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New and Improved: Pessimism about Testimony's Role in Developing Understanding

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Some philosophers—call them pessimists—think we have reason to avoid deferring to testimony to settle our questions in domains where deep understanding is important. Extant defences of pessimism focus on whether deferring to testimony is ever sufficient for acquiring understanding. But I argue that these defences/articulations of pessimism are unsatisfactory. Even if deference to testimony were always insufficient for acquiring understanding—which seems doubtful—this would not explain why we have reason to avoid deferring in certain domains. Instead, I claim we should think about how and when testimony can disincentivize and discourage agents' coming to understand. I argue that deferring to testimony to settle a question often results in one having less reason to seek broader understanding and thereby sets one up to (continue to) lack understanding. The *incentive pessimist* appeals to this phenomenon to explain and defend the basic pessimist thought.

Keywords: deference, moral testimony, understanding, understanding-why, testimony

1. Introduction

Some philosophers are *pessimistic* about deference to testimony when it comes to questions or domains where understanding is important. They think testimony has a limited role to play in the acquisition of understanding, in that where

seeking/developing understanding is important we have some reason to avoid settling questions by deferring to others. *Understanding* here is, roughly, a deep or broad appreciation of something rather complex like a system, explanation, phenomenon, or subject area—more on which below.¹ The idea that we have reason to avoid deference where what we really want is understanding is well-represented, and it is often paired with and justified by appeal to the further claim that deference to testimony cannot directly give us understanding. For example, Zagzebski (2008: 145-6) claims:

Knowledge can be acquired by testimony, whereas understanding cannot be... In fact, understanding cannot be given to another person at all except in the indirect sense that a good teacher can sometimes recreate the conditions that produce understanding in hopes that the student will acquire it also.

Hills (2009; 2016; 2020) makes the slightly weaker claim that understanding is not ‘usually’ or ‘easily’ gained by testimony; this is why, she claims, deference has a limited role in moral epistemology. And Sosa (2021) argues that even if some understanding can be gained via testimony, this sort of understanding ‘falls short’; in a variety of domains, desirable or real understanding simply must be acquired firsthand, by working to grasp or see for oneself how a complex object or explanation hangs together.

In this paper, I will defend the general pessimist claim that we have some reason to avoid deferring to testimony to settle our questions in domains where understanding is important. But I will take issue with these just-mentioned forms of what I call *sufficiency pessimism*, which defend and explain the appropriateness of non-deferential practices by appeal to testimony’s insufficiency for understanding. Sufficiency pessimism, I shall argue, is both too strong and too weak. It is too strong, as others have also argued, in making dubious claims about the relative difficulty of the individual work involved in acquiring understanding. It is too weak because it misses an important way in which learning by testimony is often at odds with acquiring understanding; this omission in

¹ *Understanding* and *understanding why* are now familiar terms of art in epistemology. For influential discussion, see, e.g., Elgin (2006; 2009), Grimm (2006; 2011), Hills (2009; 2016), Kvanvig (2003), Pritchard (2010), Riggs (2003), and Zagzebski (2001).

turn severs sufficiency pessimism from some of the main motivations for pessimism in the first place—that is, the intuitive appropriateness of some non-deferential practices in domains where understanding is important.

This omission points the way, however, to a new and better form of pessimism, which I call *incentive pessimism*. I will argue that deferring to testimony systematically, though certainly not always or generally, *disincentivizes* understanding and hence can discourage its acquisition. The incentive pessimist claims that this disincentivizing potential explains the reason we have to avoid settling our questions by deference to testimony in domains where understanding is important.

A few clarifications on my usage of *testimony*, *understanding*, and *pessimism* are in order, before proceeding.

First, as my talk of *deference* has already suggested, I'm primarily interested in cases of testimony where a hearer takes a speaker's word in acquiring a new belief that settles her question, without seeing for herself why that belief is true—assuming it is.² It's plausible to think that not all cases of testimony are like this. Suppose you tell me something I already believe, for other reasons. Your testimony might give me additional reason to believe what I do. Or suppose your testimony fails to settle my question at all, because I take it on board only provisionally as providing some reason to believe what you say, though I remain motivated to gather additional evidence and think further. For the sake of brevity and following recent literature exploring the relationship between testimony and understanding, I will sometimes use *testimony* when I really have in mind only the first, deferential and question-settling sort of case—as when, for example, I say that testimony has the capacity to disincentivize understanding.

I'll think of *understanding* in a standard, ecumenical way, following contemporary literature on understanding and understanding-why in epistemology—see footnote 1. Although there are certainly unsettled debates in that literature—more on which

² This category includes cases where the hearer simply has no (firm) independent judgment or (decisive, weighty) reasons to believe/disbelieve, as well as cases—if such there be—in which the testifier's judgment properly pre-empts the hearer's. Cf. Zagzebski's (2012) argument for authoritative pre-emption; see discussion and critique in, e.g., Constantin and Grundmann 2020.

presently—philosophers seem to agree on a few essential features of the state at issue. For example, whereas propositional knowledge can be bitty, attaching to particular, potentially isolated propositions, understanding must take as its object something rather complex like a system, explanation, subject matter, or phenomenon—for example, the human cardiovascular system, Portuguese exploration of the 15th & 16th centuries, some explanation of the working of a lightbulb, or a friend’s feelings after the death of a loved one. Moreover, understanding involves some sort of depth, grasping, or appreciation. When we understand something, we must somehow see or feel how the complex thing hangs together, how the parts are related, or how various facts about it stand in ratio-logical connections. We necessarily have a depth of insight into things we understand. Finally, understanding typically involves various abilities or powers for inference, explanation, and/or action. This is meant as the briefest sketch: I hope to have said nothing controversial.

And on the issues that are more controversial, I hope I can remain fairly neutral.³ Note, first, that even pessimists about testimony who appeal to the value of understanding can take a wide variety of positions on precisely when, why, and to what degree understanding is valuable. They needn’t think that understanding is particularly important in many domains, and they can admit that the importance of understanding may be outweighed in some cases; hence they needn’t think that non-deferential practices are always or widely appropriate.

Pessimists can moreover—and perhaps surprisingly—remain neutral about whether understanding is ultimately reducible to propositional knowledge. Some say that understanding, for instance, the human cardiovascular system, is nothing more than having the right, largish and complex body of knowledge about the system (Greco 2014), whereas others deny this (Hills 2009; 2016). You might think that knowledge-reductionism about understanding would stand or fall with optimism about understanding, and non-reductionism would be roughly equivalent to pessimism. But

³ Other important controversies, not discussed within the main text: whether understanding is factive (cf. Elgin 2009); whether understanding attaches directly to phenomena or to representational systems (cf. Greco 2014). Pessimism is neutral here as well.

this is not so—at least not once we’ve separated pessimism-in-general from sufficiency pessimism.

To see this, notice first that pessimism might be true even if reductionism is true. Reductionism entails that it is possible, in principle, to gain understanding by accumulating all the right pieces of propositional knowledge, which could presumably be acquired via testimony. But it still might be the case that common deferential, testimonial practices do not deliver the right kinds of propositional knowledge to constitute understanding, and so it may still be true that we have reasons to avoid deferring to testimony to settle our questions—in the ways commonly available to us—in domains where understanding is important. Notice moreover that pessimism might be false even if non-reductionism is true. Suppose that understanding cannot be reduced to propositional knowledge. It does not follow straightaway that testimony is at odds with understanding; there is no argument I am aware of that propositional knowledge is the only epistemic good testimony can promote.⁴ So the question of pessimism that will concern me in this paper is separable—and I will argue ought to be separated—from the question of reductionism about understanding.

One final clarification: there is a similarly complex relationship between this pessimism about testimony vis-à-vis understanding and pessimism about *moral testimony*.⁵ The pessimist about moral testimony, like the pessimist about testimony vis-à-vis understanding, thinks we sometimes have reason not to seek or accept testimony but rather to try to appreciate certain matters for ourselves—morality, in particular.⁶ But

⁴ Moreover, as I shall argue in section 3, even if it did follow that testimony cannot straightforwardly deliver or promote understanding, this would not suffice for pessimism.

⁵ See Hopkins 2007 for an introduction to and influential discussion of pessimism and optimism about moral testimony. In passing, Hopkins also suggests that he may be pessimistic about testimony vis-à-vis understanding (ibid. 630-631).

⁶ Different pessimists put this in different ways, committing themselves more strongly or weakly. Hopkins (2007) casts the pessimist as thinking moral testimony is ‘illegitimate’, whereas Crisp (2014) argues that a more plausible version of pessimism moots a *pro tanto* reason not to accept moral testimony. See Callahan 2020 for an overview discussion.

notice that it is possible to be pessimistic about moral testimony while being optimistic about the role of testimony in delivering understanding. For you might think there's a different, non-understanding-related problem with relying on moral testimony: maybe it compromises, for example, autonomy (Driver 2006) or virtue (Howell 2014). It is also possible to be pessimistic about the role of testimony in delivering understanding while being optimistic about moral testimony. For you might think morality is not a domain in which understanding is of paramount importance—perhaps conduciveness to right action generally matters most, when it comes to moral beliefs (Enoch 2014). While the present paper will draw on discussions of moral testimony that encompass reflection on testimony's role in developing understanding, I will not be defending or critiquing moral testimony pessimism directly. I will instead focus on the prospects for pessimism about testimony vis-à-vis understanding, in particular—henceforth, just *pessimism*.

Here's the plan. After reviewing a few influential versions of sufficiency pessimism in the next section, including the familiar over-strong critique they face, I'll press the question whether these existing pessimisms are pessimistic enough, in section 3. In the meatiest sections, 4-6, I'll outline a systematic way in which testimony can disincentivize understanding, thereby properly introducing and defining incentive pessimism.

2. Sufficiency Pessimisms and Over-Strong Worries

The defining claim of *sufficiency pessimism* is that testimony—or *classic testimony* or *deference to testimony*—cannot directly give a hearer understanding⁷—or does not easily or typically do so, or cannot do so in a variety of important domains—and that this explains the reason we have to be non-deferential in domains where understanding is important. While everyone in this literature tends to admit that learning from testimony is sufficient for simple propositional knowledge, sufficiency pessimists are sceptical about whether one can acquire understanding from testimony in a similar way. Surely, the thought goes, a hearer must put in some individual, firsthand work in order to broadly or deeply grasp a subject or explanation; and such work goes beyond simply

⁷ Boyd (2017: 105) labels a similar claim, 'Indirectness'.

receiving testimony. I focus here on the pessimistic work of Alison Hills (2009; 2016; 2020) and Ernest Sosa (2021).

Hills's particular pessimism is bolstered by her view that understanding—or *understanding why*, to use her term—essentially involves certain cognitive abilities. Understanding why p , for Hills, involves not just having a true belief that p and a true belief that q is why p . It also requires “a grasp of the reason why p , or more precisely, a grasp of the relationship between p and q .” (2016: 663) She writes:

If you grasp a ball, you have it under your control. You can manipulate it, move it, turn it round, and so on, that is you (normally) have a set of practical abilities or practical know how, which you can exercise if you choose. ...

When you grasp a relationship between two propositions, you have that relationship under your control. You can manipulate it. You have a set of abilities or know-how relevant to it, which you can exercise if you choose. For instance, if you understand why p , you can give an explanation of why p and you can do the same in similar cases. (2016: 663)

Hills claims that the abilities that constitute⁸ understanding why—which she collectively calls *cognitive control*—are not the sort of thing testimony—typically—can deliver. She sometimes suggests it may in principle be possible to acquire understanding and its associated abilities of explanation, extrapolation, etc. upon receiving testimony that p and that q is why p , if one somehow comes to grasp the relevant why-relation (2009: 119). But gaining such abilities from testimony is certainly not ‘typical’ (ibid.) or ‘easy’ (2016: 662). Rather:

Cognitive control is something that typically comes with reflection and practice. Other kinds of ability or know-how too are difficult to pass on through testimony alone. Hardly anyone learns how to swim or ride a bike by reading a textbook or listening to an explanation of how to do so. (2016: 670)

⁸ Or at least are grounded in. See Hills 2016: 663.

Sosa (2021) defends a related view, though with respect to a specific subset of questions and topics in the ‘humanities.’ Sosa argues that understanding is particularly important for those questions/topics, and he suggests such understanding necessarily involves ‘firsthand intuitive insight’ (2021: 3). Despite Sosa’s reference to humanities, his questions of interest are both broader and narrower than the set of questions centrally asked in particular university classrooms, as he acknowledges. One of his central cases is in geometry:

A young teenager still innocent of plane geometry is told by his teacher that the Pythagorean Theorem is true. The teacher lays out the theorem (not any proof, just the theorem), and affirms it to be true. A smart kid with a good memory, the student thereby knows through deference the truth of the theorem. But he falls short in his understanding of why the theorem is true, lacking as he does an adequate grasp of any proof.

It does not help if the student accepts by sheer deference the conditional that conjoins in its antecedent all the premises of some proof, and contains the theorem itself as its consequent, along with accepting by deference *also* the truth of the antecedent. He still does not grasp the truth of that conjunction well enough firsthand. He accepts it just through deference to the teacher.

That is why he falls short in his understanding of the truth of that theorem. The desired level of understanding requires insight of one’s own into the premises and into the immediate inferences that constitute a proof. (Sosa 2021: 4-5)

Sosa relies on this and other cases—including cases involving moral judgment and art appreciation—to argue that there are many questions where we do and should prize firsthand insight into why some particular fact holds.

Now he admits, as Hills does, that learning from others may play an important supporting or indirect role in acquiring understanding of these questions of interest. Sosa suggests that good geometry teachers, for example, might provide a ‘script’ (2021: 12) that aids their students in following simple inferences ultimately to understand the Pythagorean theorem better for themselves. But he is quite clear that the proper role of testimony is limited: ‘Proper deliberation uses testimony *only* as a conduit to reasons *which can then be accessed firsthand*, adopted as one’s own, and deployed through firsthand reasoning.’ (2021: 14, emphasis in original).

Here we see two versions of sufficiency pessimism. In the contemporary conversation, the biggest objection to such views is that they are too strong, since testimony sometimes does seem sufficient for desirable, real understanding once we consider a wider array of examples (see Boyd 2017; Grimm 2020). If I ask you why the clock is off, and you say we lost power last night, it seems I directly come to understand why the clock is off. *Pace Hills*, it seems many of us already have the background cognitive abilities we need, in order to immediately attain cognitive control of this information. And, *pace Sosa*, testimony can seem sufficient for understanding even when it comes to important questions in the ‘humanities’. If I want to understand the debate between Stoics and Epicureans, I might look first for a good teacher. (YouTube, anyone?)

Now Sosa and Hills share a general strategy for responding to these cases, which is to say that what’s going on in the case of testifying or teaching for understanding is not *classic*⁹ or *deferential* testimonial learning at all. After all, they point out in different ways, the learner must herself do the work of following the explanation or using the ‘script’ (Sosa 2021: 12) provided by a good teacher.

But this response to the worry may seem implausibly to minimize the role of a testifier or teacher. Certainly, good teaching can drastically reduce the effort needed to understand. Testimony can make it much easier to grasp Pythagoras’s theorem than it was for Pythagoras himself. And, as Greco presses (2020: 141-2), good teachers may also train us, via testimony, how to follow and grasp explanations or acquire understanding. When teachers and textbooks testify as to how to calculate a square root or some of the main factors involved in causing a historical conflict, students are not just handed bits of knowledge. They are guided in developing their own, flexible cognitive abilities, through deference to testimony.

⁹ See Hills (2020), where she distinguishes between two methods of learning via testimony. Classic testimony simply “transmits” knowledge from a speaker to a hearer. But testimony can also “propagate” knowledge and understanding. Propagation is an epistemic influence on the speaker and, in some cases, a prompt that results in the hearer understanding for herself.

Moreover, while there may admittedly still be some individual effort and cognitive work required to follow a teacher's explanation and gain understanding, the necessity of some individual work does not separate understanding from mere propositional knowledge (Boyd 2017: 117-8; Grimm 2020:133-5). Even gaining testimonial knowledge requires semantic uptake of what is testified as well as, arguably, at least monitoring for signs of unreliability in speakers.

So, sufficiency pessimism makes dubious claims about what testimony cannot do, or cannot typically do, or cannot-do-when-it-comes-to-some-domains. This is one important way in which going versions of pessimism about the role of testimony in acquiring understanding seem unsatisfactory.

My own form of pessimism is, strictly speaking, compatible with thinking that testimony is always insufficient for understanding. But the incentive pessimist does not rely on this purported insufficiency to explain our reasons for avoiding deferring to testimony in understanding-important domains. For this reason, the incentive pessimist also has the option to accept that testimony may sometimes be sufficient for understanding. As we shall see in section 6, the incentive pessimist is only committed to there being some common ways of deferring to testimony which do not result in understanding—more on this below.

3. Pessimism and Non-Deference

Before turning to incentive pessimism, however, I want to lodge a different complaint about the going sufficiency pessimisms.

Recall that pessimists in general think that we have some reason not to settle certain questions in domains where understanding is valuable by deferring to testimony; we have reason to engage in independent thinking in order to understand some matters for ourselves. Of course other people can be involved. We may draw on the testimony of others in piecing together an independent understanding. But at least when it comes to one-off, deferential exchanges intended to settle central questions, these are to-be-avoided in certain domains. And particular versions of pessimism try to defend or explain this claim. One sees this explicitly, for example, in Hills's work on moral understanding. She's not just idly noticing that testimony seems insufficient for understanding why moral claims are true; she's appealing to the putative insufficiency

of testimony for understanding in the course of trying to explain why we typically don't and shouldn't look to settle moral questions by deferring to testimony (Hills 2009; 2020). Sosa too (2021) offers his sufficiency pessimism in the course of seeking to defend certain non-deferential practices in the humanities, including philosophy.

But these explanations or defences of non-deferential phenomena both take a rather odd form. The problem with deferring to testimony in domains where understanding is important, they claim, is that this cannot give us the understanding we really want. Hills and Sosa are not alone or unusual in thinking that sufficiency pessimism would, if successful, rationalize some non-deferential practices. Even sufficiency pessimism-critic Boyd, in his (2020) paper on moral understanding, implicitly accepts that the viability of explanations of problematic moral testimony appealing to understanding hangs on whether certain kinds of moral testimony are ever sufficient for understanding.

The problem is that the putative insufficiency of testimony for understanding *is not an explanation* for why we shouldn't defer to testimony in domains where understanding is important. Insufficiency is insufficient, if you will, to do the necessary explanatory work.¹⁰ There are a vast multitude of activities that are—typically or normally—insufficient for generating desirable understanding: eating bananas, running the dishwasher, scratching one's arm, etc. None of these activities is thereby inadvisable or prohibited, even granting the value of understanding in certain domains. If we want to explain why one shouldn't defer to testimony about certain questions, and we want to do so by advertent to the value or importance of understanding, then we need to explain why testimony is—not merely insufficient for understanding—but at odds or in tension with understanding. Insufficiency is the wrong sort of relationship to do the explanatory work of the pessimist—that is, the work of explaining and defending non-deferential practices.

Here we see what was meant in the introduction by sufficiency pessimisms being severed from some of the motivations for pessimism. Pessimism about testimony's relationship to understanding is, I take it, partly motivated by the intuition that if you

¹⁰ Cf. also Malfatti (2021), on the interesting questions that remain about testimony and understanding, if we set aside the question of sufficiency.

want to really understand something, you shouldn't always just google the answers to your questions about it—or ask your reliable guru for answers, or your mom, etc. (Over)reliance on the testimony of others does seem to prevent or stand in tension with understanding something fully.

But sufficiency pessimisms don't actually illuminate this seeming fact. For they don't explain why the person who has googled the answer to her question about, say, morality or geometry, is in any worse position vis-à-vis understanding, than the person who is simply still ignorant of the answer to her question.¹¹ Sure, if the sufficiency pessimists are right, then the googler will necessarily lack understanding. But so does her ignorant counterpart who has not yet googled. Why, then, does googling strike us as problematic? Or why does one have an understanding-based reason not to do it, whereas one does not have an understanding-based reason to refrain from eating a banana or doing any manner of things that would be insufficient for understanding?¹²

This is the first respect in which, I say, sufficiency pessimisms are in some sense too weak. They fail to explain why we would have a reason for avoiding testimony as a means to settling certain questions. Indeed, the claim that testimony is never sufficient for understanding is compatible with the claim that seeking testimony to settle questions in absolutely any domain is perfectly fine. Although it wouldn't give one understanding, it also needn't be in any positive tension with understanding. But that would not be a pessimism worthy of the name, nor is it one that actual pessimists such as Hills or Sosa would find appealing.

4. Disincentives to Understanding

The second respect in which sufficiency pessimisms are too weak is related to the first. Sufficiency pessimisms miss an important way in which settling questions by testimony

¹¹ Perhaps one can't exactly google moral questions at the moment. But, as Howell (2014) discusses, it is conceivable that there would be a reliable moral search engine, and it would nonetheless be weird to use it.

¹² This echoes my argument in Callahan (2018).

is in tension with acquiring understanding. The basic thought here is that settling questions by testimony—while at times perhaps sufficient for acquiring understanding—can also bypass understanding, allowing us to answer our particular questions based on another’s testimony without acquiring or indeed even progressing toward understanding for ourselves.

When testimony bypasses understanding in this way, I will say that it *disincentivizes understanding*. This is because in such cases we gain some of what’s valuable about understanding, without reducing the work that would be required in order to acquire actual understanding.

To see this possibility, let’s assume that, given a particular question Q , a particular instance of understanding U that would allow an agent to answer Q —among other questions, and a particular agent S who lacks U and is ignorant of the answer to Q , S has some reason to seek U . Here’s a warm-up thought: S would have less reason—indeed, no reason at all—to seek U if instead they already had U . For example, if you already understand why lying is wrong and why lying would be wrong in a particular case, then you have no reason to go meditate on the wrongness of lying or engage in deep, prolonged conversations with wise mentors who try to explain this to you. What a waste of time that would be!

For a similar reason, I claim, S would also have less reason to seek U if they could already answer Q . After all, at least part of the value of U is the value of being able to

answer certain questions (Q_1, Q_2 , etc.).¹³ So if one already has the ability to answer some of those particular questions, then one stands to gain less by working to acquire full-fledged understanding. Now testimony is an excellent tool for settling particular questions in a piecemeal fashion. When we have to rely on reasoning, experimentation, observation, reflection, etc. to settle our questions, we typically learn a good deal besides our specific answer and gain some degree of understanding along the way. But testimony—at least the kind of testimony delivered in a single, deferential exchange—is exceptionally good at delivering a surgical strike of propositional knowledge. When testimony settles some of our particular questions without progressing our understanding of a broader phenomenon or reducing the work that would be required to attain such understanding, testimony thereby disincentivizes understanding and can discourage its development, at least among—roughly—busy and/or lazy grown-ups with limited time and cognitive resources.

I'll give a quick example of this phenomenon, before defining incentive pessimism and proceeding in the next section to explain how exactly these testimonial disincentives operate.

Suppose I have very little understanding of U.S. tax law, but I have access to a reliable accountant who can tell me exactly how much I owe in taxes.¹⁴ Having such knowledge gives me part—and indeed, by my lights a rather large part—of what would be valuable

¹³ This is perhaps clearest on a view like Hills's (2009, 2016), where various abilities to explain, follow explanations, and answer related questions are partly constitutive of the state of understanding. But the constitutive claim is not necessary for my argument.

¹⁴ Cf. McGrath (2011), who contrasts testimony about what one owes in taxes with moral testimony.

about understanding the tax code more broadly. Thus, having knowledge of what I owe in taxes significantly reduces what I would stand to gain by working to acquire that understanding. This knowledge also, crucially, fails to reduce the scope of work that would be required. If I really wanted to understand the tax code, for example, I would still need to enrol in a tax preparation course; I wouldn't have any meaningful head start by already knowing how much I owe in a given year. So, testimony about how much I owe in taxes disincentivizes my coming to understand the tax code.

Now, the tax code is not—I hope—a particularly important domain for me as a philosopher to understand. But suppose we were talking about morality, or philosophy, or—given my particular interests—sourdough bread baking. In domains where understanding is particularly important, we might rightly be wary of settling our questions by deference to testimony because of the way it can disincentivize the acquisition of understanding. There would be something off-putting and indeed risky about answering particular questions in these domains on the cheap, when one really ought to be working toward a deep and flexible appreciation of the relevant domain.

A further analogy may help. Autobiographically, I am at peace with outsourcing knowledge of, say, my friends' phone numbers, to my smartphone. But notice that because I don't need to know my friends' phone numbers 'for myself', I have less reason to try to memorize them and am less likely to do so. This same phenomenon seems much more troubling to me when it comes to outsourcing, for instance, memories of important events to my digital photo storage. These are events I want to recall, and indeed, to understand as part of my life narrative. Hence, it seems to me I have a reason not to snap pictures of everything I want to remember or to use my photo storage to answer questions about what has happened in my past.

This idea that deferring to testimony—or one’s smartphone—can bypass and hence discourage understanding seems intuitive. Indeed, it may be argued, in response to the critique of the last section, that sufficiency pessimists are simply taking something like this for granted! But spelling out exactly how and why settling a question via testimony would disincentivize understanding will take a bit of doing over the course of the next sections, as we must consider quite generally why and when we might want to refuse a partial gratification of some desire which then disincentivizes our achieving our full goal.

Moreover, the claim that this disincentivizing potential of testimony is why we have reason, sometimes, to be non-deferential in domains where understanding is important, is an importantly new kind of pessimism, which I will call *incentive pessimism*. Stated officially:

Incentive pessimism (i) We often have reason not to defer to testimony in settling questions in domains where understanding is important; (ii) this is because testimony has the general capacity to disincentivize understanding—by giving us some of what’s valuable about understanding without reducing the work required to achieve understanding—and hence discourage its acquisition.

To properly understand the view, however, we need a broader examination of how disincentives like the ones I’ve gestured at can work.

5. How Disincentives Work

Suppose I offer you \$200 for digging a large hole tomorrow. You consider this offer, and since you only value the time and effort it would take you to dig the hole at around \$125, you think this is a good deal. Then I add, ‘I’ll even give you \$50 of that payment

today, up front, regardless of whether you do the digging.' Question: should you take the \$50 up front, even though—in a manner very similar to what I've claimed for testimony and understanding above—it will disincentivize your actually doing the digging tomorrow?

One natural—although, I'll argue, slightly misleading—way to think about this case is to think of yourself as having four options:

- (1) take the \$50 and don't dig
- (2) take the \$50 and dig for a further \$150
- (3) refuse the \$50 and don't dig
- (4) refuse the \$50 and dig for \$200

And a natural way to evaluate these options values them at \$50, \$75, \$0, and \$75, respectively, given that you value your time and effort in digging tomorrow at \$125. So, by decision theoretic lights, it seems at first you should be indifferent between (2) taking the \$50 'disincentive' and then digging, and (4) refusing the disincentive and digging.

The reason I think this way of framing the choice is slightly misleading is that your present choice is simply whether to accept the \$50 disincentive. Although you can plan or intend whether you will in fact do the digging, you can't—we are supposing—remove your own freedom to revise that plan when it comes time to actually pick up the shovel.

Given this, one important reason you might prefer to refuse the disincentive stems from the possibility of something like—although less controversial than¹⁵—weakness of the

¹⁵ Famously, some argue that proper weakness of the will is impossible. That is, it is impossible to ϕ intentionally while believing that there is an alternative action ψ that is open to one and

will. If you take the \$50, you will still stand to gain \$150 by digging the hole tomorrow, and by your lights it will still be a good idea to follow through on that digging—since $\$150 > \125 , which is the value you place on your time and labour. But you may know, of yourself, that you may be tempted to revise your estimate of the value of your labour or perhaps question whether it's really lower than \$150. This questioning will come more easily with a \$150 incentive to dig, vs. the \$200 incentive you will have if you refuse my upfront payment. This is a reason to refuse the \$50 and preserve the strength of your incentive to dig. It can be prudent to avoid partial immediate gratification of a desire, if you want to steel your will to pursue the full goal.

Of course, this is not prudent in every case. Perhaps you know, of yourself, that you are not terribly vulnerable to weakness of the will, at least of the relevant flavour that would prevent your digging tomorrow. Or perhaps you are more worried about other circumstances intervening, in ways that make the 'bird in the hand' aspect of the proffered disincentive highly salient: perhaps you don't fully trust me to come through with payment tomorrow, or you are worried about injuring your back in the interim, etc.

Yet another kind of case in which you might reasonably take the disincentive will involve different relative values for the *full goal* (*FG*) of digging the hole, the *cost* to achieve that goal (*C_{FG}*), and the *proffered disincentive* (*D*). Suppose that, instead of

that is better. Even if that's right, we might still need to guard against weakness of the will in a looser sense, including the kind of (irrational, unconscious) motivated revision of one's beliefs—for instance, about the value of one's time and effort—that can affect what one desires or intends. Note that it is not necessary for me to think that weakness of the will in any sense is ever rational, just that it's the sort of human behaviour to which we may sometimes be liable.

offering you \$50 upfront, I offered to pay you \$100 upfront, whether you do the digging or not. Now it seems that the prudent thing for you would be to take the \$100 payment, not dig, and forego the \$200—with its attendant cost of \$125 in labour. The relative values of FG , D , and C_{FG} all matter a great deal. My claim is that in cases where (a) $(V(FG) - V(D)) > V(C_{FG})$ —that is, the value of the full goal is greater than the value of the disincentive, and this differential offsets the cost of the work to attain the full goal, but (b) $V(C_{FG})$ is relatively high—that is, C_{FG} is the sort of thing that one might well be tempted to avoid, it may be prudent to refuse the partial gratification of a disincentive, if one also knows oneself to be vulnerable to weakness of the will.

Indeed, other flavours of the case turn up further reasons to refuse a disincentive. Suppose that instead of my just offering to hand you \$50, I tell you that you can go collect \$50 up front from the post office, if you want to. But of course, you'll have to drive there, wait in line, etc. Now driving to the post office would be pretty easy, perhaps requiring only about \$5 worth of time and effort. Still, adding this \$5 cost to the option of accepting your disincentive changes the overall evaluation of the options you might now intend. Now, even if you don't care about avoiding any temptation to weakness of the will and you simply want to align your plans with the option that maximizes expected utility, you shouldn't be indifferent between taking the disincentive now and waiting for the full \$200: you should definitely forego the disincentive. To take the disincentive instead would seem to evidence doubtfulness about whether you really will or want to do the digging on the morrow.¹⁶

¹⁶ Thanks to the associate editor of this journal for remarkably helpful comments on this point.

Adding this wrinkle to the case matters as we turn back explicitly to considering cases of testimony and understanding. The relevant *FG* here of course is understanding of some domain or phenomenon in question. And the possible partial disincentive one might accept would be testimonial knowledge of isolated facts, specifically of a kind that would (i) settle some of one's questions, thus giving one some of the value of broader understanding, but would (ii) not progress one's understanding or reduce the work required to acquire it.

We have identified two broad ways in which, in cases where the values are such that $(V(FG) - V(D)) > V(C_{FG})$ —that is, where the value of understanding over and above the value of the relevant testimonial knowledge is high enough to offset the cost of acquiring understanding—it may be prudent to eschew settling questions by deferring to testimony. First, where $V(C_{FG})$ is high—where working to acquire understanding would be difficult, requiring substantial time and effort—one may have reason to steel oneself against weakness of the will. And second, where there is a non-trivial cost to attaining testimonial knowledge, one has reason to avoid the collateral work of attaining that knowledge, preferring instead to simply work toward understanding for oneself. Notice that there is sometimes a nontrivial cost to attaining testimonial knowledge. Especially where putative experts disagree or are not easily identifiable, well-placed trust does not come for free.

Having linked the intuitive idea that in bypassing understanding testimony can disincentivize understanding with a broader range of cases in which we may need to 'steel our wills' or just hold out for what we really want and refuse the distraction of partial goods, I want to turn in the next section to the question of just how pessimistic a view I am proposing.

6. Incentive Pessimism as a Pessimism

It seems to me that incentive pessimism is about as pessimistic as it ought to be, given the pessimistic *explanandum*: that is, a limited queasiness, restricted to certain particular domains in which understanding is important, about settling one's questions by deferring to testimony.

First, I claim incentive pessimism is pessimistic enough. The view vindicates the problematic nature of taking testimonial shortcuts to knowledge in domains like morality and philosophy where what we really want, arguably, is understanding. The incentive pessimist can say that seeking to settle one's questions via testimony in a domain where understanding is important often discourages one from attaining understanding and tends to make one settle for a lower—and perhaps unacceptably low—epistemic good. In this respect the view avoids the charge of weakness I lodged against sufficiency pessimisms in section 3; it identifies a real pattern of tension between settling questions by deferring to testimony and developing understanding.

And yet in the remainder of this section I want to focus on ways in which the incentive pessimist is free to be rather *optimistic*, thus defending incentive pessimism against a charge of being too pessimistic. Indeed, it would be a big problem for the view if it cast all learning by testimony or deferring to testimony as problematic, or even all testimonial deference in domains where understanding is important. Consider children deferring to moral testimony in seemingly kosher ways, or consider again Greco's (2020) examples of extended testimonial learning in classroom settings. Some instances of testimony and deference seem entirely appropriate, even in domains where understanding is important. Fortunately, the incentive pessimist can accommodate this fact. Despite testimony's general disincentivizing potential, incentive pessimism

predicts that testimony will also often fail to discourage understanding, in at least three types of cases.

First, there are cases where, despite testimony's providing some disincentive to understanding, the agent who receives testimony will remain robustly motivated to acquire understanding. These are cases where the agent is not vulnerable to weakness of the will, as characterized in the previous section, and/or where the value of a testimonial incentive is small relative to the value of understanding. Thinking back to our digging cases, consider the puny disincentivizing impact of an upfront payment of just \$1. It seems to me that cases involving children are often like this. Their drive to understand and hence the value they place on broad understanding is... impressive! Moreover, they seem to feel less pressure from scarce time and cognitive resources, effectively reducing the cost to seek understanding and the attendant temptation to weakness of the will. In contrast, the prime sort of case for understanding-discouragement will involve busy/lazy adults, considering matters that are not intrinsically interesting to them. Where one's drive to understand is robust and not particularly prone to discouragement, incentive pessimism predicts that testimony can do little harm.

The remaining cases in which incentive pessimism predicts that testimony would not discourage understanding are cases in which testimony does not even disincentivize understanding. That is, these are cases in which it is not true that testimony delivers some of what's valuable about understanding without reducing the work that would be required to attain understanding.

The first such type of case: testimony sometimes does reduce the work required to acquire full understanding. Testimony can serve as a scaffolding to understanding—or

indeed, as we saw in section 2, perhaps in simple cases or cases involving extended testimonial exchanges, can even give us understanding. Clearly, sometimes soliciting and receiving testimony is part of the work of acquiring or seeking understanding, hence no hindrance to it by the incentive pessimist's lights. It is consistent with incentive pessimism—which claims that testimony has the general capacity to disincentivize understanding—to think that it sometimes instead progresses understanding or serves as a scaffolding for understanding.

Here we see both a contrast and a similarity with sufficiency pessimisms. Unlike sufficiency pessimists, the incentive pessimist is free to think that testimony sometimes delivers understanding, more or less directly; incentive pessimism is neutral on this question. But the incentive pessimist agrees with the sufficiency pessimist that this isn't the uniform or general result of settling a question by deference to testimony. If receiving testimony quite generally gifted us with deep understanding of whatever topic or phenomenon the testimony pertained to, we would cease to worry about marginal or impossible cases in which testimony instead disincentivized understanding. But no one, to my knowledge, defends such a strong view of testimony's understanding-delivery powers. When you inform me that the next train to Paddington leaves at 9:20, I do not automatically or usually acquire broad understanding of the train schedule. Only were I to host quite a few other background beliefs—such as: 'if they've switched to the new schedule entailing XYZ, the next train to Paddington will leave at 8:40; otherwise it will be 9:20, entailing that the old system is in place and hence QRS...'—might this

testimony trigger such new understanding.¹⁷ So the incentive pessimist is committed to the weak and plausible *insufficiency claim*, that the acquisition of understanding is not the typical or universal outcome of a testimonial exchange.

A second sort of case in which testimony fails to disincentivize understanding occurs when, despite in one way reducing the reason an agent has to seek understanding, testimony simultaneously gives the agent a new reason, or strengthens a different reason. I have in mind, for example, cases where testimony whets one's curiosity. Say someone is in the process of a conversion to Christianity and accepts, purely on the authority of a newly trusted religious institution, that Jesus rose from the dead.

Deferring to authority here would definitely seem insufficient for understanding the resurrection. But, depending on the temperament of the new convert, mightn't coming to hold this very belief predictably spark further questions and reflection? Deference to testimony might accidentally, as it were, give us new reasons to seek understanding even as it disincentivizes understanding in another respect.

One factor that seems important here is the extent to which testified content 'fits' with a hearer's background beliefs and expectations. Where question-settling testimony slots in neatly with our other opinions, the disincentivizing effect on understanding would seem most potent—restricting our attention, that is, to cases where testimony does not actually generate or further understanding in the way just discussed.¹⁸ But where

¹⁷ See Boyd 2017 on the importance of background beliefs and abilities, in the transmission of understanding—and knowledge.

¹⁸ Malfatti (2021) makes a different, interesting point, that testimony can best serve and contribute to understanding where it fits with our other beliefs. Malfatti's cases fall in the

testimony clashes or jars with other things we believe—for example, that human death is permanent—it may not be possible to simply take it on board without striving to discern how to revise and enrich our broader views.

In sum, the incentive pessimist can and should admit that there are an array of contexts and circumstances in which testimony does not discourage understanding. Again, this is a good thing, in my view, because it helps explain the rather patchy pattern of pessimistic intuitions. Although nondeference seems generally important in a variety of domains, we don't recoil strongly or uniformly from deferential practices in all contexts, involving all kinds and ages of agents. For all of these acknowledged possibilities of non-discouragement, however, the incentive pessimist maintains there is still a broad class of cases in which testimony disincentivizes and thereby discourages understanding. And this explains the appropriateness of our actual limited non-deferential practices in domains where understanding is important.

7. Conclusion

The basic pessimistic thought is that testimony has a limited role to play in the acquisition of understanding, in that where seeking/developing understanding is important we have reason to avoid settling questions by deference to testimony. I have argued that incentive pessimists have a superior explanation and defence of this thought, relative to sufficiency pessimists. Incentive pessimists avoid strong claims about the impossibility of acquiring understanding via testimony, and yet they more directly explain the appropriateness of non-deferential practices. The incentive

previously discussed category, where testimony actually reduces the work required to gain understanding.

pessimist pays attention to the way we set ourselves up to develop understanding.

Swinging through the drive through can result in our having less reason to go home to cook a nutritious meal. Just as there is, arguably, a place in life for takeout, there is certainly a huge place in our epistemic lives for testimonial learning, and even settling very important questions by deference in a pinch. But if we really want to understand certain questions or subjects for ourselves, we will rightly be somewhat wary of deferring to others too often, lest we spoil our appetites.

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