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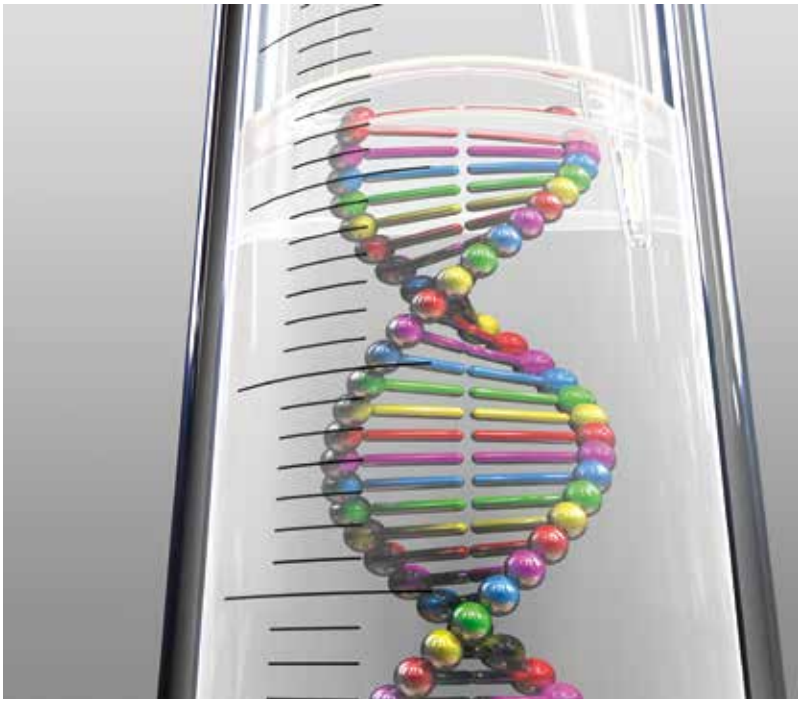
Genetic Testing and Insurance

Despite the known benefits of genetic testing such as early diagnosis of dangerous diseases, many people still choose not to undergo genetic tests due to fear of being discriminated against in the matter of insurance and employment.



Genetics is the study of DNA and how it affects inheritance. A fast growing area of genetics is that of genetic testing. This type of testing analyses a person's genetic information and tells them if they have a probability of developing certain diseases later in life. Although not always accurate, this will enable people to prepare early for that eventuality and in many cases control the illness by taking medication to lower the effects of the disease or by changing their lifestyle.

Despite the numerous benefits of genetic testing, people are still afraid of it due to fear of genetic discrimination. Once a genetic test is performed there is no guarantee the results will be kept private. If a person has had a genetic test and is aware of the results then it is likely that potential insurers and employers of the person may also have access to the results and may use those results to discriminate against them.

INSURANCE AND GENETICS

Nearly every reader of this magazine will understand that insurance works on the theory that insurers can estimate to a certain degree the number and cost of claims in a time period. Setting premiums on this basis means that if the cost of claims exceeds premium revenues then the company will recognise a loss. If this situation happens often then the company may be forced to close down.

The issue with genetic tests is that people who undergo these tests may come to know that they have a higher likelihood of contracting certain diseases. If they know they have a higher chance of getting a disease, they may take out life and/or health insurance to protect themselves and their family from this risk.

At this point they have the choice of either keeping this information from the insurer, or disclosing it – upon which the insurer will most likely charge a much higher premium to insure the higher risk and place numerous exclusions in the policy, which may remove the whole point of getting the insurance or they may refuse insurance altogether.

If they chose not to disclose the information, they have more knowledge about their risks than the insurance company, which could mean that the insurance company's estimate for the cost of claims might be greatly underestimated and could lead to losses – potentially affecting their future ability to pay other claims.

To combat this, the company might raise its premiums, potentially reducing sales to the safer risks. These people, who think they have a lower than average risk, may hold back from getting insurance – which might, in turn, cause greater than expected numbers of insurance customers to be of a higher risk than priced. If the company keeps raising its premiums to meet this higher cost of claims then eventually the premiums will equal the cost of the claims thereby making insurance pointless.

SOLUTION

Combating this issue is a great challenge for the actuaries involved. It is up to them to think up a solution to encourage the public to use genetic testing for the possible betterment of their health, yet at the same time stop insurance companies from being negatively affected, whilst also allowing these people continued access to insurance.

This isn't easy. Commercial decisions will mean the likely solution will involve government funding.

In fact, one frequently suggested solution is setting up a government fund for people who, as a result of genetic testing, have found that they are at a higher risk of contracting certain diseases, whereby they can get early treatment and access to insurance.

Whether this will work remains to be seen. However, one thing is for sure: research needs to be done on this issue to find a solution before it becomes a crisis. A