

DESCARTES ON MIND-BODY INTERACTION

Daniel Holbrook

Mind-body interaction is so fundamental to human existence that it normally goes unnoticed and is taken for granted. For example, I might feel thirsty, and then, the thought occurs to me, "I'll go to the fountain for a drink of water." The next moment, almost miraculously, my legs begin moving, carrying me to the door! Mind and body are constantly interacting. Philosophers attempt to give an accurate description of mind-body interaction and to give a reasonable account of how mind-body interaction is possible.

Before I can get to the details of Descartes' theory of mind-body interaction, I first need to examine his theory of how mind and body are separate. That's the order of his argument. First, the mind and body are shown to be distinct and separate substances; then, later, he explains how interaction between them is possible. Descartes uses a thought experiment to demonstrate that mind and body are separate substances. Each can be conceived clearly and distinctly as being complete entities capable of existing independently of one another. I can imagine my mind thinking on its own and I can imagine my body existing without a mind. How can mind and body, two drastically different kinds of things, interact in such an orderly manner? It's like fire and water. Descartes relies upon theology to answer this question. Over and above creating mental substance and physical substance, there is a third kind of creation. According to Descartes, God creates a union between these two wholly different substances, a union that constitutes human nature.

At the heart of Descartes' philosophy is a commitment to substance/mode ontology and phenomenal realism. During the course of his philosophical doubts, Descartes doubts many things, but he cannot doubt the reality of his own psychological states. Whether or not the world exists, or God exists, Descartes is certain that *it seems to him* that he sees colors and shapes floating about in a world before him.¹ From this phenomenal realism, when coupled with a substance-mode ontology, the *cogito* soon follows. Psychological states include modes: colors, shapes, loud and soft noises, for

example. Their existence implies the existence of a substance in which they inhere, given the substance/mode ontology.² Descartes finds his personal identity as being tied to the thinking substance in which these psychological states inhere. Hence, he thinks and, therefore, he exists.

Since Descartes defines substance as being that which has the capacity to exist independently of any other thing and since he envisions God as being the creator of all the world, then, strictly speaking, on this view, only God exists as substance. He alone is an uncreated and independently existing infinite thinking substance. Within the world, there are two fundamental kinds of "created" substances that only need God's concurrence to exist: minds (finite thinking substances) and the physical world (finite bodies that, taken together, are infinite).³ Apart from minds, being the substance in which thinking inheres, and bodies, which are extended (occupy spaces), all else exists as properties (modes) of these two kinds of substances. The only exception to this rule is the union of mind and body that constitutes human nature and explains mind-body interaction. In this philosophy, all other properties exist as properties of some substance. The property of being cubic only exists as the shape of some finite part of infinite corporeal substance. The property of loving only exists as the psychological state of some thinking substance. Descartes offers no argument for this ontology of substance and mode other than "it is very manifest by the natural light which is in our souls."⁴ This might mean that our knowledge of this ontology of substance and mode is innate, or it might be self-evident, or both.

Each substance has one and only one principal attribute that determines its nature. With thinking substance, the principal attribute is thought and with corporeal substance the principal attribute is extension.⁵ Descartes defines essence as "nothing without which a thing can still exist . . ."⁶ and to take away my nature as a thinking thing is to cause me to cease to exist. The nature of the psychological states of a person is essential to the identity of that person, because if separated from that person, the identity of the person is also destroyed.⁷ I can focus upon the idea I have of myself and one by one separate the various qualities that are constituents of that idea. It is still / when my arm, even my head, is separated from my

idea of myself. I can separate a particular action from all the other actions I have done. I can separate calling my mother on her birthday from my other actions. It is still I that remains. But if I separate my existence as the subject of my psychological states, then my personal identity is destroyed. In Descartes' philosophy, if I lose my mind and become an automaton, a machine of flesh and blood, then that body walking around would not be *me*.

Descartes offers a controversial proof for the conclusion that he is essentially a thinking thing. Given any other likely candidate for the unique essential property except his thinking, he can doubt that it makes up his essence. Descartes is not his body because he can doubt whether he is his body. He can imagine that he can exist without his body, but there is no possibility of imagining that he exists without being a thinking thing, since being a thinking thing is prerequisite to the doubting process.⁸ The psychological fact that doubting occurs guarantees that there is a substantial entity that exists that is doing the doubting, undoubtedly me.

In Descartes' philosophy there is a distinction to be made between the essential quality of personal identity (the thinking substance of the person) and the nature of a human as a being-in-the-world. In order that any confusion will be avoided, I will refer to the former as *human identity* and will refer to the latter as *human nature*. Up to this point, I've only addressed Descartes' philosophy of human identity. Now I will turn to the topic of Descartes' philosophy of human nature.

If mind and body are distinct substances then we might assume that human nature consists of the unhappy marriage of one mind and one body. But that is not Descartes' philosophy. He emphasizes human nature as being the *union* of these two substances. The union of mind and body that is human nature is not a mere collection of one mind and one body. Together, the mind and body form a synthesis that is different from mind and body disjoined. Human nature is not analyzable into the two potential components, mind and body. Its logical behavior is not replaceable with the logical conjunction (mind, body). Human nature is a primitive notion; other primitive notions mentioned by Descartes are being, number, duration, extension, and thought.⁹ Soul, body, and human nature are three different kinds of primitive notions.

Soul is the kind that can be known completely by pure intellect. Body is best known by the intellect aided by imagination. The *cogito* is known by the pure intellect. Knowledge of extension is gained by analytic geometry, which aids the pure intellect to understand abstract truths with the aid of imagination. The union of body and soul is of a third kind of primitive notion. It is the kind of thing that can be known through sensation. Body can only be obscurely understood by the pure intellect, and in a like manner the union of body and soul can only be obscurely known by either the pure intellect or imagination.¹⁰ The union of body and soul is known best by entering into the experience of sensation.

You might not expect a rationalist like Descartes to hold that things were best known by sensation, but that is his view about the knowledge of the mind-body union. On his view, the masses are aware that they are unions of mind and body prephilosophically. They have never doubted that there is mind-body interaction. They sense it.¹¹ Apparently, philosophical doubters are mistakenly ignoring the experience they have of mind-body interaction, on Descartes' view. There is some philosophical justification for the claim that we know of the mind-body union and their interaction through sensation. Upon the examination of sense-experience, we find that bodily sensation is given to thinking substance as being the sensation of the thinking substance. By an earlier thought-experiment, we had established that the notion of mind is complete in a way that disallows it to take on any properties of extended corporeal substance. Yet it is quite clear that it is my thumb that is throbbing when I accidentally hit it with a hammer instead of hitting the nail. Everyday sense-experience shows us that there is specifically one body to which our consciousness is linked. It is one thing to see a comedian hit her thumb, but it is not so funny to hit your own thumb. There is a fundamental difference in the nature of our experience of being pained by our own injury *versus* our experience of feeling sympathetic pains upon seeing another's injury.¹²

Descartes observes that nature teaches us that there is a special mind-body connection that is not that of a spirit making use of a body, like pulling a string on a marionette.¹³ We experience pain often without anticipating it in any way. A victim might not have ever entertained the thought that an

assassin might fire at him. Sometimes the pain arrives too suddenly to be explained as a product of our own wills. From a phenomenological standpoint, the body is acting directly upon the mind.¹⁴ The relationship between mind and body is not that of a pilot to his ship. If the ship wrecks then the pilot might be pained, but always in an indirect manner. The mast of the ship breaks. He sees it break, *then* he is pained. Compare that to my hitting my thumb with a hammer. It hurts just as much with my eyes closed, turned away from the scene. From a purely phenomenological standpoint, the pain (and pleasure, and so on) which concerns my body is usually direct, while pain associated with other bodies is always experienced indirectly.¹⁵ A Little League father is quick to react when a baseball hits *his* daughter. He can be quite sympathetic, it can hurt to see her writhing in the dust, but it is clearly different from the experience of stubbing his toe.

I think that Descartes can be defended against an objection made by Jonathan Rée where it is claimed that Descartes has ruled out the possibility of sympathy for others. Rée observes that spatial interconnection is not necessary for a person to care about some other physical object. Descartes could easily agree. Rée seems to overlook the direct/indirect distinction about the nature of sensation given by Descartes in the Sixth Meditation. What Descartes seems to have in mind is that the experience of one's own pain is sufficiently different from the experience of sympathy for another's injury that we may draw the conclusion that we are united to one unique body. If we adopt the more fundamental premise, that minds and bodies are different substances, then everyday experience certainly points toward *this* hunk of flesh being connected to my mind in a much different way than your hunk of flesh is connected to my mind.¹⁶ Sympathy toward others isn't ruled out. It's just that there is a direct connection between the pain in my body and my feeling it, while sympathy for another's pain is normally felt indirectly.

Bernard Williams sees that the pilot and ship example and the accompanying arguments are phenomenological. Yet, Descartes' doctrine of mind-body interaction is mainly metaphysical. Descartes is weak on this point. Nature teaches us that the mind and the body are united, but nature does not tell us how it happens. Descartes has three separate and,

possibly, incompatible explanations of mind-body interaction. I'll call them the phenomenological, mechanical, and metaphysical explanations. So far, I have concentrated on the phenomenological explanation. We know about the nature of the mind-body union through the phenomenology of sensation. In sense-experience, the mind is given as being intermingled with the body.¹⁷

Descartes' mechanical explanation of mind-body interaction is well known. The mind acts upon the body at a specific point in space, somewhere near the pineal gland in the brain. At that point in space, interaction between the mind and the body occurs.¹⁸ Descartes has a strong form of interactionism in his theory. My having a desire, a purely mental act, is sufficient to shake the pineal gland, a corporeal object.¹⁹ Descartes speculates that the pineal gland is a center of the nervous system.²⁰ Movement, for example, occurs when we decide to act, then the mind sends a signal to the pineal gland, then the pineal gland acts upon animal spirits in the body, then the animal spirits cause the muscles to move.²¹ Animal spirits are material, like a "very subtle wind" that flows through the nervous system.²² Descartes' mechanical explanation of mind-body interaction depicts the human body as an automaton, a machine of flesh and blood. The body does not think or act; that is done by the mind. It moves, sometimes according to the mind's wishes, and the body sends signals to the mind that cause it to feel pain, pleasure, and so forth.²³

Descartes' metaphysical explanation of mind-body interaction is that there exists a unique substantial union between the mind and the body of the person. This third thing, the union of mind and body, is not merely the relation between them, it is a *substance* that is the union of them. If we examine the notion of a human being, we will find that it is equivalent to joining of a body to a mind.²⁴ Although it is true that "particularly" the mind is joined to the body at the pineal gland, in another sense it is joined and intermingled with the entire body.²⁵ I am not quite sure what Descartes means by asserting that human nature consists of a substantial union of mind and body. Asserting that the link between mind and body is substantial is Descartes' way of denying that human nature is merely the conjunction of one mind and one body. Louis

Loeb attempts to characterize Descartes' philosophy as being that a substantial union obtains when the mind and the body enter into certain causal relations. Human mind-body interaction is not causally related in the manner of the pilot and his ship. Rather, there is a "Natural Institution"²⁶ that God has created between our minds and our bodies. Changes in the physical states of our bodies do cause sensations in our minds. I read Descartes as claiming something more radical than that the union of mind and body is merely that they enter into certain kinds of causal relations. That kind of interpretation avoids metaphysical explanations, but Descartes explicitly states his philosophy of mind-body interaction in metaphysical terms.

By the union being substantial I do not think Descartes means that the union of mind and body is capable of existing without the mind and body both existing. That would make the union a substantial *thing*, and it is not. Rather, the union is a thing only in that it requires an act of creation on the part of God. It is not enough that a mind and body are created; a third act is necessary, they must be joined. Since minds and bodies are different substances, then there is no worldly process that can effect their union. I can slap a piece of cheese on a piece of bread and make a sandwich partly because they are both corporeal objects sitting there able to be moved about. The sandwich is not a substantial union of the cheese and the bread because no third act, their union, needs to occur in order to make the sandwich. Likewise, I can join the idea of a circle and the idea of red to form the composite idea of a red circle. Like individuals of the same substance can be joined with the necessity of a third act, the creation of a substantial union between them.

For Descartes, there are three kinds of substances. Of thinking substance, there is one infinite instantiation, God, and several finite instantiations, human minds (and angels?). Of corporeal substance, there is one infinite instantiation, the world, and several finite instantiations, individual corporeal objects. Finally, of substantial unions there is only one kind, human beings, the union of a finite mind with a finite corporeal object.

As it stands, Descartes' philosophy would be improved by the deletion of the mechanical explanation of mind-body

interaction. The phenomenological and metaphysical explanations seem quite compatible. There is a substantial union that exists between mind and body, and I experience mind-body interaction as such. There is a conflict between the phenomenological and mechanical explanations. From the experience of sensation, I am supposed to draw the conclusion that mind and body are intermingled throughout space, but the mechanical explanation centers on the fact that mind and body are not intermingled, that instead they interact only at one point in space. A fundamental doctrine in Descartes' philosophy is that we can err by drawing implications from sense-experience. The most natural step is to assume that sense-experience of mind and body being intermingled is misleading, given Descartes' mechanical explanation of mind-body interaction, thus undermining the phenomenological explanation. Also, the mechanical explanation demands that the soul have a location in space, or at least a specific location where it acts upon corporeal substance. Demanding a location for the soul diminishes the strong conceptual difference Descartes has drawn between mind and body. It makes the mind appear to be more like a corporeal object than it otherwise would need be, if the mechanical explanation were dropped.

I conclude that Descartes' philosophy of the separation of mind and body is so radical that significant measures will be required to solve the philosophical problems of putting them back together again. With the phenomenological explanation, he tells us how we know of interaction through experience. The mechanical explanation was, understandably, based on an ignorance of neurophysiology. Otherwise, Descartes' views on mind-body interaction are quite plausible, given the metaphysical assumptions and theological positions on which they are based.

NOTES

¹ Meditation II, *HR* 1: 150–53. All references to Descartes' writings will be either *The Philosophical Works of Descartes*, 2 vols., trans. Haldane and Ross (Cambridge: Cambridge University Press, 1931), abbreviated as *HR* 1, or

Descartes' Philosophical Letters, translated by Anthony Kenny (Oxford: Clarendon Press, 1970), abbreviated as *Letters*.

²For a discussion of Descartes' substance-mode ontology, see *From Descartes to Hume*, Louis Loeb (Ithaca, NY: Cornell University Press, 1981), 90–91 (abbreviated as *Loeb*).

³*Principles of Philosophy* I, 51–54, *HR* 1: 239–41 and *Loeb*, 95–7.

⁴*Principles of Philosophy* I, 11, *HR* 1: 223.

⁵*Principles of Philosophy* I, 53, *HR* 1: 240.

⁶Reply IV, *HR* 2: 97.

⁷Med. II, *HR* 1: 151–52.

⁸Med. II, *HR* 1: 152 and Med. VI, *HR* 1: 190.

⁹*Letters*, 138.

¹⁰*Letters*, 140–41.

¹¹*Letters*, 141.

¹²Med. VI, *HR* 1: 187–89.

¹³Reply IV, *HR* 2: 102.

¹⁴*Principles of Philosophy* II, *HR* 1: 255.

¹⁵Med. VI, *HR* 1: 192.

¹⁶*Descartes*, by Jonathan Rée (New York: Pica Press, 1975), 106.

¹⁷*Descartes: The Project of Pure Enquiry*, Bernard Williams (New York: Pelican Books, 1978), 280, 288–90.

¹⁸Med. VI, *HR* 1: 196–98.

¹⁹Passions of the Soul XLI, *HR* 1: 350, also *Loeb*, 128.

²⁰*Principles of Philosophy* IV, CLXXXIX, *HR* 1: 289–90.

²¹Reply IV, *HR* 2: 103.

²²Passions of the Soul II, VII and X, *HR* 1: 334–36. This was, of course, before the experiments of Luigi Galvani.

²³Med. VI, *HR* 1: 195.

²⁴Reply IV, *HR* 2: 102.

²⁵Passions of the Soul I, XXX and XXXI, *HR* 1: 345–46.

²⁶*Loeb*, 131–32, also *Descartes*, by Margaret Wilson (London: Routledge & Kegan Paul, 1978), 210–11.