JAMES VAN CLEVE

4 Reid's Theory of Perception

Perception bulks large in Reid's published writings. Nearly all of the *Inquiry into the Human Mind* is devoted to it, with chapters allotted to each of the senses of Smelling, Hearing, Tasting, Touch, and Seeing. And in the *Essays on the Intellectual Powers of Man*, by far the longest essay is Essay II, "Of the Powers we Have by Means of our External Senses." The main theme of this chapter is Reid's attack on the reigning "way of ideas" and his attempt to put in its place a direct realist theory of perception. Also covered are Reid's distinction between sensation and perception, his views on primary and secondary qualities, his nativism about our conceptions of hardness and extension, and his treatment of the phenomenon of acquired perception.

I. CRITIQUE OF THE THEORY OF IDEAS

Almost alone among the great modern philosophers, Reid sought to uphold a direct realist theory of perception. He repudiated the theory of ideas, the central tenet of which is that the object immediately present to the mind is never an external thing, but only an internal image, sense datum, representation, or (to use the most common eighteenth-century term) idea. Ideas were conceived of as mental entities that existed only as long as there was awareness of them. Some proponents of the theory of ideas (such as Descartes and Locke) were realists, conceiving of physical objects as things distinct from ideas that cause ideas of them to arise in our minds. Others (such as Berkeley) were idealists, repudiating the existence of a world outside the mind and believing that the things we call physical objects are simply bundles of ideas. In either case, the theory of ideas cuts us off

from direct perception of the external world – either because there is no external world to be perceived, or because our "perception" of it is not strictly perception at all, according to Reid, but inference based on what we do perceive, namely, ideas.

Reid makes at least three important points against the theory of ideas. First, the arguments in favor of the theory are weak and without cogency. Second, the theory does nothing to explain how perception is possible. Third, the theory stands in the way of our knowing or even being able to conceive of the physical world.

In the fourteenth chapter of book two of the *Intellectual Powers*, "Reflections on the Common Theory of Ideas," Reid criticizes several arguments for the existence of ideas. One such argument is the "no action at a distance" argument, which may be put as follows:

1. Nothing can act or be acted upon where it is not.
2. When we perceive objects, we act upon them or they upon us.
3. Therefore, we perceive only those objects that are right where we are, smack up against our minds – in other words, ideas.

Reid's response to this argument is somewhat surprising by present-day lights. He challenges its second premise, denying that in perception there need be any "acting" of perceiver on percipient or vice versa, which puts him at odds with contemporary causal theories of perception and intentionality more generally. But another response to the argument would have been available to Reid. Even for its proponents, the first premise is plausible only if understood as saying that nothing can act *immediately* (that is, without mediation) where it is not. The lighting of a fuse here can cause the explosion of a keg way over there, provided there is an intervening series of contiguous causal links. With the first premise restated in this way, the second premise must also be restated in order for the conclusion to follow: When we perceive objects, we act upon them or they upon us *immediately*. Reid could have rejected the revised version of the second premise without denying the need for a causal connection between perceiver and percipient altogether. Indeed, in other places he makes it clear that he does believe that perception involves such a connection, provided the causation is thought of as lawful succession rather than "agent causation," which he sometimes says is the only true causation.[1]

Another argument for ideas Reid criticizes is a version of the argument from perceptual relativity. Hume had claimed that the "universal and primary opinion of all men" that they perceive external objects directly is "destroyed by the slightest philosophy." He offered the following argument as a specimen: "The table, which we see, seems to diminish as we remove further from it; but the real table, which exists independent of us, suffers no alteration. It was therefore nothing but its image which was present to the mind."[2] Recast somewhat, Hume's slight bit of philosophy takes the form of the following syllogism:

1. What I see diminishes in magnitude as I retreat from it.
2. The table itself does not diminish in magnitude as I retreat from it.
3. Therefore, what I see is not the table itself (but only an image or idea).

Reid contends that Hume's premises are true only if we restate them as follows:[3]

1. What I see diminishes in *apparent* magnitude as I retreat from it.
2. The table itself does not diminish in *real* magnitude as I retreat from it.
3. Therefore, what I see is not the table (but only an image or idea).

Here Reid is appropriating for his own purposes Berkeley's distinction between tangible and visible magnitude or, as Reid also styles it, real and apparent magnitude. As Reid develops the distinction, the real magnitude of an object (e.g., the edge of a table) is an intrinsic property of it, measured in inches or feet, whereas the apparent magnitude of an object is a relation between the object and a perceiver, measured by the angle the object subtends at the eye. It is easy to see that apparent magnitude varies with the distance between object and perceiver (objects subtending smaller angles when further away) while real magnitude does not. Once we record these facts correctly as in Reid's version of the syllogism, we see that the argument commits the fallacy of two middle terms.[4]

Reid's second point against the theory of ideas is that "ideas do not make any of the operations of the mind to be better understood"

(EIP II.xiv: 184). They are supposed to explain how we perceive or apprehend what is distant, what is past, and what does not exist at all, but in fact they are no help in this regard. Ideas are of no use in explaining the intentionality or aboutness of mental operations because such explanations inevitably presuppose intentionality. In the first place, ideas can represent objects for us only if the ideas are interpreted (like the symbols in a book) as standing for the objects, but that presupposes precisely the ability of the interpreter to have the object in mind.[5] In the second place, ideas themselves must be made objects of perception or some kind of awareness, but that again presupposes intentionality:

> It is as difficult to conceive how the mind perceives images in the brain, as, how it perceives things more distant. If any man will shew how the mind may perceive images in the brain, I will undertake to shew how it may perceive the most distant objects: for if we give eyes to the mind, to perceive what is transacted at home in its dark chamber, why may we not make these eyes a little longer-sighted? (IHM VI.xii: 121)

Reid's third point against the theory of ideas is that it has led philosophers into conclusions shockingly at odds with common sense.[6] If we do not simply *see* external objects, it becomes necessary to prove their existence by arguments, but the arguments philosophers have offered to this end are all problematic.[7] Thus if we start down the way of ideas, we are in danger of losing the material world. Hume developed the consequences of the theory of ideas even further, showing that the mind itself must be reduced to a series of ideas. Reid tells us that although he once subscribed to the theory himself, Hume's philosophy convinced him (by making its inevitable consequences manifest) that it must be rejected.

II. SENSATION VERSUS PERCEPTION

To Reid we owe the now familiar distinction between sensation and perception.[8] These operations of the mind are often conflated, but are distinguishable if we pay attention:

> Thus, *I feel a pain; I see a tree*: the first denoteth a sensation, the last a perception. The grammatical analysis of both expressions is the same: for both consist of an active verb and an object. But, if we attend to the things

signified by these expressions, we shall find, that in the first, the distinction between the act and the object is not real but grammatical; in the second, the distinction is not only grammatical, but real.

The form of the expression, *I feel pain*, might seem to imply, that the feeling is something distinct from the pain felt; yet, in reality, there is no distinction. As *thinking a thought* is an expression which could signify no more than *thinking*, so *feeling a pain* signifies no more than *being pained*. What we have said of pain is applicable to every other mere sensation. (IHM VI.xx: 167–8)

When I see a tree, there is an object (the tree itself) apart from my act of seeing, but when I have a sensation, there is no object apart from the act of sensing. As he says elsewhere, "Sensation is a name given by Philosophers to an act of mind, which may be distinguished from all others by this, that it hath no object distinct from the act itself" (EIP I.i: 36). Is that because an act of sensing has *itself* for its object, or because it has no object at all? Although Reid's language sometimes suggests the former option, his proposal that *being pained* is the model for all sensation suggests the latter.

If we take Reid in the latter way to hold that sensation is objectless, he is a precursor of "adverbial" theories of sensation: To have a sensation of red is not to be the subject of an act directed upon a red item as its object, but is simply to sense in a certain way, "redly" as the adverbial theory styles it.[9] It is not to sense some*thing*, but to sense some*how*. If sensing required its own special objects, the argument from perceptual relativity for the theory of ideas could be reinstated. The mountain that looks blue from a distance and green from close up would do so by generating first blue and then green sensory objects in my mind, and these special objects would displace the mountain itself (which "suffers no alteration") as my immediate objects.

Although sensations do not *have* objects, they can *become* objects for us, in the sense that we can know through proper attention what sorts of sensations we are having. Reid's views about our epistemic relation to our sensations involve a delicate balancing act. If we attend carefully to our sensations, we can know perfectly what they are like; yet they commonly pass unnoticed, serving as mere cues or signs from which our minds leap instantly to other things that they signify. Our apprehension of that which sensations signify is perception, to which we now turn.

III. REID'S THREEFOLD ACCOUNT OF PERCEPTION

Reid's official characterization of perception involves three elements – conception, belief, and immediacy:

> If, therefore, we attend to that act of our mind which we call the perception of an external object of sense, we shall find in it these three things. *First*, Some conception or notion of the object perceived. *Secondly*, A strong and irresistible conviction of its present existence. And, *thirdly*, That this conviction and belief are immediate, and not the effect of reasoning. (EIP II. v: 96)

These three elements are already singled out by Reid in the *Inquiry*, and he mentions them repeatedly in the *Intellectual Powers*.[10]

Note that this account makes no mention of sensation. Although Reid says that sensation generally serves as the trigger for the conception and belief involved in perception, he does not usually list it as an *ingredient* in perception.[11] Why not? It is probably because Reid thinks it possible that there should be beings in whom perception occurs in the absence of sensation.[12] Moreover, he holds that there is one variety of human perception that actually does occur without any characteristic sensation – namely, the perception of visible form.[13]

Is the threefold account in terms of conception, belief, and immediacy meant to be a *definition* of perception? Probably not, for two reasons. In the first place, Reid sometimes cites two further conditions that are necessary for perception. One is that the object of perception must be an external object that really exists and is contemporaneous with the act of perceiving it.[14] Another is that there must be a causal process starting with the object and culminating with our conception of the object and belief in it.[15] In the second place, it may be that some of the conditions on Reid's list (e.g., belief) are included not because they are analytical ingredients in perception, but because they are inevitable effects of it. Reid does not generally attach much importance to this distinction.[16]

IV. WHAT REID MEANS BY "CONCEPTION"

What is the nature of the "conception" that Reid lists as one of the ingredients in perception? Contemporary readers are likely to think

of Kant when they encounter that term. They are likely to connect "conception" with *concepts*, and to think that when Reid talks of conception, he is talking about subsuming something under a concept – classifying an object in some way or thinking of it as being of a certain sort. If so, the conception involved in perception would already be implicit in the belief component; it would simply be a matter of possessing and deploying the concepts that enter into the belief. Forming a conception of an object would be entertaining some proposition about it, and the belief component of perception would consist in affirming that proposition. Reid's account of perception would make perception simply a matter of forming noninferential beliefs about objects, as in the contemporary accounts advanced by Pitcher and Armstrong.[17]

It would be overly hasty, however, to conclude that Reid holds a pure belief theory of perception along such lines, or even a theory of perception as noninferential belief accompanied by sensation. As Alston and Wolterstorff have forcefully pointed out, if we are to understand Reid, we must set aside our Kantian lenses.[18] We must pay full heed to Reid's own official explanation of what he means by "conception."[19] There we learn that conception is the most basic operation of the mind, presupposed in all others. It is "that operation of the understanding, which the Logicians call *simple apprehension*," and which they define as "the bare conception of a thing, without any judgment or belief about it" (EIP IV.i: 295). Reid goes on to characterize judgment (or belief – he tends to use the terms interchangeably) as involving assent or denial. Given just this much, it could be that simple apprehension is always an act with propositional content, but an act in which the propositional content is simply entertained without being affirmed or denied. His further discussion makes clear, however, that simple apprehension may have nonpropositional as well as propositional objects: "Judgment can be expressed by a proposition only, and a proposition is a complete sentence; but simple apprehension may be expressed by a word or words, which make no complete sentence" (EIP VI.i: 408).[20] He also tells us that the objects of simple apprehension expressed by words or subsentential phrases may be either individuals or universals.[21]

Reid mentions two ways in which we may obtain conceptions of individuals.[22] If I have never seen Westminster Bridge, I may conceive of it by means of a description it satisfies, e.g., *a bridge from*

Westminster over the Thames. This mode of conception is similar to what Russell calls knowledge by description, and it does involve Kantian concepts. But if an object is present to my senses, I need no such description in order to conceive of it; I need only mentally point it out. This mode of conception is similar to what Russell called knowledge by acquaintance, and it is more akin to Kantian intuition than to Kantian conceptualization.[23]

Reid's taxonomy of the operations of the mind leaves room, then, for acts of apprehension or acquaintance whereby an object is presented to the mind without any conceptualization. Should we so understand the conception that is an ingredient in perception? I believe the answer is yes, for two reasons.

First, Reid tells us in a number of places that perception is a *ground of belief*. He seems to mean this in both a genetic and a normative sense: If I see a tree, that induces me to believe in the tree and gives me evidence for my belief. Both of these claims seem to presuppose that seeing a tree is something distinct from the belief I form about it. If the real core of perception is conception and conception is a nondoxastic act, we have something distinct from belief that can serve as a ground of it in both senses.

Second, Reid tells us that the conception involved in perception can be *more or less distinct*. We see an object more distinctly at a small than a great distance, and more distinctly on a clear than a foggy day.[24] Can the merely conceptual apprehension of an object be subject to this sort of variation? One conceptual apprehension can involve descriptions or concepts that are more determinate than those involved in another (the bird-like thing over there versus the seagull over there . . .). But I do not think that greater distinctness of conception is to be *analyzed* as greater conceptual determinacy. Rather, it is the former that makes the latter possible.[25]

I shall assume, then, that the conception involved in Reidian perception is some sort of apprehension or acquaintance that is not constituted by conceptualization or judgment. I offer further confirmation for this assumption in Sections IX and XII below.

V. REID'S NATIVISM

Reid believes that we have a number of important conceptions – including those of external extended objects – that are not abstracted

from sensation. This makes him a *nativist* in one sense of that term.[26] Negatively, his doctrine is that a being endowed with sensations and rational powers alone would never be able to arrive at any conception of extension. There is no "internal" connection between any sensation and anything extended – no resemblance between them nor any connection discernible by reason. Reid supports this contention with a thought experiment he calls his *experimentum crucis*.[27] He asks us to imagine a person furnished with a progressively richer array of sensations, beginning with the prick of a pin, advancing to more complex sensations such as the pressure of a blunt object against his body, and culminating with the sensations accompanying the motion of his limbs. He asks at each step in the series whether those sensory materials would suffice to give anyone a conception of extension, and his answer is no. Positively, Reid's doctrine is that the conception of extension is innate, not in the sense that we have it from birth, but in the sense that it is triggered in us by certain sensations from which it could never have been abstracted. We are enabled to form the conception of extended things only because we are innately programmed to do so. "That our sensations of touch indicate something external, extended, figured, hard or soft, is not a deduction of reason, but a natural principle" (IHM V.vi: 72). The natural principle is entirely contingent: We might have been so constituted as to have the same conceptions on the occasion of qualitatively different sensations, or different conceptions on the occasion of qualitatively the same sensations.

When Reid's nativism about the conception of extension and other spatial attributes is combined with the view that the conception involved in Reidian perception is akin to Kantian intuition, there emerges a striking similarity between Reid and Kant. To put the point in Kantian language, our notion of space is an *a priori* intuition.[28]

VI. PRIMARY AND SECONDARY QUALITIES

Reid endorses a version of Locke's distinction between primary and secondary qualities. He thinks that some of Locke's teachings on this topic are wrong – in particular, he thinks there is no resemblance between any primary quality and any idea or sensation in our minds. If there were such a resemblance, we could obtain our notion of extension by excogitation from our sensations, which is precisely

what we cannot do according to the *experimentum crucis* described in the previous section. But Reid thinks there is something to Locke's distinction nonetheless:

> [T]here appears to me to be a real foundation for the distinction; and it is this: That our senses give us a direct and a distinct notion of the primary qualities, and inform us what they are in themselves: But of the secondary qualities, our senses give us only a relative and obscure notion. They inform us only, that they are qualities that affect us in a certain manner, that is, produce in us a certain sensation; but as to what they are in themselves, our senses leave us in the dark. (EIP II.xvii: 201)

Our conception of the squareness of a body is direct: In knowing that a body is square, we know something about how it is intrinsically. By contrast, our conception of the redness of a body is not direct, but relative: In knowing a body to be red, we know only that it is so constituted as to produce a certain kind of sensation in us, not how the body is intrinsically or in itself.

Does Reid take secondary qualities to be mere dispositions to produce certain sorts of sensations in us, or does he take them to be the physical properties underlying such dispositions as their categorical bases? In the former case, secondary qualities would differ in their nature from primary qualities, the secondaries being dispositional and relational while the primaries are categorical and intrinsic. In the latter case, the secondaries would be as categorical as the primary, differing just in the sort of cognitive access we have to them.

On a purely dispositional account, redness would be given a definition along the following lines:

> x is red = df if a normal human observer were to view x, the observer would be affected with red* sensations.

Here "red*" designates a type of sensation known to us by introspection, and we define redness as the property of producing in us sensations of this type. On a purely physicalistic account, by contrast, we would take whatever physical property is the basis for the disposition just defined (e.g., the molecular constitution responsible for its reflecting light of a certain sort) and identify redness with that physical property. Which account (if either) would Reid prefer?

In favor of the purely dispositional account is the fact that Reid says the sensations associated with a secondary quality "bear a capital part in the notion we form of it. We conceive it only as that which

occasions such a sensation, and therefore cannot reflect upon it without thinking of the sensation which it occasions" (EIP II.xvii: 204).[29] This is clearly true given the dispositional definition, which refers to red* sensations in its definiens, but less clearly true if secondary qualities are physical bases.

In favor of the physicalist account is the fact that Reid often says of the secondary qualities that we are ignorant of their natures.[30] This is true if secondary qualities are physical bases, but not if they are dispositions, for we do know perfectly well what the dispositions are.[31]

Can we fashion a compromise between the dispositional and physicalist accounts of secondary qualities, according to which (1) knowing what redness is requires knowing what red* sensations are like, and yet (2) redness supervenes on intrinsic physical properties, in the sense that anything just like a given red thing in all intrinsic physical respects would have to be red, regardless of its sensory effects on human observers? I believe the answer is yes, provided we make use of two devices of contemporary philosophical logic: quantifying over properties and indexing to the actual world. For then we can frame the following definition:

> x is red in w = df x has in w some physical property P such that the following is a law of nature in @, the actual world: Things with P produce red* sensations in normal human observers.

Here, as in the dispositional definition above, we mention red* sensations in the definiens, so thesis (1) is presumably true. Thesis (2) is also upheld, because a thing in a world w just like a red thing in @ in its intrinsic physical properties would have whatever property P produces red* sensations in @. That would qualify it as red even if P does not produce red* sensations in w.

VII. THREE FORMS OF DIRECT REALISM

Reid is clearly a realist, i.e., one who holds that there are physical things existing outside the mind. As I understand him, he is also a *direct* realist in each of three senses to be explained below: He is an epistemological direct realist, a perceptual direct realist, and a presentational direct realist. These three claims are progressively more controversial.

The first form of direct realism is *epistemological direct realism*, according to which some beliefs about physical things are epistemically basic. The warrant they have for a subject does not derive from the warrant of any other propositions that subject believes; they are justified apart from any reasons the subject has for believing them. It is amply clear that Reid is a direct realist in this sense. Here is just one of many passages one could cite:

> If the word axiom be put to signify every truth which is known immediately, without being deduced from any antecedent truth, then the existence of the objects of sense may be called an axiom. (EIP II.xx: 231)[32]

The second form of direct realism is *perceptual direct realism*, according to which physical things are perceived directly, in a sense to be spelled out further below. It amounts roughly to this: Physical things are perceived without any perceived intermediaries. I believe it is clear that Reid is a perceptual direct realist, or at least that he intends to be one. Here is one of many passages one could quote on this score:

> When we see the sun or moon, we have no doubt that the very objects which we immediately see are very far distant from us, and from one another. . . . But how are we astonished when the Philosopher informs us, that we are mistaken in all this . . . because the objects we perceive are only ideas in our own minds. . . . (EIP II.xiv: 172)

Our first two forms of direct realism are arguably independent of one another. It would be possible to hold that although we perceive physical objects directly, beliefs about them are not epistemically basic, but need to be supported by background information, e.g., about the proper functioning of one's senses. Conversely, it would also be possible to hold that beliefs about physical objects are basic despite the fact that we do *not* perceive them directly.[33] But in Reid's mind, the two forms of direct realism are closely linked. He observes, "It was this theory of ideas [the paradigm of an indirect theory of perception] that led Des Cartes, and those that followed him, to think it necessary to prove, by philosophical arguments, the existence of material objects" (EIP II.xiv: 186). In other words, if you are not a perceptual direct realist, you cannot be an epistemological direct realist. He also makes the converse claim: That if a philosopher holds that the existence of external objects requires proof, it must be because he is of the opinion that we do not perceive external objects, but only

ideas of them.[34] In other words, if you are not an epistemological direct realist, that shows you are not a perceptual direct realist.[35]

The third form of direct realism is *presentational direct realism*: Not only are physical things perceived directly, but our perception of them is a matter of their being presented to us, or of our being acquainted with them in a Russellian sense. As Alston further describes this view:

> In perception an external object is directly 'presented' to our awareness; it is 'given' to consciousness. We are immediately aware of it, as contrasted with just thinking about it, forming a concept of it, or believing something about it. . . . This is 'knowledge by acquaintance' rather than 'knowledge by description.'[36]

It is possible to be a perceptual direct realist without being a presentational direct realist. Armstrong and Chisholm are both perceptual direct realists, because both hold that we perceive physical things without perceiving sense data or suchlike intermediaries, but neither is a presentational direct realist, because neither thinks any such relation as acquaintance enters into perception at all. Armstrong analyzes perception as a kind of noninferential belief,[37] Chisholm analyzes it as a kind of appropriately caused sensation,[38] and neither countenances such a relation as acquaintance – an irreducible cognitive relation with nonpropositional objects. Reid does countenance such a relation (as argued above in section IV), but it has been questioned whether he thinks we stand in this relation to external things. Thus it is controversial whether he is a presentational direct realist.

The first question to ask, however, is whether he is a perceptual direct realist, and to answer that, we need the promised further elucidation of "direct perception." I shall use the following definition proposed by George Pappas as a point of departure:

> A person S directly perceives an object O at a time t = df (1) S perceives O at t, and (2) it is false that: S would perceive O at t only if S were to perceive R at t, where R ≠ O, and where R is not a part of O.[39]

Pappas says that clause (2) is supposed to capture the idea of "nondependence on perceived intermediaries": I do not perceive something directly if I perceive it only by perceiving something distinct from it. More accurately (as the further proviso brings out), I do not

perceive something directly if I perceive it only by perceiving something else that is not a *part* of it. If I perceive an elephant by perceiving a side of it, I still perceive the elephant directly. But if I perceive Hume's table only by perceiving an image or idea of it (which is not part of it, but something existing only in my mind), I do not perceive the table directly. Indeed, Reid would say that in that case I do not perceive the table at all.

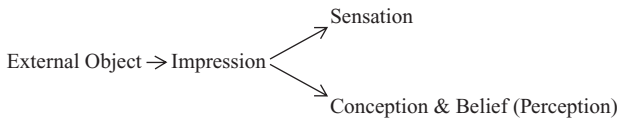
VIII. DO SENSATIONS OBSTRUCT DIRECT PERCEPTION?

It is abundantly clear that Reid has banished *one* type of objectionable intermediary in perception, namely, ideas. But many of his readers, from Sir William Hamilton to the present day, have thought that sensations play a role in Reid's philosophy analogous to ideas, and that in the end Reid fails to be a perceptual direct realist despite his best intentions.[40] I consider here several reasons for thinking that sensations do or do not make trouble for direct perception.

John Immerwahr has proposed that there is a significant difference in Reid's views about the relation of sensation to perception as we move from the *Inquiry* to the *Intellectual Powers*.[41] In the *Inquiry*, Reid holds that in the causal chain leading from objects to perceptions, sensations serve as links between physical impressions (e.g., retinal imprints) and perceptions:

External Object → Impression → Sensation → Conception & Belief (Perception)

In the *Intellectual Powers*, by contrast, the picture according to Immerwahr is this:



Here sensations are effects produced in parallel with perceptions rather than serving as intervening links. Immerwahr thinks that this difference makes Reid an indirect realist in the *Inquiry*, but a direct realist in the *Intellectual Powers*.

Immerwahr's view is subject to two criticisms. First, as he himself notes, the difference he alleges between the *Inquiry* and the

Intellectual Powers does not amount to a clean break. There are a good many passages in the *Intellectual Powers* that reaffirm the *Inquiry*'s model of the relation between sensation and perception.[42] Second, the fact that sensations come between impressions and perceptions in the first of the causal chains depicted above would not jeopardize direct perception if sensations (like impressions) were merely *causal* intermediaries in the perceptual process. The crucial question, if we operate with the Pappas definition above, is whether sensations are *perceived* intermediaries.

In this connection, some may think it relevant that according to Reid, we seldom attend to our sensations. They pass largely unnoticed. Here are several representative passages:

> But it is one thing to have the sensation and another thing to attend to it, and make it a distinct object of reflection. The first is very easy; the last, in most cases, extremely difficult. We are so accustomed to use the sensation as a sign, and to pass immediately to the hardness signified, that, as far as appears, it was never made an object of thought, either by the vulgar or by philosophers; nor has it a name in any language. (IHM V.ii: 56)

> When a primary quality is perceived, the sensation immediately leads our thought to the quality signified by it, and is itself forgot. We have no occasion afterwards to reflect upon it; and so we come to be as little acquainted with it as if we had never felt it. (EIP II.xvii: 204)

> There are many phenomena of a similar nature [to seeing double], which shew, that the mind may not attend to, and thereby, in some sort, not perceive objects that strike the senses. (IHM VI.xiii: 135)

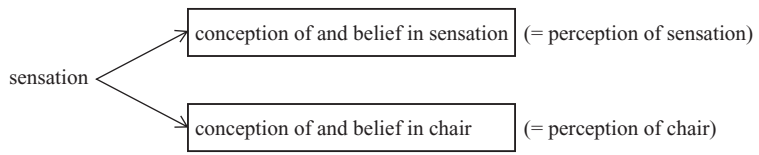
Reid says similar things about visible figure – the shape a body actually presents to the eye at a given perspective. It requires the skill of a painter to discern the shapes that are really before the mind, our attention normally being focused instead on the features of the external scene that the presented features signify.[43]

Could our normal inattention to our sensations be what keeps everyday perception direct? The idea would be that if we do not notice our sensations – if "in some sort" we do not perceive them – then it cannot be that we perceive external things by perceiving sensations.

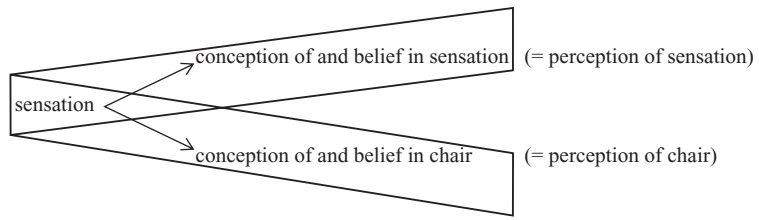
It seems to me, however, that what we do or do not pay attention to can hardly be the key to direct perception. Suppose I spend the morning painting a landscape and the afternoon playing tennis. Do

I perceive things indirectly in the morning when I am carefully attending to the way things look and directly in the afternoon when I am preoccupied with whacking the ball? That seems an unlikely shift. Let us inquire, therefore, whether there is a sense in which we perceive physical things directly even on occasions when we are attending to the accompanying sensations.

For one such sense, we may turn to an example discussed by Pappas. Suppose that on a certain occasion I have sensations that induce in me conception of and immediate belief in a chair. On Reid's standard threefold account, this means that I have a perception of the chair occasioned by the sensation. Suppose that on this occasion I do attend to the sensation, leading me to conceive of and believe in *it* as well. Applying Reid's threefold account again, I therefore have a perception of the sensation.[44] Pappas distinguishes two ways of understanding the situation as so far described. First, there is the *double-tier* account, which we may diagram as follows, using arrows to indicate causation and boxes to indicate the ingredients that together constitute perception:



The other way of understanding the situation is provided by the *single-tier* account, which we may diagram as follows:



The difference is that on the double-tier view, the sensation is regarded as the common *cause* of two perceptions, whereas on the single-tier view, it is regarded as a common *constituent* of the two perceptions. In Pappas's view, this makes a difference as to whether perception of the chair is direct. He thinks that on the double-tier view, the subjunctive conditional *I would perceive the chair only if*

I perceived the sensation is true. There is thus dependence on perceiving the sensation and no direct perception. But on the single-tier view, there is no reason to affirm such dependence.

I have two reservations about Pappas's approach.[45] First, why should we think that the crucial conditional *I would perceive the chair only if I perceived the sensation* is *true* according to the double-tier view? Consider another case of two effects with a common cause: The firing of a pistol results both in a loud report and in the disintegration of a can. We cannot infer that the can would have disintegrated only if the noise had occurred, since the pistol might have been fired with a silencer.[46] Second, why should we think that the same conditional is *false* according to the single-tier view? Here is an argument for thinking it true: The perception of the chair would have occurred only if the sensation occurred (since the sensation is a constituent of it); the sensation would have occurred only if the perception of it occurred (since it caused the remaining elements needed to constitute, along with itself, perception of a sensation); therefore, the perception of the chair would have occurred only if the perception of the sensation had occurred.[47]

My own view is that even if perception of the chair does depend on perception (or some sort of awareness) of the sensation, perception of the chair may still be direct. That requires me to modify Pappas's definition of direct perception.

Pappas's definition, reworded somewhat, runs as follows:

> S directly perceives O at t = df (1) S perceives O at t, and (2) it is false that: S would perceive O only if there were an object R distinct from O such that (a) R is not part of O and (b) S perceives R.[48]

There are two difficulties with this definition as it stands: In one way it is too strict, in another way too lax.

To see that the definition is too strict, suppose two objects A and B are inseparably connected in such a way that one never enters my field of view unless the other does. Then I would never perceive one without perceiving the other, but it seems that I might still perceive each of them directly. Or suppose I can never perceive an object without perceiving a bit of background (though no particular bit); then my perception of the object will depend on there being something else that I perceive, yet it seems I might still perceive both background and object directly.[49]

Perhaps we can avoid this first difficulty if we turn to a definition of direct perception offered by Frank Jackson. Jackson's definition is similar in spirit to Pappas's, but importantly different in one way:

> S directly perceives x at t = df (1) S perceives x at t, and (2) there is no object y distinct from x such that S perceives x *in virtue of* perceiving y.[50]

Here the "in virtue of" notion replaces the notion of dependence that Pappas tries to capture with subjunctive conditionals. This definition arguably avoids the "too strict" difficulty raised above. Even if I never see A without seeing its inseparable companion B (or a bit of background), it seems wrong to say that I see A *in virtue of* seeing B.[51]

Unfortunately, the second difficulty – that the definition is too lax – affects Jackson's definition as well as Pappas's. They both characterize direct perception as perception that does not depend on (or occur in virtue of) *perceived* intermediaries. Well, consider the following view: "When we perceive any object, the object causes certain ideas or sense data to arise in our minds; our awareness of these sense data then leads us to infer the existence of the object." That is a textbook case of indirect perception, if it is perception at all. Yet the proponent of the view could insist that such perception is not indirect by Pappas's or Jackson's definition. We do not *perceive* sense data, since for one thing they do not cause any further sense data to arise in us. Our cognitive relation to sense data is not perceiving, but something else.

It seems to me that the view just sketched is an indirect view of perception nonetheless. The sense data it posits are objectionable intermediaries precisely because they are *objects* to which we stand in some sort of *cognitive* relation – apprehension, awareness, acquaintance, or what have you. So it seems to me that in Pappas's or Jackson's definition, we should replace the final occurrence of "perceive" in the definiens by some more general cognitive verb, such as "is acquainted with."[52] If we do this in Jackson's definition, we arrive at the following:

> S directly perceives x at t = df (1) S perceives x at t, and (2) there is no object y distinct from x such that S perceives x in virtue of being acquainted with y.

Let us now return to the question of whether sensations obstruct direct perception.

It seems clear to me that the answer is no, for at least one and possibly two reasons. In the first place, sensations are not *objects* at all. Though they may be "objects of awareness," they are not objects ontologically speaking. They are not individual things, but states of a subject – manners in which a subject is affected.[53] So when Reid speaks of awareness of sensations, the awareness in question is really the apprehension of a fact about oneself – that one is sensing in a certain way – rather than acquaintance with any object. Perception is not rendered indirect just because it involves apprehension of some fact about oneself. Otherwise, no philosopher who believes that perception necessarily involves apperception – that you cannot perceive O without being aware that you perceive O – could be an upholder of direct perception.

A second reason for holding that sensations do not compromise direct perception would be this: One does not perceive physical objects *in virtue of* being acquainted with one's sensations. I hesitate to put much weight on this consideration, however, lest a sense datum theorist maintain that one does not perceive physical objects (solely) in virtue of being acquainted with sense data.[54]

IX. IS REID A PRESENTATIONAL DIRECT REALIST?

I have argued that Reid's theory of sensations does not stand in the way of his being a perceptual direct realist. I turn now to the question of whether he is a presentational direct realist. Recall that a presentational direct realist holds not only that we perceive physical objects directly, but also that our perception of them is a matter of their being presented to us or, equivalently, our being acquainted with them.

Although Alston and Wolterstorff have brought it to our attention that Reid's scheme of things includes a relation of acquaintance, both of them have denied that it is Reid's view that we stand in this relation to external things in cases of perception. Here is Alston's argument on this score:

> Most crucially, if the conception involved in perception is the direct awareness of [i.e., acquaintance with] an external object, how is that object presented to that awareness? There would seem to be no alternative to holding

that it is presented as exhibiting 'sensible' or 'phenomenal' qualities – colors, shapes, heat and cold . . . and so on. . . . But this construal is not open to Reid. For, as noted earlier, he places all the qualitative distinctness of perceptual consciousness (except for visual extension) in the sensations, which he takes to involve no awareness of any object other than itself. What it is natural to refer to as an awareness of colors, warmth, and odours (or of objects as colored, warm, and odorous) Reid construes as *modes* of feeling (awareness), as ways of being aware, directed on to no object beyond themselves.[55]

If I understand this difficult argument correctly, it may be compressed into two premises and a conclusion as follows:

1. If the conception involved in perception is direct awareness of (acquaintance with) an external object, it is an awareness in which the object is presented as having some color or shape or other sensible quality – an awareness in which these very qualities are presented to us.
2. For Reid, all the sensible qualities of objects are "drained away" into sensations – they are modes of sensing rather than qualities objects are presented as having. Thus in Reid's view, the consequent of 1 is false.
3. Therefore, the conception involved in Reidian perception is not acquaintance with external objects.

My reply to this argument is that the second premise is false. Alston has forgotten all about the primary qualities. Even if he were right in saying that Reid drains colors and odors away from objects,[56] he is wrong in claiming that seen shapes or felt hardnesses are drained away. These are by no means modes of sensing, but are qualities of external objects of which we have a clear conception that owes nothing to sensation. So there is nothing in Reid's view to prohibit him from saying that (in the case of the primary qualities, at least) our perception is a form of acquaintance.

Another argument against interpreting Reid as a presentational direct realist has been presented by Wolterstorff. It runs thus:

On this view [that there is acquaintance with external objects or qualities], there would, in fact, be a superfluity of information. . . . [I]f awareness of primary qualities involved acquaintance with those qualities, there would be too much information. My acquaintance with the primary quality yields me information about it; but the sensory experience [i.e., sensation] is also

supposed to function as a source of information about the primary quality. Something seems definitely wrong here. Given acquaintance with primary qualities, the sensory experience seems otiose; given the sensory experience, acquaintance with primary qualities seems otiose. . . . I submit that if perception consisted in acquaintance with the object perceived, there would also be "no necessity, no use" for [a sensation serving as] a *sign* of the object.[57]

This argument deserves extended scrutiny, which I have given it elsewhere.[58] Here I shall simply note that there must be *something* wrong with it, as shown by the following parody: "There can be no such thing as grasping the thought expressed by the words of another. If there were, there would be *two* sources of information about any such thought: Grasping the thought itself and hearing the words expressing it. Given the grasp, the words would be otiose, and given the words, the grasp would be otiose." Here, of course, one wants to object that the words could be necessary for evoking a grasp of the thought without there being any objectionable doubling of information.

X. DO VISIBLE FIGURES OBSTRUCT DIRECT PERCEPTION?

Reid distinguishes real from visible figure. He holds that real figure is ascertained originally only through touch, but that with experience a given visible figure comes to be a sign of a certain real figure, the mind passing automatically from the sign to the real figure associated with it. On these points he was deeply influenced by Berkeley. Unlike Berkeley, however, he believes that "the visible figure of objects is a real and external object to the eye" (IHM VI.viii: 98) and that visible figures are a fit subject matter for geometry. In fact, they obey a geometry of their own, distinct from the Euclidean geometry that governs tangible figures.

What is visible figure? "As the real figure of a body consists in [i.e., is determined by] the position of its several parts with regard to one another," Reid tells us, "so its visible figure consists in the position of its several parts with regard to the eye" (IHM VI.vii: 96). He explains further that two points have the same position with regard to the eye if and only if they lie on the same straight line extending out from the center of the eye, regardless of their distance from it.

This definition reflects his agreement with Berkeley that the eye alone is incapable of making any discriminations of depth: In the visual field there are seen differences of left, right, up, and down, but not of near and far. It follows that a plane triangle and its projection on a sphere centered on the eye have the same visible figure, despite the fact that one is flat and the other curved. (The two triangles differ in real figure, but that difference is ascertainable only by touch.) We may also say that a round plate seen obliquely has the same visible figure as an elliptical plate seen head on.[59]

As noted, Reid believes that visible figures have a geometry of their own, distinct from the Euclidean geometry that governs tangible figures:

> When the geometrician draws a diagram with the most perfect accuracy – when he keeps his eye fixed upon it, while he goes through a long process of reasoning, and demonstrates the relations of the several parts of his figure – he does not consider that the visible figure presented to his eye, is only the representative of a tangible figure, upon which all his attention is fixed; he does not consider that these two figures have really different properties; and that, what he demonstrates to be true of the one, is not true of the other. (IHM VI.viii: 102–3)

He goes on to provide a list of theorems that he takes to govern visible figures. For example, any two straight lines in my visual field eventually intersect (so there are no parallels), and the sum of the angles of a visible triangle always exceeds 180 degrees.[60] These are theorems belonging to what we would nowadays classify as Riemannian geometry, but Reid advanced them almost a century before Riemann.

For exploration of why Reid thought the geometry of visible figures is non-Euclidean, I refer the reader to what I have said elsewhere.[61] Here I wish to raise a different question: Are visible figures an impediment to direct perception? There is prima facie reason to think that the answer is yes. Although visible figures may themselves be objects of direct perception – Reid calls them "the immediate objects of sight" (IHM VI.viii: 102 and VI.ix: 105) – they threaten to make our perception by sight of other physical things indirect. When I look at a triangular tabletop, the visible figure presented to my eye (according to Reid) is a triangle with an angle sum exceeding 180 degrees, even if only by a slight amount. But the tabletop

itself has an angle sum of exactly 180 degrees, since its real figure (according to Reid) is Euclidean. It follows that my immediate object of sight is not the tabletop. With experience, it comes to be a sign of the real figure associated with it, and I pass automatically from an awareness of the sign to a conception of the Euclidean tabletop that it signifies. But what all this seems to add up to is the following: I perceive the table only by being aware of something else that is distinct from it and not even a part of it. So I do not perceive the tabletop directly.[62]

Why should we think that visible figures make trouble for direct perception if we do not find any trouble with sensations? After all, sensations are used as signs in perception just as much as visible figures are. Wherein lies the difference? The answer is that sensations do not get in the way of direct perception because being aware of a sensation is not being aware of any object – it is only being aware of the fact that you are modified in a certain way. By contrast, being aware of a visible figure is definitely being aware of an object – an object that is extended in length and breadth.[63] It is an external object rather than an idea, but it is no less an obstacle to direct visual perception of tables and trees for all that.

XI. ALL PERCEPTION IS DIRECT

I have been working so far with the following rough notion of the distinction between direct and indirect perception: You perceive something indirectly when you perceive it by perceiving (or otherwise apprehending) something else. You perceive something directly when you perceive it, but *not* by apprehending anything else. We should, however, pause to ask: Could there really be such a thing as indirect perception? I am not asking whether the theory-of-ideas assay of the perceptual situation could be correct. I am asking the following question instead: *Assuming* that assay is correct, is our cognitive relation to external things properly classified as perception? In other words, is what you do when you "perceive one thing by apprehending another" really *perceiving*? Could *both* clauses in the definition of indirect perception ever be satisfied?

I believe Reid's answer is no. When you move a stone by moving a stick that touches the stone, you really do move the stone. But when

you perceive a table by perceiving or apprehending something else that is not even a part of it, you are not really perceiving the table at all:

> A body in motion may move another that was at rest, by the medium of a third body that is interposed. This is easily understood; but . . . to think of any object by a medium, seems to be words without a meaning. (EIP II.ix: 134)

A little later on the same page he concludes:

> I apprehend, therefore, that if Philosophers will maintain that ideas in the mind are the only *immediate* objects of thought, they will be forced to grant that they are the *sole* objects of thought. (EIP II.ix: 134, emphasis added)

Since Reid takes "thinking" to be "a very general word, which includes all the operations of our minds" (EIP I.i: 22), what he says here implies that there is no such thing as a mediate object of perception.

Reid has another point to make against the propriety of the phrase "mediate object of perception." He asks,

> Whether, according to the opinion of Philosophers [who embrace the theory of ideas], we perceive the images or ideas only, and infer the existence and qualities of the external object from what we perceive in the image? Or, whether we really perceive the external object as well as its image? (EIP II.vii: 105)

And he answers,

> If the last be their meaning, it would follow, that, in every instance of perception, there is a double object perceived: That I perceive, for instance, one sun in the heavens, and another in my own mind. But I do not find that they affirm this; and, as it contradicts the experience of all mankind, I will not impute it to them. (EIP II.vii: 106)

Reid's view, then, is that "indirect perception" is an oxymoron – if we perceive something at all, we perceive it directly.[64]

The preceding reflections suggest to me that we should change our tack in discussing such questions as whether sensations and visible figures "get in the way" of direct perception. We have been asking: Is our cognitive relation to various intermediaries such as to preclude direct perception? Is it a matter of being acquainted with some object that serves as a sign of the thing to be perceived? We have been

assuming that an answer of yes would imply that our perception of the thing signified is indirect. But this now seems wrongheaded. We should ask instead: Are we acquainted with the thing signified? If we are *not*, then no acquaintance with anything else can count as perceiving the thing signified, however indirectly. If we *are*, then no acquaintance with anything else can stand in the way of our perceiving the thing signified as directly as you like. In short, what is important in securing direct perception is not downgrading our relation to the sign, but upgrading our relation to the thing signified.

Acquaintance with a sign would exclude acquaintance with the thing signified only through a "no double object" argument. But double objects may be admissible in certain cases, as Reid tells us:

> The sign, by custom, or compact, or perhaps by nature, introduces the thought of the thing signified. But here the thing signified, when it is introduced to the thought, is an object of thought no less immediate than the sign was before: And there are here two objects of thought, one succeeding another, which we have shown is not the case with respect to an idea, and the object it represents. (EIP II.ix: 134)

Unfortunately, Reid gives no example of the sort of case he has in mind, and he does not make it clear whether he would extend what he says here to perception in particular. But I propose a possible perceptual example at the end of the next section.

XII. ACQUIRED PERCEPTION

"Our perceptions are of two kinds," Reid tells us. "[S]ome are natural and original, others acquired, and the fruit of experience" (IHM VI.xx: 171).[65]

Reid's favorite examples of acquired perceptions are the perceptions of distance and three-dimensionality that we have by sight. As noted above, he agrees with Berkeley that the original deliverances of sight include extension in two dimensions only: Depth (or distance out from my eye) and three-dimensional figure are not presented to me originally in vision, but are known only through touch. With the passage of experience, however, I come to know that certain sensations associated with adjusting the "trim" of the eye and certain patterns of light and shade are signs of the presence of three-dimensional objects as known through touch. I can infer the presence

of a three-dimensional globe from the way in which light and shade are distributed across a two-dimensional visual disk. Eventually the transition from sign to thing signified becomes so automatic that it is no longer a matter of inference or reasoning: When the sign is presented, I spontaneously conceive of and believe in the thing signified. When the transition has thus become a matter of habit or custom, I am said to have *acquired perception* of the thing signified. As Reid sums it up:

> It is experience that teaches me that the variation of colour is an effect of spherical convexity. . . . But so rapid is the progress of the thought, from the effect to the cause, that we attend only to the last, and can hardly be persuaded that we do not immediately see the three dimensions of the sphere. (EIP II.xxi: 236)

We can have acquired perceptions through one sense of things originally perceived only through another. I can now see wetness (a tactile quality) on the pavement ahead where I originally saw only a patch darker in color than its surroundings. "I can say, without impropriety . . . I hear a great bell, or I hear a small bell; though it is certain that the figure or size of the sounding body is not originally an object of hearing" (EIP II.xiv: 182). A butcher can perceive by sight the weight of a sheep, and a sailor the capacity and build of a distant ship.[66] As these examples illustrate, the signs in acquired perception may be either sensations or things perceived by original perception.[67]

Acquired perception is undoubtedly a powerful means of gaining information through the senses, but is it really *perception*? Berkeley's answer is no: "In short, those things alone are actually and strictly perceived by any sense, which would have been perceived, in case that same sense had then been first conferred on us."[68] Reid's answer is more equivocal. In the remark about the globe quoted above, he insinuates that our acquired perception of three dimensions is not immediate perception, which would imply for him that it is not perception at all. In another passage, he says that although we are authorized by language to classify acquired perceptions as perceptions, they are not properly the testimony of our senses, and that errors in acquired perception should not be accounted errors of the senses.[69] In yet other places, he says the question whether to classify acquired perception as perception or judgment is verbal.[70]

Despite Reid's wavering on the question, acquired perception seems to qualify as perception according to his threefold account: It involves conception of and belief in the object perceived, and once the transition from sign to thing signified has become automatic, the belief is as immediate as any.[71] It can also meet the further conditions requiring the present existence of the object and its causal connection to our experience. Yet there are cases of acquired perception that no one would regard as genuine perception. I return home and see my wife's car keys on the counter (or hear my son say "Mom's home"), whereupon I automatically conceive of her and believe that she is home. Since she is upstairs, I do not perceive her, but it seems that I fulfill all the conditions for Reidian perception. So is there something missing in Reid's account of perception? If so, what is it?

Shall we say that I do not perceive my wife because appropriate sensations are lacking, and that the threefold account is to be faulted for not including sensation? But what is meant by "appropriate" sensations? If sensations are appropriate to X just in case they are highly correlated with X, then the sensations involved in seeing the keys or hearing my son's testimony may qualify as appropriate.

Shall we say that an experience E does not qualify as perceiving X unless there is some sort of internal connection between E and X, making it necessary that anyone who had an experience that was the same in its sensory aspects as E would conceive of X? But then not even original perception would count as perception, for as Reid insists, the connection between our conception of hardness and the sensations that trigger it is entirely contingent.

Shall we say that an experience E does not qualify as perceiving X unless the experience by itself, in the absence of any collateral information about how it is correlated with X, would justify belief in X? Even if otherwise acceptable, this could not be a final answer, in view of the supervenient character of justification. If a certain experience justifies a certain belief, there must be some feature of the experience, describable in nonepistemic terms, in virtue of which it justifies the belief. Why is it that certain experiences and not others are eligible as justifiers of a given belief?

I propose the following answer to the conundrum of the car keys: An experience does not qualify as perception unless it involves *conception of the acquaintance variety*. That is why I do not perceive my wife on the occasion of seeing her keys: Though I may conceive

of her in the sense of thinking of her, I am not acquainted with her. She does not appear to me in any way, shape, or form. By contrast, in original perception (as I have argued above), my conception *is* of the acquaintance variety. Most cases of acquired perception probably do not count as perception by this standard. But *if* there are cases of acquired perception in which my perceiving one thing leads me not merely to think of another but to be acquainted with it, they are cases of genuine perception.

Perhaps our perception by sight of three-dimensional objects is a case in point. When I see the visible figure consisting of the various polygons in a cube that is presented to my eye, it is not implausible to hold that I am led to genuine acquaintance with a three-dimensional cube. If this is what happens, it may be possible to square Reid's geometry of visibles with perceptual and presentational direct realism after all.[72]

NOTES

1. Reid held that causation in the strictest sense of the term is exercised only by intelligent agents and that what is ordinarily referred to as causation in nature, such as the causation of smoke by fire, is really just a case of succession in accordance with law. But he often enough calls such succession causation and plainly thinks it is part of the perceptual process. On the latter point, see IHM VI.xxi: esp. 174 and EIP II.ii: 76.
2. EHU XII: 201.
3. See EIP II.xiv: 180–2.
4. It is crucial here that Reid refuses to analyze the dyadic relation "Object O appears large (small) to observer S" into the triadic relation "O presents to S a sense datum D that is large (small)." Otherwise, an additional criticism of Hume's argument he makes would be inadequate. In this criticism, Reid notes that by the laws of geometry, it is necessary that the real table must diminish in apparent magnitude as we move away from it. "How then can this apparent diminution be an argument that it is not the real table? When that which must happen to the real table, as we remove farther from it, does actually happen to the table we see, it is absurd to conclude from this, that it is not the real table we see" (EIP II.xiv: 182). If the table's appearing smaller as we retreat from it were a matter of its presenting successively smaller sense data to us, however, we *would* have to conclude that it is not the real table we see. So it is not enough for Reid's purposes to observe that the apparent diminution of the table is just what we should expect; it is essential as

well that he insist on a dyadic rather than a triadic analysis of apparent magnitude. For more on this point, see Broad 1959: 234–6.

5. This point is developed by Lehrer 1989: 13–14. In Reid's own writings it is perhaps most explicit in PO: 62. The point also occurs in one of Reid's Aberdeen Philosophical Society manuscripts, reproduced in IHM: 297.
6. See EIP II.xiv: 185–7.
7. For more on this issue, see Greco's essay in this volume.
8. Reid is credited with this distinction by Price 1932: 22 and by Gibson 1966, 1: 319.
9. See Chisholm 1957, Chap. 8 and 1966: 94–6.
10. See, for example, IHM VI.xx: 168, EIP II.xvi: 199, II.xvii: 210, II.xviii: 211, II.xx: 226. The first of the EIP passages mentions conception and immediate belief; the last three mention conception and belief.
11. See IHM VI.xx: 168. There are exceptions. For example, Reid says that sensation is an ingredient in the perception of external objects at EIP II.xvi: 197. But he more often says that perceptions are *accompanied by* sensations or that they have sensations *corresponding to* them. See, for example, EIP I.i: 37 and II.xvi: 194.
12. See IHM VI.xxi: 174–6 and EIP II.xx: 227.
13. See IHM VI.viii: 99–101 and VI.xxi: 176.
14. See EIP I.i: 22–3, II.xx: 232, IV.i: 311. He is actually vexingly inconsistent on this point, sometimes insisting that perception must concern an existing object (as at EIP IV.i: 310–1), but occasionally admitting cases of hallucinatory perception in which there is no existing object (e.g., perception of pain in an amputated limb at EIP II.xviii: 214).
15. See IHM VI.xxi: esp. 174 and EIP II.ii: 76.
16. For example, he says in one place that belief is part of the "meaning" of seeing a chair (EIP II.xx: 232), but in another place says that every man feels that belief is an "immediate consequence" of perception (EIP II.xv: 193). And at EIP VI.i: 409 he says this: "The man who perceives an object, believes that it exists . . . nor is it in his power to avoid such judgment. . . . Whether judgment ought to be called a necessary concomitant of these operations, or rather a part or ingredient of them, I do not dispute."
17. Armstrong 1968 and Pitcher 1971.
18. Alston 1989: 35–47 and Wolterstorff 2001: 9–12.
19. See EIP IV.i.
20. See also IHM VI.xxi: esp. 174 and EIP II.ii: 76.
21. See EIP IV.i: 302 and 305.
22. See EIP IV.i: 303.
23. For more on this, see the discussion of conceptual apprehension and apprehension by acquaintance in Wolterstorff 2001, Chap. 1.
24. See EIP II.v: 96–7.

25. I would say that Reidian conception carries information in analog form, whereas conceptualization, judgment, and belief carry information in digital form. See Dretske 1981: 135–53.
26. See the chapter by Falkenstein in this volume for more on the senses in which Reid is and is not a nativist.
27. See IHM V.vi-vii: 65–72.
28. See Kant's "Metaphysical Exposition" of the representation of space, running from A23/B38 to A26/B40 of the *Critique of Pure Reason*. One may ask whether the ascription of nativism to Reid is compatible with his allowance that if we had never felt anything hard or figured, we would never have had a conception of extension (IHM V.v: 62). The answer is given in Kant's well-known remark: "But though all our knowledge commences **with** experience, yet it does not on that account all arise **from** experience. For it could well be that even our experiential cognition is a composite of that which we receive through impressions and that which our own cognitive faculty (merely prompted by sensible impressions) provides out of itself . . ." (Kant 1998: 136).
29. As Lehrer puts it, "Our conception of secondary qualities incorporates the sensation as a semantic constituent" (Lehrer 1989: 47).
30. See, for example, IHM V.i: 54 and EIP II.xvii: 202.
31. As pointed out by Wolterstorff 2001: 110–15.
32. Reid's usual term for "direct" is "immediate." I shall use the two terms interchangeably. I have made the case for Reid's being an epistemological direct realist in greater detail in Van Cleve 1999: 3–30.
33. This is advocated as a possibility in Greco 1995: 279–96.
34. See EIP II.vii: 106.
35. It is possible, however, that Reid is not here advancing the conditional $\sim$EDR $\rightarrow$ $\sim$PDR, but is instead advancing an abductive argument using the converse conditional $\sim$PDR $\rightarrow$ $\sim$EDR. That idea-theorists hold the antecedent would explain their holding the consequent.
36. Alston 1989: 36.
37. Armstrong 1968, Chap. 10.
38. Chisholm 1957, Chap. 10: esp. 148–9.
39. Pappas 1989: 155–67, at 156. To simplify exposition, I have omitted a further condition that Pappas includes in clause (2): "nor is O [a part] of R." I surmise that Pappas includes this to deal with the "background" problem that is discussed below. I have also omitted one further clause that is not germane to present purposes.
40. According to Galen Strawson, "the question of whether [Reid] is really a 'direct realist' about perception, or whether he is really some kind of indirect realist, has been seen as the central question of Reid scholarship ever since Hamilton" (Strawson 1990: 15). For Hamilton's suggestion

that Reid's sensations play a role analogous to the indirect realist's ideas, see Supplementary Dissertation C, "On the Various Theories of External Perception," in W: 816–24. For a contemporary version of this suggestion, see Chappell 1989: 49–64.

41. Immerwahr 1978: 245–56.
42. Immerwahr cites EIP II.xvi: 312, II.xvii, II.xix, II.xxi, and VI.v.
43. See IHM VI.iii: 82–3.
44. Whether these conditions are sufficient for saying we perceive sensations has been challenged by Cummins 1990: 755–62. Pappas replies in Pappas 1990: 763–6.
45. Setting the following difficulty aside: Can a difference in how we draw the boxes in the diagrams really make the difference between direct and indirect perception?
46. For further discussion, see the Cummins–Pappas exchange cited above in n. 44.
47. I advance this inference as plausible in the present instance, even though the rule of Hypothetical Syllogism is not generally valid for subjunctive conditionals.
48. I have resolved an ambiguity about where the quantifier governing "R" in clause (2) should be placed by putting it inside the consequent of the subjunctive conditional.
49. The trouble here is that the extraneous item I perceive is not an item of the sort to which a direct realist would object – it is not an image, sense datum, or the like. One might think to avoid the difficulty, then, simply by modifying Pappas's second clause to read thus: It is false that S would perceive O only if there were a *mental* item R that S perceived. That would allow direct perception to depend on the perception of physical background. Unfortunately, however, it would also allow one to perceive the President directly by perceiving his physical image on a TV screen – no doubt an unwanted consequence.
50. Jackson 1977, Chap. 1: esp. 19–20. Jackson's word for "direct" is "immediate."
51. But why exactly is it wrong? Is it because one perceives A in virtue of perceiving B only if *necessarily*, any case of perceiving B would be a case of perceiving A? If so, not even a paradigm case of indirect perception, such as perceiving a physical object by perceiving a sense datum, would count as indirect, since perceiving a sense datum is not enough by itself to constitute perceiving a physical object.
52. I am assuming here that acquaintance is a genus of which perception is a species, even though (as we saw above) some philosophers do not take perception to be a variety of acquaintance at all.
53. See, for example, EIP II.xvi: 199.

54. Nor do I altogether dismiss this consideration, since it may be necessary to remove another obstacle to direct perception. Consider the view that one never perceives an external object without being acquainted with oneself. (Reid does not hold this view, for he thinks that we have only a relative and not a direct notion of the self – in effect, that knowledge of the self is knowledge by description rather than knowledge by acquaintance. See IHM II.vii and I.ii: 42–3.) Even if we add that a self is an object, such a view does not seem to compromise direct perception. Why not? A possible answer is that one does not perceive physical objects in virtue of being acquainted with oneself.
55. Alston 1989: 44–5.
56. Reid insists that there is a clear sense in which the color and fragrance of the rose are in it – they are in the rose as properties causing certain sensations in us. But colors and fragrances in this sense probably do not count as sensible objects of acquaintance, so they do not constitute an exception to Alston's claim that the consequent of premise 1 is false.
57. Wolterstorff 2001: 148–9.
58. Van Cleve forthcoming a.
59. Note that having corresponding parts that occupy the same position with regard to the eye is sufficient, but not necessary, for having the same visible figure: The two plates just mentioned may have the same visible figure even when seen side by side.
60. See IHM VI.ix: 105.
61. Van Cleve forthcoming b.
62. It is true that Reid says we scarcely ever attend to visible figure, but (as I have suggested above) it does not seem plausible that mere inattention to things that pass before the mind can turn us into direct perceivers.
63. "Figure" can be either an object word, as in "he drew a figure on the blackboard," or a property word, as in "these two objects have the same figure." Reid uses it both ways, but more often in the former way, and visible figures in the object sense are what he generally means by "visibles."
64. Elsewhere, commenting on Locke's doctrine that ideas are the only immediate objects of thought, he says this: "Every object of thought, therefore, is an immediate object of thought, and the word *immediate*, joined to objects of thought, seems to be a mere expletive" (EIP VI.iii: 437).
65. For more on this important distinction, the reader should consult IHM VI.xx–xxiv and EIP II.xxi–xxii.
66. See IHM VI.xx: 172.
67. See IHM II.xxiv: 191 and EIP II.xxi: 237.
68. Berkeley 1979: 40.
69. See EIP II.xxii: 247–8.

70. See EIP II.xiv: 182.
71. For confirmation of the point that acquired perception is psychologically immediate, involving no reasoning, see IHM VI.xxi: 178.
72. For advice on earlier drafts, I wish to thank Panayot Butchvarov, Terence Cuneo, Baron Reed, Ernest Sosa, Dale Tuggy, and participants in the 2002 meetings of the Reid Society.