Making God laugh: a risk management tutorial

The words “risk” and “management” sit uncomfortably alongside each other. Many people believe that it is possible to distinguish “real”, “actual” or “objective” risk from “perceived” risk. But all risk is perceived. It is a word that refers to the future, a future that exists only in our imaginations.

Those who call themselves risk managers purport to be able to manage the future. They are oblivious to Woody Allen’s hubris puncturing question “How do you make God laugh?” Answer “Tell him your plans.”

But of course we all try to do this all the time – whenever we cross the road for example. Crossing the road is an example of a directly perceptible risk. Such risks we manage using judgement – a combination of instinct, intuition and experience. We do not attempt a formal probabilistic risk assessment before we cross the road.

Other risks attract professional RISK MANAGERS. These are the risks to which numbers can be attached. This is the realm of quantified ignorance. The professionals deal in probabilities. In certain constrained circumstances probabilities can be useful. The calculations of actuaries working for motor insurance companies can be helpful in setting next year’s premiums. So long as they don’t inquire too closely.

Actuaries know that young men are more accident prone than middle-aged women and recommend differential premiums accordingly. But such information is of strictly limited utility. They also know that in Britain at the time of writing the annual risk of dying in a road accident is about 1 in 18000 – the number killed divided by the population. But a trawl through the road accident literature reveals that: a young man is about 100 times more likely to be involved in a serious road accident than a middle-aged woman; if you are on the road at 3am on a Sunday morning you are 134 times more likely to be killed than at 10am Sunday; if you have a personality disorder you are 10 times more likely to die; and if you are 2.5 times over the alcohol limit 20 times more likely to die. If the actuaries know too much their market divides into those who do not need insurance and those who cannot afford it.

There is a third category of risk that I like to call *virtual risk:* the causes and consequences of climate change, pesticide residues, mobile phone radiation, HRT, the sub-prime crisis …. Here, as with directly perceptible risks, the risk manager is thrown back on judgement – instinct, intuition and experience, and prejudice, and superstition. Here there are no large and stable actuarial databases to guide the insurance company premium setter.

The pictures from the link below offer a tutorial in risk management. The link was sent to me by Bill O’Toole, an Events Development Specialist (www.epms.net) from Sydney Australia whose day job involves making God chuckle. The risk managers involved in dealing with the events in this clip were certainly dealing with directly perceptible risk. They would also (probably) have been aware of the insurance constraints within which they were operating. But their knowledge of the laws of physics relating to levers and fulcrums was clearly rudimentary. They tipped over (literally) into the realm of virtual risk – the unknown unknowns encountered in situations that lie beyond the experience of the risk manager.

Commentary in this font is original. Commentary in this font [in parentheses] has been added by me.

Car upside down in the bay - see guy standing on it? Call out the wrecker!

Alright, getting some help. Coming back up…coming…coming

Almost there! Great job!

OMG! Oops! Now need more help!

WAIT! Not done yet!

OK. Now the big wrecker is here to rescue!

Ok, we got the car…let's get the other wrecker now!

OK! It's time to get this wrecker back on the road!

[Time to introduce the principle of the lever. **c** and **d** represent the weights of the respective vehcles. **a** and **b** represent the distances from the fulcrum to **c** and **d**. For the operation to succeed **a** X **c** must be greater than **b** X **d**.]

[c is clearly greater than **d**, and **b** is clearly greater than **a.** Hmmm?]

Who’s gonna explain this one to the insurance people?