Sellars, Quine and Epistemic Naturalism

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[This is the penultimate draft which differs in substance from the accepted version.]

I.

Wilfrid Sellars suggested that the project of philosophy is a synoptic one. In this essay, I reflect upon this suggestion and bring it into contact with some ideas found in the work of Willard van Orman Quine as well as with later work in the naturalistic tradition inspired by Quine. The result is a naturalistic conception of philosophy that I develop with specific reference to epistemology.

II.

Sellars opens his essay, ‘Philosophy and the Scientific Image of Man’[[1]](#footnote-1) with these famous words:

The aim of philosophy, abstractly formulated, is to understand how things in the broadest possible sense of the term hang together in the broadest possible sense of the term. (1963, p. 1)

“Things” is indeed understood quite broadly. Cabbages, kings, numbers, duties, possibilities, finger snaps, aesthetic experience and death are all things in the sense that Sellars has in mind. To succeed in philosophy, Sellars says, is to “know one’s way around” in a reflective way with respect to all these things. Knowing one’s way around involves know-how rather than knowing that. To know one’s way around in the relevant way is not to know one’s way around in the way that a reflective specialist (e.g., an historian) knows their way around their discipline (e.g., history). It is rather to have an “eye on the whole”. Not only must the philosopher cast their eye over things in the broadest possible sense of the term. The philosopher must reflect upon the “place of philosophy itself in the scheme of things” (1963, p. 3).

Sellars was an important figure in the analytic tradition in philosophy. And yet he was critical of a narrowly analytic conception of philosophy:

… while the term ‘analysis’ was helpful in its implication that philosophy as such makes no *substantive* contribution to what we know, and is concerned in some way to improve the *manner* in which we know it, it is most misleading by its contrast to ‘synthesis’. For by virtue of this contrast these statements suggest that philosophy is ever more myopic, tracing parts within parts, losing each in turn from sight as new parts come into view. One is tempted, therefore, to contrast the analytic conception of philosophy as myopia with the synoptic vision of true philosophy. (1963, p. 3)

Sellars considers an analogy between analysis and bringing a picture into focus. But he does not think that doing philosophy is like looking at the detail of a picture that one independently grasps as a whole. The picture does not spontaneously present itself as a whole in the first place. It must come to be perceived as such via a process of reflection on its parts. In any event, the philosopher is not presented with a single picture but with two or indeed many pictures that must be brought together in what Sellars describes as “stereoscopic vision” (1963, p. 4).

As is well-known, Sellars refers to the two main pictures with which he is concerned as the “manifest image” and the “scientific image”. By using the term ‘image’, he does not mean to deny reality to either image. An image may represent something that exists, and indeed the image itself may exist. An image is something imagined. The act of imagining exists. And what is imagined may exist, though, equally, it may not.

Although Sellars contrasts the manifest image with the scientific image, he does not take it to be pre-scientific or unscientific. The manifest image may be developed with considerable sophistication by the systematic use of inductive methods. What is crucial is that the manifest image remains exclusively restricted to the level of observable entities and properties that are or may be directly perceived by means of the human senses unaided. There are no unobservable theoretical entities in the manifest image. Theoretical entities are only to be found within the realm of the scientific image. For Sellars, the key difference relates to the kind of inference employed in the development of the image. For the manifest image, inductive (“correlational”) reasoning at the level of observable phenomena is employed.[[2]](#footnote-2) By contrast, the scientific image is developed by means of “postulational” reasoning that posits unobservables. This form of reasoning postulates the existence of unobservable theoretical entities whose behaviour gives rise to observable phenomena.

III.

Two key themes of ‘Philosophy and the Scientific Image of Man’ will serve as my starting point. One theme that emerges from the clash between Sellars’ two images is that of how to develop a thoroughly naturalistic conception of human thought and experience. A second theme relates to the synoptic approach to philosophy that Sellars seeks to promote in place of a narrowly analytic one. In the next section, I will bring the Sellarsian form of naturalism into contact with Quinean naturalism and develop some implications of the Quinean form of naturalism. In this section, I explain why I find Sellars’ synoptic view of philosophy to be an attractive one.

As we have seen, Sellars was critical of the method of philosophical analysis as overly narrow or myopic. Instead, he favours a synoptic view that brings things together rather than focussing in on any particular detail in a picture. In my estimation, this synoptic view of philosophy better reflects the practice of philosophy than does the narrowly analytic view. The narrowly analytic conception of philosophy fails to capture much of even so-called “analytic philosophy”. There is much that is done in analytic philosophy that cannot be construed as analysis, especially if analysis is understood in the strict sense as conceptual analysis. There is argument, critical appraisal, objection and reply, exposition and exegesis, narrative, comparison and contrast, and the articulation of philosophical perspective. Nor is such philosophical activity restricted to the conceptual realm. There is discussion of substantive matters that is not just reflection on the nature of our concepts.[[3]](#footnote-3) In short, much that is done in analytic philosophy fails to be analytic in any strict sense. Analysis is just one of the tools of the philosopher’s trade.

Apart from the question of actual philosophical practice, there is a worry that relates to the very idea of analysis that Sellars’ synoptic view may enable us to avoid. To take one salient example, consider the practice of conceptual analysis as it is often undertaken within the field of analytic epistemology. It is standard practice to investigate an epistemic concept such as the concept of knowledge or justification by proposing an analysis of the selected concept. The best-known example is the “traditional” analysis of the concept of knowledge as justified, true belief.[[4]](#footnote-4) The proposal is to analyze the concept in terms of three distinct conditions which constitute individually necessary and jointly sufficient conditions for the applicability of the concept of knowledge. The proposed analysis is then subjected to test by the consideration of potential counterexamples. Typically, the proposed counterexamples involve the use of fictitious examples, which are designed to elicit intuitions that may or may not support the analysis.

Intuitions play a central role in this philosophical methodology. Intuitions that fit with an analysis provide evidence for the analysis. Intuitions that fail to fit with an analysis are taken as evidence against the analysis. An important example of the latter is Gettier’s first case, in which two men, Smith and Jones, apply for the same job (1963, p. 122). It is a widely shared intuition that Smith fails to know that the man who will get the job has ten coins in his pocket despite his belief to that effect being both justified and true. After all, Smith thinks it is Jones who will get the job and has ten coins in his pocket rather than Smith himself. The intuition that Smith’s justified true belief is not knowledge counts as evidence that something is amiss with the justified true belief analysis of knowledge.

But what are intuitions? How can intuitions play a role as evidence in relation to a proposed conceptual analysis? What exactly are they evidence of?

In his book, *The Fragmentation of Reason* (1990), Stephen Stich raised serious questions about the role that intuition may play in philosophical methodology. Stich focussed on the role that intuitions play within the reflective equilibrium approach to matters of epistemic normativity rather than their role in conceptual analysis as such (1990, pp. 81-9). In particular, he suggested that intuitions about epistemic matters may vary with language or culture, with the result that there would be no reason to favour our intuitions about epistemic normativity over competing intuitions from another culture (1990, pp. 91-2). In work subsequent to Stich’s initial suggestions, experimental philosophers including Stich himself have provided evidence that intuition varies with culture, sex or gender and socio-economic status, as well as being subject to forms of manipulation such as order effects.[[5]](#footnote-5) But while work on intuition in experimental philosophy is richly suggestive, it is not entirely clear what conclusion is to be drawn from it. Recent results, for example, due to Machery *et al* (2017), appear to show the initial reports of widespread variation of intuition to have been exaggerated. Still, one way or the other, we cannot afford to be sanguine about the role that intuition may play as evidence in philosophy. Until such time as it is persuasively shown that intuition may serve as a reliable indicator of some philosophically significant property of our concepts (or, indeed, of something non-conceptual), it is best not to place significant evidential weight on intuition in philosophical deliberation.

Concerns about intuition pose a challenge to the role that intuition may play in the method of analytic philosophy. But the Sellarsian synoptic view of philosophy enables us to place the challenge in appropriate perspective. Conceptual analysis is not the only tool in the philosopher’s repertoire. The fact that intuition may be unable to play an evidential role is therefore no cause for alarm. For we have our eye on the whole rather than on any one point of fine detail. Moreover, there are other techniques and methods apart from appeal to intuition that may be employed in pursuit of the synoptic enterprise of philosophy. Not only is the appeal to intuition not the only method in the philosopher’s toolbox. It may not even be the most important one.

IV.

The position of Sellars in ‘Philosophy and the Scientific Image of Man’ is a naturalistic one.[[6]](#footnote-6) The problem that Sellars sees emerging from the clash between the manifest and the scientific images is that of explaining features characteristic of human experience in the stark terms allowed within the scientific image. It is not at all clear, for example, how to account for perceptual experience or conceptual thought in terms of systems of fundamental particles whose behaviour is explained on the basis of the laws of physics.

Sellars’ approach to matters of mind is broadly physicalistic. Thoughts are understood in terms of their functional role, so that “there is no barrier *in principle* to the identification of conceptual thinking with neurophysiological process” (1963, p. 34). Sellars speculates that future science may show how the complex interplay of particles produces sensory experience characterized by “ultimate homogeneity” (1963, p. 37). He also seeks to accommodate personhood within the realm of the physical. For Sellars, the notion of personhood has a close connection with standards (e.g., ethical, logical) that ultimately reside in the shared intentions of a community. Sellars proposes that the framework of personhood be “joined” to the scientific image. The elements of the framework are to be described in scientific terms, “so that we *directly* relate the world as conceived by scientific theory to our purposes, and make it *our* world and no longer an alien appendage to the world in which we do our living” (1963, p. 40).

Sellars’ naturalism is a metaphysical form of naturalism that reflects a broadly physicalistic outlook. The contrast between the two images is an idealization meant to “illuminate the inner dynamics of the development of philosophical ideas” (1963, p. 5). As such, it sheds light on the themes and tensions that animate modern philosophical reflection upon the nature of the human mind and its place within the scientific world-view. But to develop a fully synoptic philosophy, the metaphysical form of naturalism needs to be brought into contact with forms of naturalism that are epistemological and methodological in character.

I have in mind, in particular, the epistemological and meta-philosophical forms of naturalism that one finds in the work of W.V.O. Quine. Quine’s naturalism stems from his rejection of the analytic-synthetic distinction. In ‘Two Dogmas of Empiricism’ (1953), Quine chases the notion of analyticity around an uninformative circle of related notions such as synonymy and definition before concluding that there is no clear distinction to be drawn between analytic and synthetic truths. Given that no such clear distinction may be drawn, all statements must have some empirical content. There are no truths that are purely analytic or conceptual. And, given this, it follows that there may be no knowledge that is strictly *a priori* in nature. All knowledge is at base *a posteriori* knowledge.[[7]](#footnote-7) But, if all statements have empirical content, then all philosophical statements must have empirical content. Philosophy cannot be a purely *a priori* discipline. It must be empirical, at least in a broad sense of the term. As a discipline, philosophy is therefore located on a continuum with the sciences rather than separated off from or prior to the sciences.[[8]](#footnote-8)

Such a naturalistic outlook has implications for epistemology. Just as the pursuit of philosophy itself is to be empirical, so in particular is the pursuit of epistemology. This leads Quine ultimately to what is sometimes referred to as the *replacement thesis*.[[9]](#footnote-9) As Quine writes in ‘Epistemology Naturalized’, “Epistemology, or something like it, simply falls into place as a chapter of psychology and hence of natural science” (1969a, p. 82). The epistemologist *qua* psychologist studies the human subject to determine the relationship between perceptual input and the theoretical output which the subject ultimately produces on the basis of the input. Epistemology, and, indeed, philosophy, is not something that is to be undertaken in advance of science as preliminary “groundwork” for science. The aim of epistemology is not to establish the legitimacy of knowledge in a way that precedes or is distinct from the scientific enterprise. The aim is to answer epistemological questions about the relationship between evidence and theory on the basis of science itself. The sceptical concern that this is to use science in circular defence of itself is not one to which Quine attaches great significance.[[10]](#footnote-10)

A Quine-inspired naturalistic approach to philosophy can take a variety of forms. Some naturalistic philosophers do empirical work either on their own or in collaboration with scientific research groups. Some draw extensively on empirical work rather than doing empirical research themselves. But it is not essential to a naturalistic approach to philosophy that one either conducts empirical research or draws extensively on empirical research. For the naturalist, even philosophy that is conducted from the armchair may be understood as empirical in nature.

The point that armchair philosophy may be empirical in nature may not be immediately apparent. To briefly develop the point, I will draw upon the work of David Papineau. In his paper, ‘The Poverty of Analysis’ (2009), Papineau argues that philosophical claims are synthetic claims that are known by *a posteriori* means. They are not analytic truths that are known by *a priori* philosophical deliberation.[[11]](#footnote-11) The point may be brought out by noting that concepts by themselves engender no ontological commitment. It is the claim that a concept is instantiated by items that really exist that entails commitment to the way the world is. It is only such ontological commitment that makes the issue worthy of philosophical consideration. The commitment to the way the world is renders the claim a synthetic one. The truth of such a claim is to be decided by consideration of empirical evidence. Like the scientist, the philosopher seeks a theory that fits the evidence, though unlike the scientist the philosopher does not actively seek out novel empirical data.[[12]](#footnote-12)

Papineau illustrates the point about the synthetic nature of philosophical claims with the concept of a witch (2009, p. 11). It may be analytic to the concept of a witch that a witch flies on a broomstick and casts spells. But the mere concept of a witch entails no commitment to the existence of witches. It is only once a commitment to the existence of witches is entered into that a substantive claim about the world is made.[[13]](#footnote-13) But such a commitment entails a synthetic claim to be investigated empirically rather than an analytic claim that is to be investigated by means of pure thought alone. It is only the synthetic claim that there are indeed witches that results in a question that warrants philosophical consideration. Mere consideration of the content of the concept independently of any definite ontological commitment is philosophically idle.

V.

A persistent concern with naturalism is the question of normativity.[[14]](#footnote-14) Naturalism encourages us to engage in an empirical investigation of factual matters. Such an empirical investigation seems ill-suited to matters of normativity.[[15]](#footnote-15) For empirical investigation only produces descriptive knowledge of the way things are, not the way things ought to be. It could hardly yield normative outcomes. No normative ‘ought’ may be derived from the descriptive ‘is’ of empirical investigation of fact. Matters of normativity are not amenable to empirical investigation.

This concern is misplaced. Reliabilists such as Alvin Goldman and normative naturalists such as Larry Laudan have shown how to naturalize epistemic normativity.[[16]](#footnote-16) The basic point is that there are empirical facts about the reliability of a cognitive process or rule of scientific methodology. A reliable process or rule is one that is truth-conducive, i.e., leads to truth. Some processes or rules are a reliable means of arriving at truth. Some are not. Some have a higher degree of reliability than others.[[17]](#footnote-17) The reliability of a process or rule in leading to truth is the basis of epistemic normativity.[[18]](#footnote-18) A subject whose belief is produced by a reliable process is thereby justified in holding that belief. A scientist whose acceptance of a scientific theory is based on the satisfaction of reliable rules of method is thereby justified in acceptance of that theory. The reliability of a process or rule is a property of the process or rule that may be established by means of empirical investigation. It is therefore possible to gain understanding of the basis of epistemic normativity by means of empirical investigation. Empirical investigation is not restricted to the discovery of descriptive facts that are devoid of normative significance. For there are facts about the reliability of processes and rules that have normative significance. The fact that a rule or process is a reliable means of arriving at truth is a good reason to make use of the process or rule. Equally, one who does make use of such a process or rule in adopting a belief or theory is thereby justified in doing so.

It is worth noting that Goldman is inclined to grant an evidential role to intuition in a manner analogous to that about which I earlier expressed reservations (section III).[[19]](#footnote-19) In ‘Philosophical Intuitions: Their Target, Their Source, and Their Epistemic Status’ (2007), Goldman argues that philosophers employ the method of possible cases to prompt “application intuitions” which serve as evidence for or against a proffered conceptual analysis. With respect to his defence of reliabilist epistemology, the role of intuition is restricted to showing that reliabilism accords with our intuitions about the nature of epistemic justification. The question of whether and the extent to which any particular cognitive process is a reliable one is an empirical one to be investigated using empirical methods. Intuition is employed to show that reliability is the key to the concept of justification. It is not employed to establish the reliability of any particular process.

But, while Goldman grants a role to intuition in relation to the concept of justification, this does not show that the naturalist must make significant use of intuition in developing the reliabilist account of justification. As Hilary Kornblith has argued, it is possible for the naturalistic epistemologist to make quite minimal use of intuition. Intuition may be employed to identify straightforward cases of knowledge (2002, pp. 12-4). This is not to treat intuition as evidence about epistemic concepts. It is simply a matter of identifying unproblematic instances of knowledge, which are then investigated by empirical means. As the investigation proceeds, the function served by the initial intuitions is reduced to the point of insignificance. Moreover, the intuitions are not employed to provide access to the concept of knowledge. Their sole function is to pick out actual cases of knowledge for further investigation.[[20]](#footnote-20)

VI.

I turn, finally, to the question of realism. According to realism, we inhabit an objective reality, whose existence, structure, and nature are independent of human thought, language and experience. Despite such ontological independence, the objective world is not epistemically independent from us in the sense of being epistemically inaccessible to us. We do have epistemic access to the world that exists outside of our minds. Indeed, we acquire extensive knowledge of the world, both by means of perception at the observable level, and by means of scientific research at the level of the unobservable theoretical entities whose behaviour gives rise to observable phenomena.

How does realism sit with naturalism? Realism says there is an external world that we can come to know. As such, realism is a substantive philosophical position rather than a theory of philosophical method. By contrast, naturalism is at least in part a theory of philosophical method. For the naturalist, philosophy is to be pursued in a broadly empirical manner. What if naturalism clashes with realism? What if the empirical approach to philosophy gives rise to results that conflict with realism? Which should we give up, realism or naturalism?

There are two apparent ways in which a naturalistic approach may enter into conflict with realism. The first is that the empirical investigation of our cognitive capacities might yield sceptical results. For example, we might arrive at empirical evidence that we are in fact unable to acquire knowledge of the external world, at either the observational or non-observational levels. The second way is that we might discover empirical evidence that the world that we inhabit is not in fact an objective, mind-independent reality after all. For example, it might turn out that the world itself depends on human thought, language, or experience in some hitherto unanticipated way.

If either of these two eventualities were to transpire, it might seem that we would have no epistemically responsible alternative but to renounce realism. For in both cases, by stipulation, there is evidence that realism is wrong. And, so, if we take evidence as our guide in what to believe, we must, on the basis of that evidence, give up realism. In such an unlikely circumstance, the naturalistic outlook would lead to the denial of realism.

I am not certain that this is the right response. Naturalism encourages us to adopt an empirical approach to philosophical matters. The empirical approach brings with it a healthy dose of common sense. For common sense is in large part empirical. It is characterized by a robust sense of realism about the world with which we directly engage in our daily activities and transactions. If naturalism imbibes a healthy dose of common sense, there is less scope for a naturalistic approach to conflict with realism. A commonsense commitment to realism provides a firm basis on which to resist empirically based arguments against realism, at least in the first instance.

By combining commonsense realism with naturalism, we keep an “eye on the whole” in good Sellarsian spirit. We adopt a synoptic approach to philosophy that brings realism together with naturalism in a unified image of both philosophical method and the way the world is. It may not elevate the scientific image above the manifest. But that is a forlorn prospect in any event.[[21]](#footnote-21)

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1. Sellars’ use of the gendered term ‘man’ may grate on modern ears. I take it that he means to refer, not to people of a particular sex or gender, but to members of the human species regardless of sex or gender. One might nowadays speak instead of humans, humanity, or, perhaps, human persons. [↑](#footnote-ref-1)
2. Sellars uses the expression ‘correlational induction’ to describe the methods of inductive reasoning employed in the development of the manifest image (1963, p. 7). The inductive methods he has in mind are more complex than enumerative induction. They include methods that seek to identify a range of correlational patterns among observable phenomena, such as Mill’s methods and “canons of statistical inference” (1963, p. 7). [↑](#footnote-ref-2)
3. Hilary Kornblith makes the point that philosophy can and should engage with substantive matters rather than conceptual analysis in arguing that epistemology should be concerned with knowledge itself rather than the concept of knowledge. Indeed, he takes knowledge to be a natural kind, so that investigation of knowledge is to proceed in the manner of an empirical and theoretical investigation of a natural kind. Intuitions have a role, for Kornblith, but only to pick out instances of a natural kind, rather than in pursuit of the task of conceptual analysis. See, for example, Kornblith (2002, pp. 8-17). Another philosopher who holds that as philosophers we are interested in intuitions about kinds rather than concepts is Michael Devitt (2010, pp. 276-7). [↑](#footnote-ref-3)
4. I place quote-marks around the word ‘traditional’ because it has been persuasively argued that the justified true belief analysis of knowledge is not in fact the traditional concept of knowledge (Dutant 2015). The traditional conception of knowledge is an infallibilist view as opposed to the fallibilist view against which Gettier presented his counterexamples. To make matters even more interesting, it has recently been argued that the idea of knowledge as justified true belief only emerged as a central theme in epistemological discussion following developments in English philosophical circles after the middle of the twentieth century (see Verhaegh forthcoming). [↑](#footnote-ref-4)
5. See, for example, Weinberg, Nichols and Stich (2001), Buckwalter and Stich (2013), Swain, Alexander and Weinberg (2008). [↑](#footnote-ref-5)
6. James O’Shea, for example, describes Sellars’ task as “to envision how we could explain our own human nature naturalistically without ‘explaining it away’ altogether” (2007, p. 3). [↑](#footnote-ref-6)
7. It may be noted that it does not follow from the claim that no knowledge is strictly *a priori* that all knowledge is at base *a posteriori*. For surely knowledge that is not strictly *a priori* might still be in part *a priori*. Here my inclination is to follow Michael Devitt (2014) in denying that there is an *a priori* at all, though a more conciliatory option may be to adopt David Papineau’s (2011) view that the *a priori* exists but is philosophically trivial. [↑](#footnote-ref-7)
8. I have presented Quine’s naturalistic view of philosophy as being based on his rejection of the analytic-synthetic distinction. An alternative way of presenting Quinean naturalism without explicit reliance on rejection of the analytic-synthetic distinction may be found in Devitt (2014), who presents the Quinean case for naturalism entirely in terms of holism. Given the holistic nature of confirmation, all knowledge is ultimately empirical, so that there is no need to appeal to the *a priori* to account for knowledge in mathematics and logic or other areas that might appear to be non-empirical. [↑](#footnote-ref-8)
9. See, for example, Kornblith (1994, p. 3) and Lemos (2021, p. 219). [↑](#footnote-ref-9)
10. Quine mentions the issue of circularity only in passing in ‘Epistemology Naturalized’ (1969a, pp. 75-6). He addresses the issue at slightly greater length in ‘Natural Kinds’ (1969b). In that context he dismisses the worry that by appealing to Darwin in support of induction he is reasoning in a circle: “The reason that I shall not be impressed by this is that my position is a naturalistic one; I see philosophy not as an *a priori* propaedeutic or groundwork for science, but as continuous with science” (1969b, p. 126). [↑](#footnote-ref-10)
11. Unlike some naturalists (e.g., Devitt 2010, 2014), Papineau does not deny the existence of *a priori* knowledge. However, he takes the role of *a priori* knowledge in philosophy to be unimportant (see Papineau 2011). [↑](#footnote-ref-11)
12. Papineau takes much of philosophy to involve what he describes as “theoretical tangles” (2009, p. 2), which require the identification and exploration of conflicting assumptions, as well as developing ways to resolve the conflict between such assumptions. Papineau also allows a role for intuition, though he takes intuition to be primarily an encapsulation of empirical assumptions that bear little weight unless they are subjected to *a posteriori* assessment (2009, pp. 20-5; 2011, pp. 65-6).

    A more detailed elaboration of the way that armchair philosophy involves empirical elements may be found in Daniel Nolan’s paper, ‘The *A Posteriori* Armchair’ (2015). We reflect upon and assemble items of commonplace knowledge about the world. We conceive and develop new theoretical alternatives. We draw together and integrate existing information from scientific research. We evaluate alternative philosophical theories on the basis of theoretical virtues such as consistency, coherence, simplicity and fertility. For Nolan, all such armchair philosophical investigation is *a posteriori* in nature, though he does not go so far as to deny the existence of *a priori* knowledge. [↑](#footnote-ref-12)
13. Papineau frames the issue in terms of a contrast between analytic Carnap sentences of the form “If there is a thing that has property P, then it is a thing of kind K” and synthetic Ramsey sentences of the form “There is a thing of kind K”. He holds that it is the Ramsey sentences rather than the Carnap sentences that “matter to philosophy” (2009, p. 10). [↑](#footnote-ref-13)
14. Indeed, one common interpretation of Quine’s proposal to naturalize epistemology was that it entailed rejection of normative epistemology (e.g., Kim 1994, p. 42). For evidence that this is an incorrect reading of Quine, see Kornblith (1995, p. 3), who cites Quine (1986, p. 664; 1990, pp. 19-21). It is clear in the passages from Quine cited by Kornblith that Quine does not reject epistemic normativity at all. [↑](#footnote-ref-14)
15. I shall focus here only on epistemic normativity rather than normativity in other areas such as in ethics. Suffice to say that a commitment to a naturalistic approach does not rule out the possibility of normativity in relation to ethics. However, it would seem clear that it must impose constraints on allowable ethical theories. For example, such theories may only traffic in entities that fit within a broadly scientific worldview. Moreover, the methods of ethics must be methods countenanced by a naturalistic approach to philosophy. [↑](#footnote-ref-15)
16. For example, Goldman (1992) and Laudan (1987). [↑](#footnote-ref-16)
17. The point that some processes or rules may be more reliable than others is the key to responding to the challenge of epistemic relativism. Some processes or rules are more reliable than others, so not all processes or rules are on an epistemic par, as the relativist suggests. See my (2010) for development of this line of argument. [↑](#footnote-ref-17)
18. For present purposes, I set aside the fact that Laudan was critical of the scientific realist view that truth is the aim of science (e.g., 1984). Given his anti-realist rejection of truth as the aim of science, Laudan would not have granted truth a role in his account of epistemic normativity. I set this point aside here because I do not regard anti-realism as an essential feature of normative naturalism. Indeed, in my own approach to the warrant of rules of scientific method, I explicitly adopt Laudan’s normative naturalist meta-methodology while placing it squarely within a realist framework (e.g., Sankey 2000). Once normative naturalism is placed within a realist framework it becomes a reliabilist theory of method – method reliabilism rather than process reliabilism, to use Goldman’s terminology. [↑](#footnote-ref-18)
19. By contrast, Laudan rejected “pre-analytic intuitions” as part of his turn to normative naturalism. For discussion of the way in which Laudan’s normative naturalist meta-methodology was developed after he became critical of the appeal to intuition which he had earlier endorsed, see my (2020a). [↑](#footnote-ref-19)
20. Kornblith compares this use of intuition to that of the rock collector, who selects a group of stones on the basis of superficial similarity before conducting a detailed investigation of the underlying factors that account for that similarity (2002, p. 10). [↑](#footnote-ref-20)
21. For detailed elaboration of the relationship between science and common sense that I have sketched in the last two paragraphs, see especially my (2020b). [↑](#footnote-ref-21)