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通识读本 破解意识之谜 Consciousness

A Very Short Introduction

Susan Blackmore 著

薜 贵 译

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Chapter 1

Why the mystery?

The hard problem

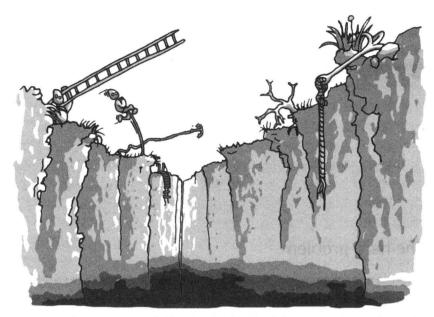
What is consciousness? This may sound like a simple question but it is not. Consciousness is at once the most obvious and the most difficult thing we can investigate. We seem either to have to use consciousness to investigate itself, which is a slightly weird idea, or to have to extricate ourselves from the very thing we want to study. No wonder that philosophers and scientists have struggled for millennia with the concept, and that scientists rejected the whole idea for long periods and refused even to study it. The good news is that, at the start of the 21st century, 'consciousness studies' is thriving. Psychology, biology, and neuroscience have reached the point when they are ready to confront some tricky questions: What does consciousness do? Could we have evolved without it? Could consciousness be an illusion? What is consciousness, anyway?

This does not mean that the mystery has gone away. Indeed, it is as deep as ever. The difference now is that we know enough about the brain to be ready to confront the problem head on. How on earth can the electrical firing of millions of tiny brain cells produce this – my private, subjective, conscious experience?

If we are going to get anywhere with understanding consciousness, we have to take this problem seriously. There are many people who

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1. No one has yet succeeded in bridging the fathomless abyss, the great chasm or the explanatory gap between inner and outer, mind and brain, or subjective and objective.

claim to have solved the mystery of consciousness: they propose grand unifying theories, quantum mechanical theories, spiritual theories of the 'power of consciousness', and many more, but most of them simply ignore the yawning chasm, or 'fathomless abyss', between the physical and mental worlds. As long as they ignore this problem they are not really dealing with consciousness at all.

This problem is a modern incarnation of the famous mind-body problem with which philosophers have struggled for more than two thousand years. The trouble is that in ordinary human experience there seem to be two entirely different kinds of thing, with no obvious way to bring the two together.

On the one hand, there are our own experiences. Right now I can see the houses and trees on a distant hill, hear the cars down on the main road, enjoy the warmth and familiarity of my own room, and wonder whether that scratching noise is the cat wanting to be let in.

All of these are my own private experiences and they have a quality that I cannot convey to anyone else. I may wonder whether your experience of green is the same as mine or whether coffee has exactly the same smell for you as it does for me, but I can never find out. These ineffable (or indescribable) qualities are what philosophers call 'qualia' (although there is much dispute about whether qualia exist). The redness of that shiny red mug is a quale; the soft feel of my cat's fur is a quale; and so is that smell of coffee. These experiences seem to be real, vivid, and undeniable. They make up the world I live in. Indeed, they are all I have.

On the other hand, I really do believe that there exists a physical world out there that gives rise to these experiences. I may have doubts about what it is made of, or about its deeper nature, but I do not doubt that it exists. If I denied its existence I would not be able to explain why, if I go to the door, I shall probably see the cat rushing in – and if you came by you would agree that there was now a cat trailing muddy footprints across my desk.

The trouble is that these two kinds of thing seem to be utterly different. There are real physical things with size, shape, weight, and other attributes that everyone can measure and agree upon, and then there are private experiences – the feeling of pain, the colour of that apple as I see it now.

Throughout history most people have adopted some kind of dualism: that is the belief that there are indeed two different realms or worlds. This is true of most non-Western cultures today, and surveys suggest that it is true of most educated Westerners as well. The major religions are almost all dualist: Christians and Muslims believe in an eternal, non-physical soul, and Hindus believe in the Atman or divine self within. Among religions, Buddhism alone rejects the idea of a persisting inner self or soul. Even among non-religious people, dualism is prevalent in Western cultures. Popular New Age theories invoke the powers of mind, consciousness, or spirit, as though they were an independent force;

and alternative therapists champion the effect of mind on body, as though these were two separate things. Such dualism is so deeply embedded in our language that we may happily refer to 'my brain' or 'my body'; as though 'I' am something separate from 'them'.

In the 17th century the French philosopher René Descartes (1596-1650) formally proposed the best-known dualist theory. Known as Cartesian dualism, this is the idea that the mind and the brain consist of different substances. According to Descartes, the mind is non-physical and non-extended (i.e. it takes up no space or has no position), while the body and the rest of the physical world are made of physical, or extended, substance. The trouble with this is obvious. How do the two interact? Descartes proposed that they meet in the tiny pineal gland in the centre of the brain, but this only staves off the problem a little. The pineal gland is a physical structure and Cartesian dualism provides no explanation of why it, alone, can communicate with the mental realm.

This problem of interaction bedevils any attempt to build a dualist theory, which is probably why most philosophers and scientists completely reject all forms of dualism in favour of some kind of monism; but the options are few and also problematic. Idealists make mind fundamental but must then explain why and how there appears to be a consistent physical world. Neutral monists reject dualism but disagree about the fundamental nature of the world and how to unify it. A third option is materialism and this is by far the most popular among scientists today. Materialists take matter as fundamental, but they must then face the problem that this book is all about. How do you account for consciousness? How can a physical brain, made purely of material substances and nothing else, give rise to conscious experiences or ineffable qualia?

This problem is called the 'hard problem' of consciousness, a phrase coined in 1994 by the Australian philosopher David Chalmers. He wanted to distinguish this serious and overwhelming difficulty from what he called the 'easy problems'. The easy problems, according to





2. Descartes explained reflex responses to pain in terms of mechanical responses and the flow of 'animal spirits' in tiny tubes. But when it came to conscious experiences he proposed that they were part of a quite different mental world, connected to the physical body through the pineal gland in the centre of the brain.

Chalmers, are those that in principle we know how to solve, even if we have not yet done so. They include such problems as perception, learning, attention, or memory; how we discriminate objects or react to stimuli; how sleep differs from being awake. All these are easy, he says, compared with the really hard problem of experience itself.

Not everyone agrees with Chalmers. Some claim that the hard problem does not exist; that it depends on a false conception of consciousness, or on drastically underestimating the 'easy' problems. The American philosopher Patricia Churchland calls it a

'hornswoggle problem', arguing that we cannot, in advance, decide which problems will turn out to be the really hard ones. It arises, she claims, from the false intuition that if we explained perception, memory, attention, and all the other details, there would still be something left out - 'consciousness itself'.

These are important objections. So before we go any further we must be clearer about what, if anything, 'consciousness itself' might mean.

Defining consciousness

What is it like to be a bat? This curious question looms large in the history of consciousness studies. First asked in the 1950s, it was made famous by the American philosopher Thomas Nagel in 1974. He used the question to challenge materialism, to explore what we mean by consciousness, and to see why it makes the mind-body problem so intractable. What we mean, he said, is *subjectivity*. If there is something it is like to be the bat – something for the bat itself, then the bat is conscious. If there is nothing it is like to be the bat, then it is not.

So think, for example, of the mug, or pot, or plastic ornament on your table. Now ask - what is it like to be the mug? You will probably answer that it is like nothing at all; that mugs cannot feel, that china is inert, and so on. You will probably have no trouble in opining that pots and mugs are not conscious. But move on to worms, flies, bacteria, or bats and you may have more trouble. You do not know - indeed, you cannot know - what it is like to be an earthworm. Even so, as Nagel points out, if you think that there is something it is like to be the worm then you believe that the worm is conscious.

Nagel chose the bat as his example because bats are so very different from us. They fly, live mostly in the dark, hang upside-down from trees or in damp caves, and use sonar, not vision, to see the world.



Defining consciousness

There is no generally agreed definition of consciousness, but the following gives some idea of what is meant by the word.

'What it's like to be . . . ': If there is something it is like to be an animal (or computer, or baby) then that thing is conscious. Otherwise it is not.

Subjectivity or **phenomenality**: Consciousness means subjective experience or phenomenal experience. This is the way things seem to me, as opposed to how they are objectively.

Qualia: The ineffable subjective qualities of experience, such as the redness of red or the indescribable smell of turpentine. Some philosophers claim they do not exist.

The hard problem: How do subjective experiences arise from objective brains?

That is, they emit rapid bursts of high-pitched squeaks while they fly and then, by analysing the echoes that come back to their sensitive ears, learn about the world around them.

What is it like to experience the world this way? It is no good imagining that you are a bat because an educated, speaking bat would not be a normal bat at all; conversely, if *you* became a normal bat and could not think or speak then you would not be able to answer your own question.

Nagel argued that we can never know and from this concluded that the problem is insoluble. For this reason he is dubbed a *mysterian*. Another mysterian is the American philosopher Colin McGinn, who argues that we humans are 'cognitively closed' with respect to