

Biological Ties and Biological Accounts of Moral Status

Jake Monaghan

Department of Philosophy, University at Buffalo

Preprint. Forthcoming in the *Journal of Medicine and Philosophy*

Abstract: Speciesist or biological accounts of moral status can be defended by showing that all members of *Homo sapiens* have a moral status conferring intrinsic or relational property. In this paper I argue that the most promising defense locates the moral status conferring property in the property of being biologically tied to other humans. This requires that biological ties ground moral obligations. I consider and reject all of the defenses of that premise. Thus, we are left with compelling evidence that biological ties and membership in a biological category like ‘species’ ground neither moral obligations nor moral status. Because it is crucial to account for the moral significance of family bonds, I conclude by describing the sense in which biological ties matter morally.

Keywords: Moral status, Speciesism, Special obligations, Parental obligations, Biological ties

Some moral obligations are special. The obligations that parents have to their children are unlike, say, my moral obligation not to punch someone else in the face. They are special because they’re had to particular individuals and had in virtue of special or unique properties or states of affairs. They’re often, though not always, particularly strong, and their violation is often especially blameworthy. Whereas, on the other hand, my obligation to refrain from face-punching is had to sentient creatures generally and had in virtue of my being a moral agent who lacks an overriding moral reason to do so.

What grounds (some of) these special moral obligations? One answer is this: we have special obligations to others in virtue of our genetic or biological ties. I shall refer to this as the ‘biological account of special moral obligation’ and to proponents of this view as ‘biological theorists.’ Biological accounts of

special moral obligation are generally used to defend theories of parental or familial obligation. Some versions of the view are pure biological views, meaning that only biological ties ground familial obligations (Schwarz 1990, Peach 2014). Others are hybrid, meaning that biological ties are only one component of the source of familial obligations (Abegg 1984, Belliotti 1986, Kolers and Bayne 2001, Bayne and Kolers 2003, Velleman 2008, Kolodny 2010, Moschella 2014, Moschella 2016).¹

If such an account were true, it would provide us with the resources to mount an especially effective defense of biological theories of moral status.² In what follows, I shall first describe the main arguments against biological theories of moral status. Doing so will allow me to set the stage for the “biological ties” defense of the biological theory of moral status I am interested in here. After developing that defense, I then turn to undermining the biological account of special moral obligation. First I target the pure biological account, and then I consider the more popular hybrid account. Because we ought to reject biological accounts of special moral obligation, there remains no promising strategy for defending biological accounts of moral status.

1. Connecting biological accounts of special moral obligation with moral status

It will be helpful to consider standard defenses of biological accounts of moral status. The first, defended by philosophers like Ronald Dworkin and Bernard Williams, is more of an assertion than an argument (Williams 2008, Dworkin 1993, and see Singer’s 2008 reply to Williams). The claim is that species membership is sufficient (some go as far as claiming it is necessary) for full moral status. But, it is implausible to think that species membership is relevant for several reasons, many of them familiar (for a

¹ And, of course, some deny that biological accounts of parenthood succeed (Boonin 2003, Austin 2004, Sparrow 2006, Wieland 2011, Brighouse and Swift 2014).

² I use the term ‘biological’ instead of ‘speciesist’ because defenders of the view will reject Singer’s construal of the view as comparable to racism or sexism. Though I will sometimes use ‘speciesist’ in this paper to avoid confusing references to proponents of biological theories of special obligation with proponents of biological theories of moral status.

selection, see Regan 1983, Singer 2009, McMahan 2002, McMahan 2005). First, it is simply unclear why we should think that biological taxa are morally relevant categories. This is not the sort of thing moral philosophers are entitled to assume. Second, if the thought is that there are certain morally relevant properties which members of the human species possess, then the argument from marginal cases or species overlap becomes problematic (for discussion: Narveson 1977, Norcross 2004, McMahan 2008, Singer 2009, Horta 2014), Finally, 'species' is a biological term, and it is not used univocally by biologists. There are very many species concepts, and they are often used pragmatically (Stanford 1995, Ereshefsky 1998, Ereshefsky 2004, Devitt 2008). The moral philosopher, then, would need to make explicit what species concept they are employing, and why it should be the one relevant to morality. Proponents of this view have not offered plausible answers to this question.

There is, however, a more fundamental problem for the view that species membership is sufficient for moral status; the following dilemma will help situate the main argument of this paper:

1. Either the speciesist will offer reasons in support of the claim that all members of the species *Homo sapiens* have moral status, or not.
2. If the former, then the speciesist is effectively abandoning the position.

For support for premise (2), consider that to offer reasons for the claim that members of the species *Homo sapiens* have moral worth is to give a set of criteria for moral worth that is independent of membership in the species. I shall return to this shortly. The argument continues:

3. If the latter, then the speciesist begs the question against her opponent.

This is surely not the controversial premise in the argument. To claim that a member of the species *Homo sapiens* has moral worth because they are a member of the species, rather than because they meet some criteria for moral status, is to assume the conclusion as a premise. Finally:

4. Therefore, the speciesist either abandons the view, or begs the question in favor of their view.

The second horn of the dilemma is obviously unavailable to the proponent of the biological account of moral status. So the challenge then is to identify some property that is connected to membership in the human species, and give independent reasons for its moral relevance, thus undermining both the argument from marginal cases or species overlap and the charge of begging the question.

One way to do this is to demonstrate that there are certain intrinsic properties which are essential to members of *Homo sapiens* (our essence), and that they are morally significant. This requires that we are essentially organisms, and further, that we are essentially members of a natural kind--*Homo sapiens*. If this is right, then even if some humans are not conscious or rational, they still have morally significant properties. The morally significant property is often thought to be the *capacity* for rationality. Without the relevant property, the individual simply would not be human. Another possibility is to claim that though we are not essentially humans, whatever our essence is, it happens to be coextensive with the biological taxon *Homo sapiens*.³ Although this position is not an instance of the speciesism that Singer and others have argued against, it still allows one to conclude that an individual will have full moral status if they are a human.

Both of these views take on theoretical commitments in the philosophy of biology. They need to be consistent with our best theories of biology and the philosophy of biology. Practicing biologists and philosophers of biology tend to think of the species category as a merely useful way of answering the questions that interest them, rather than as a category that carves nature at its joints (Stanford 1995, Ereshefsky 1998, Ereshefsky 2004). Biologists studying asexually reproducing organisms, for instance, will employ a different conception of the species category than paleontologists, and conservation biologists will

³ This is a Lee's (2004, 2007) position. On his view, we have moral status in virtue of our capacity for rationality, not our species membership.

focus on still different species concepts (Stanford 1995). The dominant position in the philosophy of biology is that we are not essentially members of any species (see, for example, LaPorte 1997).

Our essence, supposing we have one, is nevertheless unlikely to be as a member of or coextensive with a biological kind. More specifically, it is unlikely that every member of a species will have the essence that suffices for full moral status. The reason for this is that whatever morally relevant properties one has in mind, this is simply not what goes into determining whether an organism is a member of a particular species.⁴ The view that species have essences turns out to be rather unhelpful in this context. Michael Devitt's (2008) defense of species essentialism holds that an organism's species essence answers the question "in virtue of what is this organism a species?" But the answer to this question will not be some set of morally significant properties. It will have something to do with an organism's ecological niche, the organisms it could produce viable offspring with, phenotypic traits, or the like. Thus, even if our essence *is* as a member of *Homo sapiens*, the reasons canvassed above suggest that this essence is not morally relevant (e.g. it is not going to include the capacity for rationality). The work in the philosophy of biology is sufficient to shift the burden of proof onto the proponent of this view. For starters, one would need to show that there are species essences in the first place, and that species are real, rather than explanatorily useful fictions. Even if one, like Lee, does not claim that species membership itself is sufficient for full moral status, if one argues that species membership is coextensive with the possession of an essence that suffices for full moral status, one takes on an argumentative burden that requires engaging the philosophy of biology.

A different strategy for taking up this challenge (identifying some set of morally relevant properties that all members of *Homo sapiens* have) is to locate the moral relevance of species membership in the special relationships we have to other members of the species (Nozick 1997). To be clear, this conception

⁴ See Timmerman (manuscript) for a full defense of this claim.

of moral status identifies the moral status of an individual with the fact that others have moral obligations to that individual. Some will object to this conception of moral status, but it is important to note that if the relevant moral relationships grounding these obligations are had by all humans, then the account is relatively impartial. In other words, one's moral status won't vary according to the strength of the obligations other individuals have to her. In what follows, I shall simply grant that this is an acceptable conception of moral status.

One way of doing this runs into trouble. It might be thought that we have special obligations to other humans because we are members of the same community. It is in virtue of such special relationships and resulting special moral obligations that we have moral status. The proponent of such a view needs to say which community is the morally relevant one. Given such a strategy, an account of moral status which extends to all and only humans is threatened from two directions. If the community is made up of, say, rational beings, then it excludes some humans for familiar reasons. If the community is not determined by a capacity like rationality, then it might include other creatures to whom we have special obligations, like our pets. While many philosophers think a dog or cat might have full moral status, it is considerably less plausible to think that my purchasing a pet snail and welcoming it into my community would thereby elevate it to full moral status.

This strategy runs into trouble because it takes the morally relevant relationship to be one of community, rather than species, membership. The proponent of the biological account of moral status ought, then, to take species membership to be the relevant relationship. Thus, according to the view under consideration, we have special obligations to other humans because we are members of the same biological "community." This gives an account of why at least one biological taxon is morally relevant, and avoids the problem of marginal cases. Taking biological relations to ground special moral obligations, and thus moral status, also addresses the third problem for the speciesist mentioned above. The problem was that there are a variety of species concepts employed by biologists, and the moral philosopher needs a principled way of

determining the one relevant to morality. If this view is correct, the species concepts which take biological connections (as opposed to, say, the ecological niche inhabited by an organism) to be the property relevant to determining species membership will make it such that the same property which does the “biological work” is also doing the “moral work.”

To recap, defenses of biological accounts of moral status have considerable difficulty in actually yielding an account of moral status which includes all and only humans without begging the question. Pointing to a set of morally relevant intrinsic properties to defend speciesism faces difficulty from the argument from marginal cases, and pointing to community membership is often over- or under-inclusive. Again, notice that the special relationship defense struggles as a result of what grounds the special relationship. If the relevant relationship were a biological one, and special moral obligations were had similarly in virtue of the biological relationship, the worries just discussed would dissolve. Thus, the following argument offers a simple and precise defense of a biological or speciesist account of moral status:

1. If biological ties ground special moral obligations, then membership in the human species (in virtue of biological ties) confers full moral status.
2. Biological ties ground special moral obligations.
3. Therefore, membership in the human species, (in virtue of biological ties) confers full moral status.

Premise (1) is simply a conditional statement of the improved community account of moral status discussed above. The crucial premise is of course (2). If (2) is true, it would have significant implications. Before turning to an evaluation of that premise, I shall clarify what I mean by the term ‘biological ties’ because this concept is crucial to the arguments that follow. This will set the stage for my criticism of the biological account of special moral obligation.

2. The quantitative conception of 'biological tie'

There are two ways of understanding what a biological tie is: in terms of types and in terms of strength. According to the former, the parent-child relationship, understood in biological terms, is a type of biological tie. It is a different type than the sibling relationship, aunt-niece relationship, and so on.

According to the latter, biological ties are understood in terms of the amount of genetic material two individuals share; the more shared material, the stronger the biological tie. In this essay I shall understand a biological tie to be a relation consisting of shared genetic material:

Biological tie: A and B are biologically tied if A and B share genetic material. The strength of the biological tie is determined by the amount of shared genetic material.

The reason for this is methodological. The question at stake is whether biological ties ground special moral obligations or moral status. We are permitted to start with the claim that most parents have stringent special moral obligations to their children. The thing to be explained is why this is the case. If we point to the type of biological tie had between biological parents and children, we have not explained much. On the other hand, if we point to the shared genetic material, and notice that there is a considerable amount of shared genetic material, we have the beginning of an explanation. When we then consider whether more or less shared genetic material intuitively grounds more or less stringent special moral obligations, we can acquire evidence for or against our hypothesis.

It is important to note, in light of my criticisms of the biological account that will follow, that I am not thinking of biological ties in a way that is foreign to the proponents of the account. The best defenses of biological accounts of special moral obligation appeal to personal identity (Bellotti 1986, Moschella 2014, 430; Moschella 2016, 35) to indicate that because our biological parents contribute to our personal identity they have special moral obligations to us, or us to them. These appeals to personal identity lend themselves to this reductive, strength conception of biological ties. And at least one proponent of the biological account

of special moral obligation, Raymond Belliotti, explicitly accepts this way of understanding the moral relevance of biological ties. See especially his Contribution to Self Principle:

(CSP): If person N either has made or is making a contribution to person P's personal identity either by (a) genetic contribution or (b) being an attachment or commitment or (c) contributing a property constitutive of P's personal identity, then P owes a prima facie moral requirement of care to N. The relative strength of the requirement owed is proportionate to the extent of N's contribution to P's personal identity at the time of calculation (1986, 156).

Melissa Moschella also claims that genetic similarity is part of what makes the parent-child relationship morally significant (2016, 35). We should thus take the moral significance of biological ties to be 'quantitative.' Call this the 'quantitative assumption.' One might object to this reading of Belliotti, taking talk of "contribution" to refer to biological causality and origin.⁵ If this is right, then the CSP is not evidence that Belliotti endorses my quantitative assumption. The reason I do not interpret Belliotti's CSP in this way is because it is in tension with another principle he employs to defend his view. It is called the Metaphysical Proximity Principle:

(MPP): If person N is metaphysically closer to P (N is "like" P) than the metaphysical proximity of person X to P (X is not like P), then P is morally permitted to advance the interests of N rather than the interests of X.

The term "like" strongly suggests that Belliotti has in mind something like shared genetic material.

Furthermore, these principles are offered in an attempt to defend a particular claim: we have moral obligations to our parents in virtue of our biological connections. So the 'causality' or 'origin' interpretation cannot be right; the morally important relationship the child has to his parent is not one of origin or causality. The moral significance of the relationship Belliotti has in mind has to be symmetric. It is also important to stress that the biological connection is sufficient for some moral obligation in Belliotti's

⁵ Thanks to an anonymous referee for pressing on this point.

view: “I accept unsqueamishly that we all bear moral requirements to our biological parents, notwithstanding the absence of an ongoing friendship” (1986, 153).⁶

Moschella takes the genetic parent relationship to be morally significant, but she wants to employ a more robust conception of ‘biological tie’ in her work that makes reference to biological causation. In addition to this conception having difficulty with accounting for familial relations in which one did not cause the other to exist, Moschella notes a problem of twinning. For one to be a genetic parent of another, one must pass on genetic information and one’s physical genome to another. In order to avoid the conclusion that an older twin is the genetic parent of a younger twin (because the former passed on genetic information to the latter), Moschella adds the requirement that the “physical genome was reshuffled once” to the first two requirements (2014, p. 423).

Unfortunately, the ‘reshuffling’ requirement appears to be ad hoc. It is clear that an older twin is not the genetic parent of the younger twin. But in light of Moschella’s goal—to show that genetic parenthood grounds special moral obligation—it is important to avoid the implication that one has stronger moral obligations to one’s twin than to one’s children. Only the ‘reshuffling’ requirement can be deployed to account for this important intuition. But, why would we think that the one-time reshuffling of the physical genome mattered morally? We would need to call upon the conclusion that parenthood, understood in genetic terms, is morally significant. Only from there one could move to the conclusion that physical genome reshuffling is morally significant.

There is good reason to want some notion of causation embedded in our understanding of ‘biological tie,’ especially if we want biological ties to be morally significant. But if it is to play a more robust role, for instance, in partially explaining the moral significance of the grandparent-grandchild

⁶ This is in the context of a discussion of sperm donor cases, so Belliotti seems not to mean literal friendship here, but rather something like general personal relationships that might another source of moral obligations.

relationship, we must recognize the causal ‘passing-on’ role as morally significant. A tension arises here: we want biological causation to play a role, but we want to avoid the twinning problem. We can maintain the view that biological causation matters morally, but hold that ‘reshuffling’ strengthens the moral significance of biological causation. Then the only role it plays in the theory is to avoid counterexamples, and it has no independent motivation.

A further problem for this more robust account of biological ties is that it is unclear whether there is anything that is genuinely ‘biological causation.’ Frankenstein caused the monster to exist, and thereby incurred obligations to him. The difference between this and a case of procreation is that parents cause their children to exist by joining genetic material. If what makes ‘biological causation’ special is the genetic material, parsimony likely requires that the genetic material do the explanatory work alone.

The interim conclusion is that the biological theorist can only help themselves to a reductive, quantitative conception of ‘biological ties.’ Not only do they in fact typically take genetic similarity to be morally significant, there are also serious problems with appealing to ‘biological causation’ or origin.

3. Three defenses of the biological account of special moral obligation

Let us turn now to evaluating the biological account of special moral obligation. Premise (2)—biological ties ground special moral obligations—enjoys considerable plausibility. Consider the paradigmatic example of a special moral obligation with which we began. We might have a general moral obligation to feed hungry children; but parents have special moral obligations to feed their own children. An individual is more blameworthy and more vicious for failing to feed their children than for failing to donate to UNICEF. Of course, the parent-child relationship is rarely a purely biological relationship. Parents often intend to have a child, and when they don’t they are nonetheless usually causally responsible for the child’s existence (and subsequent vulnerability). The typical parental obligation, then, might be something like a promissory obligation, or might be grounded in something like Robert Goodin’s (1985)

vulnerability principle. For this reason, proponents of the biological account of special moral obligation can't simply rely on the commonly held view that we have stronger moral obligations to our children than others for support. Moschella (2014, 2016) defends a general account of the source of special moral obligation wherein personal relationships are what do the work, and genetic relationships are a species of personal relationship. Belliotti (1986) argues that contributions to one's personal identity and "metaphysical proximity" are morally significant. Because we are essentially human organisms, Belliotti thinks, biological ties are morally significant in virtue of their contribution to our children's personal identity and our metaphysical proximity to them. Finally, Jeff McMahan (2002) attempts to pare down the parent-child relationship to its biological core and to elicit an intuition which supports a biological account of special moral obligation. I shall respond to all three arguments in turn.

3.1 Against the moral significance of bare personal relationships

Moschella argues that biological ties ground special moral obligations. She claims that personal relationships ground special obligations, and that biological relationships are personal relationships (2014, 427; 2016, 34). We've seen one problem with understanding biological causation to be morally significant. But there is a second problem with her defense of this view.

The second problem is that the premise that (all) personal relationships ground special moral obligations is false. Moschella understands a personal relationship to be "a relationship in which the parties relate as unique and irreplaceable individuals, not merely fulfilling a function which anyone with the relevant competencies could fulfill" (2014, 426). Moschella denies that a bank teller is in a personal relationship to a customer, but that friends and family are in personal relationships to one another. This is problematic because given a fine-grained description of the relationship between *this* bank teller and *that* customer, the relationship will be unique and irreplaceable. There are very many bank tellers, but only one bank teller with this particular friendly smile, assuring tone of voice, or genome, for examples. Of course,

Moschella will deny that this constitutes a personal relationship, because bank tellers merely fulfill a function that many others can fulfill. But of course this is true of friends and even family. When one honestly considers their closest friend, one can probably recognize that another person could have fulfilled that role (perhaps even more successfully) if things had gone differently (e.g. if one had not moved while in elementary school, or if one had taken a different job, etc.). Similarly, when one considers the parenting skills of other parents, one can recognize that someone besides one's actual mother and father could have fulfilled that role as well. Of course, we cannot "outsource" our friendships or other personal relationships (2014, 426). But other individuals could be part of a morally similar personal relationship that serves the same function just as well. The features that Moschella points to in order to demonstrate that obligations grounded on personal relationships cannot be outsourced are not present in the merely biological parent-child relationship.

Relationships between persons are often highly unique, in virtue of the fact that persons are unique (as the bank teller example shows). So it can't be uniqueness per se that makes personal relationships in the way that Moschella uses the term morally significant. There must be some other property or set of properties. Plausible candidates include a history of reciprocity, or an explicit or implicit commitment of the will to do certain things for another. Additionally, it could be a certain sort of uniqueness: a unique ability to provide some good for another. This seems to be Moschella's point when she talks about our inability to outsource our familial or friendship based duties to others. Thus, we are left without compelling evidence that biological ties are contributing factors to the uniqueness or moral significance of a personal relationship.

These two problems interact. Moschella rightfully notes that some personal relationships have greater moral significance than others, and this is to be determined by the "closeness" of the relationship (2014, 425; 2016, 35). If biological ties are to determine the closeness of a relationship, then the reshuffling requirement becomes more important, and the circularity required to defend it becomes more damaging.

Dropping the reshuffling requirement yields highly counterintuitive results, namely that one's special moral obligations to one's twin or clone are more stringent than to one's child.⁷ Yet, determining the closeness of a personal (familial) relationship without regard to biological ties is simply to abandon the biological account of special moral obligation.

3.2 Against the moral significance of metaphysical proximity

Belliotti (1986) denies that friendship or reciprocity ground parental obligations. Instead, he suggests that "we have moral requirements of a special sort to those who contribute to and help nurture our identities, and those whose attachment is essential for our self-understanding," (1986, 152). Because genetic material contributes to one's identity (in the sense of one's numerical, personal identity), we have obligations to those who contribute to our identity. This includes our biological parents. As noted above, Moschella similarly claims that part of the moral significance of the parent-child relationship is genetic similarity (2016, 35). Belliotti is unmoved by sperm donor counter examples in which a child who knows nothing of and has never met his biological father is (counterintuitively) supposed to have special moral obligations to the father according to biological accounts of special moral obligation. He accepts that this is the case in an attempt to neutralize the counter examples (1986, 153).

Given a certain understanding of identity, Belliotti is right. His thesis is true if identity means something like narrative identity. Belliotti of course has an animalist conception of personal identity in mind though. Thus, his view has a seriously counterintuitive result. His position would entail that one has more stringent special moral obligations to one's clone than to one's biological child if we hold fixed the other special moral obligation grounding features. He also runs afoul of the twinning problem which concerned Moschella. I pursue this problem in more detail later, where I note that if metaphysical proximity were

⁷ I explore this more fully in later sections.

morally significant, it would count as a “tie breaker” in cases where an individual can only help one of two individuals. Thus, metaphysical proximity is not a source of special moral obligation.

3.3 Contaminated intuitions in *The Sperm Donor case*

In order to isolate the “biological variable” in familial relations to determine its moral salience, Jeff McMahan offers the following case:

The Sperm Donor A man donates sperm at a sperm bank, having signed an agreement that both guarantees him anonymity and absolves him of all responsibility for any child who might be conceived using his sperm. Later, however, a woman who has been artificially inseminated using the man’s sperm gives birth to a child with a serious medical condition. Only a bone marrow transplant can save its life. Desperate to find a suitable donor, the woman illegally obtains access to the records at the bank, discovers the identity of the sperm donor, and approaches him with a plea to donate bone marrow in order to save her child’s life. (McMahan 2002, 226)

The sperm donor case is designed to isolate the biological tie. McMahan notes that “if the relation of parent to child, stripped down to its purely biological component, is morally significant, perhaps the relation of membership in the same species is as well. This possibility cannot, I think, be wholly excluded,” (2002, 226). If the man does indeed have a special moral obligation to provide aid, then biological ties are morally relevant. I do not doubt that the intuition generated from this case is widely shared; rather, I doubt that the intuition will survive scrutiny.⁸

The case we are considering only counts as support for the biological account if it succeeds in isolating the ‘biological variable.’ In other words, one might have the intuition that the man is obligated to donate bone marrow, but for reasons other than the biological tie. My claim is that this is precisely what is

⁸ A note on methodology: I shall assume that intuitions about cases serve as evidence for moral claims. I recognize that this is controversial, but I cannot defend the assumption here. For a defense, see Huemer 2005 and McMahan 1999. There is a further worry one might have about this use of intuition when the cases are farfetched or difficult to imagine. While the cases I shall rely on in this paper do not involve events which regularly occur, they are less far-fetched than many of the cases used in bioethics, including McMahan’s (2002) “superchimp” case and Thomson’s (1971) famous violinist case.

going on in *The Sperm Donor*. There are three sources of ‘contamination,’ or uncontrolled variables: (1) the severity of harm that occurs without the required aid, (2) the man’s unique ability to provide aid, and (3) the man’s causal responsibility for the child’s existence and subsequent vulnerability. If we modify the case in order to avoid these contaminants, the intuition fails to present itself, or is at least considerably weaker.

In *The Sperm Donor*, if the biological father refrains from donating his bone marrow, the child will die. It is important to note that what is at stake in McMahan’s discussion is whether a biological tie yields, in general, a special moral obligation for providing aid. What is at stake is not whether a biological tie yields a special moral obligation for saving a life. This is not to say that a biological tie can yield the latter and not the former, but rather it is to say that if a biological tie is a source of a special moral obligation to provide aid, it will be a special moral obligation for providing aid simpliciter, not merely in life or death cases. The fact, however, that this thought experiment is a matter of life or death, seems to contaminate the intuition. An altered version of the case makes this apparent. Consider a case identical to McMahan’s, with the exception that rather than suffering from a life threatening illness which can be cured with a bone marrow transplant, the child is suffering from a case of mild headaches:

Poor Eyesight A man donates sperm at a sperm bank, having signed an agreement that absolves him of all responsibility for any child who might be conceived using his sperm. Later, however, a woman who has been artificially inseminated using the man’s sperm gives birth to a child who comes to need glasses. Her eyesight is good enough to get around, but gives her slight headaches. The woman illegally obtains access to the records at the bank, discovers the identity of the sperm donor, and approaches him with a plea to pay for her daughter’s glasses.

While mild headaches are not life threatening, they are harmful. Does the biological father have a special moral obligation to provide financial aid to the child? I have the intuition that he does not, and I imagine that this intuition would be widespread. The poor eyesight version of *The Sperm Donor* is relevantly similar in that a sperm donor is asked to provide aid to his biological child. If I am correct that the intuitions shift from the original to the new case, then what is doing the work in generating the intuition is the

severity of the consequences in the event that the sperm donor decides against providing aid, not the biological connection.⁹

The second source of contamination is the unique ability for the sperm donor to provide aid. In *The Sperm Donor*, whether or not the donor is willing to provide aid, he is (almost) uniquely able to help because his bone marrow is suitable for donation to the child. If it turns out that removing this aspect from the thought experiment makes it so that it can no longer elicit an analogue to the intuition from *The Sperm Donor*, then there is further reason to doubt that, as McMahan supposes, the biological relationship is what elicits the intuition. Suppose then an amended case where rather than needing a bone marrow donation, the child needs a blood donation. Call it *The Blood Donor*.

The Blood Donor A man donates sperm at a sperm bank, having signed an agreement that absolves him of all responsibility for any child who might be conceived using his sperm. Later, however, a woman who has been artificially inseminated using the man's sperm gives birth to a child who becomes injured, and needs a blood donation. The child has an AB blood type and is thus a universal recipient. Desperate to find a suitable donor, the woman illegally obtains access to the records at the bank, discovers the identity of the sperm donor, and approaches him with a plea to donate blood in order to save her child's life.

This would certainly be a strange method for obtaining a blood donation, but nonetheless it seems that the sperm donor does not have a special moral obligation to donate blood. Perhaps we have a general moral obligation to donate blood; it is doubtful that the sperm donor has anything above and beyond this general obligation. If this intuition is widespread, it suggests that the unique ability to provide aid is doing the work in eliciting the intuition in the original case, not biological connectedness (see Beverley 2015 for more discussion).

⁹ While it is true that courts have made sperm donors pay for child support, I do not think that the decision of a court is informative in this regard. The law is often a blunt instrument for practical purposes, and I do not think legal decisions can tell us much about the moral sources of parental obligation.

Let us turn now to the final source of contamination in McMahan's case. The sperm donor is willingly causally responsible for the existence of the child. The causal responsibility thus extends to the child's need for aid. The moral relevance of causal responsibility will be apparent to those who are familiar with the literature generated in response to Judith Jarvis Thomson's violinist thought experiment (Thomson 1971, McMahan 2002, Boonin 2003; McDaniels 2014). McMahan himself, in his discussion of the thought experiment, notes this as a salient disanalogy between the situation of the violinist and a pregnant woman. It is therefore somewhat surprising that McMahan did not find *The Sperm Donor* similarly problematic.

To see that it is in fact problematic, consider the following case:

Bad Doctor A man goes to a fertility specialist for an exam. The doctor collects a sperm sample, but rather than discarding it after running the tests, artificially inseminates herself with it. Later the doctor gives birth to a child who becomes injured, and needs a blood donation. The child has an AB blood type and is thus a universal recipient. Desperate to find a suitable donor, the woman approaches the man with a plea to donate blood in order to save her child's life.

Again, it is doubtful that the man has a special moral obligation to donate blood. Given the pushback Thomson has received on the causal-responsibility-disanalogy from pro-life and pro-choice theorists alike, I suspect that this intuition will also be widely shared. If it is, this counts as yet more support for the claim that the intuition elicited from *The Sperm Donor* actually has nothing to do with biological ties. It seems that the intuition is the result of the combination of the three "contaminants" I mentioned at the outset of this section.

Some might insist that causal responsibility and uniqueness are not actually contaminants on the grounds that they are essential parts of the biological parent-child relationship. In these cases, the donor is biologically related to the child in need, so the biological causation and uniqueness have remained. They do not, I've argued, ground moral obligations. Instead, certain non-biological causation and uniqueness seem considerably more morally significant.

The biological theorist cannot merely assert that the parents have obligations to their children in virtue of biological ties. But, in light of the preceding cases, it is difficult to imagine what sort of support could be offered on behalf of the biological account that is sufficiently different from these three defenses such that it does not suffer from the same objections. Absent some new, compelling argument, we should conclude that there's nothing counting in favor of the biological account. What, then, accounts for parental obligations? I return to that at the end of the paper.

4. The failure of the pure biological account

At this point in the argument we've merely shifted the burden of proof onto the biological theorist. We can do more, though. In this section and the next, I shall attempt to show that not only is there no support for the biological account, but that the account has implications that even biological theorists will (or should) reject.

Recall that the initial motivation for thinking that biological ties are morally relevant comes from reflecting on the obligations we have to our children: we have stronger obligations to our children than to others. Thus, one desideratum of the biological account is that it makes theoretical sense of this intuition. But, certain cases of twins and clones immediately put pressure on the biological account. One has a stronger biological connection (has greater metaphysical proximity) to one's identical twin or to one's clone than to a biological child.

Consider the following case:

Clone in Need Bob agrees to participate in an experiment which requires a scientist to collect some of his stem cells. Bob signs a waiver absolving himself of any legal control over or responsibility for the stem cells. A clone is created, and some years later becomes ill, requiring a lifesaving blood transfusion.

Once more, it is doubtful that Bob has a special moral obligation to donate blood. What is more important, though, is that the biological account holds in this case that not only does he have a special moral obligation

to provide aid, but that he would have a stronger moral obligation to provide aid to the clone than he would to his biological child. The reason is that the biological tie between the man and his clone is stronger. Recall that in this section, the target is the pure biological account of special moral obligation. While few people endorse such an account, there are proponents of such a view (Peach 2014, Schwarz 1990). Further, in the following section, I criticize the more plausible hybrid accounts of parental obligation.

The proponent of the pure biological account of parental obligation need not (and should not) think that only biological ties give rise to special moral obligation in general. But this is little help, for appealing to this in the present context would still imply that parental obligations are exhausted by the biological tie. Consider two modifications of this case. In the first, the genetic material that is stolen is “reshuffled” to satisfy Moschella’s requirement. Were this to happen, Bob would have a genetic relationship that is in the relevant respects the same as the one he has to a typical biological child that he developed a close personal relationship to while raising her. In this case, Bob would have more stringent obligations to the typical biological child. But, it would not be a stronger *parental* obligation. The result is a rather awkward account of parental obligation, in which the prevailing view that parental obligations are very strong is mistaken, and in which the strength of what seemed to be parental obligations are actually special moral obligations of the sort one could have to a friend. While I do not think this latter implication is false (I suggest something similar later in this paper), it is not what I take the pure biological theorists to hope to defend.

In the second modification, imagine that Bob’s sperm donation is stolen (as in *Bad Doctor*) in addition to his genetic material being used to create a clone without his specific consent. In such a case, the contaminants warned against in the previous section are absent.¹⁰ Bob’s relationship to the biological child is identical to his relationship to the clone, with the exception of the strength of the biological tie. The pure

¹⁰Thanks to an anonymous referee for bringing to my attention the need to discuss a case like this.

biological account would in this case also yield the verdict that Bob has more stringent obligations to the clone than to the biological child. This seems to be a strike against the account.

Thus, *Clone in Need* demonstrates that the biological account is, upon reflection, unable to sustain its initial motivation. The account initially seemed plausible because it could make theoretical sense of our intuition that the strongest obligation one has is to one's child; but it actually fails to yield this verdict.

5. The failure of the hybrid account

In light of these criticisms, the biological theorist should insist upon a hybrid account of special moral obligation. Biological ties matter, but they aren't the only things that matter. In addition to biological ties, interpersonal relationships that are independent of biological connections, and are partly constituted by a history of shared experiences, mutual aid, and the duties of loyalty and reciprocation that arise from them, as well as the causing of others to be vulnerable, and the way in which family members are particularly well suited to help one another, all ground special moral obligations. Surely this is a more plausible account than a purely biological account.¹¹

Nonetheless, there are two serious problems with such an account. First, we saw in section earlier that there isn't compelling evidence in favor of the view that biological ties ground obligations. Second, if we hold fixed the features of a relationship that make up the nonbiological components of the hybrid account, and manipulate (more successfully than does *The Sperm Donor*) the biological ties, it seems that the biological ties make absolutely no difference. In other words, metaphysical proximity fails to serve as a moral "tie-breaker."

Consider the following thought experiment:

¹¹And, as we've seen, the best defenses of the biological account aim to assimilate the moral significance of biological ties with the moral significance of other "ties." This is what Moschella (2014, 2016) does when arguing that purely biological relationships are a species of the morally significant "personal relationship."

Switched at Birth A couple gives birth to a baby girl. Their girl is mixed up with another in the nursery, and the couple takes the wrong child home. Many years later, the girl needs a life-saving blood transfusion. She has an AB blood type and is therefore a universal recipient.

Do the non-biological parents have a special moral obligation to donate blood? I think they obviously do. Do they have a stronger moral obligation than the biological parents? Again, it seems that they do. This is not due to any biological connection. In the event that the girl needs a new guardian, the parents or brothers and sisters of the couple would be preferred. Again, this cannot be the result of biological connections, but rather is the result of the nonbiological components of the hybrid account.

Of course, the non-biological parents did not know that they were taking home a child who was not biologically related to them. Further, there is a general duty to provide aid when the cost of doing so is low. But these points do not undermine the thrust of the thought experiment.¹² Rather, they are intentional features of the case, and are designed to show that when the cost of providing aid is held fixed, the non-biological components of the parent-child relationship swamp the biological components. The non-biological parents voluntarily took on parental obligations by taking the child home, and incurred special moral obligations by building a deep personal relationship with the child as she grew up.¹³

The fact that the non-biological components of the parent-child relationship swamp the biological component is important, for it serves to debunk the common intuition that parents have special moral obligations in virtue of their biological ties. Because I am denying that biological ties are themselves relevant to moral obligations, an error theory is called for. The intuition that biological ties matter in this way perhaps has its source in conflating the moral relevance of nonbiological ties with the biological ties that frequently accompany them.

¹²Thanks to an anonymous referee for encouraging me to address these points.

¹³Perhaps the parents did not voluntarily take on obligations to the child. This case raises an interesting question about under what descriptions of an individual or state of affairs we voluntarily take on obligations to or to bring about. I need not take a stand on this issue for my view of the source of special moral obligations is pluralistic. They can be taken on voluntarily as well as involuntarily.

If biological ties matter for moral obligation, they don't matter very much. But it seems that they do not matter at all. Consider:

Child or Clone? Jerry's biological child and clone are born at the same time. Jerry agrees to care for both (and in fact brought it about that they both came to exist); he loves both equally; he enjoys a mutually beneficial relationship with both. One day, both fall ill and need a life-saving bone marrow transplant. Unfortunately, Jerry only has enough marrow to make one donation in time to save a life.

This case is designed to manipulate only the strength of the biological ties or metaphysical proximity. The non-biological components of Jerry's parent-child relationship are identical with respect to the biological child and the clone. He has developed a close personal relationship with both, has (to borrow a phrase from Velleman 2008) thrown both into a predicament equally, has voluntarily taken up obligations to both, and so on. Only the biological tie or metaphysical proximity differs.

In these circumstances, it would be absurd to think that the strength of the biological tie could serve as a tie breaker. But this is precisely what the biological account tells us about such a situation. Any biological account that takes strength of biological connection to matter morally is going to require that Jerry has a stronger obligation to donate bone marrow to his clone on the grounds that their biological tie is stronger. Even a hybrid account will be forced to this conclusion because the details of the case do not afford any resources to "break the tie" that are non-biological. Further, even those who are skeptical that biological ties should be reduced to the amount of shared genetic material run into problems with this case. If one takes, like Moschella (2014) does, the type of biological tie (recall her reshuffling requirement) rather than the strength of biological tie to be what is morally relevant, then the verdict in this case is that Jerry has a more stringent obligation to donate marrow to the biological son. This seems just as mistaken as the verdict discussed above. My view is that the thing to do in this situation is figuratively to flip a coin.¹⁴

¹⁴ Here we run into some limits of the thought experiment method, for surely the thing to do is to seek out other donors. And a good consequentialist will want to know if there are any other relevant

Neither the child nor the clone have a special claim on Jerry's bone marrow, so any account that gives a verdict one way or the other runs into trouble. This is a serious problem for the more nuanced hybrid account of special moral obligation.

If we eliminate the non-biological components of the parent-child relationship from this case, the upshot remains the same. Suppose Jerry's sperm is stolen as in *Bad Doctor*, and his genetic material is similarly stolen, and a biological child and clone are created. If both were to need bone marrow donations at the same time, it seems that Jerry does not have an obligation to donate to one that is more stringent than to the other. Biological ties, then, just do not seem to matter.¹⁵ In the face of strong reasons for rejecting a hybrid account of special moral obligation, we ought to drop the biological component entirely.

6. On the moral significance of biological ties

I've argued that biological ties do not ground moral obligations. But surely familial relationships matter morally. David Velleman (2008) argues that they do on the grounds that biological ties are themselves morally significant. He remarks, rather powerfully, that "When people deny the importance of biological ties, I wonder how they can read world literature with any comprehension" (2008, 256). How are we to make sense of the tales of Telemachus, Oedipus, or (spoiler alert!) the significance of Darth Vader informing Luke Skywalker that he is his father, if we deny that biological ties matter? If I were unable to make sense of this, then it would be a serious strike against my position. But, when we distinguish two ways in which biological ties can be morally significant, we shall see that Velleman's remarks are not fatal for my view.

factors like different lifestyles that will give the child or clone a good chance at a longer life with more wellbeing, or whether one of them is more likely to harm others, resulting in a decreased level of total wellbeing. Nevertheless, holding all of these features equal, it seems to me that there is no moral guidance to be had from any account of parental obligation with respect to this case. None of the versions of biological accounts, hybrid or not, plausibly help.

¹⁵Thanks to an anonymous referee for pushing me to offer a more thorough analysis of this case.

Biological ties can be morally significant because they are intrinsically morally valuable, and ground moral obligations. Biological ties can also be morally significant because they are instrumentally morally valuable by satisfying desires. One can coherently reject the former while endorsing the latter. Note, though, that in doing so, biological ties *themselves* are not what are morally significant.

In “The Gift of Life,” Velleman argues that biological ties are morally significant both intrinsically and instrumentally. He offers two reasons for the view. First, everyone has a desire to know their biological parents, and thus an individual who does not have this knowledge has a life that is objectionably “truncated,” (2008, 255). Velleman’s second reason for thinking that biological ties ground moral obligations is that bringing a child into existence “throws that child into a predicament” (2008, p. 251).

Consider the first reason Velleman cites: the desire that individuals have to know their biological parents (2008, 261). Because people want to know their biological parents, finding or knowing those to whom one is biologically related satisfies an often important desire. In this way, biological ties enable something morally significant to happen. If one had a strong desire to meet the physician who helped deliver her, this relationship would be morally significant. Yet it does not follow that the helped-to-deliver relationship is in general morally significant, especially not in the way needed to ground special moral obligations.

If this is not supposed to be a defense of the instrumental significance of biological ties, then it seems that the empirical evidence offered by Velleman is not clearly in his favor. In fact, the evidence Velleman points to appears to me to cut against his view: roughly half of adopted children seek out their biological parents at some point in their life (Müller and Perry 2001, 8, cited in Velleman 2008, 261). If we are to conclude from the data that children lose something objectively beneficial (and not merely instrumental) by not knowing their biological parents, then presumably we are entitled to draw the opposite conclusion from the same data. Both conclusions have roughly the same amount of data counting in their favor.

With respect to the second reason for thinking that biological ties matter morally, note that one can throw a child into a predicament without being biologically related to them, and one can be biologically related to another without throwing them into a predicament. Although it remains in the realm of science fiction, the case of Frankenstein and his monster show that the former is possible, and cases like *Bad Doctor* show that the latter is possible as well. This, however, does not show that biological ties themselves ground moral obligations, and so does not serve the function that the biological account of moral status requires.

Biological ties matter morally because, and only because, we happen to value them. Thus, they are only instrumentally morally valuable; they matter in the sense that the satisfaction of any preference matters morally. It might be (and probably is) that humans, as social animals, almost always value biological ties. Still, this is different from the ways that other things matter morally. Knowledge and achievement are sometimes thought to be intrinsically morally valuable. Even if one does not prefer to have knowledge or achievement, they are still morally valuable, and they still make one's life go better. On the other hand, if one does not value their biological ties, then nothing is owed to her (morally speaking) based on her biological ties.

In place of a biological account of special moral obligation, then, we should adopt a pluralistic and unified, though not biological, account. We incur special moral obligations when we voluntarily adopt them (as in promising), when we cause another to be vulnerable, when we harm another and owe them reparations, and when we are uniquely suited to provide some necessary benefit to another. Perhaps there are additional sources of special moral obligation. I do not wish to rule that out here; but it seems that these considerations completely explain familial obligations as well as the special moral obligations we have to whom we are not biologically related. And, it does so without having the counterintuitive results or the possibly ad hoc commitments of the various biological accounts.

7. Conclusions

I began this paper by considering a particularly promising way to defend a biological account of moral status (§1). The defense required a controversial premise—that biological ties ground moral obligation. I've argued that this is false. The evidence marshaled in defense of the premise fails to support it (§3). Neither bare personal relations nor metaphysical proximity ground moral obligations. The intuitions underlying our view that biological ties ground parental obligations arise from other, non-biological, morally relevant features. I argued that the biological account is unable to justify one having special moral obligations to one's child that outweigh one's obligations to an identical twin or clone (§4). Biological accounts also wrongly entail that biological ties can serve as moral "tie-breakers" (§5). Finally, I accounted for the important way in which biological ties remain morally significant (§6).

At least one conclusion follows from the arguments directly: parental obligations are grounded in something other than biological ties. Whereas Thomson (1971, 65) has claimed that the special obligations parents have to their children must be taken on by an act of choice, I've argued that this is but one way of taking on parental obligations. But we should draw two additional conclusions.

It is natural to conclude that the "contaminants" in *The Sperm Donor* are themselves the grounds of special moral obligation. Thus, special moral obligations are sometimes grounded in choice, though not always. They are grounded in willingly causing vulnerability, possessing a unique ability to provide aid or being particularly well suited to doing so, interpersonal relations that give rise to duties of loyalty and reciprocity, and perhaps others. I do not mean for this list to be comprehensive, nor do I mean for the items on it to be necessary.

We are entitled, I think, to draw one final conclusion from the falsity of the biological account of special moral obligation. Earlier we saw that the two possible accounts of moral status—intrinsic property accounts and relational property or community accounts—have trouble sustaining speciesism. Again, the

intrinsic property accounts fall to the problem of species overlap or the problem of marginal cases. Our species essence, if we have one, is unlikely to be morally relevant. And claims about the species essence do not mesh well with our best theories in biology and the philosophy of biology. Further, community accounts are typically either over- or under-inclusive. The biological account (another community account) is the only one that seems capable of avoiding the problems of other community accounts, but fails nevertheless.

At this point, an inductive inference is warranted: there are serious problems for the plurality of strategies for defending biological accounts of moral status, and a successful defense has yet to be made. There is no promising strategy left for showing that something connected with our species membership is morally relevant. For now, at least, we are justified in taking biological accounts of moral status to be false.

Acknowledgements

Special thanks to David Hershenov and John Beverley for extensive comments and fruitful discussion. I would also like to thank audiences at the PANTC conference on bioethics and the philosophy of medicine at the University at Buffalo and the Rocky Mountain Ethics Congress at CU Boulder, as well as anonymous referees for *The Journal of Medicine and Philosophy* for helpful feedback and advice.

Works Cited

- Abegg, E. 1984. The moral significance of the genetic relation. *Journal of Bioethics* 5 (2):127-144
- Austin, M. W. 2004. The failure of biological accounts of parenthood. *The Journal of Value Inquiry* 38: 499–510.
- Bayne, T. and A. Kolers. 2003. Toward a pluralist account of parenthood. *Bioethics* 17: 221-242.
- Belliotti, R. 1986. Honor thy father and thy mother and to thine own self be true. *The Southern Journal of Philosophy* 24(2): 149-162.
- Beverley, J. 2016. The ties that undermine. *Bioethics* 30 (4): 304–311.
- Boonin, D. 2003. *A defense of abortion*. Cambridge: Cambridge University Press.
- Brighouse, H. and A. Swift. 2014. *Family values: the ethics of parent-child relationships*. Princeton: Princeton University Press.
- Devitt, M. 2008. Resurrecting biological essentialism. *Philosophy of Science* 75: 344–82.
- Dworkin, R. 1993. *Life's dominion: an argument about abortion, euthanasia, and individual freedom*. New York: Vintage Books.
- Ereshefsky, M. 1998. Species pluralism and anti-realism. *Philosophy of Science* 65: 103-120.
- Ereshefsky, M. 2004. *The poverty of the linnaean hierarchy: a philosophical study of biological taxonomy*. Cambridge: Cambridge University Press.
- Goodin, R. E. 1985. *Protecting the vulnerable: a reanalysis of our social responsibilities*. Chicago: Chicago University Press.
- Hart, HLA. 1955. Are there any natural rights? *Philosophical Review* 64: 175-191.
- Horta, O. 2014. The scope of the argument from species overlap. *Journal of Applied Philosophy* 31 (2):142-154.
- Huemer, M. 2005. *Ethical intuitionism*. New York: Palgrave MacMillan.
- Huemer, M. 2008. In defence of repugnance. *Mind* 117: 899–933
- Kagan, S. 2016. What's wrong with speciesism? *Journal of Applied Philosophy* 33 (1): 1-21
- Kolers, A. and T. Bayne. 2001. Are you my mommy? On the genetic basis of parenthood. *Journal of Applied Philosophy* 18: 273-285.
- Kolodny, N. 2010. Which relationships justify partiality? The case of parents and children. *Philosophy and Public Affairs* 38: 37-75.
- Kumar, R. 2008. Permissible killing and the irrelevance of being human. *The Journal of Ethics* 12: 57-80.
- Laporte, J. 1997. Essential membership. *Philosophy of Science* 64: 96-112.
- McMahan, J. 1999. Moral intuition. In *The blackwell guide to ethical theory* (pp. 92-11), Hugh LaFollette (ed.). Blackwell Publishing.
- McMahan, J. 2002. *The ethics of killing: problems at the margins of life*. New York: Oxford University Press.
- McMahan, J. 2005. Our fellow creatures. *The Journal of Ethics* 9: 353–380.
- McMahan, J. 2008. Challenges to human equality. *The Journal of Ethics* 12 (1):81 - 104
- McDaniels, I. 2014. The responsibility objection to abortion: rejecting the notion that the responsibility objection successfully refutes a woman's right to choose. *Bioethics* 29: 291-299.
- Moschella, M. 2014. Rethinking the moral permissibility of gamete donation. *Theoretical Medicine and Bioethics* 35: 421–440.
- Moschella, M. 2016. *To whom do children belong? Parental rights, civic education, and children's autonomy*. Cambridge: Cambridge University Press.
- Müller, U, and B. Perry. 2001. Adopted persons' search for and contact with their birth parents I: who searches and why? *Adoption Quarterly* 4: 5–34.
- Narveson, J. 1977. Animal rights. *Canadian Journal of Philosophy* 7: 161–178.

- Norcross, A. 2004. Puppies, pigs, and people: eating meat and marginal cases. *Philosophical Perspectives* 18 (1): 229–245.
- Nozick, R. 1997. Do animals have rights? In *Socratic puzzles*. Cambridge: Harvard University Press.
- Palmer, C. 2010. *Animal ethics in context*. New York: Columbia University Press.
- Peach, A. 2014. Abortion and parental obligation. *Life and Learning XIV, Proceedings of the Fourteenth Faculty for Life Conference*. 14 (4): 4-7.
- Regan, T. 1983. *The case for animal rights*. Berkeley: University of California Press.
- Richards, N. 2010. *The ethics of parenthood*. New York: Oxford University Press.
- Schwarz, S. 1990. *The moral question of abortion*. Chicago: Loyola University Press.
- Singer, P. 2009. *Animal liberation*. New York: Harper Collins
- Singer, P. 2016. Why speciesism is wrong: a response to Kagan. *Journal of Applied Philosophy* 33 (1): 31-35.
- Sparrow, R. 2006. Cloning, parenthood, and genetic relatedness. *Bioethics* 20: 308–318.
- Stanford, K. 1995. For pluralism and against realism about species. *Philosophy of Science* 62: 70-91.
- Thomson, JJ. 1971. A defense of abortion. *Philosophy and Public Affairs* 1 (1): 47-66.
- Timmerman, T. Manuscript. You're probably not really a speciesist.
- Velleman, D. 2008. The gift of life. *Philosophy and Public Affairs* 36 (3): 245-266.
- Wieland, N. 2011. Parental obligation. *Utilitas* 23: 249–267
- Williams, B. 2006. The human prejudice. In *Philosophy as a humanistic discipline*. Princeton: Princeton University Press