

A Self-Descriptionist Theory of Knowledge

Robert Hudson

(Department of Philosophy, University of Saskatchewan)

rjh784@mail.usask.ca

1. Introduction

Suppose you believe some claim to be true, say a perceptual claim that there is a cup on the table. And suppose someone then asks whether you not only believe this claim, but also know it to be true. How should you respond to this challenge?

A reflective person will focus on the causal process that leads to this belief. This person will ask, “Why is it that I believe this claim?”, or more technically, “What is the causal process that leads to my believing it?” The purpose of these questions isn’t necessarily historical. This person may judge that a process functioning independently of the reality of a (perceived) cup had initially caused her belief; for example, she may suspect that she is a part of a contrived scientific experiment designed to give her false cup beliefs. But that may not stop her from reinventing and re-describing the causal source of her belief. She may decide that, independently of the original cause of her belief, there is good reason to believe that a cup is on the table; for instance, she may believe that the original experiment has been terminated and that nonetheless her perception of the cup continues, or that the experiment focuses solely on visual experiences and that she has a set of informative tactile sensations that lead to an identical conclusion. In this way she might repudiate the original causal process and put in place a different one. The new causal process could be one that explicitly involves a form of reasoning. Indeed this is probably what the new causal process would be like: in answering the question, “How does one know?”, one usually gives reasons designed to appropriately cause one’s beliefs, as opposed to simply outlining some non-cognitive causal process outside of one’s conscious control. In the perceptual case, one says things like, “I know it’s a cup because I see a cup and any experiment that artificially produces in me a cup belief has terminated”, or “I know

it's a cup because I have a tactile sensation that corresponds to the presence of a cup". One doesn't, alternatively, simply bypass the option to give reasons and give reference to some undescribed though presumably reliable causal process. It wouldn't be much of a response to say that one knows some claim because one has been reliably caused to believe this claim. That would be essentially to restate the problem and prompt the further question, "How do you know that you have been reliably caused to believe this claim?"

So again, in answering the question, "How does one know (some claim)?", one looks to the causal source of one's belief in this claim, and from here one could authorize this source and recapitulate its authority in words. About the perceived cup one could say that there is a real cup in the world with properties exactly like the perceived cup that causes one's perception of the cup, perhaps adding for reassurance that one's physiological, perceptual capacities are in good working order and that the presence of the perceived cup coheres with other perceived and remembered facts. Or again, as above, one could repudiate the original source of the belief and institute another causal story regarding the source (or perhaps simply the maintenance) of this belief. Whichever causal story is chosen, the key point to bear in mind is that it is the prospective knower of a claim who supplies the relevant causal story for why she believes this claim. That is, the causal story for why someone believes a claim, if we wish to find out whether this person knows this claim as well, is not one that applies only externally to the prospective knower, as is claimed by externalist epistemologists. For such epistemologists, one knows a claim if one's belief in this claim is causally connected to the world in the right sort of a way, independently of how the knower/believer rationalizes this causal connection (so long as this rationalization doesn't disrupt the effectiveness of the relevant causal link). As such, an individual can be said to know the claim that p so long as her belief that p is caused by the fact that p, even if this individual is unable to provide an account of the pertinent causal connection. Such an approach allows (for example) children and animals to count as knowers despite their cognitive limitations. It also allows more cogent individuals to count as knowers about matters for which they often lack a suitable internal justification, such as with memorial and perceptual beliefs. Such a liberal approach to determining who and under what circumstances someone can be said to know a claim are contested on the approach I am suggesting which requires that, to be a knower, the knower/believer must supply an account of the causal genesis of her belief. She must, as I will say, 'self-describe' the causal circumstances under which she came to this belief. For this reason the line I am advocating on knowledge I call 'self-descriptionism'.

Self-descriptionism combines features of both externalism and internalism. It is externalist in so far as it makes reference to the causal genesis of a belief in determining whether this belief counts as knowledge. It is internalist in that it requires the knower to have access to the justification that grounds the attribution of knowledge to her, a justification that on my account is recorded in her self-description of the causal source of her belief. My view is that self-descriptionism combines the best of both internalism and externalism while avoiding their respective pitfalls. My plan in this paper is motivate self-descriptionism, which I do by showing that self-descriptionism, to the limited extent that we have described this theory thus far, has the resources to vindicate epistemic deontology. By the deontological character of knowledge, I mean the view that having knowledge is praiseworthy, and that a lack of knowledge (i.e., ‘ignorance’), where knowledge could have been had, is a form of failure. Put simply, people should strive to know claims and not just possess true beliefs about them, and most certainly should not have false beliefs. On the basis of this deontological view, one can argue straightaway in support of internalism, which we define as the view that justifiers for beliefs must be cognitively accessible to potential knowers (i.e., accessibilism): specifically, if we are to be praised for possessing knowledge or blamed for being ignorant, then we need to have had access to the justificatory process that leads to knowledge or, alternatively, to ignorance. (As Conee and Feldman 2004, 56–64, point out, one cannot argue from deontology for an internalist position stronger than accessibilism, such as the position they call ‘mentalism’.) The opposite of a deontological view is one where the possession of knowledge says nothing necessarily about the personal credit of the knower – one’s status as a knower may be solely a matter of luck. Such a view is usually adopted on the assumption that the knowledge-acquisition process is inaccessible to the knower, and thus largely not a matter of her responsibility.

Our foremost strategy in performing a vindication of deontology is to respond to criticisms of deontology offered in Greco (2010). Our secondary strategy is to respond to criticisms of internalism found in Alston (1989) and Goldman (1999), criticisms similar in spirit to Greco’s critique of deontology relating to the problematic role of rules and epistemic principles in internalist justifications. Though I dispute the need to invoke rules in deontological accounts of justification (contra Greco), rules and their kin clearly play a role in internalism more generally. Thus, by repelling this problem for internalism, in consideration of the intimate connection between internalism and deontology, such a defense of internalism further extends the vindication of deontology.

2. The Vindication of Deontology

As the reader is no doubt already aware, my definition of deontology is somewhat loose, as simply the view that possessing knowledge is a commendable trait for the knower and lacking knowledge is a blameworthy trait, or in stronger terms, there is an obligation to possess knowledge (as opposed to only possessing a true belief, or worse, possessing a false belief) and an obligation not to be ignorant. By contrast, on a non-deontological view, one typically held by externalists, states of knowledge fortuitously ‘happen’ to people; whether a person possesses knowledge depends on worldly factors beyond her awareness and ability to control. In this respect, normal adults are in a similar position to young children and animals in their status as knowers. It all depends on whether their belief states are connected in the right sort of way to external states of the world, and not so much on what the knower does in terms of providing evidence for her beliefs. To put an emphasis on what is at stake here, consider these comments from the non-deontologist Greco:

once we adopt externalism about knowledge-relevant normative status – once we are reliabilists, or causal theorists, or safety theorists about such status – it is hard to see why evidence itself should be so important. (2010, 65)

In other words, for Greco, with the right etiology in place there is no need to even bother with evidence. Thus, the praise we place on those who excel at collecting evidence and the obligation felt by some to adequately justify their beliefs (using evidence) to others in social situations, turns out to be somewhat misplaced. All that matters is that we have “reliable cognition” (Greco, 65), however that comes about. Resistance to such an externalism, as Greco makes clear, can be found from a Sellarsian perspective, according to which in Greco’s words, “knowledge so-called involves abilities to articulate and give one’s reasons, and to defend one’s knowledge and reasons against relevant objections” (66). The obligation to make oneself rationally accountable to others seems widespread in society, and is particularly intense in science: as Keith Lehrer comments, “[such an obligation] is required both for the ratiocination of theoretical speculation in science and practical sagacity in everyday life. To do science . . . one must be able to tell whether one has correct information or not” (Lehrer 2000, 6, quoted in Greco 2010, 67). Obligations of this sort do not sound unreasonable, not even for Greco (67) – except for problems he raises concerning weak and strong interpretations of deontology. In addition there are related problems posed by William Alston and Alvin Goldman concerning the accessibility of cognitive rules, rules that seem to be needed to properly justify beliefs. If it’s the case that self-descriptionism can solve these problems, then we’ve

opened the door to a workable epistemic deontology. So let's see what self-descriptionism can do for us.

According to Greco (2010), “the main idea of deontological theories is that some relevant merit, moral or epistemic, is a function of whether one’s activity is licensed by some relevant set of rules” (18). The role of rules in assessing what Greco calls the “knowledge-relevant normative status of beliefs” can be interpreted on his account either weakly or strongly. On Greco’s ‘weak’ interpretation, a praiseworthy epistemic state is one that is consistent with the correct epistemic rules, rules of which the prospective knower is aware; on his ‘strong’ interpretation, to be in a praiseworthy epistemic state one is not only aware of these rules, but one’s relevant beliefs are “governed by” (or, “a result of”) these rules. (20) On Greco’s view, both these interpretations lead to serious problems for deontology. On the one hand, ‘weak deontology’ leads possibly to a situation where someone possesses good reasons to believe a claim, reasons that justify this claim in accord with a correct epistemic rule, but where this person believes the claim for different and faulty reasons. The sort of example Greco provides to illustrate this possibility involves two math students, both of whom possess the relevant axioms to derive a theorem, one of whom believes the theorem by an appropriate derivation from the axioms whereas the other believes the theorem on the basis of a form of fallacious reasoning. (22) With weak deontology we derive the wrong result that not only the former but also the latter student has a belief with ‘knowledge-relevant normative status’ or, as I will put it, is in a praiseworthy epistemic state. Surely one can’t be in a praiseworthy epistemic state by reasoning fallaciously. ‘Strong deontology’, on the other hand, generates the correct result that the latter student’s epistemic state is not praiseworthy – her belief in the theorem is not ‘governed by’ or ‘a result of’ the axioms. Strong deontology, though, faces the mirror problem of wrongly discounting intuitively epistemically praiseworthy states. As Greco points out, what we are calling a rule has the feature that we are “in some sense *cognitively* aware that the antecedents of such rules are fulfilled” (27, his italics; it is taken for granted that we would be cognitively aware of the outputs of these rules, since they are beliefs). But it seems possible for knowledge states to not issue from rules in this sense. Greco cites blindsight as an example where a perceptual belief is generated by an antecedent state (say, a physical property in the world, or a sub-representational psychological state) of which one is not aware (not even dispositionally if blindsight is due to a physiological problem). (35) Thus the purported rule that issues in blindsight lacks the requirement that one be cognitively aware of the fulfillment of the antecedent of such a rule. He further cites the case of connectionist models of cognitive processing that involve computational functions that are not only beyond the awareness of cognizers but would not even be

expressible in dispositions that are “describable [(consciously representable)] at the cognitive level” (38). He leaves it open whether such a connectionist model of cognition might be accurate as regards the generation of a praiseworthy epistemic state; but if it is, such a model can’t be understood as involving the deployment of rules since the relevant antecedent states – the ‘arguments’ for the computational functions – will not be subject to conscious awareness.

One might legitimately be concerned that Greco’s conception of deontology is somewhat narrow: to say that someone has an obligation to possess knowledge, and should be praised accordingly, does not necessarily mean that she has in mind some specific rule to follow. A deontological view of knowledge implies, generally, that states of knowledge accrue to the credit of the knower, that possessing a justification sufficient for knowledge (everything else being equal) is a laudable achievement. This laudability could be a result of having followed the correct epistemic rule, as Greco has it. Or, alternatively, it could be a result of having emulated an epistemic authority, or for having generated a sought-for epistemic consequence (say, an explanation of some observable phenomenon). The point with deontology is that epistemic merit depends on the conscious abilities of knowers, and not solely on fortuitous circumstances that, unbeknownst to them, reliably generate their true beliefs. These conscious abilities could perhaps be enhanced by the utilization of epistemic ‘rules’, but acting (epistemically) correctly doesn’t necessitate the formulation of such rules.

Nevertheless, there is a legitimate point to be made here regarding the status of epistemic rules, and of rules generally – logical, probabilistic, scientific and otherwise – in an internalist epistemology. Internalist support for a knowledge claim, if it is to be thorough, will likely include abstract principles the nature of which will depend on the subject matter. These principles will in many cases be complex and beyond the capacities of normal knowers. But even if they are relatively mundane, as Alston (1989) and Goldman (1999) have it, such principles pose a substantive problem for internalism. Both philosophers consider the case of a justificatory relation where justifiers (beliefs or statements for Goldman 1999, 282; experiences for Alston 1989, 221) support a particular belief in an entirely unproblematic way (such as with the logical rule of conjunction, discussed in Conee and Feldman 2004, 76-77). From here both Alston and Goldman consider the justification relation itself, and suggest that with internalism this relation must be accessible to a knower if the adduced justifiers are to support a belief. But now the problems begin, for being aware of the abstract principles that underlie a justification relation is the precisely sort of condition that Conee and Feldman suggest “few of us are able to satisfy” (2004, 75, paraphrasing Alston); “none of these . . . relations”, Goldman (1999) asserts, “is itself a mental state, either a conscious state or a stored state” (282), and for Goldman matters only

become worse for internalism when we consider more complicated relations, such as those requiring the use of truth-tables (285). How then should an internalist deal with the status of principles or rules that govern the relation between justifiers and the justified?

Conee and Feldman's (2004) response is, on the one hand, to suggest that for some cases the justifier (p) and the justified (q) are so close semantically that "it is part of understanding p that one grasps the connection between p and q " (77), and so no explicit principle or rule needs to be formulated. On the other hand, they express equanimity about the prospect that such principles or rules may need to be formulated after all: they comment,

it is not any (sic.) implausible requirement that one have information about justification. It is merely a requirement that one have evidence that there is a supporting connection – for instance, the logical consequence relation – between what is ordinarily regarded as one's evidence and what it is evidence for. (77)

In the end their attitude is resolutely diffident: "it is not crucial to answer this question here. What is important for present purposes is that internalists have plausible options" (77). Can an internalist be more decisive as regards the question whether epistemic principles need to be explicitly formulated and referred to when justifying a belief?

This is where self-descriptionism plays a role. I had said that self-descriptionism is internalist in requiring that a knower have access to the justification grounding an attribution of knowledge. This justification I further suggested is recorded in the self-description a potential knower provides of the causal source of her belief. So let us take a case where someone, call her 'S', arrives at a belief that a maple tree is present (to borrow a case from Comesaña 2006, 35). In self-describing how she came to this belief, S can suppose either 1) that she was caused to have this belief independently of her conscious reasoning processes, or 2) that she came to this belief by means of such a process. So, for example, she can 1) suppose that she subconsciously noticed a tree with 7-pointed leaves, which caused in her a belief that a maple tree is present by a process she otherwise knows nothing about, or alternatively with 2) suppose that the process by which she arrived at this belief involved, on her behalf, a reflection on her states of her perceptual awareness (which perhaps directly reveals to her the seven-pointed nature of the leaves on the tree), which then prompts her to reason to the claim that a maple tree is present. One or other of these self-descriptions, or related versions thereof, could have been adopted by S. The key point at this stage is that there are no normative constraints here on what self-description is relevant for epistemic analysis. It is a purely descriptive issue: specifically, how does S understand the causal process by which she arrived at a belief that a maple tree is present? Moreover, this is an issue

that is manageable in a completely internalist way on the approach I am suggesting, for S will have complete access to the justification that grounds a (potential) attribution of knowledge to her since, after all, she invented this justification in the first place by self-describing the causal process by which she arrived at this belief.

But does S's self-description of the causal source of her belief really constitute the justification of her belief? Couldn't S have a conception of how she was caused to have a belief yet have a completely different conception of how this belief is justified? A perfect example of such a possibility occurs with arithmetical knowledge. One might have been caused to believe that five times five is twenty-five simply as a result of blind obedience to the dictates of a teacher in the context of instruction at the primary educational level. Further, one might retrospectively self-describe the causal source of one's belief in this case by saying, "I now believe that five times five is twenty-five because when I was young I blindly obeyed the dictates of my primary school teacher who taught me this fact". Still, one could deny that having one's belief caused in this way amounts to a justification of this belief. One might provide an alternative justificatory story, and say something along the lines of: "When I was caused to have the belief that 'five times five is twenty-five' in primary school, I didn't really understand why this claim is justified; now I understand why this claim is justified – one simply has to count up five sets of five objects and arrive at the total twenty-five". So, at least with this case, why would one suppose here that one's self-description of the causal source of one's belief could stand as a justification for one's belief, when the causation of one's belief and its justification clearly involve different factors?

And in fact it is true that, if one looks to the stated causal story as the justification for one's belief that 'five times five is twenty-five', then one will be disappointed: blind obedience to the dictates of primary school teachers is unlikely to be a source of knowledge, if it means that students will believe whatever a teacher tells them even when he is deceptive. Alternatively, if one had assurance that one's primary school teacher was ineluctably responsible, and would encourage the blind obedience of students only when students were assured of reliably believing true claims, then the causal story would fare better as a justification of 'five times five is twenty-five'. Such cases of testimonial knowledge are commonplace; for many knowledge claims, all we have to support them is the good word of an informant, media source or educator. And they are perfectly legitimate forms of knowledge. For instance, in the arithmetic case, if one self-described the causal source of one's belief as "blindly believing the dictates of a teacher who is ineluctably responsible, and who would encourage the blind obedience of students only when students were thereby assured of believing true claims", then in this case the causal story and the

justification for one's belief converges. One could add further justification, if one wanted, along the lines of, “(to check my teacher's veracity) I counted up five sets of five objects and arrived at the total of twenty-five”. But doing this is quite unnecessary; most of us have not done this check for most arithmetical calculations, but still we feel confident claiming knowledge about such things. Going back then to the original scenario, where we lacked a specific assurance about the responsible behavior of the teacher, it is once again true that the cause of the belief as self-described ('blind obedience to a primary school teacher (without assurance of his ineluctable responsibility)') does not underwrite a worthwhile justification for 'five times five is twenty-five'. Here it is true that the cause of the belief detaches from its justification. Yet the problem in this case is that the cause is not adequate to the job of justification, not that causes and justifications necessarily always detach. Where the cause is (as self-described) sufficient for justification, no detachment occurs, as we have seen.

Let us look closer at the original scenario where the cause of the belief that 'five times five is twenty-five' and its justification detach. In such a situation, what would be one's view of the cause of one's belief? To help our analysis, we can distinguish between two kinds of causes: 'original' and 'sustaining' causes. The two are different in the following sense. For a living, sexually dimorphic, biological being, we might call its 'original cause' the merging of two germ cells to make a zygote, or perhaps the particular activity of the parents of this being that lead to this merging. By comparison, the 'sustaining cause' of the being is whatever currently occurs to keep this being alive: it could be that it just ate something, or that something shielded it from a potential fatal threat, or some other factor. In light of this distinction, when one speaks about the cause of this being, or more exactly the cause of its life, one could be referring to either its original cause or to its sustaining cause – and my suspicion is that for everyday purposes it is more usual to advert to the sustaining cause. For example, why am I now alive? Here I could refer to my original cause: but so many events temporally closer to my current existence have happened since my original cause that making reference to my original cause would likely be irrelevant. In fact, in causally explaining why I am now alive one would likely refer to events that are causally closest in time. For example, if I recently survived a car crash, I would likely cite the effective functioning of my airbag (or something similar), and not to any event prior to that. Or again, to explain why I have survived the past month, I would likely refer to (something like) the fact that I have been eating and sleeping regularly. In neither of these cases would it make much sense to refer to my original cause, that is, to the past event of the merging of certain germ cells.

My proposal is to apply a similar sort of thinking to the causes of beliefs. In the situation we have been examining, the original cause of the belief that ‘five times five is twenty-five’ was one’s blind obedience to the dictates of a primary school teacher. But here too, many events have happened since then. In a subsequent educational episode, one may have been asked the question, “five times five equals _____?”, have replied with the response “twenty-five”, and then received a glowing checkmark, thus confirming what had been taken to be the teacher’s original instruction. Indeed, this experience may have been a formative one – even though ‘five times five is twenty-five’ had already been believed, having this belief confirmed through a test result may have served as an effective sustaining cause of the belief. Moreover, this may be how one would describe the causal source of the belief in a self-description, something along the lines of, “though I originally believed that five times five is twenty-five as a result of blind obedience to the dictates of my primary school teacher who first taught me this fact, the real (sustaining) cause of my belief in this arithmetical fact was when I received a checkmark on a test confirming this belief”. An even better form of a sustaining cause in this case, as found in the context of a self-description, might be, “my initial blind obedience notwithstanding, counting up five sets of five objects and arriving at the total twenty-five gave me a firm belief in this arithmetical fact”. Overall, what is interesting to note here is that, with beliefs, as opposed to living beings, one can subsequently disavow the ‘original cause’. One could decide that the original cause of the belief was epistemically ineffective, and thus withdraw one’s belief, if this were possible, and provide a new cause for this belief based perhaps on a form of reasoning; or should the belief be involuntary, one could as an alternative reflectively distance oneself from the original cause of the belief and seek an epistemic ground that would have been counterfactually a more reliable cause. Either way, this ‘new’ cause could be recorded in one’s self-description of the causal source of one’s belief, a self-description that then forms the basis of an assessment of the justifiedness of the belief. Comparatively, with regard to the original cause of a living being, there is not much room here for disavowing this cause: practically speaking one can’t ‘turn back the clock’ and set up a new causal story – not even hypothetically, if one wants to retain the identity of the living being.

Let us then grant that the justification for a belief is to be found in the self-description a potential knower provides of the causal source of a belief. How does this help us understand the status of cognitive rules in an internalist epistemology, given the apparent need of such rules to adequately link the justified to its justifiers, but given as well the fact that many knowers are oblivious to such rules, and sometimes may not even have the capacity to comprehend them? Recall that, on the account I am suggesting, a knower S has complete access to the justification that grounds a

(potential) attribution of knowledge to her; this is true because she invented this justification in the first place by self-describing the causal process by which she arrived at this belief. Thus, if an internalist justification for a claim involves the use of rules, it follows that a potential knower will have access to these rules since they are part of the self-description she provides of the cause of her belief. It won't ever be the case that some rule has an internal role to play in connecting justifiers to the justified, but is beyond the ken of the potential knower; it will be within her ken by virtue of her being the cognitive source of the rule. This is not to deny that there could be rules to which S could advert if she wanted, but that don't play a role in S's self-description. In fact, it might be the case that such rules, if S were to use them, might enhance the quality of the justification that emanates from her self-description. The existence of such rules, however, has no bearing on the quality of S's internalist justification, since S's internalist justification is recorded exclusively in her self-description. It is along similar lines that self-descriptionism can generate a response to the problem raised by Greco's 'weak' interpretation of deontology. Recall that with weak deontology a praiseworthy epistemic state is simply one that is consistent with the correct epistemic rules, rules of which the prospective knower is aware even if she does not in fact apply them (call these 'sub-described' rules). The problem raised by deeming sub-described rules as epistemically relevant (as with Greco's weak interpretation) is that someone can then be said to be in an epistemically praiseworthy state, even if she doesn't bother to use the correct (sub-described) rules – and in no less a praiseworthy state than someone who does use them. Clearly, this sort of situation does not arise for self-descriptionism since such sub-described rules will not occur in a potential knower's self-description of the cause of her belief, and so play no role in assessing the justifiedness of her belief.

Self-descriptionism also effectively responds to the problem raised by Greco's strong interpretation of deontology. On the strong interpretation, recall, to be in a praiseworthy epistemic state requires that one's belief formation process be governed by the correct (and relevant) epistemic rules. The problem with such an interpretation is that it has the potential to wrongly discount (as lacking 'knowledge-relevant normative status') certain presumably epistemically praiseworthy states. One of Greco's examples to illustrate how this can occur adverts to a connectionist model of cognitive processing. If such a connectionist model of cognition is accurate, Greco takes this to show that cognition is not rule governed in the sense required by internalists because it would involve the deployment of computational functions that are beyond the awareness of cognizers. Of course, this is a problem only if internalists and deontologists are always committed to the presence of cognitive rules (i.e., rules the antecedent of which a potential knower could be aware) in justifying potential

states of knowledge. I indicated that this is not always the case with deontologists: one's personal obligation to effectively justify one's beliefs does not necessarily involve paying heed to cognitive rules. Similarly, a self-descriptive internalism in which potential knowers describe the causal source of their beliefs need not involve the explicit statement of any cognitive rules. To illustrate, consider again the case where our potential knower S arrives at a belief that a maple tree is present. We had said that in self-describing the causal source of her belief, S can suppose either that 1) she was caused to have this belief independently of her conscious reasoning processes, or 2) that she came to this belief by means of such a process. Under 1), as an example, she might self-describe as having undergone a subconscious process wherein she visually notices (subliminally) a tree with 7-pointed leaves which causes in her a belief that a maple tree is present. From here she might add further detail, for example, that the viewing conditions are ideal (e.g., the local environment contains sufficient lighting and she is close enough to the tree to inspect its leaves), that she is not subject to the maniacal manipulations of Cartesian scientists, her cognition is describable (say) in terms of reliable connectionist processing, and so on. Moreover, it is perfectly legitimate here for S to decline to introduce cognitive rules in her self-description: she could describe the causal process that generates her belief as entirely unconscious and non-cognitive. Thus, there is no exclusion here of the connectionist type of process (or whatever other type of non-cognitive process) that Greco sets up as a foil to internalism. All it takes to incorporate such a process in an internalist account is for the potential knower to self-describe the causal genesis of her belief in these terms, a self-description whose internalist credentials result from the inherent accessibility of this self-description (again, this self-description is S's invention).

Alternatively, under 2), S might self-describe the causal process that leads to her belief as involving a form of reflection on her visual states. We can imagine her squinting at the look of the leaves, adjusting her glasses and carefully counting the points. She then feels comfortable on the basis of rough statistical analysis to assert that practically all of the leaves have seven points, from which she infers that the leaves are from a maple tree. To perform this inference she might explicitly formulate a rule that licenses this inference. There are various options here, such as, "All and only maple trees have 7-pointed leaves", or "All and only maple trees have 7-pointed leaves in this part of the country", or "it is very likely the case that a 7-pointed leaf comes from a maple tree". Which of these options is applicable, if any of them is applicable (i.e., S might not explicitly formulate any rule at all), is determined solely at S's discretion in terms of her self-description of how she is caused to believe that a maple tree is present.

Overall, then, there is a lot of flexibility in self-descriptionism as regards the sort of causal process that is presumed to be in place that leads to the formation of a belief. The causal process, as self-described, could be unconscious or conscious, and if conscious, it could rule-governed or not, and if rule-governed, all variety of rules might be playing a role. Additionally, there might be, in cases of perception, associated phenomenal states (such as the appearances of 7-pointed leaves) or no such states at all. With reference to this last pair of alternatives, we have an answer to Greco's other case that purportedly forms an obstacle to internalism, the case involving blindsight. There is, contra Greco, no requirement with internalism that perceptual knowledge necessarily involve, on behalf of a potential knower, cognitive awareness of a perceptual state on the basis of which a rule is applied that leads to a perceptual belief. This is because whether such a state plays a role in perceptual knowledge depends on how the knower self-describes the process by which she is caused to have the belief that underlies this knowledge. It is open to her to exclude any putative role for perceptual awareness in her self-description, just as it is open for her to include it. Thus it is not the case that blindsight necessarily forms an objection to internalism. On self-descriptionism (as a form of internalism) one could self-describe the causal genesis of one's state of perceptual knowledge as not involving any prior, conscious state of perceptual awareness.

3. Conclusion

Everything we have stated here as a defense of internalism applies as well as a defense of (epistemic) deontology. We have cast doubt on the notion that deontology requires that potential knowers follow rules; but even if we do require the presence of rules, self-descriptionism allows deontology to avert the threats posed by Greco against both weak and strong interpretations of deontology. Self-descriptionism also defuses the problem facing deontology concerning of the accessibility of rules. If rules are required, they are set forth in a potential knower's self-description of the causal source of her belief/state of knowledge and so, by that very fact, are accessible to her. Along these lines, we are able to vindicate (epistemic) deontology.

Bibliography

William Alston, "Internalism and Externalism in Epistemology". In: William Alston, *Epistemic Justification: Essays in the Theory of Knowledge*, Ithaca, Cornell University Press, 1989, 185-226.

Earl Conee and Richard Feldman, "Internalism Defended". In: Earl Conee and Richard Feldman, *Evidentialism*, Oxford, Oxford University Press, 2004, 53-82.

Juan Comesáñ, "A Well-Founded Solution to the Generality Problem", *Philosophical Studies*, 129, 2006, pp. 27-47.

Alvin Goldman, "Internalism Exposed", *Journal of Philosophy*, 96, 1999, pp. 271-293.

John Greco, *Achieving Knowledge*. Cambridge, Cambridge University Press, 2010.

Keith Lehrer, *Theory of Knowledge*, 2nd edition. Boulder, Westview Press, 2000.