N.Y.S.2d at 460.

190. *Id.*

191. In *Life Insurance Association v. Commissioner of Insurance*, 403 Mass. 410, 530 N.E.2d 168 (1988), the court did not address the insurance industry's arguments that the regulations were an unconstitutional taking of property, denied equal protection of the law to per-

A recent federal district court decision upholding a District of Columbia law restricting the use of AIDS tests lends further support to legislative curbs on insurers.¹⁹² In *American Council of Life Insurance v. District of Columbia*,¹⁹³ the industry challenged a law prohibiting insurers from discriminating against individuals on the basis of AIDS tests for five years.¹⁹⁴ Insurers argued the law violated the fifth amendment due process clause.¹⁹⁵ The court, however, upheld the law, applying a loose rational basis standard of scrutiny.¹⁹⁶

B. Limits on Classifications

The past twenty-five years have seen significant restrictions on the insurance industry's traditional freedom to classify individuals they insure according to varying degrees of risk and to deny coverage, limit coverage, or set premium rates accordingly. In the early years of writing life insurance, insurers simply decided whether a person was insurable based on the person's health and health history.¹⁹⁷ Gradually, companies began to differentiate among various degrees of risk. Currently large companies underwrite as many as twenty-five different substandard classes at premium rates that exceed the standard.¹⁹⁸ Insurers have looked with increasing detail at health problems such as diabetes, heart disease, high blood pressure, and drug use to differentiate among the degrees of severity and the mitigating effects of treatment.¹⁹⁹

The first major limitation on the insurers' freedom to classify their insureds occurred in laws prohibiting racial discrimination.²⁰⁰ Some states passed specific statutes during the Civil Rights era and others assumed this result under the unfair discrimination statutes.²⁰¹ It is interesting to note, however, that there is actuarial justification for classifying according to race in life insurance. Black mortality experience is worse than white mortality experience.²⁰² The disparity appears in the most

sons not infected with the AIDS virus, or interfered with the insurers' common law right not to enter into contracts. *Id.* at 418 n.6, 530 N.E.2d at 170 n.6.

192. See *American Council of Life Ins. v. District of Columbia*, 645 F. Supp. 84 (D.D.C. 1986).

193. *Id.*

194. *Id.* at 85.

195. *Id.* at 86.

196. *Id.* at 88.

197. Bailey, *supra* note 158, at 785.

198. *Id.* at 791.

199. *Id.* at 791-92.

200. *Id.* at 793.

201. *Id.*

202. The National Center for Health Statistics reports whites born in the United States in 1986 had a life expectancy of 75.4 years compared to 71.4 years for nonwhites. WORLD ALMANAC AND BOOK OF FACTS 1989, 823 (121st ed.).

routine government-produced health statistics in stark contrast to the color-blind underwriting practices of the insurance industry.²⁰³

Although reasons other than race may be causing this difference, such as lower income and different types of occupations, courts have held causality is not a prerequisite for classifying the insured.²⁰⁴ Racially blind underwriting, therefore, is an example of how public policy has already undercut the industry's notion that more numerous and precise classifications produce greater fairness.

Many states have also instituted statutory prohibitions against classifications based on sex, marital status, physical or mental impairment, presence of sickle cell, exposure to DES, Tay-Sachs disease, and hemoglobin C traits.²⁰⁵ The prohibitions affect many types of insurance. New Jersey forbids discrimination because of an "atypical heredity cellular or blood trait," which includes sickle cell trait, Tay-Sachs Disease, hemoglobin C trait, and other diseases.²⁰⁶

Until the insurance controversy over AIDS, the most debated issue was the states' attempt to limit insurers' classification schemes based on gender and marital status.²⁰⁷ Many states prohibit insurers from denying insurance or limiting coverage because of gender.²⁰⁸ A few require insurers to charge men and women the same rates.²⁰⁹ Montana has extended this gender-neutral policy to all personal lines of insurance.²¹⁰

The Supreme Court, in *City of Los Angeles, Department of Water & Power v. Manhart*²¹¹ and *Arizona Governing Committee v. Norris*,²¹² held provisions of Title VII of the Civil Rights Act of 1964 prohibiting job discrimination according to race, color, religion, sex, or national origin applied to fringe benefit plans, including pensions and annuities.²¹³ The

203. *Id.*

204. See *Brest v. Commissioner of Ins.*, 270 Mass. 7, 169 N.E. 657 (1930) (unfair discrimination statute only required that place of garaging and loss be statistically associated, not causally linked); *Department of Ins. v. Insurance Servs. Office*, 434 So. 2d 908, 912-13 (Fla. Dist. Ct. App. 1983), *appeal denied*, 444 So. 2d 416 (Fla. 1984) (use of sex, marital status, and scholastic achievement in automobile insurance rating judged by predictive accuracy alone). *But see Hartford Accident & Indem. Co. v. Insurance Comm'r*, 505 Pa. 571, 579-80, 482 A.2d 542, 546 (1984) (causality, reliability, social acceptability, and incentive value should be used in judging classification system); *Lange v. Rancher*, 262 Wis. 625, 56 N.W.2d 542 (1953) (race is an improper classification for state life insurance program because it failed to explain mortality differences between blacks and whites).

205. See Schatz, *The AIDS Insurance Crisis: Underwriting or Overreaching?*, 100 HARV. L. REV. 1782, 1797-98 (1987); see also *Wortham*, *supra* note 26, at 367.

206. N.J. STAT. ANN. § 10:5-12(a) (West Supp. 1991); *Bailey*, *supra* note 158, at 795.

207. *Wortham*, *supra* note 26, at 355.

208. *Id.* at 366.

209. *Id.*

210. *Id.*

211. *City of Los Angeles, Dep't of Water & Power v. Manhart*, 435 U.S. 702 (1978).

212. *Arizona Governing Comm'n v. Norris*, 463 U.S. 1073 (1989).

213. *Id.* at 1081; *City of Los Angeles, Dep't of Water & Power v. Manhart*, 435 U.S. at 717.

Court stated that even true differences in longevity between the sexes "cannot justify class-based treatment."²¹⁴ Although *Manhart* and *Norris* apply only to employer-sponsored insurance plans, those plans include the lion's share of health and life insurance. The decisions further undermine the general premise of insurer autonomy in classification decisions.

VI. CONCLUSION

The collision of genetic testing and insurance seems inevitable. As genetic predictions of disease become commonplace in medicine, they will inevitably become incorporated into insurance underwriting. The resulting discrimination plays so powerfully to the public's sympathies it is difficult to imagine how insurers could possibly avoid being bogged down in state-by-state efforts to prohibit such discrimination.²¹⁵

The insurance industry's free-market concept of the role of private insurance is central to its stand on AIDS testing and its emerging views on genetic testing. It argues that unfettered insurers, by tradition and law, should charge individuals according to all their known risks.²¹⁶ Insurance companies argue the survival of the industry depends on insurers being free to classify people by risk and to charge nonsubsidized premiums.²¹⁷

The government-encouraged system of group insurance, however, already involves massive cross subsidization made acceptable only because

214. *Arizona Governing Comm'n v. Norris*, 463 U.S. at 1084-85 (quoting *City of Los Angeles, Dep't of Water & Power v. Manhart*, 435 U.S. at 709).

215. *See generally P. Billings, supra* note 2. One person with hereditary hemochromatosis, a blood disorder, was rejected by insurance companies although early detection and medication had kept the disease essentially asymptomatic. *Id.* at 21. Assurances by physicians were to no avail. *Id.*

A newborn child diagnosed as having phenylketonuria, a potentially severe biochemical disorder, was reportedly successfully treated through a special diet. *Id.* at 18. She was developmentally normal at eight years of age when her father changed jobs. *Id.* The new employer refused coverage to the child under a group plan. *Id.* The authors said this case demonstrated how one person's "genetic labeling" can effect an entire family by effectively prohibiting job change. *Id.* at 19.

Individuals at risk for Huntington's have elected not to be tested out of fear they will be unable to get health and disability insurance if they test positive and jeopardize the financial security of their families. Interview with Richard Myers, Coordinator of the Huntington's Disease Research Center, in Boston, Massachusetts (March 21, 1989). Being able to plan for their family's financial security is often one of the motives for being tested. *Id.* Those at risk also fear job-related consequences of testing positive, including being passed over for promotions. *Id.* Huntington's is invariably fatal and tends to strike between the ages of 30 and 50. *Id.* Those tested had a 50% chance of having the disease and the genetic diagnostic test is 95% reliable. *Id.*

216. *See Bailey, supra* note 158, at 780.

217. *See Clifford & Iuculano, supra* note 34, at 1806-25; *see also ROWLEY, REILLY & LEONARD, THE NEW GENETICS: PROBING SOCIAL AND ETHICAL ISSUES* 179-94 (1989).

employers pay the tab.²¹⁸ It also has been suggested different lines of insurance subsidize each other, such as in the early 1980s when personal lines of insurance subsidized property and casualty insurance during a particularly competitive time for the latter.²¹⁹ Furthermore, insurance has traditionally been subject to regulation, increasingly so in recent decades. The industry has blurred the sacred lines of risk classifications without major trauma when forced to, or when it was politically expedient. State legislatures have virtually unlimited power to restrict insurers' risk classification practices. Even without new laws, state insurance commissioners have varying degrees of authority to impose such restrictions on their own.²²⁰

Regulation of the insurance industry by the states is justified by the importance of insurance in our personal lives as well as in the conduct of commerce. As the Supreme Court noted three-quarters of a century ago, insurance operates almost as a monopoly that is "affected with the public interest" and vital to spreading the risk of catastrophe so that individuals do not bear the burden alone.²²¹ Insurance has become more intertwined in our lives as the cost of health care has increased and the security offered by extended families has largely vanished.²²² Such an important component of the personal financial infrastructure should not be left to the vagaries of the free market.²²³

Insurers and their customers are entitled to some protection against the unfair scenario the industry envisions through adverse selection. People aware of impending death do not have the right to purchase a \$10 million life insurance policy under false pretenses. Shouldn't those same people, however, be able to change jobs without losing health care coverage when their fatal illness is years in the future? If they have only a one-in-four chance of contracting a disease, should they be denied insurance throughout their lives?

Genetic testing has the potential of stimulating an unprecedented debate about the role of personal lines of insurance.²²⁴ As the political process begins, it is important not to view insurance as a monolith but to look at its various components and their functions. For example, certain levels of health, disability, and life insurance coverage may deserve a different regulatory approach than unlimited life insurance policies.

218. See *supra* notes 37-39 and accompanying text.

219. Wortham, *supra* note 26, at 377.

220. See *supra* notes 165-90 and accompanying text.

221. *German Alliance Ins. Co. v. Kansas*, 233 U.S. 389 (1914) (upholding a state's right to regulate fire insurance rates).

222. Wortham, *supra* note 26, at 352-53.

223. *Id.* at 400.

224. "[T]he insurance business must participate in dialogues about the use of genetic tests. The industry must assume a role of leadership in order to maintain the viability of private insurance and to fulfill its social responsibilities." See Pokorski, *supra* note 14, at 17.

Major questions remain over what genetic tests will reveal and how individuals will react. How often will they predict serious illness? With what accuracy? What diseases and what probability of contracting them will cause people to change their insurance coverage? How will they change it? Until such questions are answered, predictions of the industry's demise are premature, if not greatly exaggerated. Such scare tactics have no place in the public discussion over the future of insurance in our society.