

THERAPEUTIC REFLECTIONS ON OUR BIPOLAR HISTORY OF PERCEPTION

ROBERT PASNAU

University of Colorado

1. Overview

The long history of theorizing about perception—a history as long as the history of philosophy itself—divides into two quite distinct and irreconcilable camps, one that takes sensory experience to show us external reality just as it is, and one that takes such experience to reveal our own mind. Why we swing back and forth between these two extremes is something I hope to explain. Perhaps I might be forgiven for declining to take a position on which side in this oldest of philosophical debates has things right—but I mean to ask for no such forgiveness because in fact I am going to tell you which side is right: Neither one. Each position is wholly pathological.

The first part of this essay diagnoses our long bipolar history and draws several lessons from it. The second part suggests that many current theories might still benefit from this diagnosis, inasmuch as they simply recapitulate the bipolar structure of these older debates. As therapy, I suggest we recognize that although perceptual experience is obviously indispensable to our lives, we ought not to suppose that the phenomenal character of that experience itself reveals anything about the nature of either mind or world.

Part One: History

2. A Very Brief History of Outward Theories

For most of the history of philosophy, the vast majority of philosophers took perception to acquaint us with external reality. Plato took it for granted, though he thought this gave us good reason to downgrade the value of perception, since he regarded mere physical reality as an unworthy object of human inquiry. Aristotle responded by trying to articulate in a more fine-grained way what the objects of perception are, and he contended that with respect to the proper objects of each sense—color, sound, heat, flavor, odor—the senses (almost) never go astray. It was Aristotle, of course, who came to dominate later philosophy, both in the Islamic and the Christian worlds, and

his brand of outward realism would shape philosophy up to the seventeenth century. So, to pick just one from among countless possible examples, the great fifteenth-century logician Paul of Venice writes that “we grasp the sensible prior to the sensation, because we grasp the sensation only because we grasp the color.”¹ For Paul, as for nearly all scholastic authors, the primary objects of perception are sensible qualities in the world. Inward awareness is a secondary byproduct of our outward perception.

3. *A Still Briefer History of Inward Theories*

It was obvious to philosophers from the start that one might reject these sorts of outward theories. Democritus seems to have thought that perception acquaints us only with our inner sensory states, and the Cyrenaics certainly thought this.² But it is only in the seventeenth century that such views became widespread, beginning with Descartes’s appropriation of the Greek word ‘idea’ to refer to “the form of any given thought, immediate perception of which makes me aware of the thought.”³ Within a few decades of Descartes’s death, Malebranche had embraced both the term ‘idea’ and its inward usage, remarking that “I think everyone agrees that we do not perceive objects external to us by ourselves.”⁴ In England, Locke famously followed suit, and still later Berkeley could write that “I take the word ‘idea’ for any the immediate object of sense, or understanding—in which large signification it is commonly used by the moderns.”⁵

4. *Why Outward Theories Dominated*

Before the seventeenth century, outward realism is almost always just taken for granted. William Ockham, for instance, argues that there must be no intermediaries of any kind between a sense and its

¹ *Summa philosophiae naturalis* De anima ch. 6 concl. 1. The material in Part I of this paper draws on the more extended historical discussions in my forthcoming monograph, *After Certainty*.

² See Voula Tsouna, *The Epistemology of the Cyrenaic School*.

³ *Meditations*, Second Replies (VII:160).

⁴ *Search* III.2.1 (p. 217).

⁵ *New Theory of Vision* §45. There is considerable scholarly disagreement over whether any of these authors in fact hold the sort of inward theory I am ascribing to them—except for Berkeley, who prudently removed all possibility of misunderstanding by embracing idealism. Why so many have been so keen to purge the seventeenth century of such inward views is something I find baffling, since the texts seem so manifestly clear, and since this is one of the most unique and interesting features of the era. If it is outward theories of perception one wants, then the whole history of philosophy abounds with such examples, everywhere one looks. Why try to force the seventeenth century into that same mold?

objects, on the grounds that if there were something intervening, “it would be more immediately seen, which is manifestly false.”⁶ Ockham’s parsimonious rejection of all intermediaries is unusual, but the assumption he makes here is quite standard. *Of course* it is the external things that we perceive immediately. Who could think otherwise?

Almost no one could think otherwise, not because the inward thesis did not occur to them, but because—with only a very few exceptions—it seemed self-evidently absurd. And although, as is often the case with seemingly absurd theories, no one bothered to explain just where the absurdity lay, I think it is fairly clear that the principal reason for the apparent absurdity is the diaphanous character of perception. In invoking this piece of modern jargon, I mean to appeal to the way perception seems to take us directly to the things themselves, passing right through the inner experience as if it were invisible.⁷ The jargon is modern, but the idea is old. The Coimbran commentators on Aristotle, for instance, from the late sixteenth century, write that “what is understood through its proper form (*species*) is understood directly. Experience testifies, in contrast, that we come to a knowledge of our own soul only through a reflective act, by inferring (*arguendo*) one thing from another.”⁸ Following the main line of Aristotelian tradition, they take the soul, its acts, and its inner forms to be diaphanous vehicles for our grasp of the external world. They did not deny the need for philosophers to postulate such mental structures, but they thought the case had to be made *arguendo*, rather than experientially, because experience reveals only outward objects.

5. What Changed circa 1640

Theories of perception undergo so radical a transformation in the seventeenth century that one almost might wonder whether, at some point circa 1640, the phenomenology of perception itself somehow changed. Was there something in the water? In fact it seems clear that theories of perception changed because metaphysics and natural

⁶ *Reportatio* III.2 (*Opera theol.* VI:48).

⁷ The classic source is G. E. Moore: “when we try to introspect the sensation of blue, all we can see is the blue: the other element is as if it were diaphanous” (“Refutation of Idealism,” in *Philosophical Studies*, p. 25). Earlier in the same essay, Moore describes the sensation of blue as “transparent” (p. 20), and it is this equivalent Latinate term that is most often used in recent discussions. Here, however, I avoid that more common label because of the unfortunate equivocation in the term’s meaning: sometimes being used for that which one sees right through, so that it is invisible, and sometimes being used for the underlying thing that is revealed—i.e., that which one fully grasps without any obfuscating intermediary. This equivocation is generally harmless enough, but here I need to retain ‘transparent’ for the latter sense, in the familiar context of Cartesian dualism.

⁸ Coimbrans, *De anima* III.8.7.2. Compare the earlier quotation from Paul of Venice, at note 1.

science changed. When Aristotle asserted the outward reliability of the five senses with respect to their proper objects, he took for granted that there *are* proper objects for each of the senses: that heat and color and all the rest are real, mind-independent qualities in the world. According to what was, for two millennia, the best scientific theory available, the primary qualities of nature were Hot, Cold, Wet, and Dry. Supervening on these, yet still irreducibly real in their own right, were the various secondary sensible qualities such as color and flavor. These qualities, moreover, were embedded within a physics that treated qualitative properties as the fundamental causal agents, meaning that there was no difficulty in understanding how the color of an object could make an impression on the surrounding medium, transmitting a form that lodged in the visual faculty and ultimately in the inner senses of the brain. Such literal *information* readily lends itself to a theory of intentionality on which the initial quality is represented by the ultimate form within the soul. Such a worldview inevitably led perceptual theorizing outward. For given the diaphanous phenomenology of experience, plus the supposed real presence in the outer world of the qualities we seem to be acquainted with, along with a tidy causal account of information transmission, it seemed simply incredible to deny that the senses put us directly in touch with those qualities.⁹

What happened circa 1640 is that philosophy returned to the reductive corpuscularianism of Democritus. This involved two different sorts of revolutions. On one hand, heat, color, and other sensible qualities were explained in terms of particles in motion, elevating the geometric–kinetic properties to the status of the primary qualities responsible for causation among bodies. This was a revolution in natural philosophy, promulgated first by Bacon and Galileo, and later by figures like Gassendi and Boyle. By itself, this new science might not have forced a change to perceptual theory, because one could treat size, shape, and motion as primary and still think that heat, color, etc., even if they supervene on these geometric–kinetic properties, are nevertheless features of external reality. (This in fact was the view Gassendi took, championing the less radical atomism of the Epicureans in preference to the antirealism of Democritus.¹⁰) What made outward theories of perception seem untenable, however, was that, parallel to these transformations in natural science, there was a revolution

⁹ For more information on qualities in scholastic Aristotelianism, and what became of them in the seventeenth century, see Pasnau, *Metaphysical Themes* chs. 19–24. Thanks here to Harry Ide for pointing out the critical role played by the causal theory of mental representation through formal resemblance. For recent work on that topic, see the papers in Gyula Klima, *Intentionality, Cognition, and Mental Representation*.

¹⁰ On the Epicureans in this regard, see Sedley, “Epicurean Anti-Reductionism.” On Gassendi see Pasnau, *Metaphysical Themes*, pp. 503–4. It is also worth noting that neither Bacon nor Galileo, despite their corpuscularian views with regard to the sensible qualities, turned perception inward. That shift began with Descartes.

in metaphysics. In place of the real accidents of scholastic Aristotelianism, Descartes and others took physical reality to be nothing more than impenetrable bodies, organized by various modes of extension. This made it hard to see how an outward theory of perception is tenable, because in a world such as this it becomes hard to identify eligible external objects for perception to latch onto. Perhaps, in retrospect, they should have tried harder to find eligible objects in the external world (see §§7–8 below). But in fact what happened is that theories of perception turned inward, and treated the mind's inner states as the things with which we are directly acquainted.

Seventeenth-century authors knew that they were doing something radical in turning perception inward, and they saw that what made all the difference was their revisionary theories of the sensible qualities. Malebranche, for instance, remarks that his hero Augustine would have arrived at a properly inward theory of perception, but for his being in the grip of “the prejudice that colors are in objects.”¹¹ And no wonder it later seemed to Hume that “the fundamental principle” of “modern” philosophy is “the opinion concerning colours, sounds, tastes, smells, heat and cold; which it asserts to be nothing but impressions in the mind.”¹² It seems in retrospect quite correct to say that this one issue, arising out of natural philosophy, lay at the heart of the transformative changes in postscholastic thought. From this sprang the reductive corpuscularian metaphysics that then led to the new inward theory of perception, which in turn led to new conceptions of mind and knowledge, and ultimately to the still more radical idealist metaphysics of the eighteenth century.

6. *Diaphanousness and Error*

At this point, however, one might wonder how developments in metaphysics and natural philosophy could have so thoroughly undermined the outward realism of the scholastics. If such realism was based on the diaphanousness of experience, then should that testimony not have carried more weight? The trouble is that the claim of diaphanousness, all by itself, is nothing more than a claim about how things seem. Mere seemings, however, have never carried much weight among philosophers; indeed, the overturning of superficial appearances has effectively served to define the enterprise of philosophy, all the way back to Plato's cave. So the most that can be said of diaphanousness is that it gives us some *prima facie* impetus toward outward theories of perception, absent strong reasons to the contrary.

How strong must those reasons be? Consider Michael Tye's influential account of how diaphanousness can be harnessed in the philosophy

¹¹ *Réponse au Livre des vraies et des fausses idées* 7.12 (*Oeuvres complètes* VI:68).

¹² *Treatise* I.4.4, p. 226.

of mind. Step one, for Tye, is simply to register the phenomenology of the experience. Step two, which is as far as we need to go for present purposes, runs as follows:

To suppose that the qualities of which perceivers are directly aware in undergoing ordinary everyday visual experiences are really qualities of the experiences would be to convict such experiences of massive error. This is just not credible. It seems totally implausible to hold that visual experience is systematically misleading in this way. Accordingly, the qualities of which you are directly aware in focusing on the scene before your eyes and how things look are not qualities of your visual experience.¹³

This is very much how philosophers prior to the seventeenth century conceived of the situation. They had no reason to take the prospect of such “massive error” seriously, because their metaphysics and natural science concurred in identifying objects in the world—real sensible qualities—that could play the sort of causal role that yielded inner sensory representations having those qualities as their intentional objects. But what if one’s best metaphysical and scientific theories suggest that there are no eligible objects in the world to serve as external objects of perception? Then it may seem that the best way forward is to conclude that our sensory phenomenology just does systematically deceive us.

This sort of error theory is exactly what came to be the dominant view among postscholastic philosophers. Malebranche, for instance, wrote that “I shall teach you that the world you live in is not such as you believe it to be, since it is not such as you see it or as you feel it. You judge all objects surrounding you on the basis of your senses, and your senses delude you a very great deal more than you can imagine.”¹⁴ Despite Malebranche’s saying here that “your senses delude,” there was in fact considerable reluctance among authors from this era to accuse the senses themselves of systematic error, since that would seem to be the sort of design flaw their theological commitments precluded. Thus, Descartes insisted that it is not that the senses function poorly, but that we “from our early childhood” become accustomed to a certain misinterpretation, confusing the sensation with the outward object.¹⁵ Of course, this serves only to shift the focus of blame

¹³ *Consciousness, Color, and Content*, p. 46. The remainder of Tye’s argument is devoted to establishing the thesis of “strong representationalism”—that the phenomenal character of experience just is a certain sort of representational content, so that if we could understand how the mind represents the world, we would thereby have understood its phenomenal, qualitative feel, and thus have explained consciousness. So far as I can see, my arguments in this paper are neutral on this issue (see note 37 below).

¹⁴ *Dialogues on Metaphysics*, dial. 1 (*Selections*, p. 148).

¹⁵ *Principles* I.66.

away from the perfect creator and toward our fallible wills. One way or another, then, the inward perceptual turn requires embracing an error theory of perception.

7. *Metaphysics First?*

Yet if there is something admittedly implausible about a theory of perception that runs so contrary to phenomenal experience, still, from the perspective of the later seventeenth century, this was the least bad of various bad options. For though the inward theory forces us to confess systematic error with regard to the location of the objects of sense, at least it succeeds in identifying some such objects. Much worse, from their perspective, would be to insist that the senses are aimed directly outward, because then one would have to say that the senses have nothing at all as their objects. They would be telling us that things are a certain way, and yet there would be *nothing* that is that way—at least, not with regard to the supposedly proper objects of the senses (color, heat, smell, etc.), even though it was here that the senses had always been supposed to be most reliable.

In reaching their radical inward conclusion, Descartes and others were motivated in part by various developments in the new science, such as Bacon's kinetic conception of heat. But equally important, I have claimed, was their austere corpuscularian metaphysics, which precluded the postulation of any sort of entities out in the world that could serve as viable objects of perception. Indeed, by the time we come to Leibniz, the infinite divisibility of matter was thought to block even the geometric qualities of things from being perceptible, and thus "the extensions we attribute to bodies are merely phenomena and abstractions."¹⁶ At this point, however, one might wonder about the direction of argument. To turn perception inward, one must dismiss as illusory the most familiar and vivid of perceptual data—the way in which sensation seems to take us straight to the things themselves, diaphanously. Should one take such a step on the basis of abstruse metaphysical considerations? Why not instead let the phenomenology guide the metaphysics, and conclude that the senses are showing us something about what the world is like?

We might in fact think that the seventeenth century contains the perfect example of this sort of approach. For consider Locke's well-known treatment of colors etc. as powers or dispositions: in his words, as "in truth nothing in the objects themselves but powers to produce various sensations in us by their primary qualities."¹⁷ What Locke might seem to be doing here is precisely to let the phenomenology of experience direct his ontology. To be sure, colors are not basic

¹⁶ To Arnauld, April 30, 1687 (*Essays*, p. 87).

¹⁷ *Essay* II.8.10.

qualities in the world—the new science has shown us that. But yet we see them out there, and so we should postulate a further category of entities, the category of Power, and we should let the colors now be powers. So understood, Locke becomes the fountainhead of a prominent modern variation on outward perceptual theories, according to which the objects of perception are dispositional rather than categorical features of reality.¹⁸ Yet if this is what Locke is doing, then it is a considerable embarrassment that he himself seems unable to tell his story properly, but instead persists in treating ideas as the immediate objects of perception and talking as if the colors are in the perceiver rather than in the world. In fact Locke talks this way, however, not because he is confused, but because he does not hold this kind of dispositional theory. Rather, when he says that the secondary qualities are “nothing . . . but powers,” this is to be read dismissively. Talk of colors in bodies refers to its powers, and yet what actually exercises the power in bodies is its geometric–kinetic qualities. The power is not something over and above these primary qualities. Hence, when he famously asks us to pound an almond, thereby changing its color and taste, he asks rhetorically, “What real alteration can the beating of the pestle make in any body, but an alteration of the texture of it?”¹⁹ To this we might think there is a perfectly obvious response: pound the almond and you change its powers. But from Locke’s point of view only an outmoded scholastic Aristotelian would suppose that powers are something real in bodies, distinct from their primary geometric–kinetic qualities. The game of letting one’s metaphysics be driven by ordinary appearances is precisely the old, discredited scholastic game, something Locke wants no part of.

8. *Reduction*

Even granted the metaphysical austerity of the later seventeenth century, still one might wonder whether it is really so difficult to find some sort of external object to serve as an object of sensation. For even if all there are in the physical world are bodies in motion, it seems that we might well conclude that it is these physical events, or their attendant states, that the senses acquaint us with. Berkeley, whose whole philosophy was built around resisting the outward trajectory of sensation, recognized that this was the natural move to make at this point. Sound, he has Hylas object, “in the real and philosophic sense . . . is nothing but a certain motion of the air.”²⁰ Berkeley’s way

¹⁸ See, e.g., E. J. Lowe, *Locke on Human Understanding*, pp. 47–53.

¹⁹ *Essay* II.8.20.

²⁰ *Three Dialogues*, dial. 1 (*Writings*, p. 165). This is a natural move in the case of sound in particular, since it had always been the sensible quality most apt to be given a geometric–kinetic account (see Pasnau, “Sensible Qualities: The Case of Sound”).

of handling this objection looks, on its face, disappointingly crude. If real sounds are motions, then (he responds through Philonous), since it is sight and touch rather than hearing that detects motion, we would face the absurd result that sounds “may possibly be seen or felt, but never heard.” This looks flat-footed, since it seems obvious that Hylas might just hold his ground and insist that part of what the new science has shown us is that, in fact, hearing *does* acquaint us with motions of a certain kind. But we can read Berkeley as making a subtler point. Although the reductivist can in principle insist that hearing acquaints us with nothing more than certain motions, this is not at all what hearing *seems* to be showing us. The same sort of phenomenological considerations that put pressure on us to locate the objects of sensation out in the world likewise put pressure on us to think that those objects are not merely minute particles in motion, since none of the senses seem to be showing us *that*. So if the role of hearing is simply to detect certain sorts of microphysical motions, then auditory experience is systematically misleading in a way that is quite incredible. The lesson in general would be that it is hopeless to try to do justice to our phenomenal experience by identifying the sensible qualities with the microphysical features of bodies. That sort of reductive outward realism would allow us to save one aspect of our phenomenological experience, inasmuch as the experience would at least be right about the *location* of the sensible qualities. But with respect to how those qualities really are, the senses would mislead us quite thoroughly.

9. *Reliability and Fidelity*

We arrive, then, at an impasse with regard to perceptual veridicality, caught between our apparently diaphanous appearances and our apparently corpuscularian world. To see why postscholastic authors resolved that impasse in an inward direction, we need to distinguish two dimensions of veridicality. In one way, the senses get things right when they reliably signal the presence of those things in the environment: that is, when there is a reliable correlation between its seeming to the senses that something is out there and its actually being the case that something is out there. Call this *reliability*. A second way in which the senses get things right is when they reveal substantial details about the nature or qualities of what we perceive: not just *that* a certain something is present to us, but *what* that thing is. Call this *fidelity*.

Admittedly, it is not easy to draw a precise distinction between reliability and fidelity. The sound of my doorbell reliably tells me that someone is at the door, but not who is there. Yet it does tell me that a *person* is there, since nothing else—not my wife’s cat, not the neighborhood bears—has yet figured out how to ring the bell. So that’s

some information on the *what* side. Does that count as fidelity? Precision at this point would require a theory of perceptual content, as well as a metaphysics well enough developed to specify just what *whatness* is at issue. Aristotle—who draws a similar distinction between the question of *whether* a thing exists and the question of *what* it is—has just such a metaphysics: the what-it-is question concerns the essences of things. I will myself sometimes speak of the *natures* of things, but without intending any substantive metaphysical commitments. Whether or not things have natures, there are, I will assume, more or less accurate and comprehensive accounts of how things are. Fidelity can be understood as coming in degrees, in proportion to the degree to which this sort of accurate and comprehensive account is achieved. My doorbell is brilliant at signaling persons, but that is as far as it goes. The senses presumably do better, but it is unclear how much better, and to what extent their contribution lies inward or outward.²¹

Challenges to the bare *reliability* of the senses are the province of the dreaming doubt and other *recherché* skeptical scenarios, and these are not my concern here. Not even Berkeley wanted anything to do with those arguments. On the contrary, he insisted on the reliability of the senses, inasmuch as he took them to be a reliable guide to the world as it is in God's mind. But what Berkeley and his contemporaries claimed was that any outward theory of perception condemns the senses to being massively *unfaithful* to how things are. This seemed intolerable. As Berkeley put it, in arguing against those who thought our cognitive faculties leave us unable to grasp the true natures of things, "We should believe that God has dealt more bountifully with the sons of men than to give them a strong desire for that knowledge which he had placed quite out of their reach."²² Hence, to safeguard this ideal of perception in high fidelity, postscholastic authors moved the objects of perception inward. Regrettably, this requires us to say that the senses give the wrong impression about *where* the sensible qualities are, and thus the wrong impression about what outside bodies are like (at any rate, they do so when naively interpreted). But at least the senses faithfully reveal to us what those qualities are like. The phenomenal qualities with which we are acquainted in perception are perfectly real, and faithfully represented in experience, and so need only be relocated inward. Thus, the impasse over perceptual veridicality was resolved.

²¹ On perceptual accuracy, see, e.g., Susanna Siegel, "Do Experiences Have Contents?" Her account appeals to the instantiation of property clusters, drawing on her own theory of perceptual content. Talk of sensory "revelation" comes from Mark Johnston, "How To Speak of the Colors." As the main text explains, however, I do not mean to link revelation to a grasp of the nature or essence of a thing (the now standard construal of the term), but only to the looser ideal of perceiving a thing in high fidelity.

²² *Principles of Human Knowledge*, introduction, §3.

10. Outward Phenomenal Realism

The distinction between reliability and fidelity allows us to understand more precisely what changed circa 1640. Before Descartes, as we have seen, nearly everyone was committed to an outward realism that locates the objects of perception in the external world. Beyond that, however, they were committed to something we can call outward *phenomenal* realism, according to which the character of perceptual experience itself reveals external sensible qualities as they are, in high fidelity. What exactly such a claim amounts to is not at all easy to spell out, as will become increasingly clear, but we might begin by looking at how scholastic Aristotelians defended the view. This bit of history, however, is itself difficult to get clear about, because scholastic views have often been caricatured in absurd ways. Descartes, for instance, accused the scholastics of having mistakenly supposed that “what is called color in objects is something exactly like the color we sense.”²³ And Malebranche wrote that “they speak of sensible qualities as sensations.”²⁴ We have already seen, however, why this absurd reduplication of phenomenal character should not be ascribed to scholastic authors. For them, the “color we sense” is not aptly said to be “exactly like” the color in objects, as Descartes put it, because scholastic authors took their outward realism from the diaphanousness of experience. For them, the color we sense *just is* the color in objects. As for sensations, these are so clearly demarcated from outward sensible qualities that scholastic authors think we are aware of them only derivatively. As we earlier saw Paul of Venice say, “we grasp the sensation only because we grasp the color.”

To understand the true character of scholastic phenomenal realism, it is useful to go all the way back to Aristotle. According to an often quoted passage in the *Posterior Analytics*, “if some perception is lacking, it is necessary for some knowledge to be lacking too,” a remark that the *Physics* elaborates on: “a man blind from birth might reason about colors. Such persons, then, must be talking about words, without any understanding.”²⁵ Why should this be? Clearly, it might be *more difficult* for someone blind to have an understanding of color, just as blindness makes many things more difficult. But Aristotle thinks that natural science can teach us—even the blind among us—a great deal about the colors: that they arise from mixing black and white, for instance, and that they ultimately arise out of a mixture of the four elemental qualities. So why should Aristotle think the blind cannot understand colors? One possibility is that he is falling into the mistake Malebranche complained of, confusing sensation with sensible quality. For one certainly might think that someone blind cannot

²³ *Principles* I.70.

²⁴ *Search after Truth* VI.2.2 (p. 441).

²⁵ *Posterior Analytics* I.18, 81a38; *Physics* II.1, 193a7–9.

understand visual sensations (though more on this later). A more charitable interpretation of the passage, however, is that Aristotle is simply an outward phenomenal realist, supposing that the sort of visual experience to which the blind lack access gives us knowledge of what the colors are. Hence, although someone blind can perfectly well know that the leaves of the forest he walks through are green, he will lack “understanding” (*noein*) and “knowledge” (*epistēmē*) of color, where *epistēmē* is Aristotle’s word for an ideal theoretical grasp of a thing grounded in an understanding of its nature.

This is how scholastic Aristotelians understood the doctrine. John Buridan, in the fourteenth century, discusses how Aristotle’s remarks might seem to be undermined by his own theoretical story about what grounds the various sensible qualities: “why through a knowledge of the [four] tangible qualities can we not come to a knowledge of flavors or odors [e.g.], since these are their causes, just as in many other cases we go from knowledge of causes to knowledge of effects, and conversely?”²⁶ Buridan’s answer is that this would count as a kind of knowledge, but not one that gets at the nature of the sensible qualities: “if we lack a sense from birth then it is impossible for us, with respect to the sensibles proper to that sense, to acquire naturally a knowledge of the quidditative concepts of those sensibles.” This is to say that the phenomenal experience of perception reveals something about outward reality—indeed shows us the very natures of the sensible qualities of things.

11. Phenomenal Inward Realism

From the mid-seventeenth century on, as a result of the new science and metaphysics, a general consensus emerged that outward phenomenal realism had to be rejected. Here is Leibniz:

We use the external senses as a blind man uses his stick, . . . and they allow us to know their particular objects, which are colors, sounds, odors, flavors, and tactile qualities. But they allow us no knowledge of what these sensible qualities are, nor in what they consist. For example, whether red is the rotation of certain small globes, which some suppose to make up light; whether heat is a vortex of very fine dust; whether sound is made in air as circles in water when a stone is tossed in, as some philosophers suppose.²⁷

Leibniz is tacitly relying on the distinction between reliability and fidelity. When it comes to reliability, the senses are not under

²⁶ *Quaest. in Post. an.* I.28c. For further discussion, see Pasnau, *Metaphysical Themes* pp. 491–99.

²⁷ Letter to Queen Sophie Charlotte (*Essays*, p. 186). See Stephen Puryear, “Leibniz on the Metaphysics of Color.”

suspicion: “they allow us to know their particular objects.” But they do so without fidelity, without “knowledge of *what* these sensible qualities are.” Hence, when it comes to our access to the external world, we might as well be a blind man using a stick.

Yet rather than abandon phenomenal realism, and with it the ideal of perception in high fidelity, postscholastic theories of perception turned inward. Descartes and his contemporaries identified the mind itself as the privileged domain where experience reveals how things are. Thus, arose the notorious doctrine of Cartesian transparency, that “nothing can be in me, that is, in my mind, of which I am not conscious,” a doctrine that “follows from the fact that the soul is distinct from the body and that its essence is to think.”²⁸ For Descartes, the mind is essentially self-revealing, meaning that conscious awareness of our mental states shows us, clearly and distinctly, the very nature of those states. The essence of mind is thought, and the modes of thought are the various determinate kinds of conscious experience. Thus, we are fully aware of what the mind is, simply in virtue of being aware of these experiences.

Descartes’s inside-out transformation of scholastic perceptual theory was extreme in its insistence on full self-revelation: that the mind’s very nature is revealed in consciousness. Later authors tend not to go so far. Locke, for instance, controversially held that for all we know the mind might be material,²⁹ which means that he cannot suppose its full nature is revealed in experience. Still, Locke agreed that our ideas are transparently revealed by experience: an idea “can be no other but such as the mind perceives it to be.”³⁰ Such claims were commonplace within postscholastic philosophy.

12. *Exclusive but Not Exhaustive*

Given all this history, we are now in a position to see why it is, as I asserted at the start, that these polar-opposite theories of perception are so distinct and irreconcilable. The trouble, once again, lies with diaphanousness. Although this feature of experience does not force upon us an outward theory of perception, it does force us to make a choice one way or the other. That is, if the phenomenology shows anything, it shows that we are quite unable to toggle back and forth

²⁸ Letter to Mersenne (III:273). See also, e.g., First Replies (VII:107). The extent of Descartes’s commitment to transparency is a matter of some dispute. Presumably, for instance, it needs to be qualified to take account of his claims about innate knowledge (see, e.g., the discussions in Wilson, *Descartes*, pp. 150–65 and Rozemond, “The Nature of the Mind”). The essential point for present purposes, however, is just that our access to the mind shows us the mind as it is, in high fidelity.

²⁹ See, e.g., *Essay* IV.3.6.

³⁰ *Essay* II.29.5. Interestingly, Leibniz dissented from such transparency, arguing instead that mental content has a complex structure not available to introspection. See Simmons, “Changing the Cartesian Mind.”

between outer and inner objects. Thus, Gilbert Harman writes, “Look at a tree and try to turn your attention to intrinsic features of your visual experience. I predict you will find that the only features there to turn your attention to will be features of the presented tree.”³¹ This is tendentiously put, because the proponent of an inward theory might just as well say that the only thing we can attend to is the experience, which we mistakenly suppose to acquaint us with outward features of things. But what seems hard to deny is the impossibility of the sort of “turning” Harman asks us to attempt. There is no “reveal codes” option in our perceptual browser that allows us to go from the things themselves to the underlying raw experience. Hence, we must choose between an outward and an inward theory of perception.

There have been occasional attempts to show that this sort of turning from the outward to the inward *is* possible—not that some sort of abstruse meditative process might suddenly reveal the raw code of experience, but that experience from the start contains both sorts of elements.³² Yet even if this could be made plausible, there is a further obstacle in the present context in identifying some sort of temperate compromise view on which we are acquainted with both inner and outer states. The trouble is that both sides, at least tacitly, are committed to the ideal of sensation in high fidelity, such that the senses show us something of the nature of the world around us. But part of the lesson of diaphanousness is that our experience, no matter how we attend to it, is homogeneous in character. Perhaps it acquaints us with the world, or perhaps with our minds. But it would take a very strange theory to suppose that it does both. Now, in fact, there have occasionally been such views. Berkeley, for instance, could think that sensation worked in high fidelity both inside and outside, showing us both the nature of our inner ideas and the nature of external reality, the divine ideas. Since the world is just minds and ideas, all the way through, he could have things both ways, and take himself to have answered the skeptic once and for all. A very different but equally strange case is that of William Crathorn, from the fourteenth century. He thought that representation requires literal likeness, so that, for instance, our perception of color requires that the mind itself becomes colored. This bizarre view led him to become one of the very few pre-seventeenth-century philosophers to suppose that perception immediately acquaints us with our inner states.³³ But for Crathorn—just like Berkeley turned inside out—this was quite unproblematic because in showing us inward things in high fidelity, it could at the same time show us outward things in high fidelity.

³¹ “The Intrinsic Quality of Experience,” p. 39. Compare Moore, in note 7 above.

³² For arguments of this sort see Loar; “Transparent Experience,” Nida-Rümelin; “Transparency of Experience,” and Horgan and Kriegel, “Phenomenal Epistemology.” Compare the critical discussion in Tye, *Consciousness Revisited*, ch. 1.

³³ See the translation in Pasnau, *Cambridge Translations*, ch. 10.

The bizarreness of these precedents helps make clear why no one today is likely to suppose that the senses acquaint us with both inner and outer reality. Either the senses are showing us the things themselves or they are showing us our ideas of things. As William James once put it, "...the whole philosophy of perception from Democritus's time downwards has been just one long wrangle over the paradox that what is evidently one reality should be in two places at once, both in outer space and in a person's mind."³⁴ James's neutral monism is an attempt to make sense of the seemingly impossible idea that appearances might actually be in two places at once, outside and inside. Almost no one since Bertrand Russell has been able to take this idea seriously.³⁵ But though inward and outward realism do seem to be exclusive, they are not exhaustive. The possibility remains that both sides might be the victims of a philosophical psychosis, inasmuch as the senses acquaint us with neither inside nor outside reality. This is the view that I will defend in Part Two.

Part Two: History Repeats Itself

13. *Perceiving Zombie Style*

In a recent paper, Mark Johnston wonders why we have phenomenal experience at all. Why not just perceive like a zombie? Johnston regards it as a "deep mistake" to suppose that phenomenal experience might be dispensable, and calls on epistemologists to answer his zombie challenge.³⁶ But it seems to me we ought not to accept this challenge, at least as it concerns the philosophy of perception, and that we ought instead to admit that zombie perceivers, under the right conditions, would be in just as good a position as we are to grasp things as they are.

Of course, 'zombie' here is used in a technical philosophical sense, to describe someone who functions in an entirely normal way, detecting the environment just as well as normal human beings, but without having any conscious experience of so doing. In fact, within a very limited domain, there are real-world cases of perceiving zombie style, where

³⁴ William James, "Does 'Consciousness' Exist?" in *Essays*, p. 11.

³⁵ For the history of neutral monism, see, e.g., Gary Hatfield, "Sense-Data and the Mind-Body Problem."

³⁶ Johnston, "On a Neglected Epistemic Virtue," p. 166. Johnston is responding, in part, to Jack Lyons, *Perception and Basic Beliefs*. Both Lyons and Johnston are focused on epistemic issues more broadly, rather than on the narrow problem of perception with which I am concerned. So I need not take a side on whether Lyons is right to think that epistemic justification might come just as easily without phenomenal experience, or whether Johnston has successfully identified some epistemic advantages to conscious perception. I need deny only those advantages that concern showing us things as they are, in high fidelity.

brain damage has left people incapable of conscious visual experience, but still curiously able to form reliably true beliefs about the world on the basis of their remaining visual faculties. Such real-world cases of so-called “blindsight” give their possessors only the most tenuous ability to engage in visual perception, but philosophers customarily weave this thread of verisimilitude into the full-blown thought experiment of zombie perception, or “superblindsight,” where the agent is able to navigate just as well as ordinary agents, reliably detecting shape, distance, and color, but without any of the phenomenal experience that comes through ordinary visual perception. Such an agent reliably detects the presence of visual qualities just as well as we do, and on that basis recognizes objects just as well as we do, but has no experience of what it is like to see such qualities and objects.³⁷

Could there even be sensory perception without experience? I am not concerned with how we *label* such a thing, but there is nothing at all exotic about the possibility of information’s simply coming into our mind without any associated phenomenology. Consider, for instance, the way we recollect proper names. Here zombie memory is the normal state of affairs, inasmuch as there is virtually no phenomenology associated with the process. If you ask me to name the neighbors whose homes surround my own, I start reciting: Pat, Doug, Dave, Judy, and so on. These names just come to me, without any further qualitative inner feel. In a normal case of this sort, I trust the process absolutely, just as I trust vision in normal cases, but whereas vision works via phenomenal experience, memory simply delivers the names. There is, so far as I am consciously aware, nothing more to it. The names just show up. (Or sometimes they don’t, and in that case too there is no phenomenology, and so we speak then of our mind’s being blank.) Such memory is linguistic rather than perceptual. If you ask me what Judy looks like, I can visualize her face, and here we have phenomenology of a kind not entirely unlike that of normal visual experience. But when the case is restricted to linguistic memory, we have something like zombie perception as I am conceiving of it: the information just comes to you, when you seek it, but without any further qualitative feel. Of course, it would take a considerable array of such information to yield the rich content furnished by perception. To count as a superblindsighted perception of a bear, for instance, it would not be enough just to have words ‘brown bear’ pop

³⁷ On the actual condition of blindsight, see Weiskrantz, *Blindsight*. On superblindsight, see, e.g., Tye, *Ten Problems*, pp. 19–21 and 142–43. Tye stresses the representational differences between ordinary perception and superblindsight, as he must to defend a representational theory of consciousness (see note 13 above). I can readily accept these points, since I by no means wish to claim that superblindsighters would be representationally identical. As for zombies, different philosophical contexts require more or less elaborate accounts of their character. Nothing here turns on such elaborations. In particular, I do not assume that they are physical or even functional duplicates.

into my head. Moreover, for all I know, insuperable design difficulties would preclude any system that attempted to furnish the content of perceptual experience without the experience. No doubt, our familiar form of conscious perception is an elegant engineering solution. But for my purposes, all that is necessary is the thought experiment.

14. *Phenomenal Shifts*

If the very coherence of zombie perception (or superblindsight) seems doubtful, then I can illustrate my point in another, less contentious way, by considering familiar examples of phenomenal shifts, where a perceiver's experiences are systematically transposed. Focusing again on the visual case, we could imagine a radical inversion of color experience or simply a subtle shift of the sort routinely produced by sunglasses. We could also consider a wholly different phenomenology associated with visual perception—think of echolocation, or try to imagine something even more exotic. Provided the experience continues reliably to track its objects, I claim that the experienter is in no worse position to grasp things as they are.³⁸

In fact, we are already quite familiar with radical phenomenal shifts, though we do not think of them as such. I can, for instance, perceive the roughness of a surface by seeing it, feeling it, or hearing it (if something is rubbed against it). The thing in the world is the same, but the phenomenal experiences are of course utterly different across the three modalities. All three modalities are reliable, but which one captures the world as it is, in high fidelity? In different circumstances, it is easy to imagine one or another modality yielding better information about texture. But there is nothing about any of these *experiences*, as such, that reveals features of the surface. We know what it is like, for instance, to rub one's hand quickly across a rough surface. Is the surface like the experience?

When it comes to the primary qualities—the geometric–kinetic properties—it seems all too easy to establish that phenomenal experience gives us no special access to how things are. Since all these properties can be perceived through multiple sensory modalities, there should be no temptation to think that any particular modality, such as vision, somehow reveals these qualities. After all, it is obvious that someone blind might understand shape and motion just as well. The hard cases, then, concern the secondary qualities, each tied to its own sensory modality, for here is where there has historically been the temptation to suppose that the very character of the experience reveals the nature of its objects. Here, then, is where the thought

³⁸ Such cases go back to Locke, *Essay* II.32.15. Again, it makes no difference for my purposes whether such transpositions can preserve physical or even functional equivalence. Anyone doubtful about the very cogency of such cases can stick with the example of sunglasses.

experiment is required: if we imagine the experience shifting, or ceasing to exist entirely—while reliability of tracking is preserved—would anything necessarily be lost?

15. *Phenomenal Antirealism*

The question concerns not just whether the senses show us anything in high fidelity, but how the phenomenal character contributes. Presumably, somehow or other, it is *in virtue* of the phenomenal character that the senses show us what they do, with however much reliability and fidelity there happens to be.³⁹ But the question before us is whether there is something about the qualitative character of experience that itself captures how things are—as if we could say that colors in the world are just as they seem to be, or that there is something in the mind that is just as it seems to be. This way of putting the point, however, takes us back to the misleading seventeenth-century caricature of Aristotelian outward realism (§10), with its alleged reduplication of phenomenal qualities, as if there were both perceptual seemings and something more “just like” the seemings. To avoid such absurdities, we need to insist on the distinction between reliability and fidelity, and then say that for the phenomenal realist there is something that the experience reveals in high fidelity, either in mind or world. For the outward phenomenal realist, it will be features of the world that experience reveals (at least in ordinary, veridical cases), whereas for the inward realist the phenomenal character will reveal a feature of the mind. On many such views, the phenomenal character is *identified* with a property of either mind or world, which neatly avoids the reduplication problem, but here I mean to speak more inclusively, and allow within the scope of realism any view on which the very having of an experience, in virtue of its phenomenal character, shows us something in high fidelity. The experience, in short, reveals something.⁴⁰

Rejecting such dreams of revelation, we should instead be phenomenal antirealists, and allow that perception’s fidelity, to whatever extent it obtains, does not depend on the contingent features of its phe-

³⁹ In fact, not everyone accepts that sensory representation occurs in virtue of phenomenal character. For discussion, see Cassam in Campbell and Cassam, *Berkeley’s Puzzle*, pp. 195–98.

⁴⁰ Compare phenomenal realism, as here understood, with Howard Robinson’s Phenomenal Principle: “If there sensibly appears to a subject to be something which possesses a particular sensible quality then there is something of which the subject is aware which does possess that sensible quality” (*Perception*, p. 32). Rejecting phenomenal realism makes it easy to reject the Phenomenal Principle, which is a good thing because it rids us of the argument from illusion. But compared to the Phenomenal Principle, phenomenal realism is a far more tempting doctrine because it requires us to suppose only that experience itself, somehow or somewhere, ordinarily reveals something of how things are.

nomenology. So to the old and familiar question—Do the senses reveal internal or external reality?—I counsel that we say *neither*. For all the good phenomenal experience does us, we might as well be blind-sighted. Plenty of recent work in the philosophy of perception might be read as sympathetic to this conclusion,⁴¹ but even so the claim needs articulation and defense because the whole history of the subject, including a great deal of recent literature, takes for granted one or another form of phenomenal realism. Indeed, I will now argue that current discussions often just recapitulate that history at a higher level of abstraction.

16. *From Concreta to Abstracta*

The history lesson of Part I went up to the eighteenth century, far enough to contrast the outward phenomenal realism of the scholastics with the inward phenomenal realism of Descartes and others. Phenomenal realisms of both varieties, though poles apart in their orientation, have at least this much in common: they take the objects revealed by experience to be concrete features of reality. If ‘Aristotelian realism’ is to serve as a term of art in this domain, it is best thought of as holding that phenomenal experience reveals the nature of ordinary qualities in the material world—i.e., that the color, heat, flavors etc. revealed by experience are among the fundamental physical features of reality. Similarly, Cartesian realism takes phenomenal experience to reveal the fundamental nature of the mind itself, an independent substance with its own robust causal powers. Whereas Aristotelians had supposed that one could understand the soul only by working from the outside in, the startling conclusion of Descartes’s Second Meditation, as announced in its title, is that “the mind is better known than the body.” Still, each in its own way, these two kinds of phenomenal realism are both attempting to satisfy the ideal of revelation in high fidelity: that one way or another, somewhere or other, sensory experience reveals the nature of what fundamentally exists.

After Descartes, Aristotelian outward realism quickly came to seem naïve. With the rise of modern psychology and neuroscience, Cartesian inward realism came to seem equally naïve. So one might have expected the story to end. After all, the new science was broadly right

⁴¹ I have in mind work in the tradition of Armstrong, Dretske, Lewis, Lycan, and (early) Tye. Perhaps the most explicit case for the sort of view I am advancing is Derk Pereboom, *Consciousness and the Prospects of Physicalism*. But Pereboom’s focus is on the problem of consciousness, and he wants to use (what I call) phenomenal antirealism as a solution to the knowledge argument and explanatory-gap argument for dualism. This is no part of my agenda; indeed, I am doubtful whether such an argument can be made, inasmuch as, one way or another, there is no getting around the reality of phenomenal experience, which is where the trouble for physicalism (allegedly) lies.

in its claims about the sensible qualities, even if in some cases—especially color—it would not be until the twentieth century that the details were properly understood. And who could continue to suppose, in light of the emerging brain sciences, that experience reveals anything about the mind? Hence, one might have expected that phenomenal antirealism would carry the day, and that the ideal of revelation in high fidelity would be abandoned as yet another casualty in the long, slow decline of our epistemic ambitions.

Yet the story did not end there. Instead, even while granting the scientific accounts that had made the various forms of phenomenal realism seem untenable, philosophers began to postulate metaphysical entities, beyond the ambit of science, that might serve as the *revelata* of perceptual experience. An early example is the sense datum of Moore and Russell. The commitment to phenomenal realism is clear in Russell's characterization of a color sense datum:

The particular shade of colour that I am seeing may have many things said about it—I may say that it is brown, that it is rather dark, and so on. But such statements, though they make me know truths *about* the colour, do not make me know the colour itself any better than I did before: so far as concerns knowledge of the colour itself, as opposed to knowledge of truths about it, I know the colour perfectly and completely when I see it, and no further knowledge of it itself is even theoretically possible.⁴²

Colors, on this view, have a nature, and that nature is revealed by experience, thus making good on the Aristotelian idea that one who lacks a sense must lack some corresponding knowledge. But yet this is not Aristotelian realism, because sense data are explicitly distinguished from physical reality. Nor is it Cartesian inward realism, because sense data are also wholly distinct from the mind. They are instead abstracta inhabiting their own independent realm, designed specifically to safeguard phenomenal realism.

17. Modern Outward Realism

Hardly anyone now defends sense data in their original form. Instead, it has seemed to most that, if such abstracta are going to play a role in the philosophy of perception, they might as well be conceived as features of either minds or bodies. Why postulate some third domain? One way forward at this point is to champion the return of something like Aristotelian realism, but now purified of its antiquated physics and recast in an abstractly metaphysical form. This is the view we must take, argues Mark Johnston, if we are to locate colors (e.g.) out in the

⁴² *Problems of Philosophy*, pp. 46–47.

world: "If external things are colored, then their colors must be tightly connected to the distinctive qualities which visual awareness alone reveals."⁴³ Similarly, Stephen Yablo contends that "yellowness is the intrinsic, categorical feature that objects *appear* to have when they look yellow to us."⁴⁴ And Michael Tye has recently urged that we should identify phenomenal character with the qualities of bodies: "the phenomenal character of the experience of red in a case of veridical perception is a feature of the surface the perceiver sees. The surface itself has the phenomenal character."⁴⁵

None of these post-Aristotelian outward realists wishes to repudiate modern science. Instead, they think that the philosophy of perception demands something over and above the familiar reductionism of physics. Thus, John Campbell asserts that "reality can be described 'at many levels.'"⁴⁶ According to Colin McGinn, "we must enrich our ontology by adding an extra layer for the colors. We need mental and physical properties and *then* colors."⁴⁷ Of course, such metaphysical extravagances are a significant cost to the theory, and it is easy to see that there will be further costs when it comes to accounting for perceptual illusion and even ordinary intersubjective variation. *Whose* experience will reveal how bodies are, or will there be distinct qualities for every which way it is like to perceive?⁴⁸

⁴³ "Better than Mere Knowledge?" p. 264.

⁴⁴ "Singling Out Properties," p. 486. Yablo's discussion is notable for resisting the very common tendency to conflate claims about our color concepts with claims about color itself: "the connection between the way a thing is supposed to be conceived, and the way it is, are complicated" (p. 493). Compare how Cassam rejects as "extreme" the view that "when it comes to *knowledge of the colours or grasp of colour concepts* someone with no colour vision need be no worse off than someone with colour vision" (Campbell and Cassam, *Berkeley's Puzzle*, p. 148, emphasis added). I am ready to grant that our *concepts* of color are mixed up with phenomenal character. That's a large part of the reason we tend to be so badly confused about these subjects.

⁴⁵ *Consciousness Revisited*, p. 120. See too Campbell: "the qualitative character of the experience is the qualitative character of the object itself" (*Berkeley's Puzzle*, p. 33).

⁴⁶ *Berkeley's Puzzle*, p. 3.

⁴⁷ "Another Look at Color," p. 548. Compare Yablo, "Singling Out Properties," p. 486: "naïve redness, if it exists, is not a property that scientists have much truck with."

⁴⁸ For worries about intersubjective variation, see, e.g., Byrne and Hilbert, "Color Primitivism," pp. 94–95 and Chalmers, "Perception and the Fall from Eden," pp. 66–69. For a thorough recent critical discussion, see Cassam, in Campbell and Cassam, *Berkeley's Puzzle*, ch. 7.

Robert Audi has pushed me on what the denier of outward phenomenal realism will say about aesthetic properties. This question points more generally to the possibility of there being response-dependent features of the world that can be grasped only through certain sorts of phenomenal experiences. My concern at present is with the traditional sensible qualities; I am arguing that at least *these* are not like that. But might there be other features of the world that zombie perceivers and the like are precluded from grasping? I am inclined to say that it would not be anything about the external world that is being missed in such cases. But my phenomenal antirealism could be qualified, without any great damage to the main line of thought, to leave room for special cases such as the aesthetic.

18. *Modern Inward Realism*

If these costs seem too great, then the obvious way to save phenomenal realism, without having recourse to a third realm of sense data, is to lodge the *revelata* of experience within the mind. This pole of the debate takes the phenomenal character of an experience to reveal something about what the mind is like. One way to defend such a view is simply to return to Cartesian dualism and insist that the very nature of the mind is transparently available to introspection. This, I hope most will agree, is no more attractive today than is a return to Aristotelian physics. But one need not be a dualist to embrace modern inward realism. Consider, for instance, David Papineau's 2013 Presidential Address to the Aristotelian Society:

From my perspective, then, our conscious sensory properties, the ones we are aware of when we introspect, are intrinsic properties of us, and metaphysically quite distinct from the properties of objects that successful sensory experience enables us to perceive. The 'blueness' that I know to be present when I introspect my sense experience is a property of me, not of the object out there. Of course there is a perfectly good sense in which I perceive the external blueness of my shirt itself in the good case. But I so perceive that external blueness in virtue of having a different property of conscious sensory 'blueness.'⁴⁹

Papineau is no dualist, yet he endorses the idea that "when we introspect" we are aware of "intrinsic properties of us." Evidently, these intrinsic properties are not brain states. Just as McGinn wants an "extra layer" for the colors, so Papineau seems to require an extra layer for conscious sensation. This allows him to suppose that perceptual experience—such as the experience of a blue shirt—reveals something about the mind. Such inward phenomenal realism is commonplace in current discussions.⁵⁰

19. *The Resistibility of Inward Realism*

One might think that respectably modern inward phenomenal realism is commonplace just because it is, in fact, quite irrefutable. After

⁴⁹ "Sensory Experience and Representational Properties," p. 26.

⁵⁰ See, e.g., Speaks, *The Phenomenal and the Representational*, who favors the phrase "phenomenal properties." According to Coates, "phenomenal qualities present in perceptual experience belong to *inner states* of the experiencing subject. They are not located in the non-sentient world, but are properties that belong to the mind or brain" ("Projection, Revelation, and the Function of Perception," p. 181). For a modern example of Cartesian inward realism, see Robinson, *Perception*.

all, what could be more platitudinous than to claim that, when we perceive, the character of the perception is a feature of the mind? A quick way to see that such claims cannot be wholly platitudinous is to note that they must be rejected by the tribe of outward realists. After all, if the character of visual experience reveals what colors in the world are like, it can hardly reveal what the mind is like as well—let alone just *be* a feature of the mind. To have it both ways here would require the sort of absurd reduplication that the scholastics were charged with. Hence, for the outward realist, introspection—if there even is such a thing—does not reveal the mind's character. This, indeed, was meant to be a central lesson from the diaphanousness of perception.⁵¹

If it seems counterintuitive to deny that we are capable of a kind of introspection that yields information about the mind, this is just because we have not yet let go of a distinctively seventeenth-century conception of these issues. As we have seen, philosophers of that era had a respectable reason for turning perception inward, inasmuch as the new science had made a persuasive case for reductive corpuscularianism out in the world, but had not yet made that case for the mind. Before the era of Cartesian “ideas” and Lockean “reflection,” it was generally supposed that knowledge of the mind was vastly more difficult than knowledge of bodies. As Aristotle warned at the start of the *De anima*, “grasping anything trustworthy concerning the soul is completely and in every way among the most difficult of affairs.”⁵² Once the new science called into question the relationship between sensation and reality, the soul looked, for a while, to be the safer domain in which to locate sensory fidelity. But now that the mind seems to be just another part of physical reality, special only in virtue of its complexity, there is no reason to make that inward turn. The same considerations that led seventeenth-century authors to reject outward phenomenal realism give us reason today to reject inward phenomenal realism.

Of course, the mind does have experiences, and there is something it is like to have them. It is no part of my project to deny these plain phenomenal facts. But then, one may wonder, how can it fail to be the case that, in being conscious of these experiences, we learn

⁵¹ For vigorous challenges to the power of introspection, see Pereboom *Consciousness and the Prospects of Physicalism* and Dretske, “How Do You Know You Are Not a Zombie?” Mark Johnston exemplifies how a committed outward realist will reject inward realism. He denies, for instance, that there is any such thing as a visual field (“There Are No Visual Fields”). More generally, he writes that “There are no qualia. It is ordinary qualities and complexes involving them that account for the so-called subjective character of experience” (Johnston “The Obscure Object of Hallucination,” p. 146). See too Campbell: “In ordinary perceptual experience, there are only the qualitative characteristics of the objects in our surroundings. . . . To suppose that there is some special set of qualitative characteristics of perceptual experience itself . . . is the fundamental mistake. . . .” (*Berkeley's Puzzle*, p. 23).

⁵² *De anima* I.1, 402a10-11.

something about the mind? Granted, in having a conscious perceptual experience, I come to know that I am having such an experience, and I come to know its phenomenal feel. But there is no reason to suppose that this shows me more about the mind than it does about the external events that, after all, are making their own causal contribution to the sensation. As J. L. Austin put it, "I am not disclosing a fact about *myself*, but about petrol, when I say that petrol looks like water."⁵³ It is easy to slide from *experience* to *phenomenal character* to *phenomenal qualities*, at which point it becomes natural to look for some subject in which those qualities are instantiated.⁵⁴ But nothing requires us to suppose that the character of our experiences—what it feels like to have them—is a property of anything. Or, setting aside obscure talk of *properties*, why think that these phenomenal events reveal anything about either world or mind? Of course, we can agree the senses reliably track many things. But what do they show us with fidelity? Why think they reveal anything, in either mind or world? Our abiding commitment to one or another form of phenomenal realism, inward or outward, seems to arise from our inability to abandon the old epistemic ideal of perception in high fidelity.

Still, one may respond, once the undeniable fact of phenomenal experience is allowed, there must be something those experiences are like, and so we can call this its character, and then speak of the determinate qualities of that character. In learning about that character, are we not learning something about the mind? I certainly agree that, in having such experiences, we learn *something* about the mind: we learn that the mind is capable of producing sensations like *this*. So here is something that zombies and the blindsighted would not know. But do I thereby learn anything about the mind itself? Compare: I may know the characteristic cry of a Blue Jay, and thus know quite a lot about the acoustic profile of that call. But this by itself shows me little about the bird, other than the bare fact that it is capable of making such a sound. Hearing the cry is a reliable guide to the presence

⁵³ *Sense and Sensibilia*, p. 43.

⁵⁴ For an example of the slide in action, consider the very start of Neil Mehta's recent argument for outward phenomenal realism: "Suppose I'm at the zoo. I observe a hulking gray rhinoceros. . . . I then muse . . . about the nature of my current visual experience. I introspect 'what it's like' for me to see the meandering rhino. In doing so, I become aware of certain properties — phenomenal qualities. . . . These phenomenal qualities constitute what my experience is like, so by gaining awareness of them I am positioned to know what my experience is like. Where are these phenomenal qualities instantiated?" ("Beyond Transparency," p. 1). The main options turn out to be *in the mind* and *outside the mind*. Mehta does flag the possibility that "no phenomenal qualities are instantiated," but he dismisses this without argument as "straightforwardly experientially extremist," apparently assimilating such views to the denial of conscious experience itself. For an explicit defense of treating phenomenal properties as properties of the person who has them, see Speaks, *The Phenomenal and the Representational* ch. 1. Speaks acknowledges, however, that this way of proceeding makes it harder to make inferences from phenomenology to these person-level properties (p. 4).

of the bird, from which we may be able to infer various things about the bird and its environment, but all by itself the cry reveals nothing of the bird itself with any sort of fidelity.

Hence again, as far as grasping our own minds is concerned, we might as well be zombies. Of course, if we were zombies, then by definition there would be no phenomenal qualities to be missed out on. But to see the intended point, imagine a zombie amidst ordinary human beings. Would the zombie's lack of phenomenal experience hinder its ability to understand ordinary human minds? No, I claim, because the phenomenology is too superficial—like the cry of the Blue Jay—to be useful in coming to know the mind. Our intimate familiarity with our inner experiences fails to shed light on even the most basic questions, beginning with whether or not the mind is material. Thomas Reid made the analogous point about the inward theories of his own day: “if ideas be not a mere fiction, they must be, of all objects of human knowledge, the things we have best access to know, and to be acquainted with; yet there is nothing about which men differ so much.”⁵⁵ Again, the aim is not to deny the phenomenology, but to deny that the phenomenology gives us access to some inner domain of ideas or properties. For all the value that phenomenal experience brings to our understanding of the mind itself, we might as well be blindsighted.⁵⁶

20. *The Notorious Veil*

If we start with the idealizing assumption that phenomenal experience must reveal *something*, then it is easy to sympathize with the desire to locate these *revelata* within the mind. That seems, at first glance, far less offensive to our modern scientific sensibilities. Yet once we reflect on the consequences of this sort of inward turn, we can see why so many have fought so strenuously to avoid it, even at the cost of filling outward reality with abstract sensibilia. For if what the senses are showing us, with the greatest fidelity, are features of our mind, then there is no escaping the conclusion that the mind itself is, in some sense, the immediate object of perception. And this of course is just what the great early masters of the inward turn

⁵⁵ *Essays on Intellectual Powers* II.14 (*Works* I:305a).

⁵⁶ Along similar lines, David Lewis rejects what he calls the Identification Thesis, according to which, “when I have an experience with quale Q, the knowledge I thereby gain reveals the essence of Q: a property of Q such that, necessarily, Q has it and nothing else does” (“Should A Materialist Believe in Qualia?” p. 328). For Lewis, then, although we of course have experiences, there are no mental properties that these experiences reveal. He claims categorically that “A materialist cannot accept the Identification Thesis” (p. 329). But it turns out to be pretty easy to be both a materialist and an inward phenomenal realist—one just needs to posit another “level” within the mind that can both satisfy the Identification Thesis and yet not actually do anything that might disrupt the materialist's applicart.

notoriously claimed. Descartes, for instance, defined 'idea' as "whatever is immediately perceived by the mind,"⁵⁷ and Locke held that "the mind, in all its thoughts and reasonings, has no other immediate object but its own ideas."⁵⁸ Why they should be so insistent on this manifestly dubious doctrine is something that neither author makes very clear, but we can see from our present perspective why the view is forced upon them. Aristotelian outward realism, with its commitment to high-fidelity perception of concrete sensible qualities in the world, left no room to doubt that these external qualities are the primary and proper objects of sensation. But when that scientific and metaphysical program collapsed, it suddenly seemed just obvious that what the senses were showing us, firstly and most vividly, was not the outer world but rather the inner mind. Given the assumptions about mind and world to which they were committed, there was no other reasonable conclusion.

Although the debate today has shifted from the concrete to the abstract, the dialectic remains much the same. If the phenomenal character of experience reveals features of the mind rather than the world, then there is a very strong sense in which it is the mind we perceive. We can quibble over just how to put this point, and in particular whether 'perceive' is quite the right word to use, but one way or another the veil has descended. The senses will have turned out to be most reliably and faithfully attuned to the mind itself rather than to the outer world. If this seems obviously wrongheaded, then the obvious solution is to insist that, in fact, it is that outer world that the sensory experience reveals in high fidelity. Thus, Michael Tye has recently embraced outward realism on the grounds that "If ordinary objects merely lie behind conscious experiences, then a veil of perception has been erected."⁵⁹ This seems quite right—provided we must choose between one or another form of realism. For if we assume that phenomenal experience reveals *something*, then philosophical reflection will inescapably lead to the conclusion that *this something*—wherever it may be—is what we most properly perceive. After all, whatever exactly the relationship is between representational content and phenomenal character, it is hard to deny that the character plays a critical role in the content. Pretheoretically, we are all inclined to accept the diaphanous feel of perceptual experience, and allow that the senses show us the outside world in high fidelity. But if it turns out to be our inner states that sensation actually reveals most faithfully, then theoretical reflection should cause us to reverse course and treat that inward reality as the proper object of perception. Not

⁵⁷ *Meditations*, Third Replies, VII:181. See also the passages quoted above at notes 3–5.

⁵⁸ *Essay* IV.1.1.

⁵⁹ "Transparency, Qualia Realism and Representationalism," p. 55. Compare Campbell, who charges that on rival views "it looks as though we must in fact be confined to knowledge of sensation itself" (*Berkeley's Puzzle*, p. 24).

of course that we would then fail to track external objects with considerable reliability. But we would do so through a veil.

This familiar dialectic gets started, however, only on the assumption that we must be phenomenal realists of one sort or another. Sober science and metaphysics pushes us toward inward realism, until we notice that this has the implication that the senses grasp the mind more faithfully than they do the outside world. Fleeing such absurdity, we loosen our metaphysical imaginations and find a way to relocate sensible qualities out into the world, just where they seem to be. None of this maneuvering is necessary, however, if we allow from the start the possibility of phenomenal antirealism. For once we see that we can just give up the misguided ideal of sensory revelation in high fidelity, we can avoid the veil of perception without recourse to an ontology of external *revelata*.

21. "Direct" Realism

The phenomenal antirealist declines to choose between one or another dubious form of realism, inward or outward. In taking that stand, however, the question arises of whether such antirealism is consistent with ordinary perceptual realism—that is, with treating mind-independent external things as the objects of sensation. This is, of course, the very most central question in the philosophy of perception, and a great many ingenious attempts have been made to shed light on it, with some attempting to make progress by analyzing the notions of *directness* and *immediacy*, others seeking to identify the precise causal relationship that settles these matters, still others appealing to a technical notion of information, and so forth.

We would do better to think about these issues in light of the notion of fidelity. Accounts in terms of one or another causal notion have to grapple with the obvious fact that, along any one causal chain from external object to perceiver, the senses may reliably track various features of reality. But even though the senses may be a *reliable* guide to multiple aspects of reality, they cannot—or so I have argued—be an equally *faithful* guide to more than one thing. So here we do have to choose, and the choice we make at this point determines what we should say the senses have as their most proper objects. Inward phenomenal realists are driven—willingly or not—to conclude that the “immediate” objects of perception must be internal because this is what the senses show us in high fidelity. The “immediacy” here, however, has nothing to do with causal proximity. It turns instead on their conviction that the senses fail to show us the outside world as it is, but do show us something of the inner world as it is. To be sure, one can insist on the undisputed fact that perceptual attention is ordinarily directed outward, and this is what seems to license Papineau’s remark (as above) that “there is a perfectly good sense in

which I perceive the external blueness of my shirt itself in the good case.” Yet Papineau’s inward phenomenal realism guarantees that what the senses show us with the greatest fidelity is the inward properties of the mind. This unhappy result is what drives the outward phenomenal realist’s rejoinder that the senses reveal *external* things in high fidelity, and so the game continues.

But what if we are not phenomenal realists of any kind? For the antirealist, can external things be the “immediate” objects of perception? Will perception have *any* objects? In fact, there is no real difficulty here. Consider again the imaginary case of the superblind-sighted. There is no reason to doubt that they would immediately grasp external objects. They may not see anything in high fidelity, but to the extent they would acquire visual information about how things are, it is external things that they would apprehend best by far. Something similar holds for ordinary perception, according to phenomenal antirealism. The senses can be used to track reliably the presence of a great many things, inward and outward. But what do they show us in fidelity? Not nearly as much as philosophers have tenaciously hoped. Still, if the question arises of what counts first and foremost as the objects of sensation, the answer must clearly be external things because here is where the senses allow us to locate objects, to detect their shapes and motions, and so on.⁶⁰ As Descartes and his contemporaries taught us, this hardly counts as high fidelity, but fidelity comes in degrees, and there is much the senses do get right about outward objects. Comparatively speaking, they do vastly better here than they do with regard to our mental states. For if we ask ourselves what sensory experience shows us about the mind and its qualities, the sad truth is that it reveals virtually nothing.

22. *Unweaving the Veil*

This last point is both critical and easily misunderstood. To escape the veil, it is critical that the senses show us nothing other than the external world in comparable fidelity. Here, the Blue Jay and its song will no longer do as an example, because although the song is not a property of the bird, the song itself is an independent object of perception. The phenomenal antirealist must take a firmer line than this, and insist that there is nothing between mind and external objects that the senses show us with fidelity. But now again one may wonder: is this not to deny the very reality of conscious experience? Am I one

⁶⁰ The line of argument advanced here might be put in terms of information, along the lines of Dretske’s *Knowledge and the Flow of Information*. But doing so would require somehow building the notion of fidelity into the theory—in effect, privileging information that shows us more about how things are. Another attempt to link the objects of perception to informational content is Michael Huemer’s notion of content satisfaction (*Skepticism and the Veil of Perception*, pp. 60–64).

of those philosophers who, as Galen Strawson has recently put it, “claim to be realists about experience while covertly denying its existence”?⁶¹ No, I am just as willing as anyone to acknowledge the reality of experience with all of its phenomenal character. It is just that I deny that this experience shows us anything on the inward side. As long as I adhere to this line, the veil cannot even be woven. For the only material available, on the story I am telling, is the bare experience itself. But the experience is what shows us external things—not in the highest fidelity, to be sure, but at least in sufficient detail to learn quite a lot about how things are. If this is how the story goes, then how can one reasonably claim that the experience *itself* veils outward reality? The experience, after all, is what shows us outward reality—and shows us nothing else. The veil, if there is one, would be some sort of object lying in between the experience and external reality. But this is precisely what the present story denies.

The critical move, then, is to take a firm line against any sort of creeping inward phenomenal realism. Compare Strawson’s own efforts at squaring “real direct realism” with “real realism about experience.” Can he have it both ways? He can do so, I claim, only if he is willing to accept that perceptual experience reveals nothing about inward reality. But this is a line that Strawson repeatedly crosses. He writes, for instance, that “the intrinsic nature of the physical is fundamentally more than anything revealed by physics and neurophysiology,” and that this something more is “experience wholly realistically conceived,” something we apprehend through ordinary sensation: “experiencing the qualitative character of the sensation of blue is what our seeing the blueness of the sky is.”⁶² But if this is what “realism about experience” requires, then it is incompatible with “real direct realism.” For as soon as we take (e.g.) color experience to show us something of what the mind is like, we have fallen behind the veil, because now its seemingly diaphanous outward orientation faces competition from an inward object, and so to win that battle we need to postulate an ontology of outer sensible qualities that are as they seem to be even more than the mind is as it seems to be. All this is enough to drive anyone crazy. The correct therapy is just to recognize that nothing is quite as it seems. Still, we perceive the world, and we do pretty well by it.

23. *Historicizing Conclusion*

Our theorizing about perception over the centuries has swung back and forth between two poles. Either the mind shows us the outer

⁶¹ “Real Direct Realism,” p. 218.

⁶² “Real Direct Realism,” pp. 220, 239. See p. 218, where he says of experience that “the having is the knowing.”

world or it shows us the inner world. If one is untenable, then the other must be embraced, whatever the cost. The proper lesson to draw is that we need not choose because there is no reason to be a phenomenal realist of any kind. But although both sides are wrong, they are only half-wrong. For inasmuch as both parties to the dispute are antirealists with regard to the opposite pole, we can also say that each side is right when it insists that the senses *don't show us that*. Combine the half-right parts of their views, and what emerges is phenomenal antirealism.

Why resist this result and insist on sensory fidelity, whether inside or out? My suspicion is that we remain in the grip of the same monomania that drove our predecessors to construct their own elaborate metaphysics in the service of one or another irresistible epistemic ideal. This is, indeed, the original sin of philosophy. Plato wanted unerring knowledge,⁶³ and so, when he concluded that this could not be had in the material domain, he invented his own domain of eternal Forms. Aristotle thought such an epistemic ideal could be achieved *in rebus*, but to secure it there he needed to construct a metaphysics anchored by the immutable essences of things. Descartes mocked the scholastics for thinking that the external world is just as it seems to be, but then to achieve his own epistemic ideal he had to insist that our minds are just as they seem to be. Berkeley went one step further, imagining a world that is nothing but mind, a kind of idealism from which Kant strategically retreated, allowing a world beyond mind, but refusing to make any epistemic claims upon it.

And so it continues. Philosophy has its epistemic ideals—dreams of a perfect grasp of the world around us—which we bring into reach by reconstructing that world. We would do better to abandon these ideals, and confront the sober and sane reality of our precarious epistemic position. The bad news of the seventeenth century was that sensation fails to deliver the external world in high fidelity. The bad news of the twentieth was that sensation also fails to deliver the mind in high fidelity. As a result, science has turned out to be much more like theology than had been previously supposed: the first causes of things being themselves hidden, we must make inferences from their effects, through a mirror darkly. We should simply learn to live with that.

Acknowledgments

I have benefited greatly from extended discussions with audiences at the University of Nebraska Lincoln, the University of Notre Dame, and the University of Texas Austin, as well as from detailed comments by Michael Huemer. This paper is dedicated to my uncle, Robert O. Pasnau M.D.

⁶³ See *Theaetetus* 152c; *Republic* V, 477e.

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