Perspective Widening your point of view

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Richard Bach, in his book *Illusions*, states a handy aphorism: **Perspective – use it or lose it**. This periodical shares amongst recreation and tourism management professionals, such as yourself, several tools and concepts which will help exercise your perspective. This issue considers how our systems of perception – whether they be via our sensory organs or our processes of cognition – team up to make it jolly difficult to believe what we see and to agree with what we think.

Perspective is distributed by Rob Greenaway & Associates as a service to the recreation and tourism industries.

Confabulation

My Chambers dictionary defines confabulation to mean, 'to imagine experiences to compensate for loss of memory'. The neurosurgeon Oliver Sacks¹, in several of his books, talks about how various head injuries or unusual mental syndromes have resulted in conditions where a person 'confabulates' a range of compensatory imagined perceptions. The classic is 'blind sight' where a neurological disorder renders an individual unable to recognise common objects until a smell or sound gives sufficient clues for the brain to complete a visual image. Francis Crick² reports of 'blindness denial' where a truly blind person still believes they can see. Their very imaginative mind completes such a vivid visual picture of the world that they may be unaware they are blind.

You are, or course, thinking that this is highly unusual. You are pleased that your brain doesn't confabulate to you. But it does. Bear with me.

Francis Crick, after co-discovering the structure of DNA, turned his attention to the study of consciousness. He discusses how research into visual awareness might lead to an effective description of how consciousness works. It's a big ask and I suspect that the reductionist approach he promulgates will be interesting but not totally fulfilling. His 'astonishing' hypothesis is that our sense of consciousness is merely a trick played by our myriad of inter-relating neurons. So when Descartes came up with what must now be a cliché – I think therefore I am – he was almost agreeing with Crick. I am because I think. Although Popeye might have been closer – I am what I am.

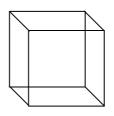
Crick relies a little on confabulation to prove his point. To what degree is what we perceive the result of 'imagination' compensating for our very average sensory organs (if you believe your cup is half full)?

Crick states: You are easily deceived by your visual system; The visual information provided by your eyes can be ambiguous, and; Seeing is a constructive process (that is, you make it up as you go).

You are deceived: Does the middle box fade from left to right?



¹ Sacks, Oliver. (1985). The Man Who Mistook His Wife For a Hat and other clinical tales. Summit.



Things are ambiguous: Which is the front panel on this cube?

The final issue is, to me, the most startling. Seeing is a constructive process. Which means, your brain processes what you 'see' before you see it. Of what you are visually

aware is not necessarily what is right in front of your eyes. Consider your blind spot – the bit of your retina where the ocular nerve joins and you have no light sensors. You may recall at school holding a page with two black dots thereon (about seven centimetres apart) approximately 30 centimetres from your face. Cover one eye with your hand and look at the dot opposite that eye. The dot in front of your open eye will disappear. Open both eyes and it reappears. One eye compensates for the other, which is a Good Thing. However, do you wonder why, once the dot has gone, you see a white space if you've used a white page, and a yellow space if you've used a yellow page? Your neurons are just making things up – they're confabulating.

If, instead of a dot, you use an annulus (a thick ring) of some colour and move the ring so its edges coincide with the edge of your blind spot, you will see a complete coloured disc. This is, in essence, 'blind sight'. The brain knows not what is inside the ring once it coincides with the blind spot. All it knows is that it can see a coloured edge. *Ipso facto* (by that fact), the brain says, it's just got to be a disc. It makes a best guess, which is also handy if your retina has been damaged in one area.



If only this was the sole example of how 'you' confabulate yourself. One of Oliver Sacks' patients mistook his wife for a hat. How sure can you be? $\mbox{\ensuremath{\diamondsuit}}$

Cognitive Dissonance

I have tried to avoid referring to Peter Bernstein's wonderful book *Against the Gods*³ for this topic because I have referred to it before, and I don't wish to appear repetitive. However, I have read reasonably widely over the past 12 months in search of a legible text on the psychology of decision making which refers to Prospect

² Crick, Francis. (1994). *The Astonishing Hypothesis*. Touchstone.

³ Bernstein, Peter. L. (1996) Against the Gods. Wiley.

Theory and cognitive dissonance (or invariance). It appears that psychologists rarely write for the lay reader, which is sad since they have a lot to say about the human condition (at least, more than does Coronation Street).

Having said that, there are a few good texts which discuss how we make decisions. Many are concerned with why we so often act 'irrationally' – why we make decisions that do not maximise our utility or which are just plain illogical. The classic example is: Say you bought a \$20 theatre ticket. When you get to the theatre you discover it's lost. Do you buy another ticket or do you go home? But then say you weren't going to buy a ticket till you got to the theatre, but on arrival discover that \$20 is missing from your pocket. Do you then buy a ticket or go home? The loss is the same, but I know I would be more likely to go home having lost the ticket rather than if I'd lost the \$20. The question is, are we being rational in having that preference?

Philosopher Frederick Schick⁵ suggests that many researchers believe anyone who considers the two scenarios to be different is 'softheaded' – which is a less polite way of saying they are sensitive to the way in which a situation is *reported* to them. "They consider it a basic condition of a person's being rational that [their]⁶ choices *not* be sensitive to the descriptions [they] accept of situations, to how [they] understand the facts involved, to how those facts are 'framed'".

An economist I know reports that his father purchases lotto tickets using sequences like 1, 2, 3, 4, 5 and 6. He knows those numbers have as much chance of being drawn as any other sequence, and that no one else will use such a line-up. He will therefore have more chance of not having to share a prize with any other winners. Such rationality should breed good economists.

Not many of us are like that though. Would you consider it a waste of money to buy that sort of lotto ticket (even though by default you do)? We often reflect upon the way a situation is 'framed'. Schick gives us an out'.

"I reject this argument of what is rational and what is not. We let a person's choices be sensitive to their beliefs and desires, and we assign a role to their subjective utilities and probabilities. Why then chafe at the thought of letting their understandings play a role too?"

The problem is, we often make very poor decisions because of that subjectivity. Schick might be happy to let us off by saying that what is in essence 'gut instinct' has a fair role in how we chose between

various options (we're not softheaded – just human). However, in a governance role we are generally expected to gain the maximum utility for the maximum number of people.⁷ There, gut instinct generally doesn't cut it.

This is where Prospect Theory assists, to a degree. In any dilemma (or poly-lemma) there is generally a risk that one or more choices will offer a poorer return than another. There is risk and uncertainty. Most texts on logic, reason or decision making are concerned with how to quantify the risks, deal with the uncertainty and make an appropriate choice, and it's impossible to summarise these processes in a paragraph. Bernstein, however, nicely summarises why we can get it wrong, relying on the tenets of Prospect Theory (developed to evaluate Israeli army recruits):

- We pay excessive attention to low-probability events accompanied by high drama and overlook events that happen in routine fashion.
- We tend to ignore the common components of a problem and concentrate on each part in isolation.
- We have trouble recognising how much information is enough and how much is too much.
- We display risk-aversion when we are offered a choice in one setting and then turn into risk-seekers when we are offered the same choice in a different setting. Would you like \$200 or a 50% chance of winning \$400, or a 20% chance of winning \$1000 (all with the same mathematical expectancies)?
- We treat costs and uncompensated losses differently, even though their impact on wealth is identical (that \$20 theatre ticket,

 or would you be more likely to buy five CDs if you had just purchased a \$1000 CD player than buy five CDs at a separate time?).
- We start out with a purely rational decision about how to manage our risks and then extrapolate from what may be only a run of good luck. As a result, we forget about regression to the mean⁸, overstay our positions (don't cut our losses), and end up in trouble.

Maybe it would be worthwhile taking a course in logic. But in the meantime, that little check-list might be a good start in saving us from soft-headedness. ❖

For Your Interest

The past 12 months have been full. Most importantly, our second child was born late last year – Jack (or, Little Man Jack, according to his sister). The range of projects we've been engaged with has been very motivating. The Meridian Energy Project Aqua resource consent application is now requiring the preparation of evidence (we completed a major recreation assessment of effects in 2002). We are also preparing effects assessments for several other commercial developments in Canterbury. Dave Allan of Strategic Leisure and I have been working on two recreation plans in the Far North – the Bay of Islands and the stretch from Kaikohe to Cape Reinga. Two community-board based leisure, parks and waterway studies in Christchurch have also been enjoyable. Asset management projects continue in Franklin, Tasman and Nelson. With Boffa Miskell we assisted with a feasibility study for a track in the Ruahine Ranges and developed a reserve management plan for the Te Köhaka o Tuhaitara Trust in Canterbury. We completed the consultation draft for the Port Hills recreation strategy and assisted the Dunedin City Council over the submission process for a management plan for Signal Hill (which we drafted last year). The Global Leisure Group (GLG) completed a national territorial authority recreation planning review for SPARC. Trudy Jones, with a recent Master's degree in Parks, Recreation and Tourism Management, joined the RG&A team as a consultant.

We have a busy year ahead with continuing expert evidence preparation and concession application work. A very interesting project is a national study into recreation displacement for the Department of Conservation (with Jason Leppens, who was awarded our research scholarship in 2001 for a study on tourism impacts on Stewart Island). Several large-scale projects are underway within GLG, including a review of the Local Government Act 2002 for the recreation sector and an international study of what we are calling 'activity friendly environments' (both for SPARC). The group is just starting regional physical activity strategies for the Canterbury / West Coast and the Waikato regions.

We have set up a Web site (www.greenaway.co.nz) which features previously published *Perspective* newsletters, conference papers and articles. The Global Leisure Group site (www.globalleisuregroup.com) has also been updated.

Schick, Frederic. (1997). p 50.

⁴ Schick, Frederic. (1997). Making Choices - a recasting of decision theory. Cambridge University Press. p 48. Also Bernstein (1996). p 277.

⁶ Schick uses 'his' and 'he'. I prefer gender neutral terms but don't like to see the cumbersome use of 'he or she'. We don't say 'you is' when referring to

one person so should be happy to use a third person plural in the place of the singular.

⁷ See the 2000 issue of *Perspective* on our Web site and Section 77 of the Local Government Act 2002.

⁸ See the 1999 issue of *Perspective* on our Web site.