## **UC Irvine**

## **UC Irvine Electronic Theses and Dissertations**

## **Title**

The Many Forms of Pluralism: Three Essays on the Medieval Unitarian/Pluralist Debate

## **Permalink**

https://escholarship.org/uc/item/8j9224sk

## **Author**

Dowd, Joseph Suk-Hwan

## **Publication Date**

2017

Peer reviewed|Thesis/dissertation

# UNIVERSITY OF CALIFORNIA, IRVINE

The Many Forms of Pluralism: Three Essays on the Medieval Unitarian/Pluralist Debate

DISSERTATION

submitted in partial satisfaction of the requirements for the degree of

DOCTOR OF PHILOSOPHY

in Philosophy

by

Joseph Suk-Hwan Dowd

Dissertation Committee: Associate Professor Casey Perin, Chair Associate Professor Sean Greenberg Assistant Professor Thomas M. Ward

# TABLE OF CONTENTS

	Page
ACKNOWLEDGMENTS	iii
CURRICULUM VITAE	iv
ABSTRACT OF THE DISSERTATION	v
INTRODUCTION	1
REFERENCES	14
CHAPTER 1: PINCUSHION PLURALISM AND NESTED PLURALISM	16
REFERENCES	45
CHAPTER 2: IS ARISTOTLE A UNITARIAN?	47
REFERENCES	78
CHAPTER 3: SOUL-PLURALISM AND MIND-BODY DUALISM IN OCKHAM	81
REFERENCES	113

## **ACKNOWLEDGMENTS**

I would like to thank my committee chair, Professor Casey Perin, for his support and patience throughout the dissertation-writing process. I also want to thank him for chairing my committee despite not being a scholar of medieval philosophy. Without his support, I would not have completed this doctoral program.

I would like to thank my committee members Associate Professor Sean Greenberg, who has offered extensive feedback on my writing, and Assistant Professor Thomas Ward, whose work on John Duns Scotus's hylomorphism has proved invaluable to my research.

In addition, I should thank Professor Niko Kolodny of the University of California, Berkeley, whose Introduction to Ethics class inspired me to study philosophy and whose engaging teaching style has served as a model for my own teaching.

I thank Mathesis Publications for permission to include significant portions of my article "Does Aristotle Believe in Essentially-Ensouled Matter?" in Chapter 2 of my dissertation.

## **CURRICULUM VITAE**

## Joseph Suk-Hwan Dowd

2009	B.A. in Philosophy and Religious Studies, University of California, Berkeley
2013	M.A. in Philosophy, University of California, Irvine
2011–16	Teaching Assistant, Department of Philosophy, University of California, Irvine
2017	Ph.D. in Philosophy, University of California, Irvine

## **PUBLICATIONS**

<sup>&</sup>quot;Aquinas on Demonic Obstinacy." *American Catholic Philosophical Quarterly* 89.4 (2015): 699–718.

<sup>&</sup>quot;Does Aristotle Believe in Essentially-Ensouled Matter?" *Ancient Philosophy* 35.1 (2015): 97–111.

<sup>&</sup>quot;Maximizing Dharma: Krsna's Consequentialism in the *Mahabharata*." *Praxis Journal of Philosophy* 3.1 (2011): 33–50.

## ABSTRACT OF THE DISSERTATION

The Many Forms of Pluralism: Three Essays on the Medieval Unitarian/Pluralist Debate

By

Joseph Suk-Hwan Dowd

Doctor of Philosophy in Philosophy

University of California, Irvine, 2017

Associate Professor Casey Perin, Chair

My dissertation consists of three essays on the medieval debate between pluralists (those who believe that a substance can have more than one substantial form) and unitarians (those who think that a substance can have only one substantial form). In the first essay, I argue—contrary to a common assumption in the secondary literature—that at least some medieval philosophers recognize two fundamentally different kinds of pluralism. I use the writings of Aquinas as my main example, arguing that he distinguishes two kinds of pluralism and takes the time to argue against both. In the second essay, I challenge the assumption, common both to Aquinas and to many more recent commentators, that Aristotle holds a unitarian view of living things. I show that Aristotle's view of living things might be categorized as pluralism, albeit a kind of pluralism that differs from that of medieval pluralists such as Scotus and Ockham. In the third essay, I argue that Ockham's arguments for pluralism presuppose a version of mind-body dualism that differs from both substance and property dualism. I show that this Ockhamist dualism avoids a common objection to mind-body dualism, namely that dualism implies a morally and/or metaphysically problematic division between certain beings and the rest of nature.

#### INTRODUCTION

A bronze statue consists of a piece of bronze with a statue-shape. The piece of bronze is potentially a statue, and the statue-shape makes the bronze into an actual statue. Aristotle¹ calls the piece of bronze the statue's "matter" and the statue-shape the statue's "form." For Aristotle, this distinction between matter and form applies to physical things in general: a physical thing consists of matter that is potentially that thing and a form that makes the matter actually that thing. Aristotle expresses this point by saying that matter stands to form as potentiality to actuality (*DA* 412a9). Present-day historians use the term "hylomorphism" (from the Greek words *hule*, "matter," and *morphe*, "form") to refer to Aristotle's analysis of things into matter and form. In discussions of hylomorphism, a thing composed of matter and form is often called a "matter-form composite" or simply a "composite."

Aristotle applies hylomorphism to living things. He says that a living thing's matter is its body and calls a living thing's form its "soul" (*DA* 412a20). For Aristotle, the word "soul" does not refer to a spiritual entity that merely inhabits the body and departs at death. Instead, the relationship between a living thing and its "soul" is like the relationship between a bronze statue and its shape: just as the shape is the property that makes bronze into a bronze statue, so the soul is the property (or collection of properties) that makes a living thing's matter into a living thing.

In the twelfth and thirteenth centuries, Aristotle's writings reentered Western

Europe through contact between Muslim scholars, who had preserved the writings during

<sup>&</sup>lt;sup>1</sup> In this Introduction, I cite Aristotle's works by title and Bekker number. I use the following abbreviations:

<sup>•</sup> DA - De anima

<sup>•</sup> Metaph. - Metaphysics

<sup>•</sup> Cat. - Categories

the early Middle Ages, and Western Christian scholars.<sup>2</sup> Translations began to circulate in the newly-founded universities of Paris and Oxford. From the thirteenth century onward, many if not most Western European philosophers accepted hylomorphism. In 1312, at the Council of Vienne, the Western Church declared it a doctrine that "the rational or intellective soul" is "the form of the human body" (quoted in Pasnau 2002, 160). From then until the Protestant Reformation, no Western Christian who wished to avoid the charge of heresy could openly reject hylomorphism, at least as applied to human beings.

We can understand hylomorphism's appeal by considering Thomas Aquinas's<sup>3</sup> endorsement of it in the thirteenth century. For Aquinas, hylomorphism is a welcome alternative to the idea that the intellect and the body are two separate substances. This idea, which the early medievals inherited from Plato, undermines a human being's unity. If Socrates's intellect (or "intellective soul") and his body are separate substances, Aquinas says, then

either it must be said that Socrates understands with his whole self (as Plato thought, saying that a human being is [only] his or her intellective soul) or it must be said that Socrates's intellect is a part of him. ... If his intellect were not his form, then it would be outside his essence, and thus Socrates's intellect would stand to the whole Socrates as mover to moved. ... If, however, Socrates is the whole constituted by his intellect's union with everything else that is [a part] of Socrates, and yet the

All translations are my own.

<sup>&</sup>lt;sup>2</sup> At the time, Christianity was divided into two main branches: the Western Church, overseen by the Bishop of Rome (that is, the pope), and the Eastern Church, which gave the Patriarch of Constantinople pride of place among bishops. Today's Roman Catholic Church is the successor to the medieval Western Church, while today's Eastern Orthodox Church is the successor to the medieval Eastern Church.

<sup>&</sup>lt;sup>3</sup> In citing Aquinas's works, I follow the editions in Alarcón 2013. I format citations as follows:

<sup>•</sup> *Quodlibet* I: "Q 1.2.3 co." = "Quodlibet I q. 2 a. 3 co."

<sup>•</sup> *Summa contra gentiles (SCG)*: "1.2.3" = "lib. 1 cap. 2 n. 3"

<sup>•</sup> Summa theologiae (ST): "1 2.3 arg. 4" = "I<sup>a</sup> q. 2 a. 3 arg. 4"

intellect is united to everything else that is [a part] of Socrates only as a mover [is united to what it moves], then Socrates would not be absolutely one thing.<sup>4</sup> (ST 1 76.1 co.)

In short, if intellect and body were separate substances, then a human being would be either just intellect ("Socrates understands with his whole self"), just body (Socrates's intellect "would be outside his essence"), or an aggregate of two substances, intellect and body, instead of one thing ("Socrates would not be absolutely one thing"). Hylomorphism avoids these supposed pitfalls: as Aristotle notes, hylomorphism entails that body and soul are not two separate things any more than wax and its shape are two separate things (*DA* 412b6–7).

In absorbing hylomorphism, medieval philosophers adopted a system of concepts related to matter and form that they regarded as either explicit or implicit in Aristotle's writings. Before I continue, let me briefly introduce the most fundamental of those concepts.

Perhaps the most important concept within medieval hylomorphism is that of substance. Aristotle gives an individual man and an individual horse as examples of substances (*Cat.* 2a12-14) and says that anything that is not a substance—for example, a quality or a relation—cannot exist apart from substances (*Cat.* 1a25). For example, a man's relation of fatherhood to his child cannot exist apart from the man and the child. Following Aristotle, Aquinas says that substances are what most truly exist: "What truly exists is

<sup>&</sup>lt;sup>4</sup> oportet dicere quod Socrates intelligit secundum se totum, sicut Plato posuit, dicens hominem esse animam intellectivam, aut oportet dicere quod intellectus sit aliqua pars Socratis. ... si intellectus non sit forma eius, sequitur quod sit praeter essentiam eius; et sic intellectus comparabitur ad totum Socratem sicut motor ad motum. ... Si vero Socrates est totum quod componitur ex unione intellectus ad reliqua quae sunt Socratis, et tamen intellectus non unitur aliis quae sunt Socratis nisi sicut motor; sequitur quod Socrates non sit unum simpliciter.

called a substance"<sup>5</sup> (*Q* 9.2.2 co.). Medieval philosophers disagree about what criteria a thing must meet in order to be a substance. For example, Aquinas thinks that anything consisting of more than one substance cannot itself be a single substance (*SCG* 2.56.7), whereas Aquinas's near-contemporary John Duns Scotus thinks that a substance can have many other substances as parts. For example, Scotus regards a human being as a substance but also regards bodily organs such as the heart and liver as substances (Cross 1998, 68–71; Ward 2014, 77). Aquinas and Scotus agree, however, that macroscopic living things such as human beings, oak trees, and horses are substances. For our purposes, the important point is that substances are concrete individual things such as living organisms. (Whether all concrete individual things are substances is a question I will not try to answer in this dissertation.)

Starting from the concept of substance, medieval hylomorphists distinguish two kinds of form—substantial forms and accidental forms—and postulate a kind of matter called prime matter. Strip all forms from matter, and you arrive at prime matter. Prime matter is the basic stuff from which all material things are made. A substantial form combines with matter to make a substance. Unlike a substantial form, an accidental form, or accident, modifies its matter without bringing a new substance into existence. For example, paleness is an accident. When a person becomes pale—that is, when a person begins to stand to paleness as matter to form—the person gains a new characteristic, paleness, but no new substance comes into existence. The activities that a thing performs are also accidents. For example, when you think—that is, when you stand to thinking as

<sup>&</sup>lt;sup>5</sup> quod vere est, dicitur substantia

matter to form—you gain a new characteristic, thinking, but no new substance comes into existence.

Souls, then, are substantial forms. We have seen that a soul is a form that combines with matter to make a living thing. Because living things are substances, it follows that their souls are substantial forms.

This does not mean that all the substantial forms in a living thing are souls. William of Ockham, for example, thinks that a human being has three substantial forms: a "form of corporeity" that makes prime matter into a human body, a "sensitive soul" that makes the body into an animal, and an "intellective soul" that makes the animal into a human being. The sensitive soul counts as a soul because it makes its matter (namely the body) into a living thing (namely an animal). The intellective soul counts as a soul because it makes its matter (namely the animal) into a living thing (namely a human being). The form of corporeity, however, does not count as a soul, for it does not make prime matter into a living thing.

Medieval hylomorphists categorize souls as "vegetative" or "nutritive," "sensitive," and "rational" or "intellective." In this dissertation, I follow standard medieval usage by using "vegetative" interchangeably with "nutritive" and "rational" interchangeably with "intellective," generally preferring whichever term appears more often in the texts that I am citing in a given chapter. A vegetative or nutritive soul is a form that makes matter into an organism that can nourish itself, grow, and reproduce. A sensitive soul is a form that makes matter into an organism that can sense, feel emotion and desire, and imagine. A rational or intellective soul is a form that makes matter into an organism that can think and

<sup>&</sup>lt;sup>6</sup> A fuller discussion of Ockham's hylomorphism, with textual citations, can be found in Chapter 3.

will. As Aquinas puts it, "because of the intellective soul, we are called human beings; because of the sensitive soul, animals; and because of the nutritive soul, living things" (SCG 2.58.3). Medieval hylomorphists generally agree, in accordance with the Western Church's teaching, that rational souls, unlike other souls, are immortal and can survive the body's death.

Given these concepts, we can outline a basic conceptual (or at least terminological) framework within which medieval philosophers worked during and after the thirteenth century. A physical thing is a composite of matter and form. The matter is potentially the thing, and the form makes the matter actually the thing. Substantial forms combine with prime matter to make substances. Substances can serve as matter for various accidental forms, or accidents. Living things are substances. A living thing's soul is the substantial form that makes it a living thing. A soul is vegetative or nutritive if it makes matter into a living thing that can nourish itself, grow, and reproduce. A soul is sensitive if it makes matter into a living thing that can sense, feel emotion and desire, and imagine. A soul is rational or intellective if it makes matter into a living thing that can think and will.

This taxonomy of souls raises a question. A human being can think and will, but she can also nourish herself, grow, reproduce, sense, feel emotion and desire, and imagine.

Therefore, she has not only a rational soul but also a vegetative soul and a sensitive soul.

One might wonder what the relationship between these souls is. Are they three different substantial forms, or does she have a single substantial form that is simultaneously a vegetative soul, a sensitive soul, and a rational soul? This question generalizes: one might ask, for any substance, how many substantial forms it has.

 $^7$  secundum animam intellectivam dicimur homines, secundum sensitivam animalia, secundum nutritivam viventia.

The medieval hylomorphists disagree about the answer to this question. Most say that a given substance can have more than one substantial form. Present-day scholars call this position "plurality of substantial forms," "plurality of forms," or simply "pluralism." For example, Ockham, who thinks that a human being has three substantial forms, is a pluralist. Other medieval hylomorphists, most notably Thomas Aquinas, think that every substance has only one substantial form. Scholars call Aquinas's position "unicity of substantial form," "unicity of form," or simply "unitarianism." According to Aquinas, a human being has a single substantial form that is simultaneously a rational soul, a sensitive soul, a vegetative soul, and a form of corporeity and that singlehandedly makes prime matter into a human being.

The unitarian/pluralist debate goes to the heart of what a human person is.

Unitarians think that where there is a human being, there is only one substantial form. This one substantial form is responsible not only for a human being's uniquely human traits but also for her animal and bodily traits, for there is no other substantial form to confer those traits. Hence, when the human substantial form combines with prime matter, the resulting matter-form composite is simultaneously a body, an animal, and a person. We may use three different words—"body," "animal," and "person"—but they refer to one and the same entity. On Ockham's pluralist view, by contrast, there are three entities, not one: a body (composed of prime matter and the form of corporeity), an animal (composed of the body and the sensitive soul), and a person (composed of the animal and the intellective soul). In short, the outcome of the unitarian/pluralist debate would tell us whether we should see a person as a kind of body or animal or as something made from a body or animal but not identical with it.

This unitarian/pluralist debate deserves attention from present-day philosophers. As Ainsworth (2016) notes, "Aristotle's hylomorphism has ... enjoyed something of a renaissance in contemporary metaphysics." In recent decades, several philosophers have hailed hylomorphism as a promising metaphysical position. Stump (1995) proposes hylomorphism as a viable alternative to Cartesian dualism and modern versions of materialism. Oderberg (2005) advances Aquinas's unitarian hylomorphism as a solution to the mind-body problem. Feser (2006) ends his introductory textbook *Philosophy of Mind* by endorsing hylomorphism over against more recent philosophies of mind. Koslicki (2008) formulates a version of hylomorphism in order to solve some puzzles regarding the metaphysics of material objects. (Unlike Stump, Oderberg, and Feser, Koslicki takes her inspiration more from Aristotle himself than from the medieval hylomorphists.)

Hylomorphism-advocacy is especially important to neo-Thomist thinkers such as Oderberg and Feser, whose support for Aquinas's philosophy includes support for the unitarian version of hylomorphism.

Hylomorphism has implications that extend beyond metaphysics and into the realm of hot-button political issues. Pasnau (2002, 111–115) has used Aquinas's hylomorphic account of the soul to argue—presumably against Catholic intellectuals who respect Aquinas and oppose abortion—that early-term abortions should not be considered murder:

Even if we agree that there is no reason to believe God infuses the rational soul at conception, why should we follow Aquinas in believing that God waits until the brain has sufficiently developed? His argument depends on his hylomorphic conception of the soul-body relationship. Just as a form requires the appropriate

sort of matter—one cannot make a good copy of a Rodin sculpture out of cardboard—so the human soul requires the appropriate sort of body. (Pasnau 2002, 111)

Pasnau's application of hylomorphism to abortion triggered a minor controversy, prompting a heated exchange between Haldane and Lee (2003) and Pasnau (2003).

In short, hylomorphism (or at least certain applications of it) is once again a live topic. To the extent that present-day philosophers want to take this topic seriously, they will need to grapple with the question of how many substantial forms a substance has. That is, they will need to grapple with the unitarian/pluralist debate.

Such grappling has already occurred on small scale. Barnes (2003) argues that hylomorphists should accept a version of pluralism in which the parts of a substance's matter continue to exist and have their own substantial forms even after the matter has received the substance's substantial form. For example, Barnes would say that the substantial forms of my atoms continue to exist even after the atoms combine with my human substantial form (Barnes 2003, 520). Storck (2008) rebuts Barnes's argument, defending the unitarian claim that a substance has only one substantial form. Toner (2008) defends what he describes as a modernized version of Aquinas's unitarianism against various present-day alternatives.

Given this recent interest in hylomorphism, it would be worthwhile to examine the unitarian/pluralist debate's history in some detail. Many histories of medieval philosophy provide overviews of the debate.<sup>8</sup> Instead of providing yet another overview, this

<sup>&</sup>lt;sup>8</sup> The English translation of Étienne Gilson's *History of Christian Philosophy in the Middle Ages* is one classic English-language source on the medieval unitarian/pluralist debate.

dissertation focuses on three areas in which the conventional wisdom regarding the unitarian/pluralist debate should be reconsidered.

Chapter 1 questions a common assumption about medieval pluralism. It is clear that a matter-form composite can serve as matter for an additional accidental form. Consider an ice sculpture. Water is potentially ice, and it is actually ice when it is cold enough. Therefore, ice is a matter-form composite whose matter is water and whose form is a certain temperature range. Hence, ice is a composite of matter and an accidental form. At the same time, this matter-form composite serves as matter for an additional accidental form, the ice-sculpture's shape. We might say that one accidental form, the sculpture's shape, is layered on top of another accidental form, the ice's temperature. According to many commentators, medieval pluralism is the view that substantial forms can be layered in the same way. For example, these commentators tend to assume that if a human being's rational soul is distinct from her sensitive soul, then those souls must be layered, with the body animated by the sensitive soul serving as matter for the rational soul. In Chapter 1, I argue that this assumption is mistaken not only in the case of some pluralists (namely Ockham and Peter John Olivi, whom I mention in the chapter) but also in the case of the unitarian Aquinas. I show that Aquinas recognizes both the "layered" (or, as I call it in Chapter 1, "nested") kind of pluralism and a different, non-layered kind of pluralism, and takes the time to argue against both kinds.

The distinction between these two kinds of pluralism is relevant to present-day attempts to revive hylomorphism. As I have mentioned, several present-day authors who take hylomorphism seriously have debated the relative merits of unitarianism and pluralism, with neo-Thomists attempting to refute pluralism. Chapter 1 shows that there

are at least two major kinds of pluralism and that, as Aquinas found, different objections may be required in order to refute different kinds of pluralism.

Chapter 2 challenges the assumption, common to both Aquinas and several more recent commentators, that Aristotle is a unitarian. At first glance, there seem to be ample texts to support this assumption. For example, Aristotle says that a dead body is no longer the same body and that a severed hand is no longer a hand. Remarks like these have led many scholars to conclude that for Aristotle, a human being has only one substantial form, the soul, which is responsible for making not only the human being but all of the human being's parts, such as her body and her hands, what they are. Through a close reading of Aristotle's writings, I argue that Aristotle is not a unitarian. More precisely, I argue that for Aristotle, the form that makes a human body what it is is not the same form that makes a human being what she is. At the same time, I argue that Aristotle would reject at least one of the main objections that Scotus and Ockham raise against unitarianism. Noting that the same body seems to exist before and after death, Scotus and Ockham argue that the substantial form that makes the body what it is cannot be the substantial form that makes the body alive. In Chapter 2, I point out that Aristotle would not endorse this anti-unitarian argument, since he insists that the same body does not exist after death.

The upshot of Chapter 2 is that Aristotle's view of living things might be described as pluralism, albeit a kind of pluralism that differs significantly from that of Scotus and Ockham. Neo-Thomists have tried to enlist Aristotle as a supporter of Thomistic unitarianism. For example, Oderberg describes his own unitarian philosophy of mind as the view "of Aristotle and the Aristotleians, most notably St. Thomas Aquinas and his followers" (Oderberg 2005, 71), and calls unitarianism one of the "central doctrines of

hylemorphism" (Oderberg 2005, 81). Describing Aristotle as a unitarian may be somewhat anachronistic: unitarianism is a claim about how many substantial forms a substance has, but Aristotle never uses the term "substantial form," and it is an open question whether he sharply distinguishes substantial forms from accidental forms. There is, however, a deeper problem with describing Aristotle as a unitarian: if my argument in Chapter 2 is correct, then Aristotle believes (unlike Scotus and Ockham) that a living thing's body no longer exists after death, but like a pluralist, he thinks that the body has its own identity independent of the substantial form called the soul.

Chapter 3 explores an under-appreciated aspect of Ockham's pluralism, namely its dependence on mind-body dualism. I show that some of Ockham's arguments for pluralism rest on the assumption that mental activities take place in the soul alone, not in any bodily organ. Pasnau has suggested that there is a connection between mind-body dualism and Ockham's pluralism, but as I show in Chapter 3, there is a connection that goes beyond the one that Pasnau identifies. I conclude Chapter 3 by suggesting that Ockham's mind-body dualism and his resulting pluralism are a counterexample to a common anti-dualist argument, namely the argument that mind-body dualism introduces an unacceptable division or discontinuity into nature. As I argue in Chapter 3, Ockham's mind-body dualism

-

<sup>&</sup>lt;sup>9</sup> Aristotle does use the term "substance" (Greek *ousia*), so one might think that he implicitly distinguishes substantial forms from accidental forms: a substantial form is a form that combines with matter to make a substance; other forms are accidental forms. The issue is more complicated, however. Aristotle does not use the term "accidental form" any more than "substantial form." When he wants to refer to properties that modify a substance without bringing about a new substance, he uses only the term "accident." Hence, it is not immediately clear whether he even includes accidents in the category of forms. This does not necessarily mean that he regards accidents as non-forms; rather, it may simply mean that he did not consciously connect his substance/accident distinction to his matter/form distinction in the way medieval hylomorphists did. It is worth noting that although I have found several commentators who use the term "substantial form" when discussing Aristotle's philosophy (see Haring 1956; Modrak 1979, 373, 374; Cohen 2016), I have not found any present-day commentator who explicitly defends the assumption that Aristotle distinguishes substantial forms from accidental forms.

and his resulting pluralism imply more continuity in nature than does Aquinas's less dualistic philosophy of mind.

All three chapters presuppose the background information covered in this introduction, but otherwise I have tried, to the extent possible, 10 to write the dissertation so that each chapter can be read and understood on its own.

 $^{10}$  In order to avoid excessive repetition, Chapter 2 cites some conclusions reached in Chapter 1 instead of reproducing the arguments for those conclusions; however, Chapter 2 is still comprehensible as a stand-alone article.

## **REFERENCES**

- Ainsworth, Thomas. 2016. "Form vs. Matter." In In Stanford Encyclopedia of Philosophy.

  Stanford University. Last modified February 8.

  https://plato.stanford.edu/entries/form-matter/
- Barnes, Gordon P. 2003. "The Paradoxes of Hylomorphism." *The Review of Metaphysics* 56.3: 501–523.
- Cohen, S. Marc. 2016. "Aristotle's Metaphysics." In *Stanford Encyclopedia of Philosophy*.

  Stanford University. Last modified June 15.

  https://seop.illc.uva.nl/entries/aristotle-metaphysics/
- Cross, Richard. 1998. *The Physics of Duns Scotus: The Scientific Context of a Theological Vision*. Oxford: Clarendon.
- Feser, Edward. 2005. Philosophy of Mind: A Beginner's Guide. Oxford: Oneworld.
- Haldane, John, and Patrick Lee. 2003. "Aquinas on Human Ensoulment, Abortion, and the Value of Life." *Philosophy* 78.304: 255–278.
- Haring, Ellen Stone. 1956. "Substantial Form in Aristotle's *Metaphysics Z, I." The Review of Metaphysics* 10.2: 308–332.
- Koslicki, Katherin. 2008. The Structure of Objects. Oxford: Oxford University Press.
- Modrak, Deborah K. W. 1979. "Forms, Types, and Tokens in Aristotle's Metaphysics." *Journal of the History of Philosophy* 17.4: 371–381.
- Oderberg, David. 2005. "Hylemorphic Dualism." *Social Philosophy and Policy* 22.2: 70–99.
- Pasnau, Robert. 2002. *Thomas Aquinas on Human Nature*. Cambridge: Cambridge University Press.

- \_\_\_\_. 2003. "Souls and the Beginning of Life (A Reply to Haldane and Lee)." *Philosophy* 78.306: 521–531.
- Storck, Michael Hector. 2008. "Parts, Wholes, and Presence by Power: A Response to Gordon P. Barnes." *The Review of Metaphysics* 62.1: 45–59.
- Stump, Eleonore. 1995. "Non-Cartesian Substance Dualism and Materialism Without Reductionism," *Faith and Philosophy* 12.4: 505–531.

Toner, Patrick. 2008. "Emergent Substance." Philosophical Studies 141.3: 281–297.

Ward, Thomas M. 2014. John Duns Scotus on Parts, Wholes, and Hylomorphism. Leiden: Brill.

## CHAPTER 1

## PINCUSHION PLURALISM AND NESTED PLURALISM

According to William of Ockham,<sup>11</sup> an animal has at least two substantial forms: a form of corporeity that is responsible for the animal's bodily structure and a sensitive (and vegetative) soul that makes the animal alive. When discussing these substantial forms, he distinguishes two ways in which the forms might be related:

Second, [there is a doubt] regarding the sensitive form's immediate subject, whether it is [prime] matter or the form of corporeity. ... In response to the second [doubt], I say that the sensitive [soul] is received immediately into the form of corporeity or [perhaps] immediately into [prime] matter. 12 (Quod. 2.12, 61–62, 69–70)

In this context, a form's "subject" is that which serves as the form's matter (compare Thomas Aquinas, <sup>13</sup> *DSC* 3 co.: "But a doubt still remains: what is the soul's proper subject, which stands to it as matter to form?" <sup>14</sup>). When Ockham asks what the sensitive soul's

All translations are my own.

All translations are my own.

<sup>&</sup>lt;sup>11</sup> In this chapter, I cite Ockham's *Reportatio*, following the edition in de Ockham 1984, and his *Quodlibet* II, following the edition in de Ockham 1980. I format citations as follows:

<sup>• &</sup>quot;Rep. 4.9, de Ockham 1984, 160–161" = "the portion of Reportatio liber 4 quaest. 9 in de Ockham 1984, 160–161"

<sup>• &</sup>quot;Quod. 2.1.2" = "Quodlibet II quaestio 1 n. 2"

<sup>&</sup>lt;sup>12</sup> secundo, de subiecto immediato formae sensitivae, utrum sit materia vel forma corporeitatis. ... Ad secundum dico quod sensitiva immediate recipitur in forma corporeitatis, vel in materia immediate.

<sup>&</sup>lt;sup>13</sup> In citing Aquinas's works, I follow the editions in Alarcón 2013. I format citations as follows:

<sup>•</sup> *De ente et essentia (DEE)*: "1" = "cap. 1"

<sup>•</sup> De spiritualibus creaturis (DSC): "1 arg. 2" = "a. 1 arg. 2"

<sup>•</sup> *De veritate (DV)*: "1.2 arg. 3" = "q. 1 a. 2 arg. 3"

<sup>•</sup> Expositio Posteriorum Analyticorum (EPA): "1.2.3" = "lib. 1 l. 2 n. 3"

<sup>•</sup> Quaestiones disputatae de anima (QDA): "1 arg. 2" = "a. 1 arg. 2"

<sup>•</sup> Quodlibet XI: "Q 11.1 arg. 2" = "Quodlibet XI q. 1 arg. 2"

<sup>•</sup> Scriptum super Sententiis (SS): "1.2.3.4 arg. 5" = "lib. 1 d. 2 q. 3 a. 4 arg. 5"

<sup>•</sup> *Summa contra gentiles (SCG)*: "1.2.3" = "lib. 1 cap. 2 n. 3"

<sup>•</sup> Summa theologiae (ST): "1 2.3 arg. 4" = " $I^{\underline{a}}$  q. 2 a. 3 arg. 4"

<sup>•</sup> Super De Trinitate (SDT): "1.2.3 arg. 4" = "pars 1 q. 2 a. 3 arg. 4"

<sup>&</sup>lt;sup>14</sup> Sed tunc dubium restat, quid sit proprium subiectum animae, quod comparetur ad ipsam sicut materia ad formam.

"immediate subject" is, he is asking what stands to the sensitive soul as matter to form. There are at least two possible answers. On one hand, the form of corporeity and the sensitive soul might both directly combine with prime matter. In that case, prime matter would stand to both the form of corporeity and the sensitive soul as matter to form. On the other hand, the form of corporeity and the sensitive soul might be layered: perhaps prime matter serves as matter for the form of corporeity, resulting in a body, and this body (or maybe just the body's form of corporeity, as Ockham seems to suggest) serves as matter for the sensitive soul. In this second scenario, it is the body (or the form of corporeity), not prime matter, that stands to the sensitive soul as matter to form. In this passage, Ockham wavers between these two possibilities without coming down on either side. 15

Although Ockham is discussing specific kinds of substantial form (namely the sensitive soul and the form of corporeity), his point generalizes: when we say that a substance has more than one substantial form, there are two different things that we might mean. On one hand, we might mean that the substance contains several substantial forms that combine directly with prime matter. In this case, the substantial forms would be like pins in a pincushion: just as all the pins attach directly to the same cushion, so all the substantial forms attach directly to the same bit of prime matter. I call this kind of pluralism "pincushion pluralism." On the other hand, we might mean that prime matter combines with one substantial form, resulting in a matter-form composite; that this composite (or perhaps just the composite's form, as Ockham seems to suggest) serves as matter for another substantial form, resulting in a second matter-form composite; that this second composite serves as matter for yet another substantial form; and so on. In this

<sup>&</sup>lt;sup>15</sup> As we will see later, he elsewhere expresses a preference for the second possibility.

second case, the substance would be layered like an onion, with each substantial form serving as matter for the next one. I call this kind of pluralism "nested pluralism."

Zavalloni (1951, 312–315) distinguishes pincushion pluralism from nested pluralism and says that both kinds of pluralism had supporters during the Middle Ages. <sup>16</sup> Many commentators, however, write in ways that suggest that medieval pluralism is nested pluralism. For example, Spade (2008) says that "the 'plurality of forms,' in the sense in which our authors speak of it, refers to ... the picture of some kind of primordial *matter*, ... to which is added a series of forms *one on top of the other* in a certain order ... The structure that results is ... a metaphysical 'onion' with several layers." On my reading, Gilson (1965, 293), Wippel (1981, 322), Stump (1995, 508), and King (2002, 52) also imply that medieval pluralism is nested pluralism. Newman (2006, 56) is a borderline case: he acknowledges both nested and pincushion pluralism as possible versions of pluralism but says that medieval pluralism is nested pluralism.

This identification of medieval pluralism with nested pluralism is incorrect. In the passage quoted at the beginning of this chapter, Ockham wavers between nested pluralism and pincushion pluralism. Moreover, Toivanen (2013, 50) argues that the thirteenth-century theologian Peter John Olivi is (what I would call) a pincushion pluralist instead of a nested pluralist.

<sup>&</sup>lt;sup>16</sup> According to Zavalloni (1951, 312-315), medieval pluralists reject the idea that a substance's substantial forms are merely "juxtaposed" and instead hold that the forms are "subordinated" to each other. The claim that forms are "subordinated" to each other may seem to imply nested pluralism. However, Zavalloni distinguishes two kinds of subordination, both of which were considered by medieval pluralists: "dispositive subordination" and "essential subordination." In dispositive subordination, one form prepares (disposes) matter to receive another form, but the first form does not serve as matter for the second form, which instead combines directly with prime matter. This is a version of pincushion pluralism. In essential subordination, one form serves as matter for another form.

I thank Darby Vickers for translating Zavalloni's French for me.

One might forgive commentators for overlooking the pincushion pluralism in Ockham's and Olivi's writings. In this chapter, however, I argue that Thomas Aquinas—probably the most famous medieval philosopher, whose writings have attracted far more scholarly and popular attention than those of Ockham and Olivi—also recognizes both kinds of pluralism. Although he seems to focus more on nested pluralism, perhaps because it was the more popular version of pluralism among his contemporaries, he distinguishes nested pluralism from pincushion pluralism and takes the time to argue against them both.

This chapter is organized as follows. In sections 1–3, I show that Aquinas recognizes both nested pluralism and pincushion pluralism as possible kinds of pluralism. In section 1, I examine Aquinas's descriptions of pluralism in *ST* 1 76.3 arg 4 and *DSC* 3 co. and argue that he is describing nested pluralism. In section 2, I argue that Aquinas's most common anti-pluralist argument, which I call the First Form Argument, targets nested pluralism. In section 3, I show that one of Aquinas's anti-pluralist arguments, which I call the Predication Argument, distinguishes nested pluralism from pincushion pluralism and argues against both kinds of pluralism. Sections 4 and 5 examine the upshot of these findings. In section 4, I assess Aquinas's overall awareness of and attitude toward nested pluralism and pincushion pluralism. I argue that Aquinas is aware of the distinction between the two kinds of pluralism but usually does not put much effort into explicitly distinguishing them, probably because he is most interested in nested pluralism. Section 5 concludes the chapter with a brief assessment of the commentators who identify medieval pluralism with nested pluralism.

<sup>-</sup>

<sup>&</sup>lt;sup>17</sup> Let me make a technical note before I continue. In the passage quoted at the beginning of this chapter, Ockham seems to envision one form serving as matter for another form. I take it that most of us are not especially mystified by the idea of a matter-form *composite* (for example, a piece of marble) serving as matter

## 1. ST 176.3 arg 4 and DSC 3 co.: nested pluralism

In this section, I examine two texts from Aquinas: *ST* 1 76.3 arg 4 and *DSC* 3 co. I argue that these texts show that Aquinas recognizes nested pluralism as a possible pluralist position.

Let us begin with *ST* 1 76.3 arg 4. Each article in the *Summa theologiae* begins with some objections to Aquinas's position in that article. In the article *ST* 1 76.3, Aquinas takes the position that a human being has only one soul. One of the objections that he considers uses a statement from Aristotle's *Metaphysics* to argue that a human being has two souls:

The philosopher says, in *Metaphysics* 8, that the genus is taken from matter, whereas the differentia is taken from form. But *rational*, which is the constitutive differentia of a human being, is taken from the intellective soul, whereas one is called *animal* because one has a body animated by a sensitive soul. Therefore, the intellective soul stands to the body animated by the sensitive soul as form to matter. In a human being, therefore, the intellective soul is not the same as the sensitive soul in essence but, rather, presupposes it as a material basis. (*ST* 1 76.3 arg 4)

According to this argument, the body serves as matter for the sensitive soul, resulting in a matter-form composite, and this composite serves as matter for the rational soul.

for a form (for example, a statue-shape). The idea that the composite's *form* (for example, the marble's marble-ness) could, by itself, serve as matter for another form is probably a bit more counterintuitive. In this chapter, I do not emphasize the distinction between having a matter-form composite as one's matter and having the composite's form as one's matter. This distinction is important in some contexts; for example, Aquinas says that the the power to sense has the body, which is a matter-form composite, as its matter, whereas the power to think has the soul, which is the body's form, as its matter (*ST* 1.77.5 co.). In this chapter, however, the distinction between having a matter-form composite as matter and having the composite's form as matter does not seem particularly relevant.

<sup>&</sup>lt;sup>18</sup> philosophus dicit, in VIII Metaphys., quod genus sumitur a materia, differentia vero a forma. Sed rationale, quod est differentia constitutiva hominis, sumitur ab anima intellectiva; animal vero dicitur ex hoc quod habet corpus animatum anima sensitive. Anima ergo intellectiva comparatur ad corpus animatum anima sensitiva, sicut forma ad materiam. Non ergo anima intellectiva est eadem per essentiam cum anima sensitive in homine; sed praesupponit eam sicut materiale suppositum.

Therefore, the argument concludes, the sensitive soul and the rational soul are two different souls. The kind of pluralism presented in this argument is nested pluralism: the substantial forms in a human being are layered, with the rational soul added on top of the sensitive soul.

Aquinas recognizes the same kind of nested pluralism in *DSC* 3 co. In this text, he considers two ways in which the rational soul might combine with matter. The second possibility is Aquinas's position, unitarianism. For our purposes, the important part is the first possibility, which Aquinas attributes to "some" and which he describes as follows:

Some say that there are many substantial forms in the same individual, one subordinate to another. Prime matter is thus not the immediate subject of the final substantial form, but its subject through the mediation of intervening forms. This matter, insofar as it is under the first form, is the proximate subject for the second form, and so on up to the final form. Therefore, the proximate subject of a rational soul is a body perfected by a sensitive soul, and to this the rational soul is united as a form. 19 (DSC 3 co.)

It would be hard to find a clearer example of nested pluralism. Prime matter combines with a substantial form to make a matter-form composite. This first matter-form composite serves as a subject—that is, as matter—for another substantial form, resulting in a second matter-form composite. This second composite, in turn, serves as matter for yet another substantial form, and so on. Eventually we reach the substantial form called the sensitive

<sup>&</sup>lt;sup>19</sup> Sed tunc dubium restat, quid sit proprium subiectum animae, quod comparetur ad ipsam sicut materia ad formam. Circa hoc est duplex opinio. Quidam enim dicunt, quod sunt multae formae substantiales in eodem individuo, quarum una substernitur alteri; et sic materia prima non est immediatum subiectum ultimae formae substantialis, sed subiicitur ei mediantibus formis mediis; ita quod ipsa materia, secundum quod est sub forma prima, est subiectum proximum formae secundae; et sic deinceps usque ad ultimam formam. Sic igitur subiectum animae rationalis proximum, est corpus perfectum anima sensitiva; et huic unitur anima rationalis ut forma.

soul, which results in "a body perfected by a sensitive soul." This animate body serves as matter for the rational soul. A human being is layered like an onion, with each substantial form added on top of the last one.

#### 2. The First Form Argument: nested pluralism

The texts examined in the previous section are not the only evidence that Aquinas recognizes nested pluralism. Of Aquinas's many arguments against pluralism, one of his favorites is what I call the First Form Argument. In this section, I argue that the First Form Argument targets nested pluralism. This section further supports the idea that Aquinas recognizes nested pluralism as a possible kind of pluralism.

The First Form Argument appears throughout Aquinas's writings.<sup>20</sup> Here I consider the version of the argument found in his *Quodlibet* XI:

They say that one is merely a substance through one substantial form, a body through another one, a living thing through another one, an animal through another one, and a human being through another one. ... But this position cannot stand. A substantial form is what makes a substance exist and gives a thing substantial existence. Therefore, only the first form is substantial, for only that one gives a thing substantial existence and makes it a substance. All the later forms arrive accidentally and make a thing exist not in the first place but only in a certain way. $^{21}$  (Q 11.5 co.)

<sup>&</sup>lt;sup>20</sup> See, for example, *CT* 1.90; *ST* 1 76.4 co.; *DSC* 3 co.; *SCG* 2.58.6.

<sup>&</sup>lt;sup>21</sup> Dicunt ergo, quod quaedam forma substantialis est per quam est substantia tantum, et postea est quaedam alia per quam est corpus, deinde est et alia per quam est animatum, et alia per quam est animal, et alia per quam est homo ... Sed haec positio stare non potest: quia, cum forma substantialis sit quae facit hoc aliquid, et dat esse substantiale rei, tunc sola prima forma esset substantialis, cum ipsa sola daret esse substantiale rei, et faceret hoc aliquid; omnes autem post primam essent accidentaliter advenientes, nec darent esse rei simpliciter, sed esse tale.

The idea is simple. By definition, a substantial form combines with matter to make an actual thing, a substance. An accidental form, by contrast, combines with an existing thing to modify it. For example, the accidental form of paleness combines with an existing person to make the person pale. Once a substantial form combines with prime matter, a substance—and, therefore, an actual thing—exists. Any subsequent forms will combine with that existing thing and will therefore be accidental, not substantial. Therefore, a substance cannot contain more than one substantial form.

One might worry that this argument begs the question against pluralism, at least of the nested variety. The argument rests on the assumption that an existing thing can serve as matter only for accidental forms, not for substantial forms. That is precisely what nested pluralism denies. According to nested pluralism, the substantial forms in a substance are layered, such that one substantial form or matter-form composite serves as matter for another substantial form. A substantial form or matter-form composite is an existing thing. Therefore, to say that an existing thing cannot serve as matter for a substantial form is not to argue against the pluralists, one might object, but simply to deny their central claim.

My goal is to identify what version of pluralism Aquinas has in mind in the First Form Argument, not to support the argument itself, so this objection is no threat to my project. Nonetheless, I will make some remarks in the First Form Argument's defense. Even if the First Form Argument as stated technically begs the question, pointing out this question-begging would not address the deeper worry behind the argument: the worry that pluralists, whether nested or pincushion, cannot draw any principled distinction between substantial forms and accidental ones. Pluralists can, of course, label some forms (for example, the rational soul) as substantial and other forms (for example, paleness) as

accidental, but it is not clear that they have any principled basis for doing so. Aquinas can draw a straightforward distinction between substantial and accidental forms: the first form in a substance is substantial;<sup>22</sup> all additional forms are accidental. Because pluralists think that a substance can have several substantial forms, this way of drawing the distinction is not open to them. They must find some other distinction between substantial and accidental forms.

The distinction, pluralists will presumably say, is that a substantial form, when combined with matter, results in a new substance, whereas an accidental form merely modifies an existing substance (for example, paleness modifies an existing person by making her pale); however, that reply merely pushes the problem back. Now the pluralists must explain why some matter-form composites count as new substances and others do not. They must explain, for example, why the composite of a body and a rational soul, a person, counts as a new substance but the composite of a person and paleness, a pale person, does not. I am not asking whether pluralists can provide guidelines for recognizing when something is a substance and when it is not. Rather, I am asking what, on their view, *makes it the case* that a person is a new substance whereas a pale person is not.

\_

<sup>&</sup>lt;sup>22</sup> For Aquinas, there is technically a sense in which some accidental forms are prior to a substance's substantial form. He says that what serves as matter for a substantial form is "signate matter" (*materia signata*) (*ST* 1 119.1 co.), defines signate matter as matter "considered under determinate dimensions" (*DEE* 2), and asserts that dimensions are accidents (*ST* 1 76.6 ad 2). Hence, for Aquinas, what serves as matter for a substantial form is not pure prime matter but a combination of prime matter and some accidental forms, namely dimensions.

This aspect of Thomistic metaphysics does not threaten the First Form Argument, however, because Aquinas insists that even a substance's property of having dimensions is present only because the substance's substantial form is present: "Dimensions are accidents and presuppose some substantial form in matter" (*DSC* 3 arg. 18). Unless a substantial form were already present in matter, the matter would not even be three-dimensional.

Pluralists will probably have answers to this question,<sup>23</sup> but my point is that the First Form Argument is not merely begging the question against pluralism. It raises a legitimate worry about pluralism, a worry that pluralists must address. But let us return to the main question: what kind of pluralism Aquinas has in mind in the First Form Argument.

When we view the First Form Argument as a whole, it seems clear that Aquinas has nested pluralism in mind (even if the worry behind the argument applies to pluralism in general). The First Form Argument says that in order to create a pluralist substance, one would need to add substantial forms to an existing matter-form composite. It then objects that these additional forms would end up being accidental, not substantial. Thus, the argument assumes that according to pluralism, the additional substantial forms stand to the existing matter-form composite in the way accidental forms stand to a substance.

<sup>23</sup> We can see one possible answer by considering Aquinas's account of substantial and accidental forms in more detail. According to Aquinas, the combination of a substantial form and its matter results in a new thing, a thing in addition to the matter and the form, whereas the combination of an accidental form and its matter does not:

An accidental form does not make something exist in the first place but makes it be a certain way. For example, heat does not make its subject exist in the first place but makes it be hot. Therefore, when an accidental form arrives, it is said to make something not come to exist and be generated in the first place but come to be a certain way ... By contrast, a substantial form makes something exist in the first place. Therefore, through its arrival, something is said to be generated in the first place. (*ST* 1 76.4 co.)

We know that an accidental form does not bring a new substance into existence, but here Aquinas seems to go further: an accidental form does not bring any new thing into existence. As Aquinas puts it, only a substantial form makes something exist in the first place. For example, when the substantial form called the human soul combines with matter, the result is a new thing, a human being, but when an accidental form combines with a substance, the substance comes to be a certain way—for example, when heat combines with iron, the iron comes to be hot—but no new thing comes into existence. In short, a matter-form composite is a new substance if it is something in addition to its matter and its form.

There seems to be nothing about the pluralist doctrine itself that would prevent a pluralist from adopting this account of substances. Even if a pluralist thinks that an existing substance can serve as matter for a substantial form, she could say that this combination of matter and form results in a new thing, something distinct from the matter and the form—and that this fact is what makes the resulting thing a new substance. Scotus seems to take this route, claiming that a substance is something distinct from its matter and form (Ward 2014, 50-51). Indeed, Scotus echos Aquinas, saying that substantial forms differ from accidental ones insofar as a substantial form "makes something exist in the first place," whereas an accidental form "makes something exist not in the first place but in a certain way" (*Ord.* 4.11.1.2.1.245). Admittedly, not all pluralists take such an approach in their writings. Ockham, for example, denies that a substance is something distinct from its matter and its form (*Rep.* 4.9, de Ockham 1984, 163; see Ward 2014, 51).

According to Aquinas, accidental forms stand to substances as form to matter: "All accidents stand to the underlying substance as form to matter" (SDT 3.5.3 co. 2). Therefore, the First Form Argument seems to target a kind of pluralism according to which substantial forms stand to an existing matter-form composite as form to matter. This kind of pluralism is nested pluralism, which envisions a matter-form composite serving as matter for additional substantial forms.

We can reach the same conclusion in a more roundabout way by examining Hughes's (2015, 63) objection to the First Form Argument. The argument that I am about to present is less airtight than the one above, but it is worth mentioning.

Hughes thinks that the First Form Argument ignores a relevant possibility. The First Form Argument rests on the following premise: a form that combines with an existing thing is accidental. From this premise, it follows that we cannot create a substance with more than one substantial form by adding substantial forms one by one: if we add them one by one, then the first substantial form will bring about an actual thing, any additional forms will have to combine with that existing thing, and the additional forms will therefore be accidental, not substantial. Therefore, the First Form Argument concludes, we cannot create a substance with more than one substantial form. However, one might wonder whether there is a different way to create a substance with more than one substantial form. Hughes thinks that there is a different way: instead of adding substantial forms one by one, we might create a substance—a human being, say—by combining several substantial forms with prime matter simultaneously. In that case, the "human being acquires all its substantial forms at the first moment it exists" (Hughes 2015, 63). If a human being

<sup>&</sup>lt;sup>24</sup> omnia accidentia comparentur ad substantiam subiectam sicut forma ad materiam

receives all her substantial forms at once, Hughes thinks, then the human being can have several substantial forms without having any of those substantial forms combine with an existing thing.

One might rebut Hughes's objection by pointing to Aquinas's account of embryogenesis. According to Aquinas, a human embryo receives a vegetative soul first, then a sensitive soul, and finally a rational soul (ST 1 118.2 ad 2). He takes it to be a biological fact that a human embryo has vegetative characteristics before it has sensitive characteristics and sensitive characteristics before it has rational ones. Therefore, he would reject Hughes's suggestion that a human being might receive all her substantial forms at once.25

However, this response does not address the core of Hughes's objection. It is irrelevant that, as a matter of biological fact, human embryos do not receive all their substantial forms at once. Hughes's point is that we can imagine a human being receiving all her substantial forms at once. If we can imagine such a scenario, then there seems to be no reason in principle why a substance cannot not receive several substantial forms simultaneously.

If the First Form Argument targeted pincushion pluralism, then Hughes's objection would be relevant. According to pincushion pluralism, a substance consists of prime matter directly informed by several substantial forms. If several substantial forms can directly inform the same bit of prime matter, then there seems to be no reason why they could not

<sup>&</sup>lt;sup>25</sup> Because Aguinas is a unitarian, he does not think that the souls accumulate in the embryo, resulting in a person with three different substantial forms. Instead, he thinks that the embryo first receives a purely vegetative soul, that this vegetative soul is later replaced by a vegetative-sensitive soul, and that the vegetative-sensitive soul is in turn replaced by a vegetative-sensitive-rational soul (ST 1 118.2 ad 2). Because we are discussing pluralism, however, we are imagining that the vegetative, sensitive, and rationals souls are three different substantial forms.

all start to inform that bit of prime matter simultaneously. This is precisely the scenario suggested in Hughes's objection. If Aquinas's target were pincushion pluralism, then a pincushion pluralist could justly reply by making Hughes's objection.

By contrast, Hughes's objection does not apply if the First Form Argument targets nested pluralism. Suppose a human being received all her substantial forms at once. According to nested pluralism, if we analyze that human being into form and matter, the form will be a substantial form and the matter will be a matter-form composite. The substantial form is combined with the matter-form composite, which is an existing thing. Hence, if nested pluralism is true, then it does not matter whether the human being received all her substantial forms at once: even if she did, nested pluralism still implies that at least one of her substantial forms is combined with an existing thing, namely a matter-form composite. Thus, if the First Form Argument targets nested pluralism, then Aquinas need not consider Hughes's objection.

Hence, Hughes's objection provides at least some support for my claim that the First Form Argument targets nested pluralism. Aquinas does not address Hughes's objection or anything like it, which is precisely what we would expect if the First Form Argument targeted nested pluralism. Admittedly, this hardly proves that the First Form Argument targets nested pluralism, since Aquinas might fail to address Hughes's objection even if he were targeting pincushion pluralism. Still, the considerations raised by Hughes's objection can only bolster my case that the First Form Argument targets nested pluralism.

#### 3. The Predication Argument: nested vs. pincushion pluralism

Thus far, I have argued that Aquinas recognizes nested pluralism as a possible kind of pluralism. I now ask whether he also recognizes pincushion pluralism and clearly

distinguishes it from nested pluralism. In order to answer this question, I examine an antipluralist argument that Aquinas offers in *ST* 1 76.3 co., *SCG* 2.58.3–4, and *QDA* 11 co. I call this anti-pluralist argument "the Predication Argument." Strictly speaking, the Predication Argument is an argument not against pluralism but against a specific version of pluralism, namely the idea that a human being's sensitive soul and rational soul (and, in *SCG* 2.58.3–4, the vegetative soul as well) are different substantial forms.

As presented in ST 1 76.3 co., the Predication Argument begins by distinguishing two ways in which a thing can have more than one form:

What arise from diverse forms are predicated of each other accidentally if the forms are not ordered [*ordinatae*] to each other, as when we say that a white thing is sweet. Or if the forms are ordered [*ordinatae*] to each other, ... the subject is placed in the definition of the predicate. For example, color presupposes a surface.<sup>26</sup> (*ST* 1 76.3 co.)

For the moment, let us focus only on this passage's distinction between "ordered" and "unordered" forms. When a thing contains two forms, the forms may be either "ordered" to each other or not "ordered" to each other. Aquinas offers the accidental forms<sup>27</sup> of color and surface as an example of ordered forms. He introduces this example by pointing out that color "presupposes" surface—that is, that something cannot be colored unless it has a surface. Therefore, he seems to think that two forms are ordered when one of them presupposes the other. With this in mind, we can guess that forms are unordered when they do not presuppose each other. This guess is supported by the fact that the passage

<sup>&</sup>lt;sup>26</sup> Quae enim sumuntur a diversis formis, praedicantur ad invicem vel per accidens, si formae non sint ad invicem ordinatae, puta cum dicimus quod album est dulce, vel, si formae sint ordinatae ad invicem, ... subiectum ponitur in definitione praedicati. Sicut superficies praeambula est ad colorem.

 $<sup>^{27}</sup>$  Aquinas regards an object's color and surface as accidental forms attaching to that object (SS 2.34.1.1 co.; EPA 1.2.5).

uses whiteness and sweetness as an example of unordered forms. Whiteness and sweetness do not presuppose each other, for not everything white is sweet and not everything sweet is white.

In this section, I argue for two main claims. First, the distinction between ordered and unordered forms shows that the Predication Argument distinguishes nested pluralism from pincushion pluralism. Second, the Predication Argument rejects both nested pluralism and pincushion pluralism, at least as accounts of the relationship between the sensitive soul and the rational soul.

Given the complexity of the issues involved, it may be best if I provide an outline of my argument in stepwise form:

- The Predication Argument distinguishes the idea that a human being's souls are ordered from the idea that they are unordered and argues against both ideas.
   (Premise)
- The difference between ordered and unordered forms is that ordered forms are related as matter and form whereas unordered forms share the same matter.
   (Premise)
- 3. The Predication Argument distinguishes the idea that a human being's souls relate to each other as matter and form from the idea that they share the same matter and argues against both ideas. (from 1 and 2)
- 4. Souls are substantial forms. (Premise)
- 5. The Predication Argument distinguishes the possibility that a human being's substantial forms (or at least some of them, namely the ones that are souls) relate to

- each other as matter and form from the possibility that they share the same matter and argues against both ideas. (from 3 and 4)
- 6. Nested pluralism is the idea that a substance's (for example, a human being's) substantial forms relate to each other as matter and form. (Premise)
- 7. Pincushion pluralism is the idea that a substance's (for example, a human being's) substantial forms share the same matter. (Premise)
- 8. The Predication Argument distinguishes nested pluralism from pincushion pluralism and argues against both ideas. (from 5–7)

In this argument, the premises are steps 1, 2, 4, 6, and 7. Step 4 is uncontroversial, and steps 6 and 7 are true by definition. Therefore, if the argument is valid, as I think it is, then I need only provide support for steps 1 and 2 in order to show that the conclusion is likely. It is to this task that I now turn.

Let me start by arguing for step 1. The following excerpt from the *ST* 1 76.3 co. version of the Predication Argument provides fairly straightforward support for step 1:

Therefore, if the form by which something is called an animal [that is, the sensitive soul] were different from the form by which it is called a human being [that is, the rational soul], it would follow that either [a] one of these [that is, animal and human being] cannot be predicated of the other except accidentally, if these two forms [that is, the sensitive soul and the rational soul] are not ordered to each other, or [b] there is a predication in the second way of speaking *per se*, if one of the souls presupposes the other. But both of these [possibilities] are clearly false.<sup>28</sup> (*ST* 1 76.3 co.)

<sup>&</sup>lt;sup>28</sup> Si ergo alia forma sit a qua aliquid dicitur animal, et a qua aliquid dicitur homo, sequeretur quod vel unum horum non possit praedicari de altero nisi per accidens, si istae duae formae ad invicem ordinem non habent;

Explaining some features of this passage (for example, the meaning of "predication in the second way of speaking *per se*) would take us far afield. For our purposes, the following observations suffice. This passage distinguishes two possibilities, which I have labeled "a" and "b": (a) that a human being's souls are unordered and (b) that one soul "presupposes" the other. We have seen that if one form presupposes another, the two forms are ordered to each other. Therefore, the passage distinguishes the following possibilities: that a human being's souls are unordered and that they are ordered. The passage denies both possibilities: "But both of these [possibilities] are clearly false." In short, the Predication Argument distinguishes the idea that a human being's souls are ordered from the idea that they are unordered and rejects both ideas, just as step 1 claims.

The support for step 1 is a bit less obvious in SCG 2.58.3–4, but it is still clear enough. Consider the following excerpt from that version of the Predication Argument:

Therefore, if the intellective, sensitive, and nutritive souls were different powers or forms in us, ... the predications A human being is an animal and An animal is a living thing would be accidental. But these predications are per se [rather than accidental], for a human being is an animal insofar as he is a human being, and an animal is a living thing insofar as it is an animal. However, one might say that although the aforesaid souls are different, it does not follow that the aforesaid predications are accidental, for those souls are ordered to each other. This is also rejected.<sup>29</sup> (SCG 2.58.2-4

vel quod sit ibi praedicatio in secundo modo dicendi per se, si una animarum sit ad aliam praeambula. Utrumque autem horum est manifeste falsum

<sup>&</sup>lt;sup>29</sup> Si igitur anima intellectiva, sensitiva et nutritiva sunt diversae virtutes aut formae in nobis, ... haec praedicatio per accidens, homo est animal; vel, animal est vivum. Est autem per se: nam homo secundum quod est homo, animal est; et animal secundum quod est animal, vivum est. ... Si autem dicatur quod, etiam

In this passage, Aquinas considers two scenarios. In the first scenario, animal can be predicated of human being and living thing can be predicated of animal only accidentally: "the predications *A human being is an animal* and *An animal is a living thing* would be accidental." In the excerpt from *ST* 1 76.3 co. quoted above, Aquinas associates this kind of accidental predication with unordered souls, so the first scenario is presumably one in which a human being's souls are unordered. He rejects the first scenario because he thinks that these predications are not accidental. In the second scenario, a human being's souls are ordered. Aquinas also rejects this scenario: "This is also rejected." In short, the *SCG* 2.58.3–4 version of the Predication Argument distinguishes the idea that a human being's souls are unordered from the idea that they are ordered and rejects both ideas, just as step 1 says.

Finally, support from step 1 can be found in the following excerpt from the *QDA* 11 co. version of the Predication Argument:

Therefore, if Socrates were called a human being and an animal because of different forms [namely a rational soul and a sensitive soul], then the predication *A human being is an animal* would be accidental ... However, it happens that different forms can result in a *per se* [rather than accidental] predication when [the forms—in this case, the rational and sensitive souls] are ordered to each other ... But this way of predicating *per se* applies not when the predicate is placed in the definition of the subject but, rather, when the opposite is true. ... Therefore, if this way of predicating *per se* applied to human being and animal, ... then animal would not be predicated

praedictis animabus diversis existentibus, non sequitur praedictae praedicationes fore per accidens, eo quod animae illae ad invicem ordinem habent: hoc iterum removetur.

per se of human being, but vice versa. And another unfitting thing also follows.  $^{30}$  ( $QDA\ 11\ co.$ )

Here, again, Aquinas considers two scenarios. In the first scenario, animal can be predicated of human being only accidentally: "the predication *A human being is an animal* would be accidental." As we have seen, this scenario is the one in which a human being's souls are unordered. In the second scenario, a human being's souls (namely the rational and sensitive souls) "are ordered to each other." Thus, the passage distinguishes the scenario in which a human being's souls are unordered from the scenario in which they are ordered. After describing these scenarios, Aquinas transitions to a new point by saying, "And another unfitting thing follows"—implying that both scenarios are unfitting. In short, *QDA* 11 co. distinguishes the idea that a human being's souls are unordered from the idea that they are ordered and rejects both ideas, just as step 1 says.

Now that we have seen the support for step 1, let us turn to step 2. Step 2 says that the difference between ordered and unordered forms is that ordered forms are related as matter and form whereas unordered forms share the same matter.

The *SCG* 2.58.3–4 version of the Predication Argument makes it clear that ordered forms are related as matter and form. When discussing ordered forms, *SCG* 2.58.3–4 says that "the ordering of the sensitive [soul] to the intellective and of the nutritive to the sensitive is like the ordering of potentiality to actuality" (*SCG* 2.58.4). This passage says that if a human being's souls are ordered forms, then one stands to another as potentiality to

<sup>&</sup>lt;sup>30</sup> Si igitur Socrates dicatur homo et animal secundum aliam et aliam formam, sequeretur quod haec praedicatio homo est animal, sit per accidens ... Contingit tamen secundum diversas formas fieri praedicationem per se, quando habent ordinem ad invicem ... Sed hic modus praedicandi per se non est quia praedicatum ponatur in definitione subiecti; sed magis e converso. ... Si ergo hoc modo esset praedicatio per se hominis et animalis, ... sequetur quod animal non praedicabitur per se de homine, sed magis e contrario. Sequitur etiam aliud inconveniens.

actuality. Matter stands to form as potentiality to actuality, so this statement suggests that ordered forms are related as matter and form.

We find yet more evidence that ordered forms are related as matter and form in the *QDA* 11 co. version of the Predication Argument: "If the sensitive soul and the rational soul are different [forms], then the sensitive soul is ordered to the rational soul in a material way." I interpret this statement as follows: if the sensitive soul and the rational soul are different forms *and* they are ordered, then the sensitive soul relates to the rational soul "in a material way." The expression "in a material way" suggests that the sensitive soul serves as matter for the rational soul. Aquinas seems to be saying that if two forms are ordered, then one stands to the other as form to matter.

This conclusion is further supported by a remark that Aquinas makes elsewhere about color and surface: "Whatever receives into itself that which is like matter also receives that which is like form. For example, a body that receives surface also receives color, which is a kind of form for the surface"<sup>32</sup> (*QDA* 16 co.). This passage clearly states that surface stands to color as matter to form. As we have seen, the *ST* 1 76.3 co. version of the Predication Argument gives surface and color as an example of ordered forms. Therefore, it seems that ordered forms are related as matter and form.

One might object to the argument in the previous paragraph. The previous paragraph claims that surface stands to color as matter to form. One might wonder whether the word "like" (*quasi*), found in the *QDA* passage, casts doubt on this interpretation; perhaps Aquinas means only that the surface-color relation is "like" the

<sup>31</sup> anima sensibilis quasi materialiter ordinetur ad rationalem, si diversae sint

<sup>&</sup>lt;sup>32</sup> Quidquid autem recipit in se id quod est quasi materia, recipit illud etiam quod est quasi forma. Sicut corpus recipiens superficiem, recipit etiam colorem, qui est forma quaedam superficiei

matter-form relation (in some unspecified way), not that a surface literally serves as matter for color.

We can dissolve this objection to an extent by noting that Aquinas often reserves the term "form" for *substantial* forms and the term "matter" for what serves as matter for substantial forms. In one place, he considers (though he does not endorse) the following argument:

An accident depends on its subject more than a form depends on its matter, for a form makes its matter exist in the first place, whereas an accident does not make its subject exist in the first place. Now, one accident can exist in several substances. For example, one time can exist in several movements, as Anselm says. Therefore, it is all the more the case that one soul can exist in several bodies.<sup>33</sup> (*DSC* 9 arg 11).

Explaining this argument would require a considerable digression (into medieval theories of time and movement). For our purposes, the important thing is how Aquinas words the argument. He contrasts "forms" with "accidents." In this passage, then, accidents are not included in the category of form. The only forms other than accidents are substantial forms, so Aquinas seems to be limiting "forms" to substantial forms. In addition, he pairs "form" with "matter" and pairs "accident" not with "matter" but with "subject." Because "form" is limited to substantial form and "matter" is paired with "form," Aquinas seems to be reserving the term "matter" for what serves as matter for a substantial form.<sup>34</sup>

<sup>&</sup>lt;sup>33</sup> magis dependet accidens a subiecto quam forma a materia; cum forma det esse materiae simpliciter, accidens autem non dat esse simpliciter subiecto. Sed unum accidens potest esse in multis substantiis, sicut unum tempus est in multis motibus, ut Anselmus dicit. Ergo multo magis una anima potest esse multorum corporum

<sup>&</sup>lt;sup>34</sup> Aquinas proceeds to refute this argument, and his refutation supports the idea that he is limiting "form" to substantial form and "matter" to what serves as matter for a substantial form:

A time is related to only one movement as accident to subject—namely to the movement of the first movable thing [that is, the outermost heavenly sphere], by which all other movements are measured.

In that case, Aquinas's statement that surface is only "like" matter and color is only "like" form does not rule out the idea that surface is related to color as matter to form.

When Aquinas says that surface is only "like" matter and color is only "like" form, I suggest that he is limiting "form" to substantial form and "matter" to what serves as matter for a substantial form. Color is an accident, not a substantial form. If "form" is limited to substantial form, then color is only "like" form. Likewise, when a surface receives a color, it is not receiving a substantial form. If "matter" means matter that receives substantial forms, then we can understand why Aquinas says that surface is only "like" matter. He is not denying that the surface-color relation is an instance of the matter-form relation (broadly construed) but, rather, using "form" as shorthand for substantial form and "matter" as shorthand for a substantial form's matter.

If my argument up to this point has been correct, then Aquinas thinks that ordered forms are related as matter and form. We can go further, however. Not only are ordered forms related as matter and form, but the defining feature of ordered forms—the feature that makes them ordered instead of unordered—is that they are related as matter and form: "Nothing prevents several forms in the same subject from coming in a kind of order [ordinem], namely so that one is formal in relation to another. For example, color is formal

To other movements, it is instead related as a measure to a thing measured. Likewise, a [measure of length] is related to a wooden stick as to a subject, but to the garment that is measured through it, it is related only as to a thing measured. And so it does not follow that one accident exists in several subjects. (DSC 9 ad 11)

Like the argument, the refutation contains concepts that I cannot explain without taking us far afield. For our purposes, the important thing is that the refutation objects only to the argument's claims about time; it does not object to the argument's restriction of "form" to substantial form and "matter" to what serves as matter for a substantial form.

Because of texts like these, some commentators conclude that only the matter of substantial forms counts as matter. For example, Kenny (1994, 23) writes that Aquinas uses "matter" as "a technical term for that which has the capacity for substantial change," where substantial change involves a change from one substantial form to another. Such a conclusion is too hasty. Aquinas occasionally talks about the "matter" of an accidental form. For example, he writes that "an accident's matter is its proximate subject" (SS 4.12.1.2 qc. 1 ad 1).

in relation to a surface" $^{35}$  (DV 2.3 ad 2). This passage states that forms are ordered insofar as one stands to the other as form to matter.

If correct, this conclusion seems to decisively support step 2. If the defining feature of ordered forms is that they are related as matter and form, then the defining feature of unordered forms is that they are not related as matter and form. Therefore, if a thing has more than one form (whether substantial or accidental) and the forms are *un*ordered, then it seems that the forms must share the same matter.<sup>36</sup> It is unclear what else they could have as matter. They cannot have each other as matter, for they are unordered. Therefore, it seems that step 2 is true: the difference between ordered and unordered forms is that ordered forms are related as matter and form whereas unordered forms share the same matter.

Nonetheless, it would be good if we could find additional support for the claim that unordered forms are not related as matter and form. Let us return to *ST* 1 76.3 co., which uses whiteness and sweetness as an example of unordered forms. There is a good reason to think that surface stands to color as matter to form: as Aquinas notes, color presupposes surface. In much the same way, a statue's form presupposes the statue's matter, for you cannot produce a statue's form without producing it in some sculpting material. By contrast, whiteness and sweetness do not presuppose each other: not everything that is white is sweet, and not everything that is sweet is white. Thus, there is no good reason to think that when an object is both white and sweet, the whiteness and the sweetness are

<sup>&</sup>lt;sup>35</sup> Nihil tamen prohibet plures formas in eodem subiecto esse secundum quemdam ordinem; scilicet ut una sit formalis respectu alterius, sicut color est formalis respectu superficiei

<sup>&</sup>lt;sup>36</sup> This is not strictly true. Different forms might inform different portions of the thing's matter. In that case, the forms would not share the same bit of matter. As we will see below, John Duns Scotus thinks that the forms of an animal's organs are like that: each organ-form (for example, the heart-form or the liver-form) informs a different portion of the body's matter. In the texts discussed in this chapter, Aquinas does not mention the possibility that each bodily organ has its own form, so I set this possibility aside.

related as matter and form. If whiteness and sweetness serve as Aquinas's example of unordered forms, then we have no reason to think that unordered forms relate to each other as matter and form.

When forms are unordered, then, no form serves as matter for another form; instead, all the forms have the same matter. For example, suppose Socrates is both pale and musical. (The *SCG* 2.58.3–4 and *QDA* 11 co. versions of the Predication Argument use Socrates's paleness and musical skill, not whiteness and sweetness, as an example of unordered forms.) In this case, the paleness and the musical skill have the same matter: the substance Socrates.

Let us recap. At the beginning of this section, I presented a stepwise argument whose conclusion is that the Predication Argument distinguishes nested pluralism from pincushion pluralism and rejects both kinds of pluralism. In order to show that this conclusion is likely, I need only provide support for steps 1 and 2 of the stepwise argument. I have now provided textual evidence in support of steps 1 and 2. If the evidence is compelling, as I think it is, then we can conclude that the Predication Argument distinguishes nested pluralism from pincushion pluralism and rejects both kinds of pluralism.

### 4. Aquinas on nested vs. pincushion pluralism

In the previous sections, I examined the ways nested and pincushion pluralism appear, and the extent to which they are distinguished, in Aquinas's writings. In this section, I synthesize the evidence from the previous sections to assess Aquinas's overall awareness of and attitude toward the distinction between pincushion and nested

pluralism. I argue that Aquinas is fully aware of the distinction but not especially interested in it, perhaps because he tends to focus on nested pluralism.

The first statement that we can make with relative certainty is that Aquinas consciously distinguishes nested pluralism from pincushion pluralism, at least in some cases. We have seen that the Predication Argument distinguishes nested pluralism from pincushion pluralism.

We can also say with relative certainty that Aquinas is not especially interested in this distinction. Except for the Predication Argument texts, the texts that we have examined neither distinguish nested pluralism from pincushion pluralism nor explicitly tell the reader which kind of pluralism they are discussing. Indeed, the main point of the previous sections (other than the section on the Predication Argument) has been to decipher which kind of pluralism Aquinas has in mind in each text. The fact that we must perform this interpretive work shows that Aquinas has not put much effort into indicating when he is discussing nested pluralism and when he is discussing pincushion pluralism.

I suspect that Aquinas's lack of interest in the nested/pincushion distinction stems partly from the fact that nested pluralism is his main target. Of the texts and arguments that we have examined, only the Predication Argument targets both kinds of pluralism. The other texts focus solely on nested pluralism. To my knowledge, the Predication Argument is the only place in which Aquinas bothers to argue explicitly against pincushion pluralism.

The reason Aquinas focuses on nested pluralism is probably that many of his pluralist contemporaries and near-contemporaries also focus on it. Aquinas lived squarely in the middle of the thirteenth century (1225–1274). Philip the Chancellor (*c.* 1160–1236), who wrote in the early thirteenth century, says that "the sensitive power" serves as "a

material disposition" for the rational soul. Likewise, an anonymous thirteenth-century commentary on Aristotle's *De anima* says that the rational soul "arrives to the sensitive as form to matter." As these statements show, Philip and the anonymous commentator are nested pluralists with regard to human beings, claiming that the sensitive soul serves as matter for the rational soul.

Although Ockham (c. 1287–1347) was born over a decade after Aquinas's death, his statements about nested pluralism and pincushion pluralism are instructive. Ockham cannot decide between the two kinds of pluralism in the passage quoted at the beginning of this chapter, but elsewhere he shows a preference for nested pluralism:

Now, if several [substantial] forms are posited—for example, in a human being—then there is one substantial form that <immediately> informs <[prime] matter, and that serves as a preparation for another form>.38 And so there are diverse matters in a composite that has several [substantial] forms, for the earlier form, which informs [prime] matter immediately, is matter with respect to the later form, and the other, later form informs the earlier form immediately.39 (*Rep.* 4.9, de Ockham 1984, 160–161)

According to this passage, if a substance has more than one substantial form, then the substantial forms are ordered: the first substantial form combines with "prime matter immediately" and "is matter with respect to the later form." In other words, each

<sup>&</sup>lt;sup>37</sup> The relevant quotations from Philip the Chancellor and the anonymous commentator can be found in Dales 1995, 23,79.

<sup>&</sup>lt;sup>38</sup> The words in angle brackets correspond to parts of the Latin text that are uncertain according to the editors of the critical edition.

<sup>&</sup>lt;sup>39</sup> Si autem ponantur plures formae, sicut in homine, tunc est ibi una forma substantialis <immediate> informans <materiam et illa est dispositio ad aliam formam>. Et sic sunt diversae materiae in composito habente plures formas, quia forma prior est materia respectu posterioris informans materiam immediate, et alia forma posterior informans formam priorem immediate.

substantial form stands to the next one as matter to form. It would be hard to find a clearer statement of nested pluralism.

Unlike Ockham, John Duns Scotus<sup>40</sup> (*c.* 1266–1308) does not think that all of a substance's substantial forms must be related as matter and form. For example, he thinks that each of a human being's organs has its own substantial form: "The more perfect a living thing is, the more it requires a plurality of organs—and it is likely that these belong to different species through [different] substantial forms"<sup>41</sup> (*Ord.* 4.11.1.2.1.254). These organ-forms are obviously not related as matter and form. For example, the heart's form does not serve as matter for the liver's form. The relationship between these organ-forms is neither nested pluralism nor pincushion pluralism: it cannot be nested pluralism, since the organ-forms are not related as matter and form, yet it cannot be pincushion pluralism, since the organ-forms do not share the same bit of matter (for example, the heart's form does not have the same bit of matter as the liver's form).

At the same time, Scotus tends toward nested pluralism. He insists that if a substance has many substantial forms, at least one of these forms must stand to the others as form to matter. This form is

the last one, which follows all the others. And in this way, the whole composite is divided into two essential parts: into its proper actuality—that is, into the last form, by which [the composite] is what it is—and into the proper potentiality

<sup>&</sup>lt;sup>40</sup> Of Scotus's works, I cite only *Ordinatio* IV in this chapter. I follow the edition in B. Ioannis Duns Scoti 2010 and format the citations as follows: "*Ord.* 4.1.2.3.4.5" = "*Ordinatio* IV dist. 1 pars 2 art. 3 q. 4 n. 5." All translations are my own.

<sup>&</sup>lt;sup>41</sup> quanto enim animatum est perfectius, tanto requirit plura organa, (et probabile est quod distincta specie per formas substantiales)

corresponding to that actuality, which [potentiality] includes prime matter along with all the preceding forms.<sup>42</sup> (*Ord.* 4.11.1.2.1.252)

On this view, a substance with many substantial forms can be divided into actuality and potentiality—that is, into form and matter. The form is a substantial form, and the matter is prime matter plus all the other substantial forms. For example, each of a human being's organs may have its own substantial form, but there must be an additional substantial form, the soul, that unifies the organs by taking them all as its matter.<sup>43</sup> This view is a qualified version of nested pluralism: not all of a substance's substantial forms must relate to each other as matter and form, but at least one of them must relate to the others as form to matter.

It is not surprising, then, that Aquinas directs most of his anti-pluralist energies at nested pluralism. Whether or not nested pluralism was the most popular form of pluralism during Aquinas's time, it seems to have had plenty of supporters. Aquinas recognizes both kinds of pluralism but focuses on responding to those of his contemporaries who support nested pluralism.

#### 5. Conclusion

As I noted at the beginning of this chapter, many commentators assume that medieval pluralism is nested pluralism. On one hand, this assumption is understandable. I have argued that nested pluralism was popular during Aquinas's time and that some of Aquinas's anti-pluralist arguments specifically target nested pluralism. It is not surprising that some commentators come away with the impression that medieval pluralism—or at

 $<sup>^{42}</sup>$  illa autem est ultima, adveniens omnibus praecedentibus; et hoc modo totum compositum dividitur in duas partes essentiales: in actum proprium, scilicet in ultimam formam, qua est illud quod est, — et in propriam potentiam illius actus, quae includit materiam primam cum omnibus formis praecedentibus.

<sup>&</sup>lt;sup>43</sup> See Ward (2014, 77) for a fuller discussion of this aspect of Scotus's hylomorphism.

least the pluralism of Aquinas's contemporaries—is nested pluralism. On the other hand, Aquinas is well aware of the possibility of pincushion pluralism and even takes the time to argue against it. It is unclear whether he does so because his pluralist opponents include pincushion pluralists or simply for the sake of thoroughness. However, one thing is clear: any simple identification of medieval pluralism with nested pluralism is incorrect.

## REFERENCES

- Alarcón, Enrique, ed. 2013. *Corpus Thomisticum*. http://www.corpusthomisticum.org/iopera.html.
- B. Ioannis Duns Scoti. 2010. *Opera Omnia*. Vol. 12, edited by B. Hechich, J. Percan, S. Recchia, S. Ruiz de Loizaga, W. Salamon, G. Pica. Vatican City: Typis Vaticanis.
- Gilson, Etienne. 1965. *The Philosophy of St. Bonaventure*. Trans. Dom Illtyd Trethowan and Frank J. Sheed. Paterson: St. Anthony Guild Press.
- Hughes, Christopher. 2015. Aquinas on Being, Goodness, and God. London: Routledge.
- Kenny, Anthony. 1994. Aquinas on Mind. London: Routledge.
- King, Peter. 2002. "Scotus on Metaphysics." *The Cambridge Companion to Duns Scotus*.

  Cambridge University Press. 15–68.
- Newman, William R. 2006. *Atoms and Alchemy: Chymistry and the Experimental Origins of the Scientific Revolution*. Chicago: University of Chicago Press.
- de Ockham, Guillelmi. 1980. *Opera Theologica*. Vol. 9, *Quodlibeta Septem*. St. Bonaventure, NY: The Franciscan Institute.
- \_\_\_\_. 1984. Opera Theologica. Vol. 7, Quaestiones in Quartum Librum Sententiarum (Reportatio). St. Bonaventure, NY: The Franciscan Institute.
- Spade, Paul Vincent. 2008. "Binarium Famosissimum." In The Stanford Encyclopedia of Philosophy. Last modified June 16.
  - http://plato.stanford.edu/archives/fall2008/entries/binarium/.
- Stump, Eleonore. 1995. "Non-Cartesian Substance Dualism and Materialism Without Reductionism," *Faith and Philosophy* 12.4: 505–531.

Toivanen, Juhana. 2013. *Perception and the Internal Senses: Peter of John Olivi on the Cognitive Functions of the Sensitive Soul*. Leiden: Brill.

Ward, Thomas M. 2014. John Duns Scotus on Parts, Wholes, and Hylomorphism. Leiden: Brill.

Wippel, John F. *The Metaphysical Thought of Godfrey of Fontaines: A Study in Late Thirteenth-Century Philosophy*. Washington, D.C.: The Catholic University of America Press, 1981.

Zavalloni, Roberto. 1951. *Richard de Mediavilla et la Controverse sur la Pluralité des Formes*.

Louvain: Éditions de l'Institut supérieur de philosophie.

### **CHAPTER 2**

## IS ARISTOTLE A UNITARIAN?

After introducing the theory of pluralism in *De spiritualibus creaturis*, Thomas Aquinas<sup>44</sup> says, "But this opinion is impossible according to the true principles of philosophy, which Aristotle considered" (*DSC* 3 co.). Many modern scholars would agree with this claim (except perhaps for the suggestion that Aristotle's principles are the "true" principles of philosophy). Comments scattered throughout the scholarly literature imply that unitarianism represents a more authentically Aristotelian position than pluralism does. Te Velde (1995, 237; see 234, 234–235) says that unitarianism is more consistent with Aristotle's "principles," while Toivanen (2013, 49) says that "Aristotelian metaphysics" seems to rule out pluralism. Doig (2001, 99) calls unitarianism an "Aristotelian doctrine." Similar remarks can be found in Lagerlund and Thom (2013, 10),<sup>45</sup> Moody (1975, 45), Cross (1999, 74), and König-Pralong (2011, 359).

A complete evaluation of such claims would require a book at the very least. In order to assess Te Velde's and Toivanen's statements, for example, one would need to determine whether and how Aristotle's works differ from each other in their claims, which of these claims should be considered basic principles, and which works should be regarded as more central sources of Aristotelian doctrine.

<sup>&</sup>lt;sup>44</sup> Of Aquinas's works, I cite only two in this chapter: *De spiritualibus creaturis* and the *Compendium theologiae*. I follow the editions in Alarcón 2013 and format the citations as follows:

<sup>•</sup> De spiritualibus creaturis (DSC): "1 arg. 2" = "a. 1 arg. 2"

<sup>•</sup> *Compendium theologiae (CT)*: "1.2" = "lib. 1 cap. 2"

All translations are my own.

<sup>&</sup>lt;sup>45</sup> Lagerlund and Thom (2013, 10) say that the thirteenth-century churchman Robert Kilwardby was neither "purely Aristotelian" nor "purely Augustinian." As an example of the "Augustinian," as opposed to

<sup>&</sup>quot;Aristotelian," influences, they cite Kilwardby's support for pluralism—the implication being that a pure "Aristotelian" would be a unitarian.

Instead of trying to answer these questions, this chapter focuses on a narrower question: whether Aristotle thinks that a living thing's soul is responsible for making the living thing's body what it is. According to unitarians, a living thing has a single substantial form, its soul, that makes prime matter into the living thing. On this view, the soul is responsible for making not only the living thing but also every part of the living thing what it is: without the soul, the living thing would be reduced to totally formless prime matter. If Aristotle thinks that the soul is not responsible for making a living thing's body what it is, then he does not accept unitarianism as applied to living things.

According to many commentators, Aristotle thinks that the soul is responsible for making the body what it is. These commentators often express this idea by saying that the body is "essentially ensouled" (Ackrill 1972–3, 129; Whiting 1992, 76, 84; Bostock 2003, 165; Frey 2007, 168; Shields 2007, 293; Shields 2010).

In this chapter, I argue that Aristotle does not regard the body as essentially ensouled and that he therefore rejects a unitarian account of living things. If forced to choose between unitarianism and pluralism, I would call Aristotle a pluralist. I must add a qualification, however. While not a unitarian, Aristotle would disagree strongly with one of the major arguments that some medieval pluralists use to attack unitarianism. As we will see, John Duns Scotus<sup>46</sup> and William of Ockham<sup>47</sup> argue against unitarianism on the grounds that the same body continues to exist after the soul departs—an argument that I call "the Corpse Argument." Aristotle, however, says that a dead body is no longer the same

46

<sup>&</sup>lt;sup>46</sup> Of Scotus's works, I cite only *Ordinatio* IV in this chapter. I follow the edition found in B. Ioannis Duns Scoti 2010. I format the citations as follows: "*Ord.* 4.1.2.3.4.5" = "*Ordinatio* IV, dist. 1, pars 2, art. 3, q. 4, n. 5." All translations are my own.

<sup>&</sup>lt;sup>47</sup> Of Ockham's works, I cite only *Quodlibet* II in this chapter, following the edition in de Ockham 1980. I format the citations as follows: "*Quod.* 2.1.2" = "*Quodlibet* II, quaestio 1, n. 2." All translations are my own.

body. I discuss this contrast between Aristotle and the medieval pluralists toward the end of this chapter, using Scotus and Ockham as case studies.

This chapter is organized as follows. In section 1, I clarify the phrase "essentially ensouled." In sections 2–5, I argue that Aristotle does not regard a living thing's body as essentially ensouled. In section 6, I lay out Scotus's and Ockham's versions of the Corpse Argument. In section 7, I show that Aristotle would reject the Corpse Argument. In section 8, I discuss the difficulties involved in classifying Aristotle as either a unitarian or a pluralist and present the upshot of this inquiry: that Aristotle rejects unitarianism but not for the same reason as medieval pluralists like Scotus and Ockham: Scotus and Ockham argue against unitarianism partly on the grounds that a living thing's body survives the living thing's death, whereas Aristotle denies that a living thing's body survives death.

# 1. "Essentially ensouled"

Although some Aristotle scholars describe a living thing's body as "essentially ensouled," the term "essentially" is problematic in an Aristotelian context, for Aristotle does not use the word "essence" in this way. 48 He says that things have "essences," but he does not call things "essentially" this or that. In this section, I examine three things that we might mean when we say that a living thing's body is essentially ensouled. When I deny that Aristotle regards a living thing's body as essentially ensouled, I mean "essentially ensouled" in the third of these three senses.

# 1.1. Essential ensoulment - first interpretation

Aristotle says that matter is relative to form (*Phys.* 194b8-9). The bronze in a bronze statue is matter relative to the statue and the statue's form, for we can analyze the statue

<sup>&</sup>lt;sup>48</sup> I thank Ron Polansky for pointing this out to me.

into bronze (matter) and statue-shape (form). But notice: we can also analyze the bronze itself into matter and form. The matter would include some tin and other materials. The form would be a certain ratio and blending of these materials. Thus, the bronze is matter relative to the bronze statue, but the bronze is not matter relative to the tin. Rather, the tin is matter relative to the bronze.

In short, "matter" does not name a particular thing, such as bronze, or a particular class of things. Rather, to be matter is to play a certain role for something else. A piece of bronze plays that role for a statue if the statue is made out of the piece of bronze. A collection of tin and other materials can, in turn, play that role for the piece of bronze.

If "matter" names a role, not a thing, then a thing can cease to play that role. If a bronze statue currently exists, then a piece of bronze currently plays the role of matter for that statue. Now suppose we melt the statue and recast it as a cube. Then the piece of bronze no longer plays the role of matter for the statue, for the statue no longer exists. The piece of bronze now plays the role of matter for something else, a cube. The piece of bronze plays the role of the statue's matter only when it has the statue's form. More generally, M plays the role of X's matter when, and only when, M has X's form.

Given these facts, one might offer the following as a first interpretation of claim that the body is essentially ensouled. M plays the role of a living thing's matter when, and only when, M has the living thing's form. The living thing's form is its soul. Therefore, M plays the role of the living thing's matter when, and only when, M has the living thing's soul. In

this sense, we can say the living thing's matter—that is, the living thing's body—is essentially ensouled.<sup>49</sup>

Understood in this sense, the claim that a living thing's body is essentially ensouled is neither controversial nor philosophically interesting. After all, *every* object's matter has the object's form "essentially" in this sense.

This cannot be what Aristotle scholars have in mind when they say that a living thing's body or matter is essentially ensouled. These scholars are concerned not with the role of a living thing's matter but, rather, with the thing (whatever it is) that is capable of playing that role (whether or not is it currently doing so). It is not immediately clear what object can play that role, but let us suppose, for the moment, that my flesh plays the role of my matter. These commentators want to know whether my flesh is essentially ensouled.

From here on, therefore, whenever I speak of an object's "matter", I use "matter" as shorthand for "the object (whatever it is) that is capable of playing the role of the object's matter (whether or not it is currently doing so)". The reader should apply this gloss to all occurrences of the word "matter" that appear after this sentence.

#### 1.2. Essential ensoulment - second interpretation

Here is a second possible interpretation of the claim that the body is essentially ensouled: "essentially ensouled" may simply mean "necessarily ensouled." If by "essentially" we mean "necessarily", then Aristotle may very well regard a living thing's body as essentially ensouled. According to Aristotle, a corpse from which life has departed is not potentially a living thing (*DA* 412b25–26). Nor, apparently, are the seeds from which

 $<sup>^{49}</sup>$  I thank an anonymous referee of Dowd 2015 for pointing out that the body is essentially ensouled in this sense.

living things grow.<sup>50</sup> In short, for any living thing, that which is potentially the living thing neither survives the living thing's death nor precedes its life. By definition, X's matter is potentially X (*DA* 412a9). (For example, a piece of bronze is potentially a bronze statue.) Therefore, a living thing's matter neither survives the living thing's death nor precedes its life. Because a living thing's matter is its body, the body neither survives the living thing's death nor precedes its life: the body exists only in the living thing itself, which has a soul. In other words, a living thing's body never lacks its soul. According to one interpretation, Aristotle thinks that if X never happens, then X is impossible.<sup>51</sup> If this interpretation is correct, then it is impossible (in Aristotle's sense) for a living thing's body to lack its soul. In other words, the body is necessarily ensouled. If this conclusion is correct and "essentially ensouled" means "necessarily ensouled," then the body is essentially ensouled.

This interpretation is problematic. As noted above, Aristotle does not use the expression "essentially"; however, some ways of using that expression are more faithful, and some less, to what Aristotle means by the term "essence." This interpretation does not use the expression "essentially" in anything close to an Aristotelian way.

For Aristotle, if F is part of X's essence, then F is part of what it is to be X. Thus, something can be necessary without being essential. For example, consider the characteristics which Aristotle calls *idia* and which are commonly known by their Latin name, *propria*. X's *propria* are not part of X's essence, yet they belong to X necessarily (*Top.* 

<sup>5</sup> 

<sup>&</sup>lt;sup>50</sup> I take it that Aristotle here means seeds as in plant seeds, not as in sperm. Aristotle says that seeds have the potential to be potentially alive but are not (so to speak) actually potentially alive (*DA* 412b26–27; see Apostle 1981, 99; Irwin 1988, 285).

<sup>&</sup>lt;sup>51</sup> Kyriakou 1993, 352; Bechler 1995, 12; Bäck 2000, 85; Keyt 2006, 405. The strongest support for this interpretation is *Metaph.* 1047b3-6, which seems to contain the following argument: if X will never be, then X is impossible, for otherwise nothing would count as impossible (I take it that the X in question here is a kind, not a particular; that is, I take it that if *Metaph.* 1047b3-6 does indeed give an argument of this form, then the argument means the following: if an event or entity of kind K is never realized, then kind K cannot be realized). However, the passage is open to other readings (Makin 2006, 83–89).

102a18-9). For example, the ability to learn grammar is a *proprium* of a human being (*Top.* 102a20). Take any human being you like—Socrates, say. Socrates necessarily has the ability to learn grammar: according to Aristotle, all human beings can learn grammar, so if Socrates could not learn grammar, then he would not be human; but if he were not human, then he would not be Socrates; therefore, it is necessarily true that Socrates can learn grammar. At the same time, Aristotle does not think that being able to learn grammar is part of what it is to be Socrates. Instead, being able to learn grammar follows from being rational, which *is* part of what it is to be Socrates (assuming that rational is part of the definition of human being).

In an Aristotelian context, then, we must distinguish "necessarily ensouled" from "essentially ensouled." Our second interpretation of "essentially ensouled" makes "essentially ensouled" equivalent to "necessarily ensouled" and is therefore un-Aristotelian.

#### 1.3. Essential ensoulment - third sense

The discussion of essences in the last section gives us a clue to a properly Aristotelian interpretation of the claim that the body is essentially ensouled. For Aristotle, to say that X has Y essentially can only mean that having Y is part of X's essence—that is, part of what it is to be X. Therefore, if a living thing's body is essentially ensouled, then the body is, as Shields (2007, 293) puts it, "parasitic for its identity conditions" on the soul: having that soul is part of what it is to be that body.

That is the sense of "essentially ensouled" that I care about in this chapter. I claim that Aristotle does not regard a living thing's body as essentially ensouled in that sense.

That is, he does not think that if B serves as a living thing's body, then having the living thing's soul is part of what it is to be B.

## 2. An objection to essentially ensouled bodies

If that is what we mean by "essentially ensouled," then the idea that Aristotle regards a living thing's body as essentially ensouled faces some immediate objections. In this section, I present two of the main objections.

Ackrill (1972–3, 126) says that the analysis of an object into matter and form makes "ready sense" only if we can conceive of the matter apart from the form. He bases this claim on Aristotle's account of change, which depends on our ability to conceive of an object's matter apart from the object's form (Ackrill 1972–3, 124). When an object of one kind changes into an object of a different kind, we do not think that the old object vanishes and the new object appears out of nowhere. We think that something changes from the old object into the new object. Thus, we must assume that something underlies the change from the old form to the new form. Aristotle calls this underlying thing the object's matter (*Phys.* 211b31–33; *GC* 320a1–5). The purpose of Aristotle's concept of matter is to pick out an underlying thing identifiable apart from the form that it currently has. If we cannot distinguish X's matter from X's form, then we defeat this purpose.

There is a second reason, not explicitly mentioned by Ackrill, for thinking that we must be able to conceive of X's matter apart from X's form. If we can conceive of X's matter only as having X's form, then we can conceive of X's matter only as X's-matter-having-X's-form; but "X's-matter-having-X's-form" sounds suspiciously like X itself; thus, if we can conceive of X's matter only as having X's form, then the distinction between X and X's matter breaks down. Therefore, an inability to conceive of X's matter apart from X's form threatens the distinction between X's matter and X itself.

Erasing the distinction between X's matter and X itself would be unacceptable to Aristotle, for he explicitly distinguishes them. Consider his discussion of substance in the *Metaphysics*. He lists three candidates for the title of "substance": (1) matter, (2) form, (3) the matter-form composite (*Metaph*. 1028b2–3; 1042a25–31). The question of which candidate he ultimately chooses is a vexed one. Intuitively, we would expect him to regard the composite as the true substance, but some commentators believe that the *Metaphysics* (to the extent that it reaches a single, coherent conclusion) settles on particular forms—not a form of catness shared by all cats, for example, but the particular instance of catness belonging to this particular cat—as the entities most entitled to the status of substance.<sup>52</sup> For our purposes, we need not enter into this dispute. The important thing is that Aristotle distinguishes X, the matter-form composite, from X's matter.

Ackrill seems to be right, then: we must be able to conceive of X's matter apart from X's form. In that case, the idea of essentially ensouled bodies is problematic. If X's matter has X's form essentially, then we cannot conceive of X's matter apart from X's form.

Therefore, if Ackrill is right, then X's matter cannot have X's form essentially. A living thing's matter is its body, and its soul is its form. If X's matter cannot have X's form essentially, then a living thing's body cannot be essentially ensouled.

\_

The issues and positions involved are complex, and I cannot examine them in detail here. For example, Whiting (1986) and Irwin (1988) claim that a substance is a particular form, but they interpret this claim (along with the concept of particular forms) in such a way that it is compatible with the claim that a substance includes matter or is in some sense identical to the matter-form composite (Whiting 1986, 372–373; Irwin 1988, 250–252, 257–259). Spellman (1995, 40) argues that substances are "specimens of natural kinds." Although she says that her view "has evident affinity to the view that there are particular forms," she also compares her view to the idea that forms are "neither particulars nor universals" (Spellman 1995, 51). Hartman (1976, 554) offers one of the most straightforward arguments for the conclusion that a substance is a particular form: a substance must be a form, not a matter-form composite, because a substance can persist while exchanging matter with its environment.

#### 3. Two kinds of matter?

For scholars who think that Aristotle believes in essentially ensouled bodies, the objections in the previous section present a challenge. Later we will survey the main reasons why some Aristotle scholars accept essentially ensouled bodies. For now, I want to respond to one attempt to defuse the objections in the previous section.

Faced with such objections, Whiting (1992, 76, 84) and Shields (2010) propose the following solution. We must distinguish, they say, two kinds of matter in a living thing. Shields calls the two kinds of matter "organic matter" and "non-organic matter." Whiting does not use this terminology, but she proposes the same basic idea (see also Irwin 1988, 286). Modern science tells us that a less-organized stuff called protein underlies the moreorganized stuff called flesh. Likewise, according to Whiting and Shields, at least two items count as a living thing's matter: a less-organized "non-organic matter" and a moreorganized "organic matter." A living thing's organic matter is essentially ensouled, whereas its non-organic matter is contingently ensouled. According to Whiting and Shields, the rule that X's form is not essential to X's matter (call it "the non-essentiality rule") applies only to non-organic matter, not to organic matter. Thus, Shields and Whiting attempt to preserve the non-essentiality rule while retaining the idea of an essentially ensouled body, namely the living thing's organic matter.

Unfortunately, Shields's and Whiting's solution solves one problem at the expense of creating another. Their solution is to restrict the scope of the non-essentiality rule. That rule, they claim, applies only to some kinds of matter—to "non-organic" as opposed to "organic" matter. This claim creates a new problem: why organic matter has its form essentially even though non-organic matter does not.

In order to avoid these difficulties, I propose a different solution: we can simply deny that a living thing's body is essentially ensouled.

# 4. A living thing's body: an overview

To evaluate my proposed solution, we must examine a living thing's body in more detail. In this section, I outline some of Aristotle's general views about a living thing's body and argue that those views do not suggest that a living thing's body is essentially ensouled.

Aristotle thinks that only an actually-living thing has the potential for life. A living thing's body obviously has the potential for life, for it *is* alive. As we have seen, Aristotle thinks that this potential for life neither precedes the living thing's life nor survives its death. The only things that have the potential for life are ones that are actually alive.

As for why the potential for life does not survive death, I agree with the answer that Mirus (2001, 372) gives. Here is a slightly elaborated version of Mirus's answer. We cannot turn life off and on at will. A living thing does not stop living unless it deteriorates in a way that destroys its potential for life. Such deterioration slowly accumulates during a living thing's life in the process called aging. Aristotle knows this: vital functions decay, he says, "because something else within is destroyed" (*DA* 408b24–5). A body dies when it has deteriorated so much that its structures can no longer support life. In other words, a body dies when it is no longer potentially alive. We might compare a living thing's body to a light bulb that is never turned off. Because the light bulb is never turned off, it stops glowing only when it burns out. That is, it stops glowing only when it no longer has the potential to glow. Likewise, a living thing's body stops living only when it no longer has the potential to live. Thus, the potential for life does not survive the living thing's death.

If the potential for life does not survive death, then a living thing's body does not survive the living thing's death. A body dies only when its body has broken down to the point where it no longer has the potential for life. In other words, a living thing's body dies only when it can no longer serve as the living thing's matter. For Aristotle, a living thing's body is that which serves as the living thing's matter. Therefore, what exists after a living thing's death does not count as the living thing's body. The point is not just that the living thing no longer exists and the body is therefore no longer the body of that living thing; rather, the point is that what exists after the living thing's death is not the sort of thing that could serve as the living thing's body.

If Aristotle's remarks about body and soul were limited to the ones cited above, we would have no reason to think that a living thing's body is essentially ensouled. Granted, my body exists only when it has my soul. But this is simply because my soul does not depart until my body breaks down.

# 5. Arguments for essentially ensouled bodies

Although the discussion in section 4 seems to undermine the idea of essentially ensouled bodies, Aristotle's remarks about body and soul are not limited to the ones cited above. Various texts do, at first glance, suggest that a living thing's body is essentially ensouled. To my knowledge, commentators give five main arguments for the conclusion that a living thing's body is essentially ensouled. One of these arguments rests on Aristotle's claim that the potential for life does not survive death (see Shields 2010). As I have argued, that claim does not truly entail that a living thing's body is essentially ensouled. The remaining four arguments require careful analyses of some texts. I will consider each of these four arguments and provide a counterargument to each.

## 5.1. First argument

The first argument (Whiting 1992, 77) is straightforward. In *DA* 412b16–17, Aristotle says that the soul is the essence of "a certain kind of natural body having within itself a source of movement and rest." Therefore, a living thing's body is essentially ensouled.

Let us examine *DA* 412b16–17 more closely. *DA* 412b16–17 does not say that the soul is the body's essence. Rather, it says that the soul is the essence of "a certain kind of natural body having within itself a source of movement and rest". A "natural body having within itself a source of movement and rest" is a *living* body. Thus, Aristotle could be saying that the soul is the essence of a *living* body.

A comparison with the *Physics* seems to confirm this interpretation. When *DA* 412b16–17 speaks of "a certain kind of natural body having within itself a source of movement and rest," it echoes *Phys.* 2.1, for *Phys.* 2.1 identifies a natural body's "nature" as its internal source of movement and rest. According to *Phys.* 2.1, it is form, not matter, that primarily plays this role of "nature" in an object. Therefore, a natural body must include not only matter but also form. When *DA* 412b16–17 describes the soul as the essence of a "natural body," it presumably means that the soul is the essence of a matter-form composite. In the context of living things, the matter-form composite is the whole living thing, the living body, not the body alone. Therefore, *DA* 412b16–17 apparently means that the soul is the essence of a *living* body.

This conclusion is also supported by a statement slightly earlier in the *De anima*. Immediately before *DA* 412b16–17, Aristotle says that some natural bodies are living bodies and that the soul is associated with "a body of such a kind"—that is, with a living

body (*DA* 412a12–16). Thus, at *DA* 412b16–17, Aristotle presumably means that the soul is the essence of a living body.

Suppose *DA* 412b16–17 means that the soul is the essence of a living body. From this, can we infer that the soul is the essence of the *body*? Not unless we treat "body" and "living body" as synonyms. In other words, not unless we assume that the body is essentially living, essentially ensouled. But that is precisely what is at issue. Thus, we cannot infer that the body is essentially ensouled without begging the question.

I will admit that one can interpret *DA* 412b16–17 so that it supports the idea of essentially ensouled bodies. Perhaps *DA* 412b16–17 does not mean that the soul is the essence of a living body. Perhaps it means something like this: the soul is the essence of a living thing's body. So If the soul is the essence of a living thing's body, then that body is essentially ensouled.

I freely grant that *DA* 412b16–17 can be interpreted in a way that supports essentially ensouled bodies, but I have shown that we need not interpret it that way. By itself, *DA* 412b16–17 does not tell us whether Aristotle believes in essentially ensouled bodies. The proponents of essentially ensouled bodies will have to find further evidence to support their position.

### **5.2. Second argument**

The second argument (Ackrill 1972–3, 126; Whiting 1992, 77; Frey 2007, 168) relies on Aristotle's claims about organs. An eye's essence is its function: to be an eye is to be able to perform the function of an eye, which is to see (*Meteor.* 390a10–12; *DA* 412b20–22). An eye cannot perform that function apart from a living—that is, ensouled—body.

<sup>&</sup>lt;sup>53</sup> I thank Casey Perin for bringing this possibility to my attention.

Therefore, organs such as eyes are essentially parts of an ensouled body (*Meteor.* 390a10–13; *GA* 734b24–27; *Metaph.* 1035b25; *Pol.* 1253a20–25). Aristotle says that the body which serves as a living thing's matter is *organikon* (*DA* 412b4). He presumably intends this claim in a strong sense: a living thing's body is essentially *organikon*. In this context, *organikon* is commonly translated as "having organs." Thus, we get the following claim: a living thing's body essentially has organs and organs are essentially parts of an ensouled body, then a living thing's body is essentially ensouled.

This argument is problematic because it does not use the term "essence" in an Aristotelian way. The argument claims that organs such as eyes are "essentially" parts of an ensouled body. Now, it is true that for Aristotle, an eye's essence is (partly?) the eye's function. It is also true that the eye must be part of an ensouled body in order to perform that function. But this does not show that being part of an ensouled body is part of the eye's essence. It merely shows that the eye's essence, its function, depends on an ensouled body. If the eye's essence depends on an ensouled body, then the eye is necessarily part of an ensouled body. As we have seen, however, "necessarily" does not mean "essentially": from the fact that Socrates is necessarily capable of learning grammar, it does not follow that he is essentially capable of learning grammar. Likewise, from the fact that the eye is necessarily part of an ensouled body, it does not follow that the eye is essentially part of an ensouled body.

By itself, this objection would seem to be decisive: without the premise that organs are essentially parts of an ensouled body, the argument's conclusion cannot follow. Before we move on, however, I would like to highlight some other problems with the argument above.

The argument assumes that "the body is essentially *organikon*" means "the body essentially has organs." As several scholars have pointed out, however, Aristotle almost always uses *organikon* to mean "useful" or "instrumental", not "having organs." Thus, we must ask what it could mean for the body to be "useful" or "instrumental." Leunissen (2010, 54) suggests that a living thing's body is the soul's "instrument" in the following sense: the living thing's body "is present for the sake of the performance of all the characteristic life functions that make up that [living thing]'s life"—that is, that living thing's soul. On Leunissen's interpretation, a living thing's body is *organikon* in the sense that it exists for the sake of the soul.

If we accept Leunissen's interpretation, then we need not conclude that the body is essentially ensouled. Aristotle says that matter exists for the sake of form (*Metaph*. 1050a15). Thus, for Aristotle, there is a general sense in which, for every X, X's matter exists for the sake of X's form. As Leunissen suggests, the body may exist for the sake of the soul in that sense. From the fact that the body exists for the sake of the soul in that general sense, it does not follow that the body is essentially ensouled. After all, the bronze in a bronze statue exists for the sake of the statue's form in this sense, but having the statue's form is not part of the bronze's essence.

Drawing on Leunissen, I would like to make the following suggestion: when Aristotle says that the soul is united to an *organikon* body, he means that the soul is united to a body that exists for the sake of the soul, and the body exists "for the sake of" the soul only in the same sense that every object's matter exists for the sake of that object's form. If

<sup>&</sup>lt;sup>54</sup> For sources and a brief discussion, see footnote 16 in Leunissen 2010, 53–54.

the body is *organikon* only in this sense, then it does not follow that the body is essentially ensouled.

## 5.3. The eye analogy

The third argument (Whiting 1992, 77; Shields 2007, 290–291; 2010; compare Irwin 1988, 285) rests on an analogy that Aristotle draws between the eye and the body. If the eye were an animal, Aristotle says, then its soul would be sight (DA 412b19). In the same passage, he says that sight is essential to the eye<sup>55</sup> and that a blind eye is an eye only in name (DA 412b20–21). He also says we should treat the whole body as we treat parts such as the eye (DA 412b22–25). This implies that just as sight is essential to the eye, so the soul is essential to the body.

Dealing with the eye analogy is complicated, for the analogy permits multiple interpretations. In this section, I offer three possible interpretations of the analogy and show that none of them entail that the body is essentially ensouled.

### **5.3.1. First interpretation**

Let us inspect the eye analogy more closely. Aristotle says not that we should treat the whole body as we treat the eye but, rather, that we should treat the whole *living* and *perceptive* body as we treat the eye (*DA* 412b22-5). If we take Aristotle's words literally, then he is not comparing the eye to the body qua body. Rather, he is comparing the eye to the *living* body. In that case, the eye analogy does not entail that the *body* is essentially ensouled. At most, it entails that the *living* body is essentially ensouled.

<sup>&</sup>lt;sup>55</sup> To be more precise, Aristotle says that sight is the eye's "substance" (*DA* 412b20). Here he seems to be using "substance" to mean essence, for he elsewhere says that the eye is defined by sight (*Meteor.* 390a10–12).

#### 5.3.2. Second interpretation

According to the first interpretation, Aristotle is comparing the eye to the *living* body, not to the body qua body. For argument's sake, let's now suppose that Aristotle is comparing the eye to the body qua body. Does it follow that the body is essentially ensouled?

That depends. We must know exactly how far the analogy is supposed to go. Sight is essential to the eye, and sight is like the eye's soul. If the eye and the body are analogous in all respects, then we must conclude that the soul is essential to the body. But perhaps the analogy is more limited. Before introducing the eye analogy, Aristotle does say that sight is essential to the eye, but he also says that a blind eye is no longer an eye except in name (*DA* 412b21). Thus, perhaps the analogy is supposed to be this: just as a blind eye is no longer an eye, so a dead body is no longer a body.

If Aristotle is merely noting that a dead body is no longer a body, then it does not follow that bodies are essentially ensouled. We have already seen why a dead body is no longer a body. A body dies when it breaks down. Once it breaks down, it is no longer potentially alive and, thus, no longer the sort of thing that could serve as a living thing's body. From this, it does not follow that the body is essentially ensouled. All that follows is that the body is necessarily ensouled, and something can be necessary without being essential.

# 5.3.3. Third interpretation

In the first and second interpretations, I asked whether the analogy is between the eye and the body or between the eye and the *living* body. To some, this question may seem like hair-splitting. Some might say the point of the eye analogy is simply this: we must treat

the whole as we treat the part. A sightless eye is an eye only in name, and the eye is part of the body. Thus, perhaps we should interpret the eye analogy as follows: just as a sightless eye is an eye only in name, so a soulless body must be *something* only in name.

If this interpretation is correct, some might conclude that the body is essentially ensouled. Here is the argument that they would give. A soulless body is something only in name. A soulless body cannot be a *living* body only in name: a soulless body is a lifeless body, and no one would call a lifeless body a living body, even just in name. If we cannot say that a soulless body is a *living* body only in name, then we seem to have only one option: we must say that a soulless body is a *body* only in name. In other words, a soulless body is not a genuine body. If a soulless body is not a genuine body, then bodies are essentially ensouled.

This argument is unconvincing because it confuses "essentially ensouled" with "necessarily ensouled." If a soulless body is not a genuine body, then the body is necessarily ensouled. It does not follow that the body is essentially ensouled. Again, the analogy with the ability to learn grammar is helpful. Socrates necessarily has the ability to learn grammar, but it does not follow that the ability to learn grammar is part of his essence.

### 5.4. Fourth argument

The fourth argument appears in Shields (2007, 293). Shields notes that throughout a living thing's life, its body loses old material and gains new material. My body contains almost none of the material that it contained when I was three years old. Given this fact, one might wonder what makes my current body the same body as my three-year-old body. The answer seems to be my soul: my current body and my three-year-old body are the same body because they share the same soul. Thus, as Shields puts it, my body "is parasitic

for its identity conditions on the soul whose body it is": it is the body that it is because it has my soul. Therefore, my body is essentially ensouled.

I think that Shields is too quick to seize upon the soul as the preserver of the body's identity. In describing Shields's argument, I considered the following question: what is the factor that makes my body the same body over time? Shields thinks that the factor must be my soul. Presumably, the factor must be some form that persists despite the loss of old material and the gaining of new material, but I do not think that this form must be my soul. It might be my body's structure. True, my body's structure has changed over time, but the change has been gradual. I have had pretty much the same bodily structure from any one moment to the next. Perhaps the continuity of my body's structure makes my body the same body over time.

If bodily structure makes the body the same body over time, then we need not say the soul makes the body the same body over time. Aristotle denies that the soul is a harmony—that is, a way in which the body's parts are combined or organized (*DA* 407b30–33). As Heinaman (1990, 88–89) notes, this seems to rule out the possibility that the soul is the body's structure or organization. According to a fairly common interpretation, an Aristotelian soul consists of a living thing's biological and psychological capacities (capacities to grow, reproduce, perceive, etc.) (see Ackrill 1972–3, 126; Witt 1989, 136). Robinson (1995, 46), by contrast, suggests that the soul might be the underlying vital activity that *gives* a living thing its biological and psychological capacities, much as the activity in a car's engine gives the car the ability to move around. At any rate, there is no need to identify the soul with the body's structure.

# 6. Scotus and Ockham: the Corpse and Accidents Arguments

If my argument has been correct up to this point, then Aristotle does not regard a living thing's body as essentially ensouled. To this extent, Aristotle agrees with medieval pluralists such as Scotus and Ockham, who claim that the body is what it is independently of the soul. In this section, however, I argue that the agreement ends there. Scotus, Ockham, and other medieval pluralists such as Henry of Ghent argue that the body is what it is independently of the soul on the grounds that the body continues to exist after the soul departs—that is, after death. Call this argument "the Corpse Argument." Some versions of the Corpse Argument rest on Christian theological premises. Because Aristotle was a pagan who lived before Christianity arose, we would not expect him to agree with those arguments. A more interesting point of disagreement concerns non-theological versions of the Corpse Argument. In this section, I present the non-theological versions of the Corpse Argument given by Scotus and Ockham.

In his version of the Corpse Argument, Scotus asks us to imagine that a living thing has recently died and remarks:

Here we must posit more than one [substantial form]. And what is the reason? That which is always a reason to distinguish one thing from another, namely a contradiction. A contradiction is an immediate reason to distinguish more than one being, insofar as one thing and another receive a contradiction in their existing. For if this exists and that does not exist, then they are not the same in existing. Thus, in

<sup>&</sup>lt;sup>56</sup> If the bodies of living things do not survive death, then the body in Christ's tomb would not have been Christ's body (Ockham, *Quod.* 2.11.49-52). If the body in the tomb was not Christ's body, then a Mass celebrated between Christ's death and his resurrection would not have succeeded in making Christ's body present in the eucharistic bread (see Scotus, *Ord.* 4.11.1.2.1.286). Because the Mass must succeed in making Christ's body present, the argument goes, the bodies of living things must survive death. This argument was employed not only by Scotus and Ockham but also by other pluralists such as Henry of Ghent (Wippel 1981, 344).

the proposed situation, the body remains while the form of the soul does not remain. Therefore, we must posit that in every living thing, the form by which the body is a body is other than that by which the living thing is [a living thing].<sup>57</sup> (*Ord.* 4.11.1.2.1.279–282)

When a living thing has died, Scotus says, its body remains but its soul does not remain. Therefore, although the body still exists, the living thing does not exist. If X exists when Y does not exist, then X is not numerically identical to Y (as Scotus puts it, "if this exists and that does not exist, then they are not the same in existing"). Because the body still exists when the living thing does not exist, the living thing is not numerically identical to its body. Therefore, the form that makes the body a body (that is, the form of corporeity) is not the form that makes the living thing a living thing (that is, the soul).

This argument would not persuade a unitarian. A unitarian like Aquinas thinks that there is a single substantial form, the soul, that makes formless prime matter into a living thing. On this view, not only the living thing but all of its parts are what they are because of the soul, for without the soul, there would be only prime matter. Hence, a unitarian would say that a living thing's soul makes the living thing's body what it is. On the unitarian view, not only the living thing but also the body goes out of existence when the soul departs (see CT 1.209). Since the Corpse Argument rests on the opposite assumption, it may seem to beg the question against the unitarian.

The charge of question-begging is not, it should be said, anachronistic. Although

Scotus and Aquinas were not exact contemporaries, Scotus often refers to Aquinas's views

<sup>&</sup>lt;sup>57</sup> hic enim est necessitas ponendi plura. Et quae? Illa quae est ratio universaliter distinguendi hoc ab illo, scilicet contradictio, quae est ratio immediata distinguendi plura sub ente, utpote si hoc et illud recipiant contradictionem in essendo, quia si hoc est et illud non est, non sunt idem in essendo. Sic in proposito, forma animae non manente, corpus manet. Et ideo universaliter in quolibet animato necesse est ponere formam illam—qua corpus est corpus—aliam ab illa qua est animatum.

and was clearly familiar with them. It is therefore possible and, I think, likely that Scotus had the unitarian Aquinas in mind when he wrote the Corpse Argument, so it is legitimate to ask whether the Corpse Argument represents a non-question-begging response to unitarianism.

If the Corpse Argument is to avoid begging the question, its proponents must provide some justification for thinking that a living thing's body continues to exist after the living thing dies. In Scotus's fairly abbreviated version of the Corpse Argument, no such justification appears. Ockham, however, provides a more elaborate version of the Corpse Argument that I call "the Accidents Argument":

But in order to prove this [that is, that the soul is distinct from corporeity], I first argue as follows: numerically the same accidents remain in a dead human being or animal that existed before; therefore, the accidents have numerically the same subject. The inference is obvious, for accidents do not naturally migrate from one subject to another. The subject in this case cannot be prime matter, for then prime matter would be the unmediated recipient of absolute accidents, and that does not seem correct. Therefore, some preceding form remains, and not the sensitive soul. Therefore, corporeity remains. I prove the assumption that the accidents in the live animal are numerically identical to those in the dead one as follows. If they are numerically different accidents, then they belong to the same species as the living animal's accidents. For things are assimilated if a human being cannot distinguish

them. Therefore, if they are numerically different accidents, then I ask what caused them.<sup>58</sup> (*Quod.* 2.11.12–36)

The Accidents Argument features many concepts and argumentative moves that need unpacking. To facilitate this unpacking, I will divide the argument into three sub-arguments and analyze each sub-argument in turn.

The logic of the Accidents Argument may be clearest if we start with the subargument that appears last in the text:

I prove the assumption that the accidents in the live animal are numerically identical to those in the dead one as follows. If they are numerically different accidents, then they belong to the same species as the living animal's accidents. For we assimilate things if a human being cannot distinguish them. Therefore, if they are numerically different accidents, then I ask what caused them.

This sub-argument rests on three premises. The first premise is only implicit: it is that we cannot distinguish the accidents—the color, shape, and so on—of a fresh corpse from the accidents that belonged to the living thing right before it died. The second premise is that "things are assimilated if a human being cannot distinguish them"—that is, if we cannot distinguish X from Y, then we regard X and Y as entities of the same kind. On the basis of these two premises, Ockham claims that we should regard the corpse's accidents as of the same kind ("species") as the living thing's accidents. The third premise is that there seems

<sup>58</sup> Tamen ad hoc probandum arguo primo sic: mortuo homine sive bruto animali, remanent eadem accidentia numero quae prius; igitur habent idem subiectum numero. Consequentia patet, quia accidens naturaliter non migrat a subiecto in subiectum; sed illud subiectum non est materia prima, quia tunc materia prima immediate reciperet accidentia absoluta, quod non videtur verum; igitur remanent aliqua forma praecedens, et non sensitiva; igitur corporeitas. Assumptum, scilicet quod eadem accidentia numero manent in animali vivo et mortuo, probo, quia saltem si sint alia accidentia, sunt eiusdem specie cum accidentibus animalis vivi; quod patet ex hoc quod tantum assimilantur quod homo non potest iudicare inter illa. Si igitur sint nova accidentia, quaero a quo causatur.

to be no cause that would produce new accidents of that kind in a corpse. Thus, the conclusion follows that the corpse's accidents are numerically identical to the living thing's accidents.

The first premise, of course, is not strictly true. The living thing clearly had some accidents that the corpse lacks, and vice versa. For example, the corpse may be colder than the living thing. Ockham knows this and does not mean to deny it. When he says that we cannot distinguish the corpse's accidents from the living thing's accidents, he means that many if not most of the corpse's accidents—its color, its general shape, etc.—are indistinguishable from the living thing's accidents.

The next sub-argument—by "next," I mean next logically, not next in the text—moves from the first sub-argument's conclusion to the further conclusion that the corpse's accidents have the same subject as the living thing's accidents:

numerically the same accidents remain in a dead human being or animal that existed before; therefore, the accidents have numerically the same subject. The inference is obvious, for accidents do not naturally migrate from one subject to another.

This second sub-argument relies on the premise that "accidents do not naturally migrate from one subject to another." For example, if one man ceases to be pale and another man becomes pale, the second man's paleness is not numerically identical to the first man's paleness; the two men have the same *kind* of accidental form, namely paleness, but not the very same accidental form. If we combine this premise with the first sub-argument's conclusion—that the corpse's accidents are numerically identical to the living thing's

accidents—then we reach the conclusion that the corpse's accidents belong to the same subject as the living thing's accidents.

With the second sub-argument, the Accidents Argument has established that there is some subject that persists across death and exists in both the living thing and the corpse.

The Accidents Argument's ultimate goal is to prove that the living thing's body persists across death. Therefore, the argument needs to show that the subject that persists across death is the living thing's body. The third sub-argument tries to show this:

The subject in this case [that is, the subject of both the living thing's and the corpse's accidents] cannot be prime matter, for then prime matter would be the unmediated recipient of absolute accidents, and that does not seem correct. Therefore, some preceding form remains, and not the sensitive soul. Therefore, corporeity remains.

Ockham thinks that pure prime matter, which is not itself any kind of substance, is not the sort of thing that can have accidents such as colors and temperatures. In that case, the subject of the living thing's and the corpse's accidents cannot be pure prime matter; it must be or include a substantial form. This substantial form cannot be the soul, for the latter departs at death, whereas the former persists across death. The only remaining possibility, according to the third sub-argument, is that a form of corporeity persists across death. In other words, the corpse has the same form of corporeity as does the living thing.

We can now summarize the Accidents Argument. In the first sub-argument, Ockham uses the resemblance between a living thing and its corpse to argue that the very same accidents exist before and after death. In the second sub-argument, he argues that if the very same accidents exist before and after death, then the same subject exists before and after death. In the third sub-argument, he concludes that the same form of corporeity exists

before and after death. The form of corporeity is what makes matter into the body. Thus, the Accidents Argument, if successful, supports the Corpse Argument's premise that the same body exists before and after death.

#### 7. Aristotle vs. the Corpse and Accidents Arguments

Given our discussion of Aristotle's views, it might seem obvious that Aristotle would reject the Corpse Argument. The Corpse Argument rests on the premise that the body survives death. Because Aristotle denies that the body survives death, it seems that he would reject the Corpse Argument.

Such a conclusion is too hasty. We must ask whether Aristotle and the Corpse Argument use the term "body" in the same way. For Aristotle, a living thing's body is the living thing's matter. In his version of the Corpse Argument, Scotus merely says that the body still exists after the soul departs; he does not specify what he means by "body." If Scotus means something other than the living thing's matter, then there is no conflict between Aristotle's views and Scotus's Corpse Argument.

However, Aristotle's views about death appear to conflict with Scotus's Corpse

Argument when that argument is viewed in the context of Scotus's other ideas. As we saw
in Chapter 1, Scotus thinks that if a substance has several substantial forms, then the
substance can be analyzed into form and matter, where the form is one of the substantial
forms and the matter is prime matter plus the other substantial forms. In the case of a
living thing, the form is the soul, and the matter is prime matter plus the form of corporeity.
In other words, the living thing's matter is the body that consists of prime matter and the
form of corporeity. Scotus's Corpse Argument claims that the body that consists of prime
matter and the form of corporeity survives death. Therefore, his Corpse Argument claims

that the body that is the living thing's matter survives death. Aristotle, as we know, rejects this claim.

Moreover, our discussion of Ockham in Chapter 1 shows that Aristotle's views about death do indeed conflict with the Corpse Argument as Ockham understands it. As we saw in Chapter 1, Ockham thinks that the body (or the body's form of corporeity) serves as matter for the soul. The Corpse Argument says that this body survives death. Therefore, Ockham's Corpse Argument claims that the body that serves as the soul's matter survives death. As we have seen, Aristotle explicitly denies that what survives death can serve as the soul's matter: what exists after death, he says, lacks the potential for life—that is, the potential for soul.

If Aristotle denies that the body survives death, then one might wonder how he would respond to the Accidents Argument. The Accidents Argument uses the similarity between the living body's accidents and the corpse's accidents to argue that the same body exists before and after death. Aristotle needs some way to explain the similarity between the living body and the corpse without admitting that the same body exists after death.

I think that such an explanation is available to Aristotle. When Aristotle denies that the body survives death, he is not claiming that *nothing* in the living thing survives death. Instead, he is claiming that what remains after death has deteriorated to the point where it can no longer support life. We would expect these remains to resemble the living thing in many ways (at least until decay progresses), just as we would expect a car to retain its color and shape even after its engine has deteriorated. Thus, the similarity between the living thing and the corpse poses no threat to Aristotle's views about death.

#### 8. Aristotle's non-unitarianism

In light of sections 1–5, it appears that Aristotle's account of living things' bodies would entail pluralism if placed within a medieval hylomorphic framework. Within such a framework, a living thing's body must have some substantial form that combines with the body's matter to make the body. If this substantial form is the soul, then the soul makes the body what it is—or in other words, the body is essentially ensouled. We have seen that Aristotle does not regard the body as essentially ensouled. Therefore, the substantial form that makes the body what it is must be something other than the soul. In other words, the living thing must have at least two substantial forms: the soul and a form that makes the body what it is (that is, a form of corporeity).

Whether Aristotle himself would draw this conclusion is an open question—and not simply because he does not use the term "substantial form." On some readings of Aristotle, not all material things have substantial forms. Hartman (1976, 554) claims that "living beings ... alone are genuine substances" for Aristotle. If only living things are substances, then inanimate objects neither are nor consist of substances and therefore do not have substantial forms. Sokolowski (1982, 100) argues that for Aristotle, the four so-called elements (earth, fire, air, and water) are not full-fledged substances and "do not have substantial forms." Aristotle says that each of the four elements has two of four primary qualities (hot, cold, wet, and dry). On Sokolowski's reading, each element's form *just is* the combination of two primary qualities. Sokolowski offers several reasons why this interpretation rules out substantial forms in the elements. One reason is that a substantial form cannot come in degrees (something cannot be a certain substance—a human being, for example—to a greater or lesser degree), whereas the primary qualities do come in

degrees (for example, something can be more or less hot). If Hartman and Sokolowski are correct and not all material things have substantial forms, then a living thing's body—not the *living* body but, rather, the body considered apart from the soul—might be one of the material things that do not have substantial forms. If a living thing's body does not have a substantial form of its own, then there is no obvious reason to think that the living thing contains any substantial forms other than the soul. So perhaps Aristotle would not posit more than one substantial form in a living thing.

Be that as it may, we can say that Aristotle is no medieval unitarian when it comes to living things. Unitarians claim that there is a single substantial form, namely my soul, that makes my body what it is. If my main argument in this chapter is correct, then Aristotle does not think that my soul makes my body what it is. Therefore, he is not a unitarian. If forced to choose, I would place Aristotle in the pluralist rather than the unitarian camp.

At the same time, Aristotle does not reject unitarianism for the reason some pluralists such as Scotus and Ockham reject it. As we saw in section 6, Scotus and Ockham reject unitarianism on the grounds that a living thing's body still exists after the living thing's death. As we saw in section 7, however, Aristotle denies that a living thing's body exists after the living thing's death.

It may not be surprising that neither side of the unitarian/pluralist debate adopted what I believe is Aristotle's true position, for the position is a subtle one. Unlike the medieval pluralists, Aristotle thinks that a dead body is no longer the same body.<sup>59</sup> Unlike

 $support\ unitarian ism.$ 

<sup>&</sup>lt;sup>59</sup> One might expect Aquinas, as a unitarian, to seize on Aristotle's idea that a dead body is no longer the same body. Aquinas does endorse that idea, but oddly enough, I know of no place where he uses that idea to argue for unitarianism. When he does cite the idea, he uses it to support other conclusions—for example, that Christ's human soul was united to its body in the usual way human souls are united to their bodies (*CT* 1.209). I do not know why Aquinas does not use the idea that a dead body is no longer the same body to

the unitarians, he thinks that the body is what it is independently of the soul. If the body ceases to exist at death, it is not because the loss of the soul destroys the body. The truth is almost the reverse: a living thing does not stop living—does not give up its soul—until the body breaks down, so it is the body's breakdown that causes the loss of soul.

### REFERENCES

- Ackrill, J.L. 1972–3. "Aristotle's Definition of *Psuche*." *Proceedings of the Aristotelian Society* 73: 119–133.
- Alarcón, Enrique, ed. 2013. *Corpus Thomisticum*. http://www.corpusthomisticum.org/iopera.html.
- Apostle, Hippocrates G. 1981. Commentary on *Aristotle's On the Soul*, translated by Hippocrates G. Apostle. Grinnell: The Peripatetic Press.
- Bäck, Allan. 2000. Aristotle's Theory of Predication. Leiden: Brill.
- Bechler, Zev. 1995. *Aristotle's Theory of Actuality*. Albany: State University of New York Press.
- B. Ioannis Duns Scoti. 2010. *Opera Omnia*. Vol. 12, edited by B. Hechich, J. Percan, S. Recchia, S. Ruiz de Loizaga, W. Salamon, G. Pica. Vatican City: Typis Vaticanis.
- Bostock, David. 2003. Commentary on *Metaphysics: Books Z and H*, translated by David Bostock. Oxford: Oxford University Press.
- Cross, Richard. 1999. Duns Scotus. Oxford: Oxford University Press.
- Doig, James C. 2001. *Aquinas's Philosophical Commentary on the* Ethics: *A Historical Perspective*. Dordrecht: Springer.
- Dowd, Joseph. 2015. "Does Aristotle Believe in Essentially-Ensouled Matter?" *Ancient Philosophy* 35.1: 97–111.
- Frey, Christopher. 2007. "Organic Unity and the Matter of Man." *Oxford Studies in Ancient Philosophy* 32: 167–204.
- Hamlyn, D.W., trans. 1993. *De Anima: Books II and III (With Passages from Book I)*. Oxford: Clarendon.

- Hartman, Edwin. 1976. "Aristotle on the Identity of Substance and Essence."
- Heinaman, Robert. 1990. "Aristotle and the Mind-Body Problem." *Phronesis* 35.1: 83–102.
- Irwin, Terrence. 1988. Aristotle's First Principles. Oxford: Oxford University Press.
- Johansen, T.K. 2007. Aristotle on the Sense-Organs. Cambridge: Cambridge University Press.
- Keyt, David. 2006. "Aristotle's Political Philosophy." In *A Companion to Ancient Philosophy*, edited by Mary Louise Gill and Pierre Pellegrin, 393–413. Malden: Blackwell.
- König-Pralong, Catherine. 2011. "Form and Matter." *Encyclopedia of Medieval Philosophy:*Philosophy Between 500 and 1500. Vol. 1. Ed. Henrik Lagerlund. Dordrecht: Springer.

  356–361.
- Kyriakou, Poulheria. 1993. "Aristotle's Political 'Poetics'." *Mnemosyne*, Fourth Series 46.3: 344–55.
- Leunissen, Mariska. 2010. *Explanation and Teleology in Aristotle's Science of Nature*. New York: Cambridge University Press.
- Makin, Stephen. 2006. Commentary on *Metaphysics: Book*  $\Theta$ , translated by Stephen Makin. Oxford: Oxford University Press.
- Mirus, Christopher V. 2001. "Homonymy and the Matter of a Living Body." *Ancient Philosophy* 21.2: 357–73.
- Moody, Ernest A. 1975. *Studies in Medieval Philosophy, Science, and Logic: Collected Papers,*1933–1969. Berkeley: University of California Press.
- de Ockham, Guillelmi. 1980. *Opera Theologica*. Vol. 9, *Quodlibeta Septem*. St. Bonaventure, NY: The Franciscan Institute.
- Robinson, Timothy. 1995. Aristotle in Outline. Indianapolis: Hackett.
- Shields, Christopher. 2007. Aristotle. New York: Routledge.

- \_\_\_\_\_. 2010. "A Fundamental Problem about Hylomorphism." In *The Stanford Encyclopedia of Philosophy*. Stanford University. Last modified August 23.

  http://plato.stanford.edu/archives/spr2011/entries/aristotle-psychology/suppl1.html.
- Sokolowski, Robert. 1982. "Matter, Elements and Substance in Aristotle." *Substances and Things: Aristotle's Doctrine of Physical Substance in Recent Essays*. Ed. M.L. O'Hara. Washington, D.C.: University Press of America. 89–116.
- Spellman, Lynne. 1995. *Substance and Separation in Aristotle*. Cambridge: Cambridge University Press.
- Te Velde, Rudi A. 1995. Participation and Substantiality in Thomas Aquinas. Leiden: Brill.
- Toivanen, Juhana. 2013. *Perception and the Internal Senses: Peter of John Olivi on the Cognitive Functions of the Sensitive Soul*. Leiden: Brill.
- Ward, Thomas M. 2014. John Duns Scotus on Parts, Wholes, and Hylomorphism. Leiden:
  Brill.
- Whiting, Jennifer. 1986. "Form and Individuation in Aristotle." *History of Philosophy Quarterly* 3.4: 359–377.
- \_\_\_\_. 1992. "Living Bodies." In *Essays on Aristotle's De Anima*, edited by Martha C. Nussbaum and Amélie Oksenberg Rorty, 72–91. Oxford: Clarendon.
- Wippel, John F. 1981. The Metaphysical Thought of Godfrey of Fontaines: A Study in Late
  Thirteenth-Century Philosophy.
- Witt, Charlotte. 1989. *Substance and Essence in Aristotle: An Interpretation of Metaphysics VII–IX.* Ithaca: Cornell University Press.

### **CHAPTER 3**

### SOUL-PLURALISM AND MIND-BODY DUALISM IN OCKHAM

Most medieval philosophers were reluctant to attribute more than one soul to a human being (Pasnau 2002, 127). According to Thomas Aquinas,<sup>60</sup> a human being has only one substantial form, a human soul. This soul combines with prime matter to make a substance with all the characteristics of a human being, from corporeality to intelligence. Unlike Aquinas, John Duns Scotus thinks that a human being has more than one substantial form, but even Scotus does not think that a human being has more than one soul: there is only one soul, which makes the body into a living, sensing, thinking human being. By contrast, William of Ockham<sup>61</sup> thinks that a human being has two souls: a vegetative-sensitive soul that combines with the body to make a living animal and an intellective soul that combines with the animal to make a thinking human being. We might call Ockham's unusual position "soul-pluralism."

<sup>60</sup> In citing Aguinas's texts, I follow the editions in Alarcón 2013. I format citations as follows:

Except where otherwise indicated, all translations are my own.

All translations are my own.

<sup>•</sup> Sentencia libri De sensu et sensatio (DSS): "1.2.3" = "tr. 1 l. 2 n. 3"

<sup>•</sup> De malo (DM): "1.2 arg. 3" = "q. 1 a. 2 arg. 3"

<sup>•</sup> *De potentia (DP)*: "1.2 arg. 3" = "q. 1 a. 2 arg. 3"

<sup>•</sup> De unitate intellectus (DUI): "1" = "cap. 1"

<sup>•</sup> De veritate (DV): "1.2 arg. 3" = "q. 1 a. 2 arg. 3"

<sup>•</sup> Quaestiones disputatae de anima (QDA): "1 co." = "a. 1 co."

<sup>•</sup> Sentencia de anima (SDA): "1.2.3" = "lib. 1 l. 2 n. 3"

<sup>•</sup> Scriptum super Sententiis (SS): "1.2.3.4 arg. 5" = "lib. 1 d. 2 q. 3 a. 4 arg. 5"

<sup>•</sup> *Summa contra gentiles (SCG)*: "1.2.3" = "lib. 1 cap. 2 n. 3"

<sup>•</sup> Summa theologiae (ST): "1 2.3 arg. 4" = " $I^{\underline{a}}$  q. 2 a. 3 arg. 4"

<sup>&</sup>lt;sup>61</sup> In this chapter, I cite Ockham's works as follows (work: edition: citation format):

<sup>•</sup> Expositio in Libros Physicorum (ELP): de Ockham 1985: "pr. 1.2" = "prologue, section 1, n. 2"; "1.2.3.4" = "lib. 1 cap. 2 § 3 n. 4"

<sup>•</sup> *Ordinatio* (*Ord.*): de Ockham 2000: "*Ord.* 1.24.1, de Ockham 2000, 78" = "the portion of *Ordinatio* liber 1, dist. 24, q. 1, in de Ockham 2000, 78"

<sup>•</sup> Quodlibeta Septem: de Ockham 1980: "Quod. 2.1.2" = "Quodlibet II, quaestio 1, n. 2"

<sup>•</sup> *Reportatio* (*Rep.*): de Ockham 1984: "*Rep.* 4.9, de Ockham 1984, 160–161" = "the portion of *Reportatio* liber 4 quaest. 9 in de Ockham 1984, 160–161"

In light of recent attempts to position hylomorphism as an alternative to reductive materialism and mind-body dualism, Ockham's soul-pluralism is an interesting case.

Pasnau (2007, 11) has argued that by severing the intellective soul from the soul that gives the body its vegetative and sensitive powers, Ockham comes perilously close to the kind of substance dualism that hylomorphism is supposed to avoid: on Ockham's view, it is unclear what connection, if any, the intellective soul has to the body.

Whether or not Pasnau is correct on this point, there is indeed a link between mind-body dualism and Ockham's soul-pluralism. As I argue in this chapter, Ockham's arguments for soul-pluralism presuppose a kind of mind-body dualism. This Ockhamist dualism is interesting both because it does not fit into the standard categories of substance dualism and property dualism and because it evades a criticism often leveled at mind-body dualism. Some metaphysicians and environmental philosophers have accused mind-body dualism of implying a radical discontinuity within nature—a deep separation between human beings (or conscious organisms in general) and everything else. As we will see, Ockham's dualism shows that this accusation is not always true: his mind-body dualism and his resulting soul-pluralism actually imply greater continuity within nature than does Aquinas's less dualistic philosophy of mind.

I organize this chapter as follows. In section 1, I provide some necessary background information by explaining what Ockham and Aquinas mean by the term "subject." In section 2, I show that Ockham's arguments for soul-pluralism rest on a kind of mind-body dualism. In section 3, I explore Aquinas's philosophy of mind. In section 4, I argue that Ockham's philosophy of mind is more dualistic than Aquinas's. In section 5, I present the claim, made by several metaphysicians and environmental philosophers, that mind-body

dualism implies a problematic discontinuity within nature. In section 6, I argue that Ockham's philosophy of mind implies greater continuity within nature than does Aquinas's.

### 1. The term "subject" in Ockham and Aquinas

Before discussing Ockham's and Aquinas's philosophies of mind, I must say a bit about the term "subject" (*subiectum*) as it appears in Ockham's and Aquinas's writings.

Ockham says that "a form exists in matter as in a subject" (*ELP* 1.14.3.25). Aquinas uses the term "subject" in the same way, saying that a substantial form's subject is prime matter (*ST* 1 48.3 co.; *DP* 3.2 co.) and sometimes using the phrase "matter or subject" (*ST* 2–2 2.9 ad 1; 3 75.8 co.; *DSS* 8 co.). It seems, then, that we can define "subject" as follows: F's subject stands to F as matter to form.

One of Ockham's statements might seem to undermine this interpretation of "subject." "Fire," Ockham says, "is a subject of heat" (*ELP* pr. 3.73). In the most straightforward examples of matter and form, the matter can exist without the form. For example, a bronze statue's bronze can exist without the statue's shape. Fire cannot exist without heat, so one might conclude that fire does not stand to heat as matter to form. Thus, if fire is the subject of heat, then it seems we cannot lay down a general rule that F's subject stands to F as matter to form.

This objection fails to take into account one category of forms: necessary accidents. According to Aristotle and the medieval philosophers who used Aristotleian terminology, a substance has some accidents necessarily. For example, Aristotle says that the ability to learn grammar is an accident that human beings cannot lack (*Topics* 102a18–19).<sup>64</sup> If the

<sup>62</sup> forma enim est in materia sicut in subiecto

<sup>63</sup> ignis est subiectum caloris.

<sup>&</sup>lt;sup>64</sup> I cite Aristotle's *Topics* by Bekker number.

ability to learn grammar is an accidental form belonging to human beings, then human beings stand to the ability to learn grammar as matter to form. Therefore, the fact that human beings cannot (according to Aristotle) lack the ability to learn grammar does not prevent human beings from standing to that ability as matter to form. Likewise, the fact that fire cannot lack heat does not prevent fire from standing to heat as matter to form. For heat may be—and Aquinas says it is<sup>65</sup>—a necessary accident of fire.

If my argument has been correct up to this point, then we can say that F's subject stands to F as matter to form. This statement, however, is imprecise. Aguinas says that it is not the soul but the whole person that thinks (ST 1 75.2 ad 2). In other words, thinking is properly attributed to the whole person, not to the person's soul. At the same time, he says that the soul is the subject of thinking (ST 1 77.5 co.). In short, he identifies the subject of thinking not with the whole thing that thinks but, rather, with the part where thinking occurs. Likewise, Stump (1997, 282) claims that for Aquinas, freedom is a property of the whole person, or at least the whole system of intellect and will, but freedom's subject is the will alone. In other words, the subject of freedom is not the whole thing that is free but, rather, the part where freedom resides, namely the will. Similarly, Ockham says, "A body or surface is a subject of whiteness" (*ELP* pr. 3.70–77). He acknowledges that we might call a body the subject of whiteness, but he says that we can also identify the subject of whiteness with the part of the body where whiteness resides, namely the body's surface. It seems, then, that the word "subject" can be used in two ways. Suppose F stands to M as form to matter. The phrase "F's subject" can refer either to M or to the part of M where F resides.

\_

<sup>&</sup>lt;sup>65</sup> Aquinas writes, "Heat and dryness are proper accidents [*propria accidentia*] of fire" (*QDA* 9 arg. 5). By "proper accidents," he means necessary accidents: "Some [accidents] are proper accidents, ... whose existence is never separated from that of their subject" (*DV* 3.7 co.).

In the texts that I examine in this chapter, Ockham use the term "subject" in the second way. For example, as we will see, Ockham says that the subject of mental activities is the sensitive or intellective soul, not the whole person. In these texts, therefore, F's subject is not the whole thing that stands to F as matter to form but, rather, the part where F resides. I will henceforth use the term "subject" in that sense.

### 2. Dualism in Ockham's arguments for soul-pluralism

With the concept of a subject in hand, we can now turn to Ockham's arguments for soul-pluralism. In this section, I argue that Ockham's two main arguments for soul-pluralism presuppose a version of mind-body dualism in which the subject of mental activities is the soul alone, not the body or the composite of body and soul.

Ockham's first main argument for soul-pluralism, which I call "the Opposites

Argument," centers on what he calls "the sensitive appetite" and "the intellective appetite."

The sensitive appetite is an appetite for what appeals to the senses. The intellective appetite is an appetite for what appeals to the intellect. Employing these concepts, Ockham makes the following argument in his *Quodlibet* II:

I first prove that [the sensitive soul and the intellective soul] are really distinct as follows. It is impossible for contraries to exist simultaneously in the same subject. But the activity of wanting a thing and the activity of rejecting that same thing are contraries [if they occur] in the same subject. Therefore, if they occur simultaneously in something's nature, then they do not occur in the same subject. But they clearly occur simultaneously in a human being, for a human being can want

a thing with his sensitive appetite and reject that same thing with his intellective appetite.<sup>66</sup> (*Quod.* 2.10.13–19)

Sometimes you want something with your sensitive appetite but reject it with your intellective appetite. For example, you might want to continue eating ice cream because the ice cream appeals to your sense of taste but reject any further ice cream because your intellect tells you that eating too much ice cream is bad for you. Wanting ice cream and rejecting ice cream are opposites according to Ockham, or at least they *would* be opposites if they occurred in the same subject.<sup>67</sup> Ockham claims that opposites cannot exist simultaneously in the same subject. Thus, he infers that the wanting and the rejecting have different subjects—that is, that they occur in different parts of you.

We have not yet reached Ockham's stated conclusion, namely that a person's sensitive soul is not her intellective soul. Instead, we have reached the conclusion that wanting X with the sensitive appetite and rejecting X with the intellective appetite have different subjects. We must explain how Ockham gets from the latter conclusion to the former. The simplest explanation—and, I believe, the correct one—is that Ockham bridges the gap with the following unstated premise: when one wants something with the sensitive appetite, the subject of the wanting is the sensitive soul, and when one rejects something with the intellective appetite, the subject of the rejecting is the intellective soul.

If this is correct, then we can summarize the Opposites Argument as follows. One can want something with the sensitive appetite and simultaneously reject it with the

<sup>&</sup>lt;sup>66</sup> Probo tamen quod distinguuntur realiter primo sic: impossibile est quod in eodem subiecto sint simul contraria; sed actus appetendi aliquid et actus renuendi idem in eodem subiecto sunt contraria; igitur si sint simul in rerum natura, non sunt in eodem subiecto; sed manifestum est quod sunt simul in homine, quia illud idem quod homo appetit per appetitum sensitivum, renuit per appetitum intellectivum.

<sup>&</sup>lt;sup>67</sup> This qualification ("or at least they *would*...") may be unnecessary, since Ockham might be willing to say that wanting X and rejecting X are opposites without qualification; however, I am trying to stay close to the actual text, which says that wanting X and rejecting X are opposites if they occur "in the same subject."

intellective appetite. Wanting and rejecting the same thing are opposites if they occur in the same subject. Therefore, the wanting and the rejecting have different subjects. The wanting's subject is the sensitive soul, and the rejecting's subject is the intellective soul.

Therefore, the sensitive soul is not the intellective soul.<sup>68</sup>

In the Opposites Argument, Ockham seems to assume that only a soul can be a subject of mental activities. As I have argued, the Opposites Argument rests on the unstated premise that when one wants something with the sensitive appetite, the subject of the wanting is the sensitive soul, and when one rejects something with the intellective appetite, the subject of the rejecting is the intellective soul. Ockham does not even consider the possibility that wanting and rejecting could have something other than a soul as their subject.

One might think that Ockham's assumption is not very surprising, given his hylomorphism. If the soul were a substance separate from the body, then the claim that only souls can be subjects of mental activities would indeed be striking: it would be equivalent to substance dualism. For hylomorphists such as Ockham, however, a soul is simply the form of a living thing, not a substance separate from the body.<sup>69</sup>

On the contrary, I would argue that Ockham's hylomorphism makes the idea of the soul as the subject of wanting and rejecting more surprising, not less. I take it that present-

\_

<sup>&</sup>lt;sup>68</sup> The Opposites Argument bears a striking similarity to an argument that appears in Plato's *Republic*, though I do not know whether Ockham read that work. In the *Republic*, Plato argues that the human soul has three parts. Like Ockham, Plato claims that opposites cannot occur simultaneously in the very same part of a thing. On the basis of this claim and the observation that reason, animal appetite, and "spirit" (that is, the capacity for honor and aggression) sometimes incline an agent in opposite directions, Plato concludes that reason, animal appetite, and spirit are different parts of the soul. Plato's argument is not identical to the Opposites Argument: unlike Plato's reason, which corresponds to Ockham's intellective soul, animal appetite and spirit do not neatly correspond to either of the two souls (intellective and sensitive) that figure in the Opposites Argument. Although Ockham and Plato are not making the same argument, their arguments nonetheless appeal to the same principle: that opposites cannot exist simultaneously in the same part of a thing.

<sup>69</sup> I thank Thomas Ward for alerting me to this objection.

day thinkers do not usually regard a form as the sort of thing that could be a subject of activities. Consider a hand's accidental form of dexterity. The dexterity enables the hand to perform the activity of grasping things, but the subject of the activity is the hand, not the dexterity. It is not clear what it would even mean to say that grasping occurs in the hand's dexterity, whereas it is obvious that grasping occurs in the hand. Likewise, the accidental form called mathematical knowledge enables the mind to perform the activity of calculating, but the subject of the activity is the mind, not the mathematical knowledge. In thinking that a form is the subject of mental activities, Ockham deviates from this pattern. It is easy to see why the subject of mental activities would *include* a form. For example, if we say that the brain is the subject of mental activities, then the subject of mental activities includes a form, for the brain is a matter-form composite, not pure prime matter. Ockham, however, seems to think that the subject of mental activities is pure form, not a matter-form composite. I discuss this point further in section 4 below.

Ockham's second argument for soul-pluralism, which also appears in his *Quodlibet*II, is as follows:

Sensations have the sensitive soul as their mediate or immediate subject, and they don't have the intellective soul as their subject. Therefore, the sensitive soul and the intellective soul are [numerically] distinct. The major premise is obvious, for nothing can be the subject of sensation besides either the sensitive soul or the sensitive power, and if the sensitive power is an accident of the sensitive soul, then the sensitive power will have the sensitive soul as its subject. The minor premise is proved as follows: otherwise, every apprehension of the sensitive soul would be an intellection, for it would have the intellective soul as its subject; likewise, then the

separated soul could have sensations. For sensation would have the intellective soul as its subject, and God can preserve every accident in its subject apart from anything else, so he could preserve sensation in the separated soul, which is absurd.<sup>70</sup> (*Quod.* 2.10.47–53)

This passage has three parts: a simple three-step argument, an argument supporting the three-step argument's first step, and an argument supporting the three-step argument's second step. Let us examine each of these three parts in turn.

The passage begins with the simple three-step argument: "Sensations have the sensitive soul as their mediate or immediate subject, and they don't have the intellective soul as their subject. Therefore, the sensitive soul and the intellective soul are [numerically] distinct." This argument has two premises and a conclusion. The first premise is that the sensitive soul is the (mediate or immediate) subject of sensations. The second premise is that the intellective soul is not the subject of sensations. The conclusion is that the sensitive soul is numerically distinct from the intellective soul.

Ockham supports the first premise—that the sensitive soul is the subject of sensations—with the following argument:

The major premise [that is, the first premise] is obvious, for nothing can be the subject of sensation besides either the sensitive soul or the sensitive power, and if the sensitive power is an accident of the sensitive soul, then the sensitive power will have the sensitive soul as its subject.

posset conservare sensationem in anima separata; quod est absurdum.

<sup>&</sup>lt;sup>70</sup> sensationes sunt subiective in anima sensitiva mediate vel immediate; et non sunt subiective in anima intellectiva; igitur distinguuntur. Maior patet, quia nihil aliud potest assignari subiectum sensationum nisi anima sensitiva vel potentia; et si potentia sit accidens anima, erit subiective in anima sensitiva. Minor probatur, quia aliter omnis apprehensio animae sensitivae esset intellectio, quia esset subiective in anima intellectiva. Similiter tunc anima separata potest sentire, quia ex quo sensatio est subiective in anima intellectiva et Deus potest conservare omne accidens in suo subiecto sine quocumque alio, per consequens

Ockham thinks that the subject of sensations must be either the sensitive soul or the sensitive power (that is, the power to have sensations). He also thinks that the sensitive power's subject is the sensitive soul. It follows that the sensitive soul is either the mediate or the immediate subject of sensations. The sensitive soul is the immediate subject of sensations if it directly serves as the subject of sensations. The sensitive soul is the mediate subject of sensations if it serves as the subject of the sensitive power and the sensitive power, in turn, serves as the subject of sensations.

In order to support the second premise—that the intellective soul is not the subject of sensations—Ockham provides the following argument:

The minor premise is proved as follows: otherwise, every apprehension of the sensitive soul would be an intellection, for it would have the intellective soul as its subject; likewise, then the separated soul could have sensations. For sensation would have the intellective soul as its subject, and God can preserve every accident in its subject apart from anything else, so he could preserve sensation in the separated soul, which is absurd.

This argument provides two different reasons for thinking that the intellective soul is not the subject of sensations. The first reason is that the intellective soul is the subject of thoughts, not sensations. If a sensation occurred in the intellective soul, Ockham says, then that sensation would be a thought (an "intellection") rather than a sensation. He seems to assume that each soul can host only one kind of mental state, either sensation or thought. The second reason has to do with the immortality of the soul. Ockham takes the intellective

soul's immortality for granted as part of the Christian faith, $^{71}$  so he believes that the intellective soul exists after the body's death and dissolution. Hence, he believes in disembodied intellective souls. If the intellective soul were the subject of sensations, then God could cause sensations to exist in a disembodied intellective soul. Ockham thinks it is "absurd" to suppose that the soul could have sensations in the absence of bodily senseorgans. He concludes that the intellective soul is not the subject of sensations.

In this passage, Ockham seems to assume that only a soul can be a subject of mental activities. Recall that the passage begins with a three-step argument. The argument's first premise is that the sensitive soul is the subject of sensations. In defense of this first premise, Ockham says that the subject of sensations is either the sensitive soul or the sensitive power. He does not even consider the possibility that the subject of sensations is a bodily sense-organ rather than the sensitive soul alone.<sup>72</sup> Now, it would not be surprising if he identified a soul as the subject of *intellective* activities: as we will see, Aquinas is less of a mind-body dualist than Ockham, but even Aquinas thinks that the subject of intellective activities is the soul alone, not the body. In this case, however, Ockham is discussing sensitive, not intellective, activities. The fact that he identifies the subject of even sensitive activities as a soul suggests that he thinks all mental activities must have a soul as their subject.

It seems, then, that both of Ockham's arguments for soul-pluralism presuppose a kind of mind-body dualism. Both arguments assume that the subject of *all* mental activities

<sup>&</sup>lt;sup>71</sup> Ockham doubts that human reason can establish the soul's immortality; instead, he accepts the doctrine on faith. Here he contrasts with Aguinas, who provides philosophical arguments for the intellective soul's immortality (ST 1 75.6). For a discussion of Ockham's more modest view of reason's ability to establish the soul's immortality, see Adams 2001.

<sup>72</sup> This is not an oversight on Ockham's part. He argues elsewhere that a matter-form composite, such as the human body, cannot be the subject of sensations. See the footnote at the end of this section.

(not just intellective activities, as for Aquinas) must be a soul rather than a body. Granted, Ockham does not conceive of the soul in the same way as substance dualists: as a hylomorphist, he thinks that the soul stands to the body as form to matter, 73 not as one substance to another, separate substance. Nonetheless, he believes that no bodily organ is the subject of mental activities; the subject of mental activities is, instead, a soul that may inform a corporeal body but that is not itself a corporeal object. 74

# 3. The subjects of mental states in Aquinas

In the previous section, I argued that Ockham thinks that every mental activity has a soul as a subject. Not all medieval philosophers agree with this mind-body dualism.

Aquinas, probably the best-known medieval philosopher, clearly rejects it. In order to bring out the significance of Ockham's mind-body dualism and lay some groundwork for later sections of this chapter, I now turn to Aquinas. I argue that Aquinas, unlike Ockham, thinks that most mental activities have the matter-form composite, not the soul alone, for a subject.

According to Aquinas, the subject of sensitive activities such as seeing and hearing is the matter-form composite. For example, the following argument from Aquinas's *Summa* 

<sup>&</sup>lt;sup>73</sup> As we will see in section 4, this statement is true in a very literal sense for Ockham. For the unitarian Aquinas, a human being has only one substantial form, a human soul, that combines with prime matter to make a living human body. On this unitarian view, the soul's matter is not really the body but prime matter. For Ockham, by contrast, the form of corporeity combines with prime matter to make a body, and the soul, in turn, takes this body as its matter. I thank Thomas Ward for drawing my attention to this point.

<sup>&</sup>lt;sup>74</sup> This mind-body dualism is a special case of a more general principle. In his *Quodlibet* II (*Quod.* 2.10.54–58) and *Reportatio* (*Rep.* 4.9, Ockham 1984, 163–164), Ockham rebuts the suggestion that sensations have a matter-form composite, rather than the soul alone, as their subject. He claims that a sensation, being simple (that is, without parts), cannot have a complex thing, such as a matter-form composite, as its subject. (The sensation might have a simple *part* of a complex thing as its subject, but that is a different matter.) Given this argument, Ockham would presumably say that no simple form, whether the form is a mental activity or something else, can have a matter-form composite as its subject.

Hence, Ockham's mind-body dualism does not rest on the idea that there is something mysterious or magical about the mental. (He may think that there is something mysterious about the mental, but that is not why he is a dualist.) Instead, his dualism rests on a general metaphysical principle that applies to all simple accidents, not just mental ones.

*theologiae* shows that he regards the matter-form composite as the subject of seeing and hearing:

Now [only] that which *can* perform an activity *does* perform the activity. Thus, the activity and the power [to perform the activity] must belong to the same thing [that is, must have the same thing as their subject]. ... But some activities of the soul are exercised through bodily organs—for example, seeing through the eye and hearing through the ear. ... And so the powers that are the source of such activities are in the [matter-form] composite as in a subject and not in the soul alone.<sup>75</sup> (*ST* 1 77.5 co.)

This argument consists of three steps, which I will label "A," "B," and "C":

- A. An activity and the power to perform the activity have the same thing as their subject.
- B. Seeing and hearing are exercised through bodily organs.
- C. Therefore, the power to see and the power to hear have the matter-form composite as their subject.

As Step C shows, this argument's purpose is to prove that the matter-form composite is the subject of the *power* to see and the *power* to hear. However, we can also conclude that the matter-form composite is the subject of seeing and hearing themselves. Two facts support this conclusion.

First, Step B says that seeing and hearing are "exercised through" bodily organs.

Bodily organs are not pure soul. Therefore, when Step B says that seeing and hearing are "exercised through" bodily organs, this presumably means that seeing and hearing are

<sup>&</sup>lt;sup>75</sup> Idem autem est quod potest operari, et quod operatur. Unde oportet quod eius sit potentia sicut subiecti, cuius est operatio ... Quaedam vero operationes sunt animae, quae exercentur per organa corporalia; sicut visio per oculum, et auditus per aurem. ... Et ideo potentiae quae sunt talium operationum principia, sunt in coniuncto sicut in subiecto, et non in anima sola.

"exercised through" the matter-form composite, not the soul alone. It is not immediately clear what "exercised through" means, but Steps A and C provide some clues. In order to get from Step A to Step C, Aquinas needs something like the following premise: seeing and hearing have the matter-form composite as their subject. Therefore, when Step B says that seeing and hearing are "exercised through" the matter-form composite, this presumably means that seeing and hearing have the matter-form composite as their subject.

Second, one can take Steps A and C and use them as premises in the following argument:

- 1. An activity and the power to perform the activity have the same thing as their subject. (Step A)
- 2. The power to see and the power to hear have the body-soul composite as their subject. (Step C)
- 3. Therefore, seeing and hearing have the body-soul composite as their subject. Thus, even if Step B does not mean that seeing and hearing have the matter-form composite as their subject, Aquinas's argument still implies that seeing and hearing have the matter-form composite as their subject. For Steps A and C have that implication.

At first glance, this conclusion—that Aquinas thinks the matter-form composite, not the soul alone, is the subject of sensitive activities such as seeing and hearing—may seem unexciting. Even a substance dualist, who thinks that the subject of mental activities is an immaterial mind separate from bodily organs, would probably say that seeing and hearing involve bodily organs, namely eyes and ears. In fact, the claim that eyes and ears are involved in seeing and hearing may be true by definition: if someone has a visual or

auditory sensation that does not result from any stimulation of her eyes or ears, we would call that sensation not "seeing" or "hearing" but "seeming to see" or "seeming to hear." 76

When Aguinas says that bodily organs are the subjects of seeing and hearing, however, he is not merely saying that seeing and hearing involve bodily organs. Someone could say that the activities of seeing and hearing involve bodily organs but still claim that the *mental components* of those activities—that is, visual and auditory sensations—have the soul alone as their subject. I think that Aguinas rejects this claim. For Aguinas, I assert, sensations have the matter-form composite, not the soul alone, as their subject. Cohen (1982) provides several pieces of textual evidence that Aquinas regards the matter-form composite as the subject of sensations. In the paragraphs that follow, I examine the two pieces of evidence provided by Cohen that I find most convincing.

The first piece of evidence is Aquinas's claim that "sense images" (phantasmata) are "in corporeal organs" (ST 1 89.1 co. and 85.1 ad 3, Cohen's translation). Cohen provides this quote "without comment" (Cohen 1982, 201), but I think that a bit of explanation is in order. According to Aquinas, sense-images are "likenesses of sensible objects" (SDA 3.13.5) that are "received from the senses" (SDA 3.12.3). These sense-images are what we call up when we imagine sensible objects: "As concepts stand to the intellect, so senseimages stand to the imagination"<sup>79</sup> (DM 16.11 arg. 4). In short, sense-images are sensations that can be stored and recalled even when bodily sense-organs are not being stimulated. Yet even sense-images, Aquinas says, reside in bodily organs; their subject is the matterform composite, not the soul alone.

<sup>&</sup>lt;sup>76</sup> I thank Thomas Ward for suggesting a similar objection.

<sup>77</sup> Phantasmata enim sunt similitudines sensibilium.

<sup>&</sup>lt;sup>78</sup> phantasmata autem a sensu accipiuntur

<sup>&</sup>lt;sup>79</sup> sicut se habet species intelligibilis ad intellectum, ita se habet phantasma ad imaginationem.

The second piece of evidence is Aquinas's discussion of disembodied souls (Cohen 1982, 201–202). He says that God can produce intellective activities in disembodied souls (*ST* 1 89.1 co.). Therefore, if the subject of sensations were the soul alone, then God would be able to produce sensations in a disembodied soul. Like Ockham, however, Aquinas denies that any component of sensitive activities can exist in a disembodied soul: "No activity of the sensitive part [of the soul] can exist without the body"<sup>80</sup> (*SCG* 2.82.2). Therefore, sensations do not have the soul alone as their subject.

There is a third piece of evidence that I would like to add to the ones cited by Cohen. Aquinas says that the human soul can perform an activity—thinking—that has the soul itself for a subject. Because the human soul can perform an activity on its own, Aquinas argues, the human soul can exist on its own, apart from the body (ST 1 75.2 co.). By this reasoning, if sensations had the soul itself as their subject, then all souls capable of sensation could exist apart from their bodies. Aquinas, however, denies that the sensitive souls of nonhuman animals can exist apart from their bodies: "the souls of brute animals are not subsistent [that is, they cannot exist apart], since they do not have any activity of their own" ST 1 75.3 co.). It follows that sensations do not have the soul itself (as opposed to the matter-form composite) as their subject.

Although Aquinas thinks that the matter-form composite is the subject of sensations, he thinks that the soul alone is the subject of intellective activities such as thinking. He writes that "the intellect inheres formally in [a human being]—not so as to be

<sup>80</sup> nulla operatio sensitivae partis esse sine corpore potest.

<sup>81</sup> Cohen (1982, 202) appears to touch on a related point in a footnote.

<sup>82</sup> cum animae brutorum animalium per se non operentur, non sint subsistentes

the body's form but, rather, because it is a power of the soul, which is the body's form"83 (*DUI* 4). In other words, the body is not directly the intellect's subject; rather, the body is the soul's subject, and the soul, in turn, is the intellect's subject. The intellect is the power to think. For Aquinas, therefore, the soul is the subject of the power to think. If we combine this conclusion with Aquinas's claim that an activity and the power to perform the activity have the same thing as their subject, we can construct the following argument: an activity and the power to perform the activity have the same thing as their subject; the power to think has the soul as its subject; therefore, thinking has the soul as its subject.

This is not to say that thinking is an activity of the soul alone. As Aquinas says in his *Summa theologiae*, "one can say that the soul thinks, just as one can say that the eye sees, but it is more proper to say that the human being thinks through the soul" <sup>84</sup> (*ST* 1 75.2 ad 2). Although we sometimes speak of eyes seeing things (consider the line "Mine eyes have seen the glory of the coming of the Lord" in "The Battle Hymn of the Republic"), it is really the person who sees things with her eyes. Although we sometimes speak of hands grasping things, it is really the person who grasps things with her hand. By the same token, Aquinas says, although we can say that the soul thinks, it is really the person who thinks with her soul.

Nonetheless, the *subject* of thinking is the soul alone. Recall how I am using the word "subject" in this chapter: the subject of F is not the whole thing that stands to F as matter to form but, rather, the part where F resides. The part of a human being where thinking

<sup>83</sup> intellectus formaliter ei inhaereat, non quidem ita quod sit forma corporis, sed quia est virtus animae quae est forma corporis.

<sup>&</sup>lt;sup>84</sup> Potest igitur dici quod anima intelligit, sicut oculus videt, sed magis proprie dicitur quod homo intelligat per animam

resides is the soul: just as seeing occurs in the eye and not the foot, so thinking occurs in the soul.

## 4. Ockham vs. Aquinas on mind-body dualism

In the previous sections, I examined Ockham's and Aquinas's views of mental activities. In this section, I argue that Aquinas's view of mental activities is far less dualistic than Ockham's.

In order to understand the relevant difference between Ockham's philosophy of mind and Aquinas's, one must understand that a matter-form composite is divisible in two ways. The analogy of cutting a layer cake may help. We can cut a layer cake vertically into slices, but we can also cut it horizontally into its lower and upper layers. Likewise, we can cut a matter-form composite vertically, so to speak, into various physical parts, but we can also cut it horizontally into two metaphysical parts: an underlying matter and an overlying form.<sup>85</sup>

Because Aquinas and Ockham both view a human being as a matter-form composite, they agree that a human being can be divided into layers corresponding to form and matter. Beyond that point, however, their views diverge. For Aquinas, a human being is a two-layered cake: the layers are prime matter and a human soul. For Ockham, a human being has many layers: a form of corporeity is layered on top of prime matter to make a body; a vegetative-sensitive soul is layered on top of the body to make an animal; and an intellective soul is layered on top of the animal to make a human being.

<sup>&</sup>lt;sup>85</sup> As Ward (2014, 1) notes, medieval philosophers would call the analysis of objects into matter and form not "metaphysical" but "physical," for they used the terms "physics" and "metaphysics" differently than we do. In calling matter and form "metaphysical parts," I am acquiescing to present-day philosophical usage.

For Aquinas, most mental activities are not localized in either the upper or the lower layer of the cake. As we saw in section 3, he thinks that the subject of sensations is the matter-form composite, not the soul alone. Sensations may have specific *physical* parts of a human being as their subjects—for example, visual sensations have the eyes as their subject—but they do not have any specific *metaphysical* part of a human being as their subject. If we divide a human being into physical parts—that is, into different bodily organs—then visual sensations belong to one part, namely the eyes, and auditory sensations belong to a different part, namely the ears. If, however, we divide a human being into metaphysical parts—into prime matter and a human soul—then visual sensations and auditory sensations do not have either part for a subject; their subject is the whole matter-form composite.

For Aquinas, only intellective activities have the soul alone as their subject. Because he thinks that intellective activities have the soul alone as their subject, one might conclude that he is a kind of mind-body dualist—or, more precisely, an intellect-body dualist. In one sense, this is completely true. I should note, however, that Aquinas's dualism is a dualism of a fairly weak kind. There are two factors that militate against classifying Aquinas as a mind-body dualist. First, he does not think that all mental activities have the soul alone as their subject: only intellective activities occur in the soul alone. Second, although he regards intellective activities as non-bodily, his unitarianism entails that a human being's intellective activities and bodily characteristics flow from the very same substantial form.

-

<sup>&</sup>lt;sup>86</sup> Oderberg (2005), for example, describes Aquinas's view of human beings as "hylemorphic dualism." Oderberg (2005, 86) says that hylomorphism "is dualistic with respect to all the analysis of *all* material substances without exception, since it holds that they are all composites of primordial matter and substantial form," but he also notes that on Aquinas's view, human beings have a special claim to the dualist label, since they have "at least some mental operations that are not wholly explicable in material terms."

On both counts, Ockham is much more of a mind-body dualist. First, he thinks that all mental activities are non-bodily. As we have seen, he thinks that the subject of sensations is the sensitive soul and the subject of intellections is the intellective soul. For him, the matter-form composite—that is, the ensouled body—is not the subject of any mental activities. Certain bodily organs (for example, eyes and ears) must exist in order for sensations (for example, visual and auditory sensations) to occur, but those sensations take place in the sensitive soul alone, not in the body. Second, Ockham thinks that mental activities and bodily characteristics result from different substantial forms: mental activities result from the sensitive and intellective souls, whereas bodily characteristics result from the form of corporeity.

This Ockhamist mind-body dualism does not correspond to either of the major versions of dualism found in today's philosophy textbooks. Present-day philosophers routinely categorize theories of mind-body dualism as either substance dualism or property dualism. According to substance dualism, a human being consists of two substances, a material body and an immaterial mind, and the immaterial mind is the subject of mental activities. According to property dualism, a human being is just one substance, a material body, but that body has both physical and nonphysical properties, and among the nonphysical properties are mental ones. Ockham's dualism is not mere property dualism, for he thinks that the subject of a mental properties is a soul distinct from the body. Yet he is not a substance dualist, for he thinks that soul and body are not two separate substances but, rather, united as form and matter.

# 5. Dualism and the continuity of nature

This Ockhamist mind-body dualism not only defies the usual categories of substance and property dualism but also reveals the limitations of one line of objection to mind-body dualism. Some metaphysicians and environmental philosophers have accused mind-body dualism of implying a problematic discontinuity between certain beings and the rest of nature. In the next section, I explain why Ockham's dualism forces us to qualify such objections. In this section, I present the family of objections itself.

It is easy to see why some might associate mind-body dualism with discontinuity or division within nature. The most famous version of mind-body dualism is René Descartes's substance dualism, which the environmental philosopher Mary Midgley describes as follows:

Descartes sharply divided the world into mind and matter ... The two kinds of item were taken to be so different that they could have no properties in common. We ourselves were pure subjects—minds. The physical world, by contrast, was pure object, and could not, in spite of appearances, be in any way akin to us. (Midgley 1992, 48)

As Midgley notes, Descartes views mind and matter as two separate and completely different substances: matter is extended but not conscious; mind is conscious but not extended. On this view, there are two fundamentally different parts of reality—mind and matter—with no continuity between them.

In this section, however, my focus is not discontinuity between mind and matter but discontinuity between certain beings and the rest of nature. In the case of Cartesian dualism, the beings in question are human beings. Descartes claims that only human beings

have immaterial souls. By itself, this claim is reasonable enough to anyone who does not expect to meet tigers and goldfish in heaven. When combined with this claim, however, Descartes's mind-body dualism—his idea that mental states reside only in immaterial souls, not in material bodies—seems to entail that the nonhuman world is utterly mindless, devoid not only of reason but even of feeling.<sup>87</sup> As Passmore (1995, 135) reports, many philosophers have thought that Descartes "separated consciousness from nature so absolutely that the two could no longer be brought into any relationship with one another." The environmental philosopher Erazim Kohák makes the same point more starkly, in a passage clearly intended to allude to Descartes:

Humans are angels incarnate, endowed with an immortal soul, other animals are material organisms or simply machines ... Figuratively speaking, humans are descended from above, in the sequence God-angels-humans, all other life rises from below, in the sequence matter-plants-animals. There is no point of contact between humans and the highest primates, orangutans and chimpanzees. (Kohák 2000, 19)

This passage is not, and does not claim to be, an accurate statement of Descartes's views.

Descartes explicitly denies that human beings are "angels incarnate," and he posits many "point[s] of contact" between human beings and other animals: "It is certain," he says in a 1649 letter to Henry More, "that in the bodies of animals, as in ours, there are bones,

Ω

<sup>&</sup>lt;sup>87</sup> According to the standard interpretation, Descartes thinks that nonhuman animals completely lack subjective experience. Not all commentators agree with this interpretation. Harrison (1992, 227) claims that Descartes is "cautiously agnostic on the whole question" of whether nonhuman animals have conscious experience. Cottingham (1987, 557–559) argues that Descartes is inconsistent, attributing conscious experience to nonhuman animals even though such an attribution is inconsistent with his metaphysics. My focus in this chapter is not Descartes scholarship, so I will accept the standard interpretation without trying to judge whether it is correct.

<sup>&</sup>lt;sup>88</sup> If an angel were put in charge of a body, Descartes (1997, 206) says in a 1642 letter to Henricus Regius, then the angel would perceive what happens to the body without feeling any bodily sensations. The fact that the human mind feels bodily sensations shows that the relationship between the human mind and its body is quite different from the relationship between the hypothetical angel and its body.

nerves, muscles, animal spirits and other organs so arranged that they can by themselves, without any thought, give rise to all the movements we observe in animals" (Descartes 1997, 366).<sup>89</sup> However, Kohák's point is that regardless of Descartes's own views, mindbody dualism of the Cartesian sort encourages human beings to view themselves as something like incarnate angels and the rest of nature as something alien to humanity. Likewise, the ecofeminist writer Val Plumwood says that various dualisms, including Cartesian dualism, suggest "a total break or discontinuity between humans and nature, such that humans are completely different from everything else in nature" (Plumwood 1993, 70; see Benson 2000, 264).

According to the environmental writer Patrick Curry, many environmentalists think that this Cartesian or Cartesian-influenced idea of a radical discontinuity between human beings and the rest of nature has problematic moral implications. These environmentalists see the idea of a "radical split between the human and natural worlds" as "an integral part of the problem" facing the planet (Curry 2006, 44). The idea that mind belongs to human beings alone contributes to what Curry calls "a powerfully held view of the non-human natural world as a set of inert raw resources to be mastered and exploited by human reason" (Curry 2006, 29). Kohák (2000, 67) uses almost the same wording, saying that Descartes "provides the conceptual presuppositions for a crudely exploitive [sic] approach to the world: the world is but raw material, human distinctiveness is the ability to calculate it and master it through that calculation." The idea is straightforward: if, as Descartes seems to claim, the material world is completely mindless and separate from the world of

\_

<sup>&</sup>lt;sup>89</sup> Compare Descartes 1985, 107: when he imagines a living human body without a mind, Descartes says that such a body would contain "organs and mechanisms of such a type that you may well believe very similar ones to be present both in us and in many animals which lack reason."

human consciousness and intelligence, then it is easy to think that the material world has no moral significance and that human treatment of that world is therefore "not subject to any moral curbs" (Passmore 1995, 133).

We can mitigate these ethical worries to some extent by turning from Cartesian dualism to other kinds of mind-body dualism. Unlike Descartes, a present-day substance or property dualist might attribute immaterial minds or nonphysical mental properties to nonhuman animals. Admittedly, such a move hardly guarantees that people will treat the nonhuman world with moral concern. After all, most people assume that nonhuman animals have conscious mental states and yet largely ignore the abuse and exploitation of those animals. Moreover, attributing minds to nonhuman animals does nothing to address the question of how we should treat the vegetable and mineral worlds. Nonetheless, by attributing minds to nonhuman animals, one does avoid reducing at least one part of nonhuman nature to mere matter. Hence, attributing minds to nonhuman animals might provide a motive for environmental responsibility other than pure human self-interest.

Even if attributing minds to nonhuman animals defuses some *ethical* worries, however, it does nothing to solve a basic *metaphysical* problem facing mind-body dualism. The discontinuity between certain beings and the rest of nature that mind-body dualism seems to imply is problematic on its own, quite apart from any environmental concerns. It is to this problem that I now turn.

According to mind-body dualism, conscious organisms (whether human beings alone or animals in general) are fundamentally different from the rest of nature. Dualists disagree about the exact nature of the difference: according to substance dualists, the difference is that conscious organisms have immaterial minds, whereas the rest of nature is

wholly material; according to property dualists, the difference is that conscious organisms have nonphysical properties, whereas the rest of nature has only physical properties.

However, substance dualists and property dualists agree on one central point: some beings have a nonphysical component, whereas the rest of nature is pure physicality.

Appealing to evolutionary theory, Churchland (2013, 35) rejects this dualist vision of nature on scientific grounds:

For the purposes of our discussion, the important point about the standard evolutionary story is that the human species and all its features are the wholly physical outcome of a wholly physical process. Like all but the simplest of organisms, we have a nervous system. ... But a nervous system is just an active matrix of cells, and a cell is just an active matrix of molecules. We are notable only in that our nervous system is more complex and powerful ... If this is the correct account of our origins, then there seems to be neither need, nor room, to fit any nonphysical substances or properties into our scientific account of ourselves. We are creatures of matter. And we should learn to live with that fact. (Churchland 2013, 35)

Taken at face value, this is not a satisfying argument. Churchland says that the evolution of human beings is "a wholly physical process." This statement seems to beg the question: that human evolution was wholly physical—that it did not involve the appearance of an immaterial mind or nonphysical properties—is precisely what Churchland needs to prove. Even if the human nervous system is "an active matrix of cells," it does not follow that the nervous system is "just an active matrix of cells": it is possible that an immaterial mind or

some nonphysical properties appeared at some point in the evolution of the nervous system. Churchland needs to argue against this possibility, not simply reject it.

This possibility seems especially salient in the case of property dualism. According to property dualists, the mental is not an independent substance attached to the nervous system from without but, rather, a set of properties that arise from neural activity. As Jacquette (2009, 39) says, citing the Churchland passage quoted above, it seems that Churchland

begs the philosophically interesting questions against property dualism in the ontology of mind. The property dualist admits all along that mind emerges as a result of purely physical forces, and that human beings in some nonreductive sense are indeed the 'creatures of matter.' From this, however, it would be equivocating to insist that therefore the mind is nothing but a material entity.

According to Jacquette, it is possible that the human nervous system is a "creature of matter," as Churchland claims, but that matter gave rise to nonphysical properties once it achieved a certain level of complexity.

There is, however, a more charitable interpretation of Churchland's argument—an interpretation that does not make the argument immediately question-begging. According to evolutionary theory, human beings resulted from a long, gradual process of evolution stretching all the way back to primitive one-celled organisms. Most dualists would presumably say that primitive one-celled organisms lack immaterial minds or nonphysical

106

<sup>&</sup>lt;sup>90</sup> Traditional, Cartesian substance dualism holds that the mind is a substance that is separate from the body but in some way attached to it. Property dualism holds that mental properties have some part of the body, such as the nervous system, as their subject. There may be a third possibility. Hasker (2001) has recently proposed a theory called "emergent substance dualism," which regards the mind as a substance that is distinct from the body but that nonetheless "emerges" from arrangements of matter much as a magnetic field emerges from a magnet.

properties, that they are "wholly physical," to use Churchland's phrase. Hence, dualists must say that immaterial minds or nonphysical properties first appeared at some point during the evolution of more complex life-forms. But any point that dualists might pick seems arbitrary. As Charles Darwin says in *On the Origin of Species, "Natura non facit saltem,"* "Nature does not leap" (Darwin 2009, 194). That is, each link in the evolutionary chain is only slightly different from the preceding one. The evolution from one-celled organisms to human beings happened gradually, as cells congregated into more complex arrangements, such as the "active matrix of cells" called the nervous system. Hence, it seems arbitrary to pick some moment and say that *that* was the moment when living things first acquired an immaterial mind or nonphysical properties. For example, it seems arbitrary to say that *this* fish's neurobiology gave rise to nonphysical mental properties but its parents' neurobiology, which was nearly the same, did not.

Even if this interpretation of Churchland's argument is correct, the argument may be open to objections. The argument notes that biological evolution is gradual and then asks how the sudden appearance of immaterial minds or nonphysical properties fits into that picture. In response, a dualist could simply insist that there is some evolutionary cutoff point at which immaterial minds or nonphysical properties appear. Because evolution is gradual, we may never know where the cutoff point lies. But something can exist even if we don't know where it is.

My goal, however, is not to defend Churchland's argument but to suggest that his objection to dualism centers on discontinuity. Like the environmental thinkers cited earlier, Churchland seems to think that dualism entails a problematic discontinuity between certain beings and the rest of nature. According to Churchland's argument as I

have interpreted it, the dualist faces the difficult task of explaining why the first conscious organism's biology should give rise to nonphysical traits although the biology of that organism's immediate evolutionary predecessors does not. In other words, Churchland is suggesting that the biological continuity between living things revealed by evolutionary theory leaves no room for the radical discontinuity between conscious organisms and the rest of nature that dualists posit.<sup>91</sup>

To sum up, one might think that mind-body dualism implies a radical and problematic discontinuity between certain beings and the rest of nature. To a Cartesian dualist, nature is purely physical until one reaches human beings, at which point immaterial minds suddenly enter the picture. According to several environmental philosophers, this discontinuity between human beings and the rest of nature is problematic because it encourages moral indifference toward nonhuman nature. Non-Cartesian dualists could partially avoid this moral problem by attributing immaterial minds or nonphysical mental properties to animals other than human beings. On this view, the discontinuity is not between human beings and the rest of nature but between conscious organisms, both human and otherwise, and the rest of nature. This discontinuity may also be problematic, however, for evolutionary theory implies a biological continuity between the first conscious organism and its immediate ancestors that may be hard to reconcile with the sudden appearance of an immaterial mind or nonphysical properties.

-

<sup>&</sup>lt;sup>91</sup> Here theistic dualists may have a slight philosophical advantage over atheistic dualists. Theistic dualists can explain the radical discontinuity between the first conscious organism and that organism's immediate ancestors by saying that God chose to infuse an immaterial mind into that organism but not into its ancestors.

## 6. Ockham and Aquinas on dualism and discontinuity

In the previous section, I surveyed some arguments that mind-body dualism implies, or encourages one to posit, an objectionable discontinuity between certain beings and the rest of nature. The relevant issues are complex, and I will not attempt to resolve them here. I would like to make one point, however: contrary to common belief, more dualistic theories of mind do not always imply a greater discontinuity within nature. As I show in this section, Ockham's mind-body dualism and his resulting soul-pluralism imply greater continuity between human beings and the rest of nature than does Aquinas's less dualistic theory, which seems to imply two deep discontinuities.

The first discontinuity stems from Aquinas's account of the intellect. As we have seen, he thinks that the subject of sensitive activities such as seeing and hearing is the matter-form composite, not the soul alone. On this view, only intellective activities have the soul itself as their subject. Aquinas assumes that human beings are the only animals that can perform intellective activities; indeed, he defines a human being as a rational—that is, intellective—animal (*SS* 1.23.1.3 ad 4). It follows that the human soul is fundamentally different from all other souls: only the human soul can serve as a subject of mental activities; the mental activities of nonhuman organisms do not take place in the soul alone.

Aquinas tries to downplay this discontinuity between human souls and other souls by positing a hierarchy of forms:

We should consider that the nobler a form is, the more it dominates bodily matter, the less it is immersed in it, and the more its activity or power transcends it. Thus, we see that the form of a mixed body has an activity that does not result from the qualities of the elements. And the nobler a form is, the more its power transcends

elemental matter—as the vegetative soul does so more than the form of a metal, and the sensitive soul more than the vegetative soul. Now, the human soul is the noblest of forms. Thus, its power so transcends bodily matter that it has an activity and power in which bodily matter has no share. $^{92}$  (ST 1 76.1 co.)

At the bottom of the hierarchy are the forms of the elements. The forms of "mixed bodies"—substances that arise from the mixing of several elements—are higher than the forms of the elements. Plant souls are higher than the forms of mixed bodies, and animal souls are higher still. Higher forms bring with them powers that are not reducible to the properties of elemental matter. For example, a plant has powers (to nourish itself, grow, and reproduce) that cannot be explained simply in terms of the elemental matter that came together to compose the plant. The human soul, according to Aquinas, is so high on this hierarchy that "it has an activity and power in which bodily matter has no share." The activity in question is intellective activity, whose subject is the soul itself and not any bodily organ. On this view, the human intellect's separation from matter does not entail a radical discontinuity between human souls and other souls; instead, the intellect's separation from matter is the last stage of a gradual detachment from matter that begins as soon as one rises above the level of the elements.

Unfortunately, it is unclear whether this hierarchy of forms succeeds in minimizing the discontinuity between human souls and other souls, if only because it is unclear whether Aquinas provides convincing evidence that properties become less attached to

<sup>&</sup>lt;sup>92</sup> considerandum est quod, quanto forma est nobilior, tanto magis dominatur materiae corporali, et minus ei immergitur, et magis sua operatione vel virtute excedit eam. Unde videmus quod forma mixti corporis habet aliquam operationem quae non causatur ex qualitatibus elementaribus. Et quanto magis proceditur in nobilitate formarum, tanto magis invenitur virtus formae materiam elementarem excedere, sicut anima vegetabilis plus quam forma metalli, et anima sensibilis plus quam anima vegetabilis. Anima autem humana est ultima in nobilitate formarum. Unde intantum sua virtute excedit materiam corporalem, quod habet aliquam operationem et virtutem in qua nullo modo communicat materia corporalis.

matter as one moves up the hierarchy. His hierarchy of forms makes most sense when interpreted as follows: as matter is organized in increasingly sophisticated ways—as it goes from being mere elements to being plants and animals—new properties emerge that are not reducible to the properties of the elements. For the sake of argument, we can assume that Aquinas is right that new properties emerge as one moves up the hierarchy. However, it is one thing to say that the new properties are not reducible to the properties of elemental matter and quite another to say that the new properties are less attached to matter. Even if one grants that intellective activity is not reducible to the properties of elemental matter, it does not follow that intellective activity has no material organ as its subject.

Compared to the picture just sketched, Ockham's mind-body dualism implies far less discontinuity between human souls and other souls. As we have seen, Ockham thinks that the subject of sensations is the soul itself rather than the matter-form composite. Because all animals experience sensations, all animal souls serve as subjects of sensations. (Plant souls do not serve as subjects of sensations, but that is only because plants have no sensations.) Therefore, unlike Aquinas, Ockham does not think that only human souls are subjects of mental activities.

Aquinas's less dualistic philosophy of mind implies a second kind of discontinuity between human souls and other souls. According to Aquinas, each human being has only one substantial form. On this view, the soul that serves as a subject of intellective activities is the very same substantial form that gives the body its corporeal features. Hence, Aquinas avoids mind-body dualism: even intellective activities are tightly bound to the body through a single substantial form. Although this theory minimizes the separation between

intellect and body, it creates a deep rift between human souls and other souls. If, as Aquinas thinks, a human being has only one soul, then this soul is responsible for both intellective activities and sensitive activities. Thus, although we might say that both human beings and other animals have sensitive souls (because the human soul confers sensitive powers and therefore counts as a sensitive soul), it would be more accurate to say that human beings and other animals have no kind of soul in common: human beings have a uniquely human kind of soul, which gives them both sensitive and intellective powers, whereas nonhuman animals have a sensitive but not intellective soul.

By contrast, Ockham's mind-body dualism allows him to say that there is less of a chasm between human souls and the souls of nonhuman animals. As we have seen, Ockham thinks that his mind-body dualism entails a kind of soul-pluralism. According to this soul-pluralism, a human being's intellective soul and sensitive soul are two different substantial forms. On this view, a human being's sensitive soul is not a uniquely human hybrid of the intellective and the sensitive but, rather, a purely sensitive (and vegetative) soul of the kind that nonhuman animals have. Unlike Aquinas, Ockham can say that human beings have a kind of soul in common with other animals.

If my comparison of Ockham's and Aquinas' theories is correct, then we reach a surprising conclusion. Despite the common association of mind-body dualism with discontinuity in nature, Ockham's more dualistic theory implies less discontinuity between human beings and the rest of nature. In short, Ockham's arguments for soul-pluralism show not only that there are possible forms of mind-body dualism other than substance and property dualism but also that mind-body dualism is not always the enemy of continuity within nature: in some cases, it can help to preserve that continuity.

## REFERENCES

- Adams, Marilyn McCord. 2001. "Ockham on the Soul: Elusive Proof, Dialectical

  Persuasions." *Proceedings of the American Catholic Philosophical Association* 75: 43–77.
- Alarcón, Enrique, ed. 2013. *Corpus Thomisticum*. http://www.corpusthomisticum.org/iopera.html.
- Benson, John. 2000. *Environmental Ethics: An Introduction with Readings*. London: Routledge.
- Boden, Margaret A. 2006. *Mind as Machine: A History of Cognitive Science*. Oxford: Clarendon.
- Churchland, Paul M. 2013. *Matter and Consciousness*. 3rd ed., Cambridge: The MIT Press.
- Cohen, Sheldon M. 1982. "St. Thomas Aquinas on the Immaterial Reception of Sensible Forms." *The Philosophical Review* 91.2: 192–209.
- Cottingham, John. 1978. "'A Brute to the Brutes?': Descartes's Treatment of Animals."

  Philosophy 53: 551–561.
- Curry, Patrick. 2006. Ecological Ethics: An Introduction. Cambridge: Polity.
- Darwin, Charles. 2009. *The Annotated* Origin: *A Facsimile of the First Edition of* On the Origin of Species. Edited by James T. Costa. Cambridge: Harvard University Press.
- Descartes, René. 1985. *The Philosophical Writings of Descartes*. Vol. 1. Translated by John Cottingham, Robert Stoothoff, and Dugald Murdoch. Cambridge: Cambridge University Press.

. 1997. The Philosophical Writings of Descartes. Vol. 3, The Correspondence. Translated by John Cottingham, Robert Stoothoff, Dugald Murdoch, and Anthony Kenny. Cambridge: Cambridge University Press. Harrison, Peter. 1992. "Descartes on Animals." The Philosophical Quarterly 42.167: 219-227. Hasker, William. 1982. The Emergent Self. Ithaca: Cornell University Press. Jacquette, Dale. 2009. *The Philosophy of Mind: The Metaphysics of Consciousness*. London: Continuum. Kohák, Erazim. 2000. The Green Halo: A Bird's-Eye View of Ecological Ethics. Peru, Illinois: Open Court. Midgley, Mary. 1992. *Science as Salvation: A Modern Myth and Its Meaning*. London: Routledge. de Ockham, Guillelmi. 1980. Opera Theologica. Vol. 9, Quodlibeta Septem. St. Bonaventure, NY: The Franciscan Institute. \_\_\_\_. 1984. Opera Theologica. Vol. 7, Quaestiones in Quartum Librum Sententiarum (Reportatio). St. Bonaventure, NY: The Franciscan Institute. \_\_\_. 1985. Opera Philosophica. Vol. 4, Expositio in Libros Physicorum Aristotelis: Prologus et Libri I–III. St. Bonaventure, NY: The Franciscan Institute. \_\_\_\_. 2000. Opera Theologica. Vol. 4, Scriptum in Librum Primum Sententiarum. Ordinatio: Distinctiones XIX-XLVIII. St. Bonaventure, NY: The Franciscan Institute. Oderberg, David. 2005. "Hylemorphic Dualism." *Social Philosophy and Policy* 22.2: 70–99. Pasnau, Robert. 2002. Thomas Aquinas on Human Nature. Cambridge: Cambridge

University Press.

- \_\_\_\_\_. 2007. "The Mind-Soul Problem." In *Mind, Cognition, and Representation: The Tradition*of Commentaries on Aristotle's De anima, edited by Paul J.J.M. Bakker and Johannes
  M.M.H. Thijssen, 3–20. Hampshire: Ashgate.
- Passmore, John. 1995. "Attitudes to Nature." *Environmental Ethics*. Ed. Robert Elliot. Oxford: Oxford University Press. 129–141.
- Plumwood, Val. 1993. Feminism and the Mastery of Nature. London: Routledge.
- Stump, Eleonore. 1997. "Aquinas's Account of Freedom: Intellect and Will." *The Monist* 80.4: 576–597.
- Ward, Thomas M. 2014. John Duns Scotus on Parts, Wholes, and Hylomorphism. Leiden: Brill.