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I Introduction

1.1 Experience and Reality

Does a tree falling in the forest make a sound when no one is around to hear it? The question is familiar to every undergraduate. One natural response is that of course the tree makes a sound – why shouldn’t it? The tree makes a sound whether anyone is on hand to hear it or not. And, in any case, even if there are no people about, there are squirrels, birds, or at the very least bugs that would hear it crashing down.

Consider a more measured response, versions of which have percolated down through successive generations of student philosophers. The tree’s falling creates sound waves that radiate outwards as ripples on the surface of a pond, but in a spherical pattern. If these sound waves are intercepted by a human ear (or maybe – although this might be slightly more controversial – the ear of some nonhuman sentient creature) they are heard as a crashing noise. If the sound waves go undetected, they eventually peter out. Whether an unobserved falling tree makes a sound, then, depends on what you mean by sound. If you mean 'heard noise', then (squirrels and birds aside) the tree falls silently. If, in contrast, you mean something like ‘distinctive spherical pattern of impact waves in the air’, then, yes, the tree’s falling does make a sound.

Most people who answer the question this way consider the issue settled. The puzzle is solved simply by getting clear on what you mean when you talk about sounds. Indeed, you could appreciate the original question as posing a puzzle only if you were already prepared to distinguish two senses of 'sound'. But what precisely are these two senses? On the one hand, there is the physical sound, a spherical pattern of impact waves open to public inspection and measurement – at any rate, open to public inspection given the right instruments. On the other hand, there is the experienced sound. The experienced sound depends on the presence of an observer. It is not, or not obviously, a public occurrence: although a sound can be experienced by many people, each observer’s experience is ‘private’. You can observe and measure agents’ responses to experienced sounds, but you cannot measure the experiences themselves. This way of thinking about sounds applies quite generally. It
The sensation of colour cannot be accounted for by the physicist's objective picture of light-waves. Could the physiologist account for it, if he had fuller knowledge than he has of the processes in the retina and the nervous processes set up by them in the optical nerve bundles and in the brain? I do not think so.

(Schrödinger 1958, 90)

The picture of the universe and our place in it that lies behind such reflections has the effect of bifurcating reality. You have, on the one hand, the 'outer' material world, the world of trees, forests, sound waves, and light radiation. On the other hand, you have the 'inner' mental world, the mind and its contents. The mental world includes conscious experiences: the looks of seen objects, ways objects feel, heard sounds, tasted tastes, smelled smells. The 'external' material world comprises the objects themselves, and their properties. These properties include such things as objects' masses and spatial characteristics (their shapes, sizes, surface textures, and, if you consider objects over time, motions and changes in their spatial characteristics).

Following a long tradition, you might call those observed qualities properly belonging to material objects 'primary qualities'. The rest, the 'secondary qualities', are characteristics of objects (presumably nothing more than arrangements of objects' primary qualities) that elicit certain familiar kinds of experience in conscious observers. Experience reliably mirrors the primary qualities of objects. Secondary qualities, in contrast, call for a distinction between the way objects are experienced, and the way they are. This distinction shows itself in student reflections on trees falling in deserted forests. More fundamentally, the distinction encourages us to view conscious experiences as occurring 'outside' the material universe.

You might doubt this, confident that conscious experiences occur in brains, and regarding brains as respectable material objects. But now apply the distinction between primary and secondary qualities to brains. Brains — yours included — have asserted primary qualities. Your brain has a definite size, shape, and spatial location; it is made up of particles; each with a definite size, shape, mass, and spatial location, and each of which contributes in a small way to the brain's overall material character. In virtue of this overall character, your brain would look (and presumably sound, smell, feel, and taste) a particular way. This is just to say that your brain could be variously experienced. The qualities of these experiences, although undoubtedly related in some systematic way to the material reality that elicits them, differ from qualities possessed by any material object, including your brain. But if that is so, where do we situate the qualities of experience?

Your first instinct was to locate them in the brain. But inspection of brains reveals only familiar material qualities. An examination of a brain — even with the kinds of sophisticated instrumentation found in the laboratory of the neurophysiologist and the neural anatomist — reveals no looks, feels, sound sounds. Imagine that you are attending a performance of Die Walküre at Bayreuth. Your senses are assaulted by sounds, colors, smells, even tastes. A neuroscientist observing your brain while all this is occurring would observe a panoply of neurological activities. But you can rest assured that the neuroscientist will not observe anything resembling the qualities of your conscious experience.

The idea that these qualities reside in your brain, so natural at first, appears, on further reflection, unpromising. But now, if qualities of your experiences are not found in your brain, where are they? The traditional answer, and the answer that we seem driven to accept, is that they are located in your mind. And this implies, quite straightforwardly, that your mind is somehow distinct from your brain. Indeed, it implies that the mind is not a material object at all, not an entity on all fours with tables, trees, stones — and brains! Minds appear to be nonmaterial entities: entities with properties not possessed by brains, or perhaps by any material object. Minds bear intimate relations to material objects, perhaps, and especially intimate relations to brains. Your conscious experiences of ordinary material objects (including your own body) appear to reach you 'through' your brain; and the effects of your conscious deliberations have on the universe (as when you decide to turn a page in this book and subsequently turn the page) require the brain as an intermediary. Nevertheless, the conclusion seems inescapable: the mind could not itself be a material object.

1.2 The Unavoidability of the Philosophy of Mind

You might find this conclusion unacceptable. If you do, I invite you to go back over the reasoning that led up to it and figure out where that reasoning went off the rails. In so doing you would be engaging in philosophical reflection on the mind: philosophy of mind. Your attention would be turned, not to the latest results in psychology or neuroscience, but to commonsense assumptions with which this chapter began and to a very natural line of argument leading from these assumptions to a particular conclusion. As you begin your reflections, you might suspect a trick. If you are right, your excursion into philosophy of mind will be brief. You need only locate the point at which the trick occurs.

I think it unlikely that you will discover any such trick. Instead you will be forced to do what philosophers since at least the time of Descartes (1596—1650) have been obliged to do. You will be forced to choose from among a variety of possibilities, each with its own distinctive advantages and liabilities. You might, for instance, simply accept the conclusion as Descartes did: minds and material objects are distinct kinds of entity, distinct 'substances'.
You might instead challenge one or more of the assumptions that led to that conclusion. If you elect this course, however, you should be aware that giving up or modifying an assumption can have unexpected and possibly unwelcome repercussions elsewhere. In any case, you will have your work cut out for you. The best minds in philosophy — and many of the best outside philosophy as well — have turned their attention to these issues, and there remains a notable lack of anything resembling a definitive, uncontested view of the mind's place in the universe.

Do not conclude from this that it would be a waste of time for you to delve into the philosophy of mind. On the contrary, you can enjoy the advantage of hindsight. You can learn from the successes and failures of others. Even if you cannot resolve every puzzle, you might at least come to learn something important about your picture of the universe and your place in it. If you are honest, you will be obliged to admit that this picture is gappy and unsatisfying in many respects. This, I submit, represents an important stage for each of us in coming to terms with ourselves and our standing in the order of things.

1.3 Science and Metaphysics

Some readers will be impatient with all this. Everyone knows that philosophers only pose problems and never solve them. Solutions to the important puzzles reside with the sciences. So it is to science that we should turn if we are ever to understand the mind and its place in a universe of quarks, leptons, and fields. Residual problems, problems not susceptible to scientific resolution, are at bottom phony pseudo-problems. Answers you give to them make no difference; any 'solution' you care to offer is as good as any other.

Although understandable, this kind of reaction is ill-considered. The success of science has depended on the enforcement of well-defined divisions of labor, coupled with a strategy of divide and conquer. Consider: there is no such thing as science; there are only individual sciences — physics, chemistry, meteorology, geology, biology, psychology, sociology. Each of these sciences (and of course there are others) carves off a strictly circumscribed domain. Staking out a domain requires delimiting permissible questions. No science sets out to answer every question, not even every 'empirical' question. In this way, every science passes the buck. The practice of back-passing is benign because, in most cases, the buck is passed eventually to a science where it stops. Sometimes, however, the buck is passed out of the sciences altogether. Indeed, this is inevitable. The sciences do not speak with a single voice. Even if every science were fully successful within its domain of application, we should still be left with the question of how these domains are related, how pronouncements of the several sciences are to be calibrated against one another. And this question is, quite clearly, not a question answerable from within any particular science.

Enter metaphysics. One traditional function of metaphysics — or, more particularly, that branch of metaphysics called ontology — is to provide a completely general, overall conception of how things are. This includes not the pursuit of particular scientific ends, but an accommodation of the pronouncements of the several sciences. It includes, as well, an attempt to reconcile the sciences with ordinary experience. In one respect, every science takes ordinary experience for granted. A science is 'empirical' in so far as it appeals to observation in confirming experimental outcomes. But the intrinsic character of observation itself (and, by extension, the character of observers) is apparently left untouched by the sciences. The nature of observation — outwardly directed conscious experience — stands at the limits of science. It is just at this point that the puzzle with which this chapter began rears its head.

Scientific practice presupposes observers and observations. In the end, however, the sciences are silent about the intrinsic nature of both. The buck is passed. Our best hope for a unified picture — a picture that includes the universe as described by the sciences and includes, as well, observers and their observations — lies in pursuing serious ontology. The buck stops here. You can, of course, turn your back on the metaphysical issues. This, however, is easier said than done. Many of those who proclaim their independence from philosophical influences, in fact, embrace unacknowledged metaphysical assumptions. In considering the nature of the mind, the question is not whether you are going to engage in metaphysical thinking, but whether you are going to do so self-consciously.

1.4 Metaphysics and Cognitive Science

This book concerns the metaphysics — the ontology — of mind. It revolves around reflections on questions about mind that fall partly or wholly outside the purview of the sciences. I should warn you that this is not a particularly fashionable endeavor. Many philosophers regard metaphysics as sterile and dated. Many more have arrived at the belief that we are best bet for understanding the mind and its place in the universe is to turn our back on philosophy altogether. These philosophers promote the idea that the philosophy of mind is, or ought to be, one component of what has come to be called cognitive science. Cognitive science includes elements of psychology, neuroscience, computer science, linguistics, and anthropology. What has a philosopher to offer the scientists who work in these areas? That is a good question.

Perhaps philosophers can provide some kind of unifying influence, a general picture that accommodates finer-grained assessments issuing from the scientific contributors to cognitive science. This, it would seem, is simply to engage in a kind of attenuated metaphysics. The metaphysics is attenuated to the extent that it excludes traditional ontological concerns, and excludes as well consideration of the relation sciences such as physics or chemistry bear on our uncovering the nature of the mind.
1.5 A Look Ahead

The chapters to follow introduce a range of themes preeminent in the philosophy of mind. They do so in a way that presupposes no special background in the subject. The focus is on theories that have formed the basis of what might be regarded as the modern (or is it postmodern?) conception of mind. I have done my best to present each of these theories in a way that makes its attractions salient. Philosophers of mind have, in my judgment, been too quick to dismiss views they regard as quaint or outmoded. One result is that we are apt to forgo opportunities to learn from predecessors who, as it happens, had a good deal to teach. A second result of slighting unfashionable theories is that we risk repeating mistakes that we ought by now to have learned to avoid. I have tried to rectify this situation by providing sympathetic readings of positions that are sometimes caricatured, dismissed out of hand, or simply ignored. In so doing, I have put less weight on criticism of positions covered than do other authors. My job, as I see it, is to illuminate the territory. I leave it to you, the reader, to decide for yourself what to accept and what to reject.

This is not to say that I am neutral on topics discussed. Where I offer my opinion, however, I have tried to make clear that it is my opinion, a consideration to be weighed alongside other considerations. In a pair of concluding chapters I say what I think. There, I offer an account of minds and their place in the universe grounded in what I consider to be an independently plausible ontology. Chapter 12 is devoted to sketching that ontology; Chapter 13 spells out its implications for central issues in the philosophy of mind. The aim of these concluding chapters is less to convince you of the details of the view I prefer than to convince you of the importance of serious ontology for the philosophy of mind.

But this is to get ahead of the story. Chapters 12 and 13 follow on the heels of chapters devoted to the examination of a rich variety of conceptions of mind. Before venturing further, it might be worthwhile to provide a brief accounting of what you can expect in each of these intervening chapters.

Cartesian Dualism and Variations

Chapter 2 introduces Descartes’s ‘dualist’ conception of mind. Descartes divides the world into mental and nonmental – immaterial and material – substances. Having done so, he is obliged to confront the notorious mind–body problem: how could mental and nonmental substances interact causally? Dissatisfaction with Descartes’s apparent failure to answer this question bred amended versions of the Cartesian framework taken up in Chapter 3: parallelism, occasionalism, epiphenomenalism, idealism.

Parallelism, conceding the seeming impossibility of comprehending causal interaction between nonmaterial mental and material entities, supposes that mental and material substances do not interact, but undergo alterations in
parallel. Occasionalists introduce God as a connecting link between the mental and the material. God wills changes in both the material world and in minds in such a way that occurrences in each realm are aligned just as they would be were they directly causally related. Epiphenomenalists defend one way, material-to-mental causation. Mental occurrences are causally inert ‘by-products’ of material events (most likely events in the brain). Epiphenomenalism has enjoyed renewed popularity in recent years, especially among philosophers and neuroscientists who take consciousness seriously but see no prospect of ‘reducing’ conscious experiences to goings-on in the brain. Idealists reject the materialist component of the dualist picture. All that exists, they contend, are minds and their contents. Idealists do not simply deny that external, material objects exist; they contend that an external material world is literally unthinkable. The thesis that material objects exist outside the mind is judged, not false, but unintelligible.

Behaviorism

Idealists reject the materialist side of the dualist conception of mind: nonmaterial mental substance is inconceivable. Materialists hold, in contrast, that every substance is a material substance (and nothing more). Chapter 4 focuses on one historically influential materialist response to Cartesianism, behaviorism.

Behaviorists hoped to show that the Cartesian conception of minds as distinct from bodies was based on a fundamental misunderstanding of what you are up to when you ascribe states of mind to yourself and to others. According to behaviorists, claims about your mind can be ‘analyzed’ into claims about what you do or are disposed to do, how you behave or are disposed to behave. To say that you are in pain — suffering a headache, for instance — is just to say (if the behaviorist is right) that you are holding your head, moaning, saying ‘I have a headache’, and the like, or at least that you are disposed to do these things. Your being in pain, then, is not a matter of your being a nonmaterial mind that is undergoing pain; it is simply a matter of your behaving in a characteristic way or being so disposed.

The Mind–Brain Identity Theory

Proponents of the Identity theory, the topic of Chapter 5, side with behaviorists against the Cartesian notion that minds are immaterial substances, but stand with Carcians against the behaviorists’ contention that having a mind is nothing more than behaving, or being disposed to behave, in particular ways. Identity theorists argue that states of mind (such as having a headache, or thinking of Alice Springs) are genuine internal states of agents possessing them. These states, as neuroscience will someday reveal, are states of our brains. Mental states are identical with these brain states: mental states are states of brains. The identity theory appeals to anyone attracted to the idea that minds are after all just brains. But, at the same time, the identity theory inherits problems associated with that doctrine, most especially the problem of finding a place of consciousness and qualities of conscious experiences in the brain.

Functionalism

Chapter 6 turns to functionalism, the historical successor to behaviorism and the identity theory, and certainly the present day’s most widely accepted conception of mind. Functionalists identify states of mind, not with states of brains, but with functional roles. Your having a headache is for you to be in some state (doubtless a state of your brain) that exhibits input–output conditions characteristic of pain. (In this, functionalism resembles a dressed-up version of behaviorism.) Headaches are caused by blows to the head, excessive alcohol intake, lack of sleep, eyestrain, and the like, and they produce characteristic responses that include, but are not exhausted by, overt behavior of the sort focused on by behaviorists: head-holding, moaning, utterances of ‘I have a headache’. In addition to behavior, a headache gives rise to other states of mind. (And here functionalists depart from the behaviorist contention that claims about states of mind are fully analyzable in terms of behavior and behavioral dispositions.) Your headache likely leads you to believe that you have a headache, for instance, to wish matters were otherwise, and to want aspirin.

Central to all forms of functionalism is the idea that states of mind are ‘multiply realizable’. To be in a particular mental state is to be in a state that has a certain characteristic role. But many different kinds of material state could occupy or ‘realize’ the very same role. You, an octopus, and an Alpha Centaurian could all be in pain despite your very different physiologies (pretend that Alpha Centaurians have a silicon-based ‘biology’). If being in pain were, as identity theorists suggest, solely being in a particular kind of neurological state, then octopodes and Alpha Centaurians, lacking physiologies comparable to ours, could not be in pain — an apparent absurdity.

Functionalism affords a powerful model that allows for the ‘abstraction’ of states of mind from the hardware that ‘realizes’ them. One result is that dramatically different kinds of material system could all share a common psychology.

The Representational Theory of Mind

The Representational Theory of Mind, an important strain of mainstream functionalism, is the subject of Chapter 7. Proponents of the Representational Theory of Mind, regard minds as ‘information-processing’ devices. Information, in the form of ‘mental representations’ encoded in a Language of Thought, mediates incoming stimuli and behavioral outputs. On a view of this kind, minds could be thought of as ‘software’ running, not
on factory-assembled computing machines, but on neurological 'hardware' in brains. The appeal of such a picture is obvious: it promises to demystify minds and their operations, neatly integrating them into the material universe.

The Representational Theory of Mind inherits a difficulty widely associated with functionalist theories in general: the difficulty of accommodating qualities of conscious experiences. When you are in pain you are in a state of a kind that has various characteristic causes and effects. But what is salient to anyone undergoing a painful experience, being in this state is painful. Painfulness is qualitatively distinctive. Indeed you might think that what makes a state a pain state is its having this character. The difficulty is to see how the qualitative aspect of conscious experiences might be reconciled with the functionalist picture.

The Intentional Stance

Daniel Dennett, the hero (or villain) of Chapter 8, focuses on the 'propositional attitudes': beliefs, desires, intentions, and the like. Dennett holds that the question whether a creature (or indeed anything at all) possesses a belief, or desire, or intention, turns solely on the utility of the practice of ascribing beliefs (or desires, or intentions) to it. We find it useful to describe cats, desktop computers, and even thermostats as believing this or that. Your car believes there is a mouse under the refrigerator. Your desktop computer believes the printer is out of paper (and so alerts you to that fact); the thermostat believes that the room is too cool (and, in consequence, turns the furnace on).

To the extent that such attributions of belief work, cats, desktop computers and thermostats (and, of course, people and many other creatures) are 'true believers'. There is no further question of whether thermostats, for instance, really have beliefs, or whether it is just that we can get away with treating them as though they do. All there is to having a belief is to be so treatable.

The practice of ascribing beliefs, desires, and intentions is, according to Dennett, a matter of taking up a particular stance: the 'intentional stance'. In pursuing science, however, you would find surprising differences in creatures' responses to one another and to their environments. An understanding of these requires that you adopt the 'design stance'. In so doing, you discover that mechanisms responsible for behavior differ importantly across species. Actions indistinguishable from the intentional perspective look very different once you consider the 'design' of creatures performing them. Eventually, the design stance gives way to the 'physical stance'. This is the move from considering a creature's software to looking at its hardware.

Having a mind, then, is simply a matter of being describable from the intentional stance. The mystery of how minds are related to bodies vanishes, according to Dennett, once you recognize that truths expressible from within the intentional stance can be explained by reverting to the design stance. For their part, design stance truths are grounded in facts uncovered from within the physical stance.

Reduction and Elimination

The thought that all there is to having a mind is being so describable, could easily lead to the more radical thought that minds are, at bottom, fictions. In Chapter 9 this possibility is explored in some detail. Perhaps our talk of minds and their contents and our practice of explaining behavior by reference to mental goings-on, are simply remnants of primitive animistic forms of explanation. We once explained the weather by the fickleness of the gods who controlled it. Later, we developed a science, meteorology, that enabled us to understand meteorological phenomena purely 'naturalistically' without appeal to conscious agents. Maybe explanations of intelligent behavior should likewise move beyond appeals to states of mind and mental processes.

One possibility is that talk of minds could be replaced by talk of states and processes unearthed by neuroscience. A second possibility takes seriously an important feature of the Representational Theory of Mind. Suppose the mind were animated by 'mental representations'. These would be sentences in a built-in, hard-wired 'Language of Thought'. But just as a computing machine cares nothing for the meaning of symbols it processes, so minds — or their physical 'realizers', brains — care nothing for the meanings of symbols in the Language of Thought: mental processes are purely 'syntactic'. Representational 'content', central in traditional accounts of the mind, drops out of the picture, taking with it the familiar categories of belief, desire, and intention.

Consciousness

Consciousness is the 800-pound gorilla that inevitably asserts itself in the philosophy of mind. Psychology and neuroscience have made impressive advances in recent years. None of these advances, however, has brought us a step closer to understanding the 'mystery of consciousness'. Or so it seems.

What exactly is the 'mystery of consciousness'? It is not easy to say. You can get a feel for it, however, by reflecting on a vivid conscious experience, the sort of experience you might have in strolling on a tropical beach at sunset, for instance. You have visual experiences of the ocean, the sky, the setting sun, the sand; you feel a cool breeze and the warm sand under your feet; you hear the waves lapping the shoreline and the calls of birds; you smell the scent of flowers and salt air. These experiences are the result of your perceptual encounter with your surroundings. Your 'sensory surfaces' are stimulated, and signals are passed on to your brain where, it would seem, they issue in your experiences. If this sequence were blocked at any point or inhibited, your experiences would be diminished.
As a result of your experiences, you respond in various ways. You are led to entertain new thoughts and to continue strolling; you turn your head to find a bird that has produced a particularly striking call. A scientist studying all this could, at least in theory, follow the whole input–output sequence, or at any rate have a detailed picture of what is going on inside your body. The problem is that there is apparently a ‘gap’ between what a scientist could observe, and what your experiences are like. How are experiences and their ‘Technicolor’ qualities to fit into the scientific picture? This is the mystery of consciousness.

Faced with this mystery, scientists and philosophers have responded in various ways. Some have chosen simply to ignore the phenomenon, dismiss it as unfit for scientific study. Although a scientist is free to ‘bracket’ or ignore one topic for the sake of studying others, philosophers do not have this luxury. Philosophers are bound to attempt a unified picture of the universe, a picture that accommodates both the findings of psychology and neuroscience, and conscious experiences.

Another option is to accept conscious experiences as they are, but to assimilate them to functional states of agents. To be conscious is just to be in a particular sort of functional state, a state realized in your brain. The question is whether qualities of conscious experience can plausibly be dealt with in this fashion. Many have doubted it.

Other options include epiphenomenalism (conscious qualities are causally inert by-products of material processes in the brain), panpsychism (what you might regard as qualities of conscious experience are really part of the ‘intrinsic nature’ of matter), and representationalism (what you regard as qualities of experiences are in fact qualities you represent objects you experience as having; qualities of your beach experience are, at bottom, just qualities of objects that you are experiencing).

Clearly, then, if you take qualia (the term used by philosophers to designate qualities of conscious experiences) seriously, you will need to say something about what David Chalmers calls ‘the hard problem’: what relation does consciousness bear to material goings-on? You might, in the end, be driven to embrace a position that seemed antecedently unattractive, epiphenomenalism, for instance, or panpsychism. Before accepting a position concerning which you might have important reservations, however, you should be certain that you have exhausted the space of possibilities. A central goal of this book is to make you aware of the extent of that space and thereby to equip you to choose wisely.

Non-Reductive Physicalism

Cartesian dualism takes consciousness seriously, while at the same time making it clear why conscious experiences are not going to be encountered in scientific investigations of the material universe. That is the good news. The bad news is that Cartesian dualism makes the interface between minds and bodies—mind–body interaction—wholly mysterious. How could substances sharing no attributes causally interact?

Suppose Descartes is wrong, however. Suppose mental properties and material properties could be possessed by material substances. Neuroscience research suggests that mental properties are grounded in physical properties. You experience a pain, for instance, because your nervous system is in a particular state. Still, pains evidently differ qualitatively from anything in your nervous system. This suggests that, although the presence of mental properties depends on the presence of physical properties, mental properties are nevertheless distinct from physical properties; the mental is not reducible to the physical. The result: substance monism combined with a dualism of properties.

This neat ‘non-reductive physicalist’ solution to the mind–body problem has recently come under fire. Mental and material properties might be properties of a single substance, but if mental and material properties are genuinely distinct, and if mental properties depend for their very existence on material properties, it is hard to see how mental properties could have a role in the production of bodily behavior. This is the Cartesian problem all over again.

Suppose that your forming the belief that a snake is in the path results in a particular bodily response (your altering course). Suppose that some material event in your brain ‘realizes’ this belief, and that this material realization causes you to alter your course. The material realization might ‘underlie’ or ‘give rise to’ various mental properties. Suppose that it does. Those properties need have no part in producing your subsequent behavior; however, they might be ‘causally irrelevant’.

A fast-bowled red cricket ball cracks a batsman’s rib. The ball is red, but its redness apparently has no role in the cracking. Many have thought that there are excellent reasons to think mental properties are like this: the properties are on the scene, perfectly genuine, but ‘causally irrelevant’. In that case you would be left with a virulent new form of epiphenomenalism. Once again, you will need to sort through the options and find the one you regard as the most promising, perhaps only because it is the least objectionable.

Ontology and Mind

The book concludes with two chapters in which, as noted above, I lay out an account of the mind grounded in a particular ontology. The ontology, details of which occupy Chapter 12, regards substances as the basic entities. Substances possess properties, which I take to be ways substances are. You could think of a cricket ball as a substance. A cricket ball is red and spherical. The ball’s redness and sphericity are ways it— that ball, and nothing else—is. Every property contributes distinctively to its possessor’s qualities and causal powers or dispositions. Indeed, every property is both qualitative and dispositional: properties are powerful qualities. From this basis, I construct,
in Chapter 13, an account of the mind. The construction is tentative and sketchy, but the fundamental ideas will be clear. I regard it as an important feature of the conception I sketch that it accommodates the attractions of its competitors without inheriting (all) their liabilities. There is, as I hope to convince you, something right as well as something wrong in each of the diverse accounts of the mind taken up in earlier chapters.

A final comment. This book will have achieved its purpose if it convinces you that any philosophical account of the nature of the mind includes an important metaphysical component. I am less concerned with your agreeing with me on the details of this component. To my way of thinking, you will have made considerable progress if only you recognize that the study of mind requires a stiff measure of ontological seriousness.

Suggested Reading

A book like this should inspire readers to look more closely at primary sources, the work of philosophers bent on defending (or attacking) positions being discussed. To this end, anthologies in the philosophy of mind can be especially useful. Three new collections and an old standard merit special mention. O’Connor and Robb’s Philosophy of Mind: Contemporary Readings (2003) assembles essays expressly selected to complement this volume. Rosenthal’s The Nature of Mind (1991), and its updated replacement, Chalmers’s Philosophy of Mind: Classical and Contemporary Readings (2002), cover much of the same territory. My own collection, Philosophy of Mind: A Guide and Anthology (2003b) includes, in addition to primary source readings, extensive introductory material.


In general, you should be skeptical of materials you turn up on the Internet. Disinformation swamps information; self-proclaimed philosophers often aren’t. For this reason, entries in Wikipedia should be approached with extreme caution. In contrast, the online Stanford Encyclopedia of Philosophy (Zalta 2002) is a trustworthy source for topics in the philosophy of mind. Marco Nani’s (2001) Field Guide for the Philosophy of Mind and Chris Eliasmith’s (2003) Dictionary of Philosophy of Mind contain useful entries. David Chalmers’s Contemporary Philosophy of Mind: An Annotated
2 Cartesian Dualism

2.1 Science and Philosophy

We all take ourselves and our fellow human beings to have minds. But what exactly is it to ‘have a mind’? The question is one with which philosophers and non-philosophers have struggled throughout recorded history. According to some, minds are spiritual entities, souls that temporarily reside in bodies, entering at birth (or maybe at conception) and departing on death. Indeed, death is just a soul’s taking leave of a body. Others imagine the relation between minds and bodies to be more intimate. Minds, they hold, are not entities. Minds resemble fists or laps: a mind is present when a body is organized in a particular way, and absent otherwise. A mind ceases to exist on the death of the body because the body’s internal structure breaks down. Still others hold that minds are indeed entities, physical entities: minds are brains.

The aim of this chapter is to make a start at sorting out some of these competing views and thus to make clear what precisely is at stake when you ask what minds are. You will discover that the issues are rarely clear cut. This is scarcely surprising. Puzzles posed by the investigation of minds are some of the deepest in philosophy. In the end, you might find no proffered solution entirely satisfactory. Even if that is so, you will at least have a better understanding of the attractions and liabilities inherent in different ways of regarding minds.

Having said this, I want to head off one natural line of response. A common attitude toward philosophy is that philosophers never answer questions, but merely pose them. Scientists, in contrast, are in the business of delivering answers. Questions, the answers to which elude science, questions that seem scientifically unanswerable, are often dismissed as ‘merely philosophical’. It is but a short step from this deflationary depiction of philosophy to the notion that, where philosophy is concerned, there are no settled truths: every opinion is as good as any other.

This conception of philosophy and its relation to science is inadequate, naïve, and, in the end, self-defeating. What eludes science need not be unsettled. The state of the universe immediately preceding the Big Bang,