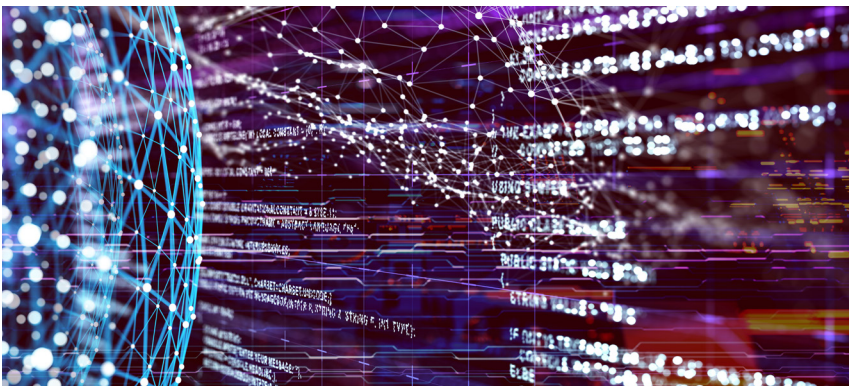


# How predictive analytics is transforming risk management

Used correctly, predictive analytics and big data, could open the doors to profitable opportunities. But how can the risk community extrapolate the benefits?



*Risk managers are going to need to push themselves to be in the prescriptive stage, which is the final stage of data analytics*

Georgina Wainwright  
Airmic

**P**redictive analytics and big data analysis are not new concepts. The insurance industry has been looking at how to leverage data for better insights into customers and more accurate risk assessment for a while. Now technological advances allied with more cost-efficient computer processing power is creating unprecedented opportunities. But how can corporates and risk managers make better use of data in risk management?

Huge volumes of data make it challenging for companies to extrapolate value and use predictive analytics to their advantage.

According to Airmic, many risk managers are not making the most of the information surge. Many have been using the same information sources and statistical techniques for several years.

“Risk managers are being told by senior executives and the board that the company requires better data on their risks. The company requires better insurance data for that,” says Georgina Wainwright, Research and Development Manager at Airmic.

“It is a huge challenge for risk managers. They are conscious of the prolific nature of technology and the excessive volume of data being pooled together, which is not being collected effectively.”

## The data journey

So how can data be better collected, or more specifically, how can corporates extract valuable analysis to aid risk decisions?

Data analytics moves through four stages from descriptive, where the data captured describes what’s happened to diagnostic analytics, which provides answers as to why something has happened and begin identifying trends.

Predictive analytics is where enough data exists to identify where future losses will occur and when. This helps risk managers to identify red flags or incidents that are likely to culminate in a significant loss or a major insurance claim.

“People are wanting to move into the [predictive analytics] stage, where they can predict what’s going to happen and how big

or severe [the risk] is going to be,” says Wainwright.

“Risk managers are going to need to push themselves into the prescriptive stage – the final stage of data analytics. This is about knowing what’s happening and why, and predicting what is going to happen, when and why. Now we need to say, ‘let’s do this or that, change this process or amend this policy to avoid or reduce those predicted losses.’”

If applied properly, these data techniques could lead to huge efficiency savings and cost savings. A reduction in the risks that business face, will lead to fewer losses and lower insurance claims. This, allied with better renewal data, will help improve the efficiency and lower the costs of buying insurance. It could also help the wider business make better strategic decisions.

For example, a data-driven approach to supply chain management could see retailers use predictive analytics from local weather stations and satellite data. Stock could then be ordered in line with upcoming weather conditions, even if they are unseasonal, so more umbrellas ready for a rainy spell or barbecues for a heatwave.

## The top five challenges

Airmic has identified five key challenges to maximising the opportunities from data analytics. These are lack of budget, inappropriate infrastructure, difficulty accessing the data, poor quality data and insufficient support.

“The key to using risk data effectively is to start small and keep it simple and focused. Big data should be used to highlight small changes that could enhance existing business processes, for example, board risk reporting, resulting in measurable improvements to overall quality and insight,” says Philip Songhurst-Thonet, Head of Risk Consulting, Aon Risk Solutions.

“Risk managers will need to demonstrate the cost-benefit of any changes using interactive and visual messaging to get the support of senior leadership. By starting small and building on success, the case for broader adoption and investment into analytics will become easier.

As companies realise the importance of data, they will have to invest in better tools to hold, capture and analyse that data.

However, these tools will only be useful if used with high quality data. Therefore, data verification and access checks will be key to ensuring data is accurate, timely and appropriate in nature and volume to its use.

That will allow companies to collect data with the main aim of managing risks and making better strategic decisions in managing those risks.

“The data dividend is when you’ve made best use of your data, manage your risks better and reap the rewards. It’s when you go from saying here’s what happened to here’s what will happen and this is how you stop it,” concludes Wainwright. **SR**

