Are Women Adult Human Females?

Alex Byrne, MIT

1: Introduction

Are women (simply) adult human females? It might surprise the woman on the Clapham Omnibus to learn that philosophers almost always answer no. This paper argues that they are wrong.

The orthodox view among philosophers who have considered the matter is that the category *woman* is a *social* category, like the categories *wife*, *firefighter*, and *shoplifter*.¹ It is not a *biological* category, like the categories *vertebrate*, *mammal*, or *adult human female*.² (Similar remarks go for *man*, *girl*, and *boy*; following the literature the focus will be on *woman*.) This (alleged) distinction between *adult human female* and *woman* is sometimes said to be the distinction between "sex" and "gender":

Speakers ordinarily seem to think that 'gender' and 'sex' are coextensive: women and men are human females and males, respectively, and the former is just the politically correct way to talk about the latter. Feminists *typically disagree* and many have historically endorsed a sex/gender distinction. Its standard formulation holds that 'sex' denotes human females and males, and depends on *biological* features (chromosomes, sex organs, hormones, other physical features). Then again, 'gender' denotes women and men and depends on *social* factors (social roles, positions, behavior, self-ascription). (Mikkola 2016: 23, first emphasis added)

§2 makes the positive case that women are adult human females; after that, the final section tries to defuse objections. But first, some preliminaries.

¹ Categories are interchangeable with properties: S is a woman iff S has the property *being a woman* iff S is a member of the category *woman*.

² In Haslanger's terminology, *wife*, *firefighter*, and so on, are "constitutively socially constructed" categories (Haslanger 2012: 87). For the purposes of this paper we can adopt one of Haslanger's accounts of constitutive social construction: a category F is socially constructed (i.e. is a social category) iff "in order for X to be F, X must exist within a social matrix that constitutes F's" (131; cf. 87). Biological categories are categories proprietary to biology. These explanations are imprecise, but that will not matter here. It will do no harm to individuate categories modally: necessarily equivalent categories are identical.

The thesis to be defended is this:

AHF S is a woman iff S is an adult human female.

This biconditional should be understood as implicitly necessitated, with 'S' bound by a universal quantifier within the scope of the necessity operator. AHF is a purely modal thesis: it is not a claim of grounding, real definition, a prioricity, or synonymy. (Since the relevant objections all target AHF, further levels of subtlety are not needed.)³

AHF is, of course, not *about* the words used to express it, in particular the English word 'woman' (cf. Williamson 2007: chs. 1, 2).⁴ More importantly, AHF bears at best a distant relation to people's *conception* of women—roughly, people's beliefs about what women are—their "folk theory" of women, so to speak. It is a familiar point from Kripke and Putnam that conceptions can be radically mistaken. AHF itself is a case in point. Since some people's conceptions of women include AHF, while others' conceptions are inconsistent with it, some people's conceptions of women will be in error no matter what.⁵

Related to this point, the *evidence* relevant to assessing AHF should not be sought in the "ordinary use" of 'woman' and the like: a mistaken conception (for instance) can lead people to systematically misapply words. Having said that, there is nothing wrong with appealing to linguistic evidence that clearly bears on the *meaning* (or intension) of 'woman', since that has immediate implications for AHF via disquotational principles. (No doubt there is *some* connection between ordinary use and meaning, but it is highly indirect and not well understood.) A simpler sort of evidence comprises *facts about where the women are* in various actual and counterfactual situations. (An analogous sort of evidence about *who knows what* is precisely what Gettier appealed to in refuting the justified true belief analysis of knowledge (JTB).) In what follows, appeal will be made to evidence of both sorts. Naturally such appeals can be disputed. People vary in their abilities to correctly identify members of categories, or to correctly apply words. *Woman* and 'woman' are no exceptions—indeed, this is amply illustrated by the discussion below. It can be tempting to respond to such disagreement by losing one's nerve and

³ Given AHF, those with a taste for hyperintensional metaphysics will want to investigate whether it can be strengthened to give a real definition of *woman* (see, e.g., Rosen 2015 and Passinsky 2019).

⁴ For a defense of a view that would count certain *disputes* about AHF as "merely verbal", see Chalmers 2011.

⁵ Cf. Haslanger 2012: 14.

retreating to the claim that one's evidence really consists in neutrally characterized facts about speakers' use of words, or (perhaps worse) facts about "intuitions"—evidence that one's opponents are less likely to challenge. That temptation should be resisted.⁶ Pointless charges of "begging the question" may be anticipated; this paper does not attempt the futile task of convincing everyone.

Given that true and interesting equivalencies in the style of AHF and JTB are notoriously hard to find, one should be wary of claiming that AHF is more than a very good approximation. More carefully put, this thesis of this paper is that *woman* is a biological (and not social) category, and that AHF is close enough. But for simplicity we can defend it outright.

1.1 Amelioration

One last preliminary before getting to the case for AHF. In an influential paper Haslanger introduced the idea of:

...an *analytical* approach to the question, "What is gender?" [including "What is a woman?"]... On this approach the task is not to explicate our ordinary concepts; nor is it to investigate the kind that we may or may not be tracking with our everyday conceptual apparatus; instead we begin by considering more fully the pragmatics of our talk employing the terms in question. What is the point of having these concepts? What cognitive or practical task do they (or should they) enable us to accomplish? (Haslanger 2000: 33)

In Haslanger's later terminology (which has become standard) this is an *ameliorative* approach to the question *What is a woman*? (Haslanger 2012: 367-8). On an ameliorative approach, the question is interpreted as something like *What should 'woman' mean*? In the 2000 paper, Haslanger famously proposed to appropriate the "everyday terminology" of 'woman' and to define it roughly to mean: a person "subordinated in a society due to their perceived or imagined female reproductive capacities" (2012: 8). She suggested (rather tentatively) that this

⁶ See, in particular, Williamson 2007: ch. 7.

⁷ Some argue that categories like *female* are social categories (see, e.g., Kessler and McKenna 1978, Butler 1990: ch. 1, Hood-Williams 1996, Ásta 2018: ch. 4). This position is assumed false here (for an examination of some arguments see Byrne 2018), but there is no obvious reason why its proponents could not meet the thesis of this paper half-way. As will become clear later, if *female* is a social category then AHF is *easier* to defend.

"terminological shift", if implemented in certain circumscribed communicative contexts, might "serve...the goal of understanding...sexual oppression, and of achieving sexual...equality" (2000: 47). Because this is a revisionary proposal, there is no conflict with AHF (supplemented with the disquotational principle that 'woman' applies to S iff S is a woman). But since ameliorative projects are especially salient in the present context (see, e.g., Jenkins 2016), it deserves emphasis that they are *not* the chief concern of this paper.⁸ That said, some observations relevant to such projects will be made at the very end.

2: The case for AHF

Once more, here is the thesis to be defended:

AHF S is a woman iff S is an adult human female.

And here are six considerations in favor of it.

2.1 AHF reproduces the dictionary definition of 'woman'.

Granted that the dictionary definition gives the meaning of 'woman', the intension of 'woman' at a world w is the set of adult human females in w, and AHF follows immediately. This may be the most popular argument for AHF on Twitter, but it seems quite weak. First, dictionaries rarely supply exact synonyms; second, they also function as encyclopedias, giving useful contingent information about the extension of a term. In nineteenth century dictionaries one can find the following entry for 'soldier': a man engaged in military service. Surely the dictionary compilers were aware that women soldiers have made many appearances throughout history! But given that military service was then an entirely male occupation, the "definition" is not so misleading. (A reader might guess that there could be women soldiers "in principle".)

So perhaps the dictionary "definition" of 'woman' merely reflects the fact that almost any woman is an adult human female, and vice versa. Even if contingent, that is a useful fact to know. (For similar reasons, opponents of same-sex marriage who tried to argue that it was an oxymoron by appealing to dictionaries were on a hiding to nothing.)

⁸ Haslanger subsequently suggested that her "ameliorative" proposals instead exposed existing meanings (2012: 12-6); on this descriptive understanding of Haslanger's project AHF is directly engaged. For discussion see Saul 2006, Cappelen 2018: 78-81, and Bogardus 2019.

Still, the dictionary entry strongly suggests that 'woman' does not pick out a *social* category. Sumo wrestlers have a quite distinctive physique—they are, let us say, *extreme endomorphs*. Suppose that, as it happens, all and only Sumo wrestlers are extreme endomorphs. Despite the fact that 'Sumo wrestler' and 'extreme endomorph' are coextensive, it would be extraordinarily misleading to define the former by means of the latter, suggesting that Sumo wrestlers do not thereby enjoy any kind of social status, and that becoming a Sumo wrestler simply involves body modification. If 'woman' picks out a social category, then the lexicographers have made a blunder of a similar magnitude. A defender of the view that *woman* is a social category needs to explain how the lexicographers could have erred so badly, but this issue is never even raised.

On closer examination, appealing to dictionaries is not so bad after all. They are hard to reconcile with the idea that *woman* is a social category. A natural alternative is that the category is biological, and the dictionary entry 'adult human female' is at least a promising suggestion.

2.2 One would expect English to have a word that picks out the category adult human female, and 'woman' is the only candidate.

Anyone in the business of hunting or farming needs to take a keen interest in the difference between male and female animals, and it is not surprising that long lists of gendered animal words are found in numerous languages. For instance, in English there are many (mostly monolexemic, often ambiguous) expressions for adult females belonging to non-human kinds: 'doe', 'sow', 'hen', 'goose', 'mare', 'peahen', 'queen', and so on. Given the utility of a similar word in the human case, it would be astounding if English made an exception here. Moreover, since the best candidates in other languages for such a word are translations of 'woman', if English makes an exception then near-enough all other languages do too.⁹

The semantics of words like 'doe' are not remotely controversial—they are standardly taken to pick out biological categories like *adult female deer*. It is no coincidence that Williamson (2007: chs. 3, 4), seeking a paradigm case of an "analytic" truth, chose 'Vixens are female foxes'.

Of the six considerations, this is perhaps the most compelling. Someone who wants to deny AHF needs to explain why this pattern of gendered animal words leaves us out. Could the

⁹ 'Woman' is likely one of the very few lexical universals (Goddard 2001: 12-3).

explanation be that when it comes to classifying their allies and rivals, as opposed to animals that are tasty or dangerous, ordinary people are interested in *socially significant* categories, not biological ones? That line of thought confuses a *social* category with a socially significant one: we *are* interested in socially significant categories, but a category can be both socially significant *and* biological. *Female* and *male* are clear examples. Peacocks have an important role in Hindu mythology—the social/religious significance of the category *peacock* is not a good reason for denying that it is biological.

2.3 AHF explains how we sometimes know that an individual is a woman, despite knowing nothing else relevant about her other than the fact that she is an adult human female.

Mitochondrial Eve lived more than 100,000 years ago, in Africa. She is the most recent common matrilineal ancestor of all humans alive today. We know nothing about her life or opinions, except that she is human and had children. Nonetheless, as the *New York Times* (correctly) puts it, she is "a woman from whom all living humans inherited their mitochondrial DNA" (Yin 2016). Genetics and developmental biology tell us that Mitochondrial Eve is an adult human female, but how do we know she is a woman?

First, note that if AHF is true, then—like its counterparts for other animals—it is not hard to discover. Many ordinary people have some kind of tacit knowledge of it, as exhibited by their willingness to assent to counterfactuals like 'If a woman had won the US 1960 presidential election, she would have been the first female president'. Given this, the simplest explanation appeals to the (known) right-to-left direction of AHF: we know that Mitochondrial Eve is a woman by deduction. A similar explanation is available for our knowledge that "Y-chromosomal Adam" (the most recent common patrilineal ancestor of all human males alive today) is not a woman, appealing to the left-to-right direction of AHF.

2.4 AHF stands or falls with the analogous thesis for girls, which can be supported independently.

Beauvoir's 'One is not born, but rather becomes, a woman' (Beauvoir 1989: 267) has that 'No man is an island' quality: evidently the platitudes that these sentences express are not the

¹⁰ A similar example ("This is the DNA of a woman") is in Saul 2012: 200. However, Saul denies AHF. See §3.3 below.

intended messages. Beauvoir was not reminding her readers of the trivial truth that one is born a girl, and later becomes, a woman.¹¹ The categories *girl* and *woman* are surely very similar: in particular, the former is social iff the latter is, and former is biological iff the latter is. AHF, then, is more-or-less exactly as plausible as:

JHF S is a girl iff S is a juvenile human female.

When a human female is born, it is almost invariably known that the baby is female, by inspection. It is also almost invariably known by inspection that the baby is a girl—no speculations about the baby's society, upbringing or psychology are needed. (Indeed, knowing that the baby will die from an infection in a month is no obstacle to knowing that she is a girl.) Why do these pieces of knowledge always go together? The simplest explanation appeals to JHF. Since *girl* and (*juvenile human*) *female* are modally equivalent, any reliable indication that a human baby is female is also a reliable indication that the baby is a girl, and vice versa.

2.5 AHF predicts the correct verdict in cases of gender role reversal.

Imagine a possible world w in which the people who are in fact dentists and the people who are in fact plumbers have exchanged occupational roles. In w, the actual dentists fix leaky pipes and install toilets, while the actual plumbers whiten teeth and attach braces and crowns. This is not a world in which dentists are disguised as plumbers, and vice versa. Rather, w is a world in which the actual dentists are plumbers. What about a possible world in which the kind of people who are in fact women and the kind of people who are in fact men have exchanged gender roles?

In 2010 the French director Eléonore Pourriat made a short film, *Majorité Opprimée* (*Oppressed Majority*), in which the males push children in strollers and are sexually harassed and assaulted by the females, who jog brazenly through the streets shirtless. Evidently the point

¹¹ See McGrath 2019: 116. In the later translation of *The Second Sex* the indefinite article is omitted: "One is not born, but rather becomes, woman" (Beauvoir 2011: 283). The iconic sentence is often supposed to express the insight that *woman* is a social category (e.g. Butler 1986). This is not the place for Beauvoir exegesis, but it is worth noting that in the introduction she *contrasts* a paradigmatic social category (*proletarian*) with the category *woman*: "But proletarians have not always existed, whereas there have always been women. They are women *in virtue of their anatomy and physiology*." (Beauvoir 1989: xxiv, emphasis added); the later translation is more literal but preserves the basic point (Beauvoir 2011: 8)). And in a 1976 interview she said: "A positive definition of "woman"? Woman is a human being with a certain physiology…" (Brison 2003: 192).

was not that males would have been women if society had been completely different. As the *New York Times* (correctly) puts it, "the parent doing the chores is a *man*, and all the gender roles are reversed, creating a world in which men confront what it would be like to face the daily indignities, compromises and risks that women often face" (Rubin 2014, emphasis added). This is exactly as predicted by AHF: in the fictional world of the film, the occupants of the female gender roles are adult human males.

One more example: in 2003 the writer Norah Vincent resolved to try living as a man; she wrote a book—*Self-Made Man*—about her experiences. This was not, she emphasizes, a trial run for transitioning from female to male, but an undercover investigation into the secret lives of men (Vincent 2006: 15-17). Vincent's alter ego Ned joined an all-male bowling team, went to a strip club, and did other manly things. As the subtitle of the reprint edition—*One Woman's Year Disguised as a Man*—implies, Vincent did not become a man. As it happens, she made some serious attempts to transform her body by weightlifting and eating lots of protein, but even if her preparations had included testosterone supplements, she would have remained a woman. Imagine that, due to misreading Judith Butler, Vincent became convinced (and perhaps alarmed) for a few months during her fieldwork that her performance as a man made her one. If that had happened, she would have been wrong. Again, all this is exactly as predicted by AHF.

2.6 AHF is supported by the fact that 'woman' and 'female' are often appropriately used as stylistic variants of each other, even in hyperintensional contexts.

Granted AHF, there is not much difference between wanting to meet the woman of one's dreams and wanting to meet the (adult human) female of one's dreams: they are both fulfilled in the same circumstances. Conversely, if AHF is false, one desire could be fulfilled without the other.

For an example of particular relevance to present topics, recall AHF's counterpart for girls:

JHF S is a girl iff S is a juvenile human female.

As noted, an argument for JHF is also an argument for AHF. Consider these autobiographical remarks from the writer and activist Julia Serano's *Whipping Girl: a transsexual woman on sexism and the scapegoating of femininity*:

...saying that I "wished" or "wanted" to be a girl erases how much being female made sense to me...I had dreams about being or becoming a girl well before I experienced any conscious desire to be female... (Serano 2007: 80-1)

Serano moves indifferently between wanting (as a juvenile human) to be a girl and wanting to be female as if these amount to the same thing. If JHF is wrong—or, more carefully, if JHF is anything but a very good approximation—Serano expressed her childhood desires in a confused way. She did not.

The foregoing makes a strong cumulative case, and AHF is of considerably greater initial appeal than the JTB analysis of knowledge. Before turning to objections, one more consideration is worth mentioning. Decades of attempts to analyze knowledge in the wake of JTB's failure have led, not to despair about whether anyone knows anything, but to an invigorated program of epistemology—Knowledge First!—that takes knowledge as basic and unanalyzed (Carter et al. 2017). Strikingly, 'Women First!' was *not* the reaction to the apparent discovery that AHF was false, and that woman defies analysis. As Saul explains, "[t]his led to a kind of crisis in feminist theorizing" (2012: 197)—the feminism-imploding possibility that there are no women was taken very seriously (see, e.g., Alcoff 2006: ch. 5). Now, if AHF is true, then (as we saw) it is sometimes part of the explanation of how we know that an individual is, or isn't, a woman. (If AHF is false, of course it plays no such role.) For instance, AHF provides a decisive reason for thinking that Norah Vincent's heroic attempt to live as a man had no effect at all on her status as a woman (see §2.5). Accordingly, if someone becomes convinced that AHF is false, his knowledge that Vincent is a woman may vanish, with his prior conviction that Vincent is a woman being replaced by uncertainty. That may well produce a more general feeling of vertigo. If Vincent might not be a woman, why am I so sure Simone de Beauvoir is one? The discombobulating thought that women are cultural fictions like witches and mermaids is not far behind. If AHF is true, the otherwise puzzling "crisis in feminist theorizing" starts to make sense.

AHF is in better starting shape than JTB ever was. Given that AHF enjoys almost zero defenders¹², the arguments against it are presumably conclusive. What are they?

¹² Stone (2007: 141) comes close, writing that "in everyday language 'woman' often just means 'female human being'", but then immediately qualifies this by arguing that "the word 'woman' is ambiguous between sex and

3: Arguments against AHF

The appeal of AHF has not been completely overlooked. Stoljar was one of the first to explicitly note it:

There is only one plausible biological type that is a candidate for the species of woman: the type "female human being." (Stoljar 1995: 267)

(Stoljar, like a number of other philosophers, omits 'adult', which we can presume to be implicit.¹³)

Bettcher agrees:

On the face of it, the definition "female, adult, human being" *really does seem right*. Indeed, it seems as perfect a definition as one might have ever wanted. (Bettcher 2009: 105)

What *is* surprising is that this point is frequently missed. Bach, for instance, puts a representative "biological essentialist" account as follows:

XX An individual Q belongs to the kind woman if and only if Q possesses XX chromosomes and female reproductive organs. (Bach 2012: 233; label added, explanatory gloss omitted)

This, Bach says, belongs to a justifiably "maligned tradition of philosophical and scientific theorizing" (2012: 233). He does not provide an example of anyone who has endorsed XX. This kind of claim, he reports, "is most commonly attacked on the grounds that it is empirically false and that it explains the social status of women as inevitable, necessary, and therefore justified"

gender". By standard tests, there is no relevant ambiguity in 'woman', and in any case there are theoretical reasons for suspicion. Lexical ambiguity is rife arguably because it leads to efficient communication when the context can easily disambiguate (Piantadosi et al. 2012); but the suggested ambiguity in 'woman' would presumably lead to misunderstanding.

Saul (2012: 196-7) does not explicitly mention AHF, but reports that she used to be sympathetic to the view that 'woman' "picks out those who have certain biological traits", before changing her mind. See also Bogardus 2019: 1-2, 16.

¹³ Stoljar is clearly not using 'woman' in some technical sense, hence the need for the qualification. Haslanger, on the other hand, stipulates that 'woman' (in her usage) applies to girls (Haslanger 2012: 40; see also Haslanger 2017: 165).

(233-4). One might well be mystified about how such an explanation is supposed to go, but Bach is certainly correct that *XX* is false.¹⁴ His own historical theory of the category *woman* would have been better motivated if AHF's defects had also been exposed, but he does not mention it.

Let us start with Bettcher's argument against AHF, followed by two others which have a more central place in the literature. There are a few more, but they are relatively unimportant and can be relegated to a footnote.¹⁵

3.1 Swapped gender roles

If AHF is true, then women might not have occupied the gender roles they in fact occupy. According to Bettcher, this is doubtful:

We can imagine a world where the cultural roles normally assigned on the basis of sex are inverted: females dress 'like men,' males dress 'like women'; stereotypical traits and behaviors are assigned to each group. Here, it isn't clear how to apply the terms 'man' and 'woman.' Does physical sex or cultural role determine category membership? If this is a hard case (I believe it is), then cultural roles (and related practices and conceptions)

¹⁴ Since there is no restriction to humans *XX* counts a female hippopotamus as a woman; there is also no mention of developmental stage. These omissions are no accident, because Bach says that the properties mentioned on the right hand side are supposed to "supervene on...*Q*'s occurrent physiology", i.e. be "intrinsic" (2012: 233). And even waiving these issues *XX* fails to give a necessary condition for many reasons (e.g. some women with Turner syndrome have only one X chromosome, women with triple X syndrome have three, and women can lack "female reproductive organs" due to birth defects or surgery).

¹⁵ Bettcher gives two more objections to AHF. First: "One problem for a definitional account of 'woman' is that the term 'sex' [more exactly, 'female'] does not itself seem very easy to define" (2009: 103; cf. Saul 2012: 198). It is hard to see how this is a problem at all, since in general one can define a word W1 using an undefined word W2; naturally a regress looms if W2 also has to be defined. Second: "consider adjectives such as 'womanly,' 'manly,' 'girly,' and the like. It seems as if they have cultural traits packed right into their meaning" (Bettcher 2009: 104). That is, 'womanly' does *not* mean: *like a (stereo)typical woman*; it rather means: *has cultural traits X, Y,...*, where X, Y,... are cultural traits *actually* distinctive of women. So, Bettcher thinks, 'Ditch digging is womanly' is *necessarily* false. Whether Bettcher is right about 'womanly' is debatable, but what is quite unclear is how this is supposed to "suggest that there is something wrong" (104) with AHF. For another argument that also appeals to 'womanly', see Spelman 1988: 14).

must somehow be connected to the semantic content of gender terms like 'woman.' (Bettcher 2009: 103-4)

Pace Bettcher, this is not a hard case at all. We have already examined these sorts of scenarios in the previous section (§2.5) and, far from disconfirming AHF, they nicely confirm it.¹⁶

3.2 Intersex individuals

Stoljar writes:

Consider...cases of sexually indeterminate people, such as those described by Anne Fausto-Sterling [1993]...Their existence...undermine[s] the claim that 'woman' refers to all and only female human beings (and correspondingly that 'man' refers to all and only male human beings). (Stoljar 1995: 273)¹⁷

'Sexually indeterminate' has a natural epistemic reading—something like 'not known to be either male or female'—which Stoljar evidently does not intend. On the epistemic reading, Stoljar's argument in this passage would be tantamount to 'Some women are not known to be

¹⁶ Cultures with a "third gender" (e.g. the berdaches in many native North American tribes) might be thought to provide a similar (and perhaps more effective) argument against AHF. Plausibly, third genders (also sometimes called 'third sexes') are cultural expressions of male homosexuality or androphilia (Vasey and VanderLaan 2014; see also Hames et al. 2017). (The phenomenon is mostly but not entirely male.) Adult male members of these third genders do not socially identify as men; can we go further and say that they are not men? In his seminal study of the Zuni berdaches in New Mexico, the activist and author Will Roscoe writes that "[t]he answer to the question 'Was We'wha [a berdache] a man or a woman?' is 'Neither'" (Roscoe 1991: 145, but cf. 147). And if adult male berdaches are not men, then men are not simply adult human males, and (by parity) women are not simply adult human females. Obviously this is an immense topic, but here are three brief observations intended to dampen any enthusiasm for this objection. First, Roscoe recounts a story in which a Zuni elder is asked where a deceased member of the "third gender" will be buried: "On the south side, the men's side, of course... Is this not a man?" the Zuni replied with a smile" (1991: 126). Second, literal translations of berdache names do not inspire confidence: admittedly they include 'man transformed into a woman' and 'man-woman', but also 'acts like a woman', 'woman pretenders', and 'unmanly man' (Roscoe 1998: 213-20). Finally, in an Australian television documentary about the fa'afafine, the Samoan third gender, one fa'afafine remarks: "We know that we're boys at the end of the day" (SBS 2013).

¹⁷ This argument can also be found in Oakley 1972: 115. It cannot be said that philosophers have reacted uniformly to these sorts of cases (in medical terminology, "disorders of sex development"): cf. Manne 2018: 26-7.

female, therefore some women are not female', which is plainly invalid. Rather, a "sexually indeterminate" individual in the relevant sense is someone who is, simply, neither female nor male. Are there any such individuals? Fausto-Sterling, in the article cited, does not argue for this claim: she seems to think that merely describing some so-called "intersex" conditions is sufficient evidence, although this is hardly straightforward.

As a concession to Stoljar, we can avoid entering the empirical weeds and examine an ideal hypothetical case. Consider, then, the fictional condition *Complete Asexual Syndrome* (CAS), which occurs in 1 in 100,000 live births. CAS individuals are born without sex chromosomes; in a CAS fetus, the primordial gonads which typically differentiate at around 7 weeks into ovaries or testes instead dissolve. Nonetheless, at birth CAS individuals appear as normal females and have female-typical play-styles and interests in infancy. Despite lacking ovaries and a uterus, around puberty they develop breasts and undergo regular episodes of bleeding that are easy to mistake for menstrual cycles. All this means that CAS usually goes undetected. Even when a CAS individual seeks medical help for fertility issues, CAS is unlikely to be diagnosed.

CAS individuals behave and look just like (human) females. But behaving and looking like a female is not sufficient for being one. By any reasonable standard, CAS individuals are not female. If adult CAS individuals are women, then we have a counterexample to the left-to-right direction of AHF: being female is not necessary for being a woman.

Are CAS individuals women? Naturally they are, and should be, treated as women in all but certain infrequent medical situations. In particular, they should be *called* 'women'. But there is a difference between *being an F* and *being (rightly) treated as an F*. (Here we are presupposing a clear understanding of 'treating someone as an F'. ¹⁸) Some children should be treated as adults. Conversely, some adults should be treated as children. Usually, being an F is neither necessary nor sufficient for being (rightly) treated as one. Even if CAS individuals are not women, only an obtuse moralistic pedant would deny them entry to a space marked 'Woman Only'; the same kind of inflexible literal-mindedness would prevent groundskeepers from mowing a patch of turf with a 'Keep Off the Grass' sign. Spaces marked 'Females Only'

¹⁸ In the cultural anthropologist Gayle Rubin's "androgynous and genderless (though not sexless) society, in which one's sexual anatomy is irrelevant to who one is" (Rubin 1975: 61), there is no such thing as "treating someone as a woman".

illustrate the same point. CAS individuals are not female, but everyone agrees that any rights and privileges afforded to females should apply to them too. Any inclination to say that CAS individuals are women might be largely driven by failing to make the distinction between being (rightly) treated as a woman and actually being one.

If CAS individuals are neither women nor female, why is it more tempting to say that they are women than to say that they are female? A plausible explanation is that the prototype of *woman* is more heavily weighted to social characteristics and external phenotype than the prototype of *(human) female*, which is more heavily weighted to reproductive organs. One can see a similar effect—to continue the fiction—using CAS in peafowl. CAS peafowl are neither male nor female, but appear as peacocks, complete with resplendent tails. It is tempting to say that CAS peafowl *are* peacocks, thus refuting the claim that peacocks are simply (adult) male peafowl. But that may be too hasty: we have a well-documented tendency to give too much weight to stereotypical or representative features, and CAS peafowl are very similar to the stereotypical peacock.¹⁹

Even the best possible *fictional* example of an individual with "indeterminate sex" is not especially convincing, then. But we can go further. Suppose that CAS individuals *are* women. Why? One possibility is that their *biological* condition is sufficient for being a woman. One might support this by considering cases of a socially isolated CAS individual, raised by wolves on a desert island. If that individual is a woman, then that is surely because her biological condition is sufficient. But then we have moved no distance at all from the idea that *woman* is a biological category—it is merely a somewhat more complicated biological category than *adult human female*. Specifically: someone is a woman iff she is either an adult human female or an adult human with CAS, or perhaps something a little fancier. And as far as this paper goes, that revision of AHF will do.

However, there is another possibility to consider. Perhaps CAS individuals are women because they function socially as women and/or have an external womanly phenotype. But notice that individuals who are neither male nor female can only provide counterexamples against the left-to-right direction of AHF, and its counterpart for men:

AHM S is a man iff S is an adult human male.

¹⁹ See Kahneman 2012: chs. 14, 15.

The idea that being an adult human female/male is *sufficient* for being a woman/man is left untouched. Consider, then, *trans women* (male-to-female, or MtF, transsexuals).²⁰ With the highly plausible assumption—accepted by Stoljar: see following section—that these individuals are male, we get the result that (some) trans women are both women and men.²¹ They are women because of their social role and/or external phenotype; they are men because they are male. However, the view that trans women are *both* women *and* men is—to judge by its extreme unpopularity—the worst of both worlds.

Summing up, Stoljar's "intersex" argument fails comprehensively. If this is the only objection, then AHF, or a minor variant thereof, is all but irresistible. More generally, given the right-to-left direction of AHF, there is a strong case for the converse direction, and so for AHF itself.

What opponents of AHF need, then, is an argument that dismantles the right-to-left direction; that is, an argument that being an adult human female is not sufficient for being a woman. Assume, reasonably enough, that individuals who are counterexamples to the right-to-left direction are men. If there are (or could be) adult human females who are men, then being an adult human male is not *necessary* for being a man, and so the left-to-right direction of AHM fails. Similarly, if the right-to-left direction of AHM fails, so does the left-to-right direction of AHF. Since AHF and AHM stand or fall together, we should expect that the sought-after objection to AHF will dismantle *both* directions.

3.3 Transsexual individuals

Stoljar has a final argument that promises to do just that:

Transsexuals keep the same chromosomes, yet *change* genders. These examples show at least that there is more to the concept 'woman' than having an XX chromosome and related sex characteristics. At most, they show that female sex is not necessary for being

²⁰ Standardly characterized as natal males who have a history of *gender dysphoria* (significant distress or unhappiness with one's sex), which has led them to "transition" and live more-or-less full-time as women.

²¹ Some animals change sex (for a review, see Vega-Frutis et al. 2014); mammals do not. Current surgical techniques and hormone treatments do not come close to reproducing the process of sex change as it occurs in the wild.

a woman and hence cannot be a candidate for the universal 'woman.' (Stoljar 1995: 274)²²

Trans women, according to Stoljar, are not female, but they are women. They are thus a counterexample to the left-to-right direction of AHF. Stoljar rests content with the conclusion that "being a female human is not necessary to being a woman" (1995: 274), but if she's right about this, a similar counterexample shows that the right-to-left direction is also false. Just as trans women are women (and, moreover, are not also men), trans men (FtM transsexuals) are men and not women. Assuming (as Stoljar in effect does) that trans men are of the "female sex", being an adult human female is not sufficient for being a woman. Transsexuality is thus potentially more devastating to AHF than Gettier's counterexamples were to JTB, which only targeted the purported sufficient conditions. As desired, this example threatens to destroy AHF completely.

Stoljar's argument is echoed by Saul. She first makes the (plausible) claim that "some [trans women] are bound to be excluded from any biologically based category", and then says:

I think TW is true:

TW Trans women are women, even if they have not had 'reassignment' surgery or hormonal treatments. (Saul 2012: 200; thesis label changed)

She draws the conclusion that *woman* is not a "biologically based category"; if that is right, then AHF is false.²³

²² "These examples" include the "sexually indeterminate people" just discussed, and also (improbably) "male transvestites" (Stoljar 1995: 273-4). It should be noted that Stoljar at one point puts her conclusion somewhat cautiously: "the examples suggest that being a female human is not necessary to being a woman" (274). The same argument, minus the crucial last sentence of the quotation, is in Kessler and McKenna 1978: 1-2.

²³ Saul formulates and sympathetically discusses a context-dependent proposal for the semantics of 'woman' (for more sympathy see Barnes 2019: 16-7):

'S is a woman' is true in a context C iff S is human and relevantly similar (according to the standards at work in C) to most of those possessing all of the biological markers of female sex. (Saul 2012: 201; endnotes omitted, some typography changed)

The idea is that in "a context in which our concern is with how people self-identify" (201), self-identification becomes the relevant respect of similarity. Since most females self-identify as women, in such a context 'Charla [a

TW is a generic, like 'Women give birth', and so there is semantic room for exceptions. However, it is clear that the intended interpretation allows for no exceptions, so it should be read as a universal generalization. Endorsement of TW has recently become quite popular among philosophers. Jenkins, for instance, writes:

The proposition that trans gender identities are entirely valid—that trans women are women and trans men are men—is a foundational premise of my argument, which I will not discuss further. (Jenkins 2016: 396)²⁴, ²⁵

trans woman] is a woman' will be true, because Charla is similar to most females in the relevant respect: she, like most females, identifies as a woman. (Whether this secures the truth of 'Trans women are women' is another matter.) Saul raises a number of objections, including "complications about how to understand 'self-identification'"; she concludes that the proposal "is far from perfect or complete" (206).

Matters are worse. First, consider 'girl', which presumably should receive a similar treatment. (Saul's proposal as written fails to take account of developmental stage, and 'adult' should qualify 'human' on the right-hand side.) A parallel account of 'girl' would mean that in "a context in which our concern is with how people self-identify", 'girl' applies to Jazz, a natal male child with gender dysphoria who identifies as a girl—the desired result. But now suppose that Jazz has a one-year old sister, Jane. It seems that 'Jazz and Jane are both girls' will be *false*, uttered in the same context, because—whatever "self-identification" comes to—Jane is too young to self-identify as anything.

Second, and more troublingly, the word 'woman' is *used* in specifying the contextually salient respect in which Carla is similar to most (adult) females: Carla identifies *as a woman*. The proposal is therefore circular (a vice, since it is supposed to specify the meaning of 'woman'). Moreover, since 'woman' is context-dependent, 'identifies as a woman' is *also* context-dependent, and the proposal cannot explain how it should be interpreted.

- ²⁴ More examples (some perhaps with minor qualifications): McKitrick 2015: 2576, Barnes 2016: 90, Manne 2018: 14, Mikkola 2017: 177, Tuvel 2018: 81-2.
- ²⁵ The quotation is difficult to reconcile with Jenkins' stated project of supplying an "ameliorative...definition of woman...[that] respect[s] the gender identifications of all trans people"

in the Haslangerian sense (Jenkins 2016: 396; see §1.1 above). The word 'woman' in the quotation in the text plainly has its ordinary sense and so is *un*ameliorated. (Indeed, the quotation occurs long before Jenkins has explained her ameliorative proposal for redefining 'woman'.) Jenkins is therefore saying that (in the ordinary sense of 'woman') trans women are women and so their identities are "entirely valid". And the ordinary sense is the relevant one. For instance, the distinguished economist Deirdre McCloskey—who transitioned from the (slightly less distinguished economist) Donald at age 53—writes in her memoir *Crossing*, "*Am I a woman? Yes.*" (McCloskey 1999: 176). This quotation is in standard English, not philosophical argot, and so any ameliorated sense is irrelevant to whether McCloskey is correct.

Like Jenkins, Stoljar and Saul treat TW as an unargued premise.²⁶ There is nothing in general wrong with that, of course. Arguments have to start somewhere, and the case for AHF in the previous section made copious appeal to unargued premises. However, taking TW as an unargued premise is methodologically quite ill-advised.

First, TW is controversial, to say the least. Treating it as an axiom is unlikely to be dialectically effective, even if one's audience is presumed to be a small group of specialists in feminist philosophy. Many notable feminist philosophers and theorists have either explicitly rejected TW or else endorsed views that evidently conflict with it. An example of the former: "The transsexual may look like a woman but can never feel like or be a woman" (Grosz 1994: 207); an example of the latter: "part of what it means to be a woman or a man is to be recognized to have a certain kind of body that is linked to certain biological processes like reproduction" (Witt 2011: 35; see also 40-1).²⁷ More examples are easy to find.²⁸ Bettcher's own position on TW is also nuanced.²⁹

²⁶ Caveat: given her "cluster" analysis of 'woman', Stoljar might not endorse TW interpreted unrestrictedly (1995: 284-5).

²⁷ Witt's account illustrates how the view that *woman* is a social category (albeit one with a biological component) and that AHF is false, may be combined with the denial of TW. Her account has some dubious consequences. For instance, a *Brave New World* scenario in which human reproduction is offloaded to hatcheries is one in which there are no women (Witt 2011: 39); she thus disagrees with Aldous Huxley. For the same reason, Witt's account conflicts with the radical feminist Shulamith Firestone's own description of her "cybernetic communist" utopia (Firestone 1970: 221-4).

The most infamous in feminist writings is Janice Raymond's *The Transsexual Empire* (Raymond 1994; original publication in 1979). Some others are Oakley 1972: 122; Daly 1978: 68; Gatens 1983: 153-4; Paglia 1992: 5; Hale 1996: 115; Greer 2000: 70-80; Bach 2012: 269; Jeffreys 2014. Haslanger (during her descriptive period—see fn. 8) can also be included. (A few of the preceding allow that *some* trans women are women; that milquetoast position is understandably not very popular, however.) Some theorists, while not rejecting TW (even implicitly), do not flatly affirm it either (cf. the quotation from Chappell, above). For instance: "The question 'are MTF transsexuals women?' is not well-formed in the absence of a fixed set of criteria of womanhood to which we can appeal" (Heyes 2000: 93). See also Scheman 1993: 191 (cf. Scheman 1999: 69-70, 86); Moi 2001: 37, fn. 50, 78, 88-99 (arguably belonging on the first list); and Ásta 2018: 90.

²⁹ Bettcher claims that both 'trans woman' and 'woman' have non-standard meanings in some idiolects. 'Trans woman', she says, is often "understood to mean 'a man who lives as a woman", but "in trans subcultures it simply *does not* mean that" (Bettcher 2013: 235). If that is right then TW, on its ordinary interpretation, amounts to 'All

Second, and more importantly, there is a danger that one's "intuitive" assessment of TW will be clouded by non-epistemic factors. Depending on who one's friends are, denying (or affirming) TW can bring heavy social penalties. Clichéd insults await the wrongthinkers: deny TW and you're a bigoted transphobe; assert it and you're a deluded member of the transcult. By the same token, the rightthinkers have their virtue and in-group credentials reinforced.

Accordingly, an assessment of TW should be as indirect and oblique as possible. Ideally, its truth

men who live as women are women'; assuming that there are such men and that they are not also women, TW turns out false. This is not an appealing view of the meaning of 'trans woman'. First, a man might live as a woman as a journalistic experiment, as Vincent lived as a man (see §2.5 above); he would not thereby be a trans woman. Second, new words are often introduced by pointing to paradigm cases of application and non-application, with some additional explanatory verbiage, in the hope that the listener will catch on (as we'll see, Bettcher herself appeals to this model). No explicit definition is given or needed. 'Trans woman' fits this nicely (see fn. 20, where the paradigms are too obvious to mention) and nothing in the introduction of the phrase forces it to have the meaning of 'man who lives as a woman'. (The remainder of this note assumes that this neutral account of the meaning of 'trans woman' is correct.)

Turning now to 'woman', and following Bettcher's notation, the standard (or "dominant") meaning of 'woman' is *woman-D*. According to Bettcher, some trans women are not women-D—further, she suggests, some trans women are men-D. Thus TW, interpreted in the standard way, is false. However, 'woman' supposedly has another ("resistant") meaning, *woman-R*, found in the idiolects of (some) "trans subcultures" (244), and all trans women *are* women-R. (See also Dembroff Forthcoming.)

Where does this leave AHF? As we have seen (§3.1), Bettcher thinks it is false, but the ambiguity view alone does not show that. If AHF has two interpretations—corresponding to the dominant and resistant meanings of 'woman'—the one clearly in play in the relevant literature is the first. There is no reason to think this interpretation falsifies AHF—quite the contrary (cf. 236).

Moreover, Bettcher's account of the alleged resistant disambiguation has difficulties of its own. In a number of places she describes it as a more *inclusive* understanding of 'woman': its extension is "broadened" (240), corresponding to "an expanded category of womanhood" (246). If that is right, then S is a woman-R iff S is either a woman-D or a trans woman. But then, assuming a similar resistant interpretation of 'man', and that (some) trans woman are men-D, in the trans subculture idiolect '(Some) trans women are men' will be *true*, which is clearly not what was intended. Bettcher also has a quite different idea, that the resistant interpretation of 'woman' is introduced by using trans women as paradigm cases (241): *she* is a woman (pointing to a trans woman); *he* (pointing to a stereotypical man-D) is not. The problem here is that it is unclear why 'woman' (in the resistant interpretation) doesn't simply mean *trans woman*, or at any rate fails to apply to many women-D, which again is not what Bettcher intends. Finally, as she notes, 'female' and 'male' are capable of resistant interpretation too (214): if AHF is true on a thoroughgoing dominant interpretation, it is likely also true on a thoroughgoing resistant one.

or falsity should be derived from premises whose acceptance is uncontaminated by any desire for social approval. No doubt that ideal cannot be reached completely, but the arguments of the previous section go some distance.

As noted, the proponents of TW (and, for that matter, many of its opponents) do not supply any argument. A reasonable conjecture is that the insistence on TW by trans women themselves has had some influence. And isn't that evidence for TW? After all, when someone declares 'I am an F' that is often a strong indication that she *is* an F. In the present case, however, this is unpersuasive for a perfectly general reason: if someone is personally heavily invested in the truth of p, it is prudent to treat her claim that p is true with some initial caution.

And in any case—this can hardly come as a surprise—trans women themselves are not of one mind on TW. To take some random examples:

I certainly wouldn't be happy with the idea of being a man, and I don't consider myself a man, but I'm not going to try and convince anyone that I'm really a woman...I like the idea of accepting the identity of a transsexual, rather than having to be 'man' or 'woman'. (County 1996: 139)

...but the darker, more difficult fact that many trans women *wish they were women*, *period*. This is most emphatically not something trans women are supposed to want. The grammar of contemporary trans activism does not brook the subjunctive. (Chu 2018; cf. Prosser 1998: 32-33.)

I know that I am not biologically female...To say that trans women are the same as women...requires denial of some rather huge concrete truths. (Hayton 2018)

Are trans women women or aren't they? Here too the urge to over-simplify gets us into trouble. We imagine we have to line up in two discrete sides, behind an unqualified Yes and an unqualified No. I don't think that's right at all. Here as in so many other places, the right answer is more like "In some ways yes, in other ways no". (Chappell 2019)

The prevalence of these views is a matter for speculation, but one can safely say that trans women's opinions run the gamut. Some think they are women, some think they are men, some

think they are neither, and some think the question of whether they are women has no simple answer.³⁰

If the main reason for TW is the testimony of trans women themselves, then this is decidedly unimpressive. But as an attempt to refute AHF, it's even worse. TW alone does not entail that AHF is false. Another premise is needed, and it is clearly intended to be:

NF Trans women are not female.

(Like TW, this should be interpreted as a universal generalization. A weaker premise would do, namely that *some* trans women are not female; but there is little suggestion that Stoljar and Saul would only endorse the weaker premise.)

NF is no doubt true. However, the problem is that a non-negligible number of trans women assert that they *are* female, thus denying NF. (Given AHF, this is only to be expected.) For instance, a recent online article by a prominent trans woman and activist is titled: 'Medical professionals increasingly agree: Trans women are female, trans men are male' (Jones 2017).³¹ To argue against AHF from TW and NF, while using the testimony of trans women to support the first premise, conveniently ignores the fact that one could also use their testimony to undermine the second.

Perhaps surprisingly, there is a practical corollary to these abstract metaphysical considerations concerning AHF. Granted that TW is false, propagating it might be justified on the grounds that its ultimate acceptance will bring benefits—rather like exaggerating the dangers

³⁰ For a century-old example (this time of a trans man claiming to be a woman), see Hirschfeld 1991: 95-102; on varieties of identities among trans men, see Hale 2009: 46.

Which opinion on TW holds the majority appears to be a highly contingent matter—anecdotally, TW has gained support over the last decade or so. There is a near-by possible world in which trans women merely claim that they have—in a phrase from Lawrence 2013: 89—"earn[ed] the right" to call themselves 'women', not that they literally are women. (And there need be no shame in that: being an honorary F is sometimes more of an achievement than being an F.) It seems unlikely that the philosophers in that world would be so keen on TW, which suggests that its actual philosophical proponents are responding to the way the zeitgeist happens to be blowing, rather than to the essence of womanhood.

³¹ Here it is important to distinguish the belief that one is *female* and the belief that one is *anatomically* female (has a vagina, uterus, etc.). If one is in fact an ordinary anatomic male, having the second belief would probably be delusional. But having the first belief might well be understandable and even to some extent defensible: what *being female* consists in is unobvious.

of climate change in order to get people to take it seriously. Prejudice and discrimination against trans women will be lessened, one might think, once it is widely believed that they are women.

The problem with this is not that many people are convinced that TW is false—which they are. Rather, it is that they *know* that TW is false. If all women are adult human females, this is hardly an arcane truth that members of the Inner Party can keep hidden from the proles, and the falsity of TW is only a short step away. And, as Williamson (2000: chs. 2, 3)—not to mention Plato—has pointed out, knowledge, once attained, tends to stick around. Relatedly, people are less susceptible to propaganda than is commonly feared (Mercier 2017). Repeatedly intoning TW is likely to backfire, inducing a feeling of being snowed. An eminently desirable and feasible goal is for trans women (and men) to be accepted by society and live in peace and dignity. Ironically, evangelists for TW may be making this harder to achieve.

Finally, let us briefly return to the ameliorative project (see §1.1 above) of formulating a revised "category of *women*" which includes "everyone who needs to be included for the purposes of feminism" (Jenkins 2016: 421), and which feminist theorists "should aim to get people to use" (395), specifically by encouraging a suitable shift in the meaning of 'woman'.

For the sake of the argument, grant Jenkins' claim that trans women need to be included (and that trans men need to be excluded) (421). The hope is not just that the meaning of 'woman' can be semantically adjusted, but that no synonym of 'woman' with its earlier meaning will emerge to enjoy widespread use, else the problem of "exclusion and marginalization" (395) would remain.³²

Assuming AHF is true, 'woman' picks out the biological category *adult human female*. The linguistic consequences of AHF go far beyond contemporary standard English: for millennia, languages used by wildly diverse human cultures have had single words for this category. Words mark useful distinctions, and this universal pattern, highly robust with respect to social structure, suggests that having a simple label for adult human females is not something we can easily do without.

Languages are not static, of course. Sometimes a word loses its earlier meaning because the original distinction is no longer useful. ('Cheater' once meant *officer appointed to look after the king's property, or "escheats"*.) Sometimes it retains its old meaning and acquires a new one.

³² For critical discussion of Jenkins' proposed adjustment see Bogardus 2019.

('Mouse' was metaphorically extended to mean *handheld pointer-moving device*.) Sometimes a word is replaced or demoted by a synonym (as has happened with 'sex' and 'gender' (Haig 2004)), but that just makes the old distinction by new means. There is no reason to think that the utility of a word for the category *adult human female* will markedly decline in the foreseeable future. Unlike scullery maids, cigarette girls and switchboard operators, the mature females of our species will continue to be an important topic of thought and talk. So even if 'woman' could somehow be coaxed to change semantically, a new word for the category (a snappier version of 'natal woman' or 'bio woman', already in occasional use) would very likely fill the lexical vacuum. Ambitious ameliorative projects for 'woman' should therefore be viewed with some skepticism.

In order to get to where we should be, it is important to know where we are. And that is what this paper has been about. Our starting point is not that *woman* is a social category, as so many theorists have presumed. Rather, it is that women are adult human females—nothing more, and nothing less.

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