

### Rapporteur's Note

In *Other People's Trades*, Primo Levi devotes an essay to the archival efforts of R. Houwink, "an old Dutch scientist" (and one of the world's best-known scholars in the field of polymers and rubber), who has "with youthful boldness gone up the path of paradox" and "given himself the pleasure" of gathering many "curiosities" from astronomy, physics, biology and economics into *The Book of Odd Data* (1965).

Houwink's compilation informs his readers, for instance, that:

- > There as many nanoseconds in one second as there are seconds in thirty years...
- > A teaspoon of water contains as many molecules as there are teaspoons of water contained in the Atlantic Ocean...
- > Shooting stars are in reality metallic or stony granules smaller than a grain of millet; every day the earth receives 15,000 tonnes of them, and if this invisible dry rain, which has probably continued uninterrupted since our planet came into existence, were not continually washed down by rains, it would have formed a layer of cosmic dust twenty metres thick...
- > Electrons rotate around atomic nuclei at a speed ten times greater than that of the missiles launched by humans, but when a conductor with a section of one square millimetre is traversed by a current of one ampere, the electrons advance at the speed of twenty-five centimetres an hour...
- > A woman resting her weight on her spiked heel exerts upon the ground a pressure similar to that of a high-pressure steam generator...
- > The current of air which runs through our nose in a normal inhalation corresponds to a #2 wind force on the Beaufort scale...
- > The energy expended by an average man speaking three hours a day all his life long would barely be sufficient to heat a cup of tea...
- > The energy that could be extracted from a pea falling from a height of three centimetres, if wholly converted into luminous energy, would be sufficient to stimulate the optic nerves of all the human beings who have existed until now...
- > A dollar invested at a compound interest of four percent a year since the birth of Christ would today have the same value of one hundred thousand terrestrial globes of solid gold...
- > If Noah in the year 3000 BC had begun to string electrons on a thread, one a second, for eight hours a day, the necklace today would be two-tenths of a millimetre long...

The book describes approximately two hundred items of this kind; and according to Levi, "Some are elegant, or frivolous, or grotesque, but not one is useless: they are all meant to help us understand the world in which we live, i.e., give us a concrete notion of it; but in many cases, to 'understand' instead means to realise that with certain objects and phenomena we are not able to form an image (the same happens with God, according to certain religions). Our imagination has our dimensions, and we cannot demand that it exceed them... For laymen like us, the only instruments that allow us to cast a glance beyond our borders are 'the odd data'. They are not a science but a stimulus to acquire it."

Levi's insistence on the limits of human perception might have pleased another mind pursuing a hypothetical oddity, not in terms of the data themselves but in terms of navigational protocols – in this case, disquieting somatic terrain. In July 1688, William Molyneux, the Irish natural philosopher and writer on politics, sent a letter from Dublin to John Locke:

A Problem Proposed to the Author of the *Essai Philosophique concernant L' Entendement*

A Man, being born blind, and having a Globe and a Cube, nigh of the same bigness, Committed into his Hands, and being taught or Told, which is Called the Globe, and which the Cube, so as

easily to distinguish them by his Touch or Feeling; Then both being taken from Him, and Laid on a Table, Let us Suppose his Sight Restored to Him; Whether he Could, by his Sight, and before he touch them, know which is the Globe and which the Cube? Or Whether he Could know by his Sight, before he stretch'd out his Hand, whether he Could not Reach them, tho they were Removed 20 or 1000 feet from Him?

If the Learned and Ingenious Author of the Forementioned Treatise think this Problem Worth his Consideration and Answer, He may at any time Direct it to One that Much Esteems him, and is,

His Humble Servant

William Molyneux

For reasons unknown, Locke did not reply to this letter. However, in March 1693, after the two men had initiated an amicable correspondence, Molyneux once again presented Locke with his formulation. This time Locke responded enthusiastically: "Your ingenious problem will deserve to be published to the world." In the 1694 edition of his *Essay*, Locke slightly rephrased the problem to make it more accessible:

Suppose a Man born blind, and now adult, and taught by his touch to distinguish between a Cube, and a Sphere of the same metal, and nighly of the same bigness, so as to tell, when he felt one and t'other; which is the Cube, which the Sphere. Suppose then the Cube and Sphere placed on a Table, and the Blind Man to be made to see. Quare, Whether by his sight, before he touch'd them, he could now distinguish and tell, which is the Sphere, which the Cube.

Logicians, metaphysicians, rationalists, empiricists and ophthalmologists of the time argued over the "problem" with ferocity; numerous theories were offered and rejected; they continue to be. The existential manifold continues to oscillate between its embedded mysteries and elusive clarities; and theories, thinkers and sophisticated technologies continue to reveal, with extraordinary finesse, the manner in which 'the odd data' disperse, fragment, coalesce, mutate into a flux of radical new configurations, enigmas and epiphanies, even while remaining apparently the same. Benoît Mandelbrot, the father of fractal theory, informs us, for instance, that:

... a complex object, such as a ball of thread 10 centimetres in diameter and made up of thread that is 1 millimetre in diameter, possesses in a somewhat latent manner many distinct physical dimensions. At the 10-metre degree of resolution, it appears as a point, thus a zero-dimensional figure. At the 10-centimetre degree of resolution, it is a ball, and thus a three-dimensional figure. At the 10-millimetre degree of resolution, it is a construction of threads, and thus a one-dimensional figure. At the 0.1-millimetre degree of resolution, each thread becomes a kind of column, and the whole becomes again a three-dimensional figure. At the 0.01-millimetre degree of resolution, each column dissolves into filiform fibres and the whole is once again a uni-dimensional figure; thus we see the determination of the dimension continuously jumping around. At a certain level of analysis, the ball of thread is represented as a finite number of infinitesimally small atoms, and the whole once more is zero-dimensional.

And Claude Shannon, the father of information theory, committed to enabling the transmission of data (odd and otherwise), and frequently seen absorbed in juggling as he went down the corridor to his office, understood that with regard to the three-ball cascade:

$$(F+D) H = (V+D) N$$

where **F** is the time a ball spends in the air, **D** the time a ball spends in a hand, **V** the time a hand is vacant, **N** the number of balls juggled, and **H** the number of hands.

Other persistent figures archived in our histories and imaginaries have embraced the compelling ambiguities of odd data with paradoxical certitude, or have wilfully surrendered to equivocation:

Ralph Waldo Emerson knew that "as the ancient said,, the world is a *plenum* or solid; and if we saw all things that really surround us, we should be imprisoned and unable to move"...

Like most with a lyric sensibility, Wallace Stevens did not know which to prefer, "the beauty of inflection/ or the beauty of innuendoes/ the blackbird whistling/ or just after"...

The theologian Jalaluddin Rumi surely knew, the instant he was indelibly marked for a poet's fate which came to rest within him "like the final touchpoints of calligraphy"...

Herman Melville's *Bartleby*, copyist beyond compare, knew that when it came to inscribing his will upon the page of the world, he always and absolutely "would prefer not to"...

"Would the saints have changed their lives, had they known that heaven didn't exist?" wonders the narrator in Italo Calvino's novella *Smog*...

As objects relinquished slow edges to his failing sight, Edgar Degas came to know that "one must commit a painting the way one commits a crime"...

Musing on the concept of nirvana, the blind Jorge Luis Borges came to know that to reach this state of sublime self-extinction "simply means that one's acts no longer cast a shadow"...

Meditating on the possibility of an eternal present, Albert Einstein came to know that "events don't happen; they are there, and we encounter them en route"...

Knowing they might never find the answer to their question, Taoists continue to ask, with regard to the "Transformation of Things", whether Chuang Tzu dreams the butterfly, or the butterfly dreams Chuang Tzu...

And the wise in every century have repeatedly informed us that we only need hold up a single blade of grass to know the direction of the wind...

Perhaps all data, odd and otherwise, contribute most usefully to our understanding when they point us towards the man searching for a fire with a lighted lantern – as the koan suggests, "Had he known what fire is, he could have cooked his rice much sooner."

Smriti Vohra  
November 2007

**Day 01**