18 October 2000

Safe biking with Jacob

7-year-old Jacob was upset that I made him walk his bicycle on the sidewalk to avoid a dangerous bit of traffic on St. Clements. "I'm as safe a biker as you!", he complained.

This set me thinking, and I realized there are at least four reasons why I apply stricter rules to his biking behavior than to mine.

First, years of experience have given me better instincts than his of how to handle a bicycle.

Second, years of experience have given me better perception of traffic hazards.

Third, I have the conservative movements of an adult, while Jacob still attracts random accidents like any child.

Finally, there's no denying it. I value his life more than my own. If Jacob heard this last argument he'd complain, "That's not fair!"

Why women live longer than men

Walking around Five Fields the other day, 9-year-old Emma and I were discussing the fact that women, on average, live much longer than men. I explained that so far as I knew, though pieces of an explanation were in place, the causes of this difference were not fully understood.

"Maybe," she suggested, "it's to make up for all the other stuff."

11 October 2007

How full is my bowl of ice cream?

There's a misperception I've noticed lately. When I eat a dessert, I feel good almost all the way through knowing it isn't done yet. When I'm 10% finished, it's good knowing there's plenty more to eat. And when I'm 90% finished it feels the same! So long as there's more than one spoonful left, I feel I'm in the middle, doing fine, no problem. Only at the final spoonful am I suddenly grabbed by the pang of running out.

This is a pure and simple illusion, a bug in my thinking that I can observe with interest just as I might observe an optical illusion in my vision. I try to compensate by telling myself, hey, your ice cream is running out, you should be upset about this: but it's no use, my heart keeps feeling plenty though the bowl is nearly clean.

And what about one's course through life itself? I felt my life was full and good at age 8, and I feel that way now, too. The calendar tells me I'm well into my second half, but no problem, there's plenty ahead.

13 May 2009

Living with a geek

**Kate complained, you're always so fast and logical!
OK, I said, I'll try to be slow or illogical.**

28 November 2006

Towels in Japan, kickstands in England

Here in Japan, it seems incomprehensible that bathrooms have sinks but no towels. Why are there no towels?, I asked a Japanese friend. Well, we don't really need them, he said, since most of us carry a handkerchief, and he pulled out his own handkerchief to show me. Nevertheless I note in men's rooms that in practice some Japanese men wash their hands, then shake them a little and leave the room damp. Ludicrous!

It's easy to see foreign cultures as sillier than one's own, so I asked myself, what is a comparable foolishness in the West? An example that came to mind is kickstands on bikes. Every bike in Japan has a kickstand, but in England or the U.S., half of them don't. So every time you stop your bike, you have to find something to prop it up against. I've never understood why people put up with this nonsense, but they do.

15 April 2002

Piet Hein's grooks

For reasons I cannot distinguish,
Piet Hein could write Grooks in English.

For reasons not hard to explainish,
I cannot write Grooks in Danish.

The advantages of an optimal life

Like many busy people, I've developed all kinds of strategies to optimize my efficiency. Such a tricky balance of how much time to spend on email, paperwork, errands, social life, housework, research!

Now as we know, any smooth function looks like a parabola near its bottom. This means that if you miss the optimum by a small amount ε, your loss in efficiency is much smaller, of order ε^2. What a blessing! It means that day-to-day, you need not worry about doing a little too much of this or a little too little of that, for the penalty will be just quadratically small. And so optimality brings peace as well as efficiency.

Shredder

I've just spent my first five minutes in my new office at Oxford. In the corner I found a document shredder.

I'd like to try this out, I thought. So I put in a page from a pile of papers for recycling, and it shredded it nicely.

I felt a bit foolish about this little experiment. How childish to shred a piece of paper with no sensitive information on it, just for the fun of it!

Fortunately, nobody would be able to tell.

Randomness in art

In all kinds of creative efforts a little randomness can be invaluable. When I improvise at the piano I make careless mistakes, and also play random notes intentionally — then I hear them, enjoy them, and build them into themes, and my music is better for it. The explanation is that our powers of interpretation are enormous, while our facility to create out of a vacuum is relatively weak. So any kind of input, even random, may be enough to stimulate us. The same should hold in oil painting, poetry, cooking, you name it.

The artist may build on the random input himself, or he may leave some randomness in the product. This is then something for the consumer's imagination to work with.

Error is not the only source of randomness. Another is the conflict of constraints that cannot all be satisfied. In poetry and song lyrics, the need for rhyme or meter forces the writer to introduce a random element in his verses, form the point of view of the meaning, though he may not like to admit this. If he has the wrong instincts, the result seems foolish. If he has the right ones, it may be sublime — so that the constraints of form, far from asphyxiating meaning, may nourish it. Bob Dylan is a genius in this respect: his verses often border on gibberish, yet come across as profound.

Resolution of Pascal's wager

Pascal's wager runs like this: most of us believe there is a positive net probability, even if it's microscopic, that leading the life of Christian virtue will earn us an eternity of bliss. Since this pious effort is finite and the expected reward infinite, obviously we would be fools not to devote our lives to virtue.

It is not enough to ridicule these crazy old arguments; we must either show they are nonsense or refute the logic. I don't think this one is nonsense.

My father and Carolyn incline to the resolution that the probability is not positive but in fact zero. But I don't think that is true for most of us; and it certainly was not true for the average skeptic of earlier centuries, when a relatively uniform Christianity prevailed.

Here is a different possibility. In what sense must a pleasure next year be worth the same to me now as the same pleasure immediately? After all, a pleasure given to my neighbour is not worth the same as a pleasure given to me. Isn't my future self also a slightly different person from me-now? Suppose we persuade ourselves that me-after-t-years is only the same as me-now up to a factor $\exp(-\alpha t)$ for some small positive α. Then no matter how small α is, the expected reward of virtuous behaviour is rendered finite.

Four bugs on a rectangle

Here is the biggest number I have encountered in my work (a joint project with James Lottes and Jon Chapman). You have four bugs initially at the corners of a 2×1 rectangle, each walking towards the next at speed 1, spiraling in towards an eventual collision at the midpoint. Consider the distance between two of the bugs on opposite corners. By what factor has this distance decreased when the bugs complete the first of their infinitely many circuits around the midpoint?

The answer is approximately $10^{427907250}$.

31 December 2007

Birdbox

For Christmas Kate's Uncle John made her a birdbox, or as I grew up calling such things, a birdhouse. It's a beautiful solid structure that for some lucky blue tit will provide a life like leasing a suite in the Grand Plaza. There's a little ledge with a round hole just the right size for the bird to get in and out, with walls thick enough to keep out any predator. The lucky discoverer will find space and security to raise a happy family.

I find myself thinking, how will the bird who comes across this perfect structure explain its existence?

But of course, birds don't think about such things. They don't try to explain the existence of a perfect birdbox. They just live their lives and that's that.

And then I find myself thinking, what is in fact the true explanation of the existence of this birdbox? Why did Uncle John build it? Why did Kate install it in her garden? The more you think about it the more you realize that the answers are bound up in extraordinary complexities of our emotions about caring. In the end the existence of Kate's birdbox is too hard for humans to explain, let alone birds.