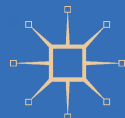




**EPISTEMIC
RELATIVISM
AND
SCEPTICISM**

Unwinding the Braid

Steven Bland



Epistemic Relativism and Scepticism

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This book is dedicated to my daughters, Evangeline and Abigail

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CHAPTER 1

Introduction

This book is a study of twin threats that strike at the heart of analytic philosophy: Pyrrhonian scepticism and epistemic relativism. Scepticism and relativism are often understood as epistemic doctrines whose main purpose is to undermine philosophers' views about knowledge and justification. Sceptics claim that none of our beliefs can be properly justified, and therefore knowledge of any kind is unattainable. Relativists maintain that knowledge and justification can be attained, but only within systems of presuppositions and methods whose epistemic authority is unavoidably local. In either case, philosophers cannot possess the kind of absolute knowledge they think of themselves as having or striving towards.

The most significant threat posed by sceptics and relativists, though, does not consist in the counter-intuitive epistemic views they espouse. Rather, it consists in their outright rejection of the traditional philosophical enterprise. Of course, they do make epistemic claims, but their main intent in doing so is to compel philosophers to recognize their limitations in attempting to reach rational consensus. Sextus Empiricus makes this abundantly clear in his characterization of scepticism:

Scepticism is an ability to set out oppositions among things which appear and are thought of in any way at all, and an ability by which, because of the equipollence in the opposed objects and accounts, we come first to suspension of judgement and afterwards to tranquillity. (Sextus Empiricus 2000, 4)

Sceptics do not take sides in philosophical debates about the nature of reality because they believe that such debates cannot be won. In order to avoid the anxieties that result from participating in futile debate, they maintain an attitude of ambivalence in all philosophical matters, passing judgement only on how things appear to them. Scepticism is thus not a proper philosophical position, but a rejection of the philosophical enterprise, or some traditional characterization thereof.

Richard Rorty is similarly clear that his relativist views force a move from epistemology to the discipline of hermeneutics: "...epistemology proceeds on the assumption that all contributions to a given discourse are commensurable. Hermeneutics is largely a struggle against this assumption" (Rorty 1979, 316).¹ Once we give up the epistemologist's dream of discovering the privileged epistemic system in which all disputes can be rationally resolved, we must content ourselves with the project of fostering conversations that neither presuppose nor require such common ground. Unlike sceptics, Rorty does not wish to give up philosophy altogether, but he does seek to transform it from a discipline that sees discussion as a means to rational consensus to a discipline that regards discussion as an end in itself.² Epistemic relativism can also be seen as an important impetus towards the anti-traditional movements of deconstructionism (Baghramian 2004, Ch. 3), epistemological anarchism (Baghramian, Ch. 6), and radical conventionalism (see Chapter 3).

In addition to having similar meta-philosophical aims, Pyrrhonian scepticism and epistemic relativism are motivated by a common argument, known as the *Agrippan trilemma*. Sceptics insist that no disagreement about how things stand in reality can be rationally resolved because

¹Rorty himself abjures the 'relativist' label in favour of 'pragmatist': "The charge that pragmatism is "relativistic" is simply [the traditional philosopher's] first unthinking expression of disgust at a teaching which seems cynical about our deepest hopes" (Rorty 1980, 735). This is in no small part due to his uncharitable understanding of the relativist doctrine: "'Relativism' is the view that every belief on a certain topic, or perhaps about any topic, is as good as every other. No one holds this view" (Ibid., 727). Whatever Rorty wants to call himself—pragmatist, epistemic behaviourist, anti-foundationalist—he does seem to be an epistemic relativist on my understanding of this term, and on others'—see Rorty (1979, 178, 182, 212, 317, 329–330, 335, 361, 364–365, 377, 379, 385), as well as Haack (1993, Ch. 9), Boghossian (2006, Ch. 5), and Seidel (2014, Ch. 3).

²For other discussions of the implications of epistemic relativism on philosophical methodology, see Hales (2006) and Carter (2016, Chs. 1 and 9).

every party's attempt to justify their position must result in a series of reasons that goes on indefinitely, terminates with a dogmatic assertion, or circles back on itself—this is the trilemma. Since none of these outcomes yield justification, we must do without knowledge and deliberative consensus. Relativists, by contrast, claim that such disagreements do admit of rational resolutions, as long as they take place within a *shared* system of basic principles and methods. However, when inquirers disagree on a subject because they subscribe to distinct epistemic systems, rational argumentation will necessarily fail because evaluations of epistemic systems fall prey to the Agrippan trilemma. Justification and consensus are intra-system, not inter-system, achievements.

Naturally, neither of these conclusions is welcomed by philosophers who work within the traditions that are attacked by sceptics and relativists. The most popular strategies of resisting them involve responding to the Agrippan argument that motivates both positions. The primary purpose of this book is to argue that Pyrrhonian scepticism and epistemic relativism should be treated as *separate* threats, to be resisted by means of *different* argumentative strategies. In pursuing this purpose, I will look to accomplish the following goals:

1. To understand how the five modes of Pyrrhonian scepticism function in the principal argument for epistemic relativism (Chapters 1–3).
2. To reveal the shortcomings of anti-sceptical attacks on epistemic relativism (Chapters 4–8).
3. To offer an alternative strategy for resisting epistemic relativism (Chapter 9).

The remainder of this chapter outlines how these goals will be pursued in subsequent chapters.

1.1 RELATIVISM, SCEPTICISM, AND ANALYTIC PHILOSOPHY

The principal target of this book is epistemic relativism. Unlike other unpopular philosophical positions, relativism is almost universally disdained by analytic philosophers because it challenges suppositions that are essential to the intellectual exercises in which they take part. Rorty himself says: "...we can see the abandonment of the search for privileged representations as the abandonment of the goal of a "theory of

knowledge”” (Rorty 1979, 211).³ Susan Haack thinks there is even more at stake:

There could be no honest intellectual work in Rorty’s post-epistemological utopia. Unless there is such a thing as better and worse evidence for accepting this or that proposition as true – objectively better or worse evidence, that is – there can be no real inquiry of any kind: epistemological ... or scientific, forensic, historical, mathematical. (Haack 1993, 194)

If genuine rational inquiry is understood as a *non-arbitrary* search for the *truth*, then Rorty would have us give up on this project by rejecting one of its essential presuppositions:

The absolutist presumption: there are objectively better and worse ways of acquiring knowledge.

If every operative epistemic method is on a par, then the use of any particular method of inquiry is arbitrary with respect to the inquirer’s goal of approaching the truth.⁴ He thus agrees with Haack that what *she* calls real inquiry is impossible from his hermeneutical perspective.

If this move away from traditional inquiry is to be successfully resisted, the absolutist presumption must not only be true, but justified; it cannot remain a *presumption*. And to justify the presumption we must know something about *which* ways of acquiring knowledge are objectively better than others. Since analytic philosophers like Haack typically rely on broadly naturalistic methods of epistemic evaluation—deductive, inductive, and abductive reasoning, conceptual analysis, perception, memory, etc.—they must also be able to defend the following principle:

The naturalist presumption: broadly naturalistic epistemic practices are objectively better than non-naturalistic practices.

If philosophers, and inquirers more generally, cannot defend the absolutist and naturalist presumptions, then they have no rational grounds on which to claim that their epistemic practices are uniquely well suited to

³See also Rorty (1979, 179).

⁴Rorty goes further still, insisting that truth ought not to be the aim of inquiry (Rorty 1979, 377).

their investigations, and no recourse when presented with radically different practices that yield contrary outcomes.

If the primary goal of our epistemic practices is to knowingly approach the truth, then one set of practices is better than another when it is more *truth-conducive*, i.e., when it yields a higher ratio of true beliefs to false ones (Haack 1993, 186). Thus, it would seem that a defense of the absolutist and naturalist presumptions must satisfy the following *justification requirement*:

The absolutist must be able to *justify* her belief that some epistemic practices are *more truth-conducive* than others.

The naturalist must be able to *justify* her belief that naturalistic epistemic practices are *more truth-conducive* than non-naturalistic practices.

However, epistemic relativists claim that any attempt to show that a set of epistemic practices is truth-conducive will inevitably fall prey to Agrippa's trilemma:

The *absolutist's trilemma*: when justifying a particular set of epistemic practices, the absolutist must either (i) defend them by appealing to some further practice(s), (ii) defend them by means of the very practices that are in question, or (iii) decline to defend them.

The *naturalist's trilemma*: when justifying her epistemic practices, the naturalist must either (i) defend them by non-naturalistic means, (ii) defend them by naturalistic means, or (iii) decline to defend them.

Relativists argue that *none* of these options yield a proper justification for the epistemic practices in question. Option (i) amounts to giving up on one's epistemic practices in favour of others; option (ii) amounts to begging the question; and option (iii) is no defense at all. And if no epistemic practice can be shown to be truth-conducive, then the justification requirement cannot be met, which means that there can be no objective grounds for preferring one set of practices over another. We are thus led to the relativist conclusion that the absolutist and naturalist presumptions are indefensible. The role of the Agrippan trilemma in this argument for epistemic relativism is the topic of Chapter 2.

Some philosophers see no need to reply to this challenge. Indeed, it is a somewhat odd circumstance that the more naturalistically inclined a philosopher is, the more likely she is to ignore this line of argument.

Hilary Kornblith, for example, is quite clear about the naturalist's attitude towards scepticism:

The project of responding to skepticism...is one which naturalists regard as a dead end. Naturalists will argue that this project has a history of failure, and the manner in which the project has failed calls the very point of the project itself into question. (Kornblith 1999, 166)⁵

Since the principal arguments for scepticism and epistemic relativism are so closely related, it seems likely that such hard-line naturalists regard them as being equally unworthy of response.

This strikes me as a mistaken attitude for three reasons. First, it means that the naturalist presumption must remain a presumption, in which case naturalists cannot provide any reasoned defense of their methods of philosophizing. Second, the arguments against the absolutist and naturalist presumptions are not at all foreign threats to analytic philosophy; as we will see in Chapter 3, they can be understood as arising within two of the more naturalistically inclined philosophies of the twentieth century: logical positivism and pragmatism. This being the case, it is difficult to see how these arguments can be rightly ignored by analytic philosophers. Finally, it is doubtful that the history of responding to scepticism is one of unmitigated failure; in fact, it would seem that most philosophers reject scepticism on what they deem to be reasonable grounds. As such, there may well be cause for optimism regarding our chances of resisting epistemic relativism as well.

Indeed, those analytic philosophers that do take the threat of epistemic relativism seriously respond to it by means of the nearly universal strategy of attacking the sceptical argument that supports it. Some of these philosophers think that an adequate reply to the Agrippan argument for scepticism is a *sufficient* condition for resisting epistemic relativism: "...to the extent that epistemic relativism depends upon a sceptical line of argument, anti-sceptical resources may be deployed against the relativist" (Sankey 2012, 183). Others regard it as a *necessary* condition: "As I see it, the case for epistemic relativism involves (one form of) scepticism, and cannot be defeated satisfactorily unless we simultaneously deny it the sceptical resources upon which it draws" (Luper 2004, 271).

⁵For an older, but no less authoritative expression of this view, see Quine (1969). More recently, Maddy (2007, Chapter I.2) has offered a similar view.

Finally, there are some who see no distinction at all between the principal arguments for scepticism and relativism: “The argument can be given a relativist spin or a sceptical spin. It is the same argument either way” (Williams 2007, 96).⁶ From these perspectives, there are as many anti-relativist strategies as there are cogent responses to Pyrrhonian scepticism. The middle chapters of this book are dedicated to elucidating and criticizing some of the more prominent of these anti-sceptical strategies of resisting epistemic relativism, which are listed in the next section.

1.2 THE ANTI-SCEPTICAL STRATEGIES

Chapter 4 discusses the classic internalist answers to the Agrippan trilemma: foundationalism and coherentism. These theories of the structure of knowledge constitute replies to the epistemic regress problem, which is an instance of the Agrippan trilemma. The problem, says the sceptic, is that in justifying a belief, we must put forward a reason for thinking it is true. The reason we provide can justify our belief only if it too is credible, which means that we must have a further reason to think that it’s true. If every justifying reason must itself be justified, then the process of justification cannot end. The only alternative is that the process of reason-giving comes to an end at a belief that we dogmatically accept, or it eventually loops back on itself such that the target belief is used to justify one of its own supporting reasons. Since these are the *only* three possibilities, and *none* of them yield justification, the sceptic argues that justification is not to be had for any belief.

Foundationalists claim that this argument depends on the false supposition that *all* justification consists in the process of inferring one belief from another credible belief; they abandon this supposition in favour of the view that all knowledge rests on basic beliefs that are *non-inferentially justified* by experience or rational intuition. It follows that any beliefs and epistemic practices that are demonstrably founded on such sources of non-inferential warrant are recognizably superior to those that are not. And if naturalistic beliefs and methods are among them, then foundationalists can defend the absolutist and naturalist presumptions.

Coherentists insist that all justification is inferential, but maintain that sceptics have an overly linear conception of justification. The epistemic

⁶See also Sosa (1994).

regress argument supposes that warrant is transmitted from *one* belief to another; it is this assumption that leads to the conclusion that the process of justification must go on indefinitely. Against this view, coherentists argue that a belief is justified when it is inferentially connected to a coherent *system* of beliefs; the more coherent the belief system, the more likely it is that the majority of its beliefs are true. And since beliefs are justified together in a web, rather than individually in a chain, there is no threat of an epistemic regress to contend with. Furthermore, to the extent that we can distinguish more coherent belief systems from less coherent ones, we can distinguish better epistemic practices from worse ones. Assuming that naturalistic belief systems are more coherent than their non-naturalistic alternatives, we would have definitive reasons to prefer such belief systems.

We will see in Chapter 5 that externalists reject a different presupposition of the sceptical argument. According to the epistemic regress problem, beliefs must be justified by well-founded *reasons*; since such reasons must themselves be justified, an infinite regress ensues. Externalists deny that a believer's reasons justify their beliefs. According to one of the more popular species of externalism, process reliabilism, a belief is justified when it is *caused* by a *reliable* cognitive process. Reliabilists deny that believers must be able to identify the cognitive process that caused a belief, or possess grounds for thinking that the process is in fact reliable, in order to be justified in holding the belief. Consequently, they do not have to contend with an endless regress of reasons, since they do not regard reasons as justifiers of beliefs. Also, they see nothing amiss with defending an epistemic practice by means of the practice itself. If a reliable cognitive process produces a true belief that the operative process is reliable, then the believer can be said to *know* that the process is reliable. Naturalists, then, can justify their epistemic practices by means of those very same practices, as long as they are sufficiently reliable. If others cannot do likewise because their practices are unreliable, then the naturalist and absolutist presumptions can be justified.

Chapter 6 concerns responses to a different version of the Agrippan trilemma: the problem of the criterion. The sceptic's argument begins by pointing out that the process of justifying a belief inevitably involves the use of one or more epistemic methods. However, to be justified in believing the outcome of an epistemic method, we must have some legitimate reason to trust that method. This reason, in turn, must be arrived at by means of a trustworthy method, and so we are off once again on

an infinite regress of methods supported by reasons that are the outcomes of further methods. Alternatively, the regress could end with a belief or method that we dogmatically accept, or we can argue in a circle by invoking the target method, or one of its outcomes, in its own justification. Since none of these three exhaustive possibilities yield cogent grounds for thinking that our epistemic methods are trustworthy, the sceptic concludes that our beliefs cannot be justified by means of such methods.

Particularists answer this problem by denying the sceptic's supposition that a belief can be justified only if it is the outcome of a demonstrably trustworthy method; they insist that there are particular knowledge claims whose correctness can be recognized without having to defend the methods that were relied on in arriving at them. We can then use these justified beliefs to rationally evaluate epistemic methods, both our own and those of foreign epistemic communities. In this way, naturalists can use readily acknowledged facts about the reliability of their epistemic practices as definitive grounds for believing that such practices are superior to their non-naturalistic alternatives.

Alternatively, methodists reject the sceptic's assumption that an epistemic method can be deemed trustworthy only if there is some cogent reason for doing so; they maintain that there are methods whose trustworthiness can be recognized without having to appeal to the outcomes of any further method. These methods can then be used to rationally evaluate beliefs, including beliefs about the reliability of other epistemic methods. On this approach, naturalists can use methods whose trustworthiness is widely recognized to marshal evidence in favour of their epistemic practices.

Another attack on scepticism alleges it to be an incoherent position that should be ignored rather than answered. This position will be examined in Chapter 7. As we have seen, sceptics defend the thesis that no belief can be properly justified because every attempt to do so inevitably results in infinite regress, dogmatic assertion, or circular argument. However, if this thesis can itself be justified, then scepticism is self-undermining, and if it cannot, then sceptics cannot rationally motivate its acceptance. A similar charge has been levelled against relativists who claim that the correctness of epistemic judgements must be determined within one of many equally legitimate epistemic systems. If this claim can be absolutely justified, then epistemic relativism is a self-undermining doctrine, and if it cannot, then relativists are no better off

than absolutists. Consequently, the argument for epistemic relativism can be ignored by absolutists and naturalists.

Chapter 8 is dedicated to the novel account of the structure of knowledge found in Wittgenstein's *On Certainty*. There is a fairly natural reading of this work as offering an argument for epistemic relativism that does not in any way rely on the Agrippan argument. However, the chapter also examines two recent interpretations that attribute to Wittgenstein anti-sceptical arguments that can be used to undermine epistemic relativism.

The first is Michael Williams's reading of Wittgenstein as a contextualist about justification. Contextualists argue that the sceptic's mistake is in thinking that *any* knowledge-claim can be legitimately challenged under any circumstances, such that every reason produced in favour of a belief must itself admit of a rational justification in the form of a further well-founded reason. Against this view, they insist that epistemic agents are entitled to some of their beliefs *by default*, including those beliefs that make reasonable justifications and doubts possible. However, unlike relativists, who think of one's default entitlements as rigidly static, contextualists maintain that they are variable and context-dependant. Furthermore, they believe that *every* belief can be subjected to rational scrutiny in some context or other, which upsets the relativist's position that default entitlements are forever beyond such scrutiny. So, while there may be some contexts in which naturalists fail to rationally convince their opponents of the superiority of their epistemic practices, it does not follow that they will always be in this position.

On Duncan Pritchard's reading, Wittgenstein is advocating a Davidsonian response to scepticism. Davidson argues that meaningful communication requires that speakers have generally accurate beliefs about the world, and therefore, the fact that we do successfully communicate gives us a reason to think that most of our beliefs are true. Moreover, when communicating with another person, we must *recognize* that most of their beliefs are true. This being the case, epistemic agents cannot have such widely divergent beliefs that they are incapable of finding common ground from which they can objectively assess their epistemic practices, as relativists suppose. Naturalists may exploit this common ground when arguing for the superiority of their practices.

While some of these strategies may be capable of overcoming Pyrrhonian scepticism, none of them successfully defuse the threat of epistemic relativism. However, this is not nearly the disconcerting

conclusion that it may seem, since, contrary to the popular view, a successful reply to Pyrrhonian scepticism is neither a necessary nor a sufficient condition for resisting epistemic relativism. In Chapter 9, I offer an alternative strategy for resisting epistemic relativism that has no anti-sceptical aspirations whatsoever.

1.3 THE DIALECTICAL STRATEGY

Most anti-sceptical strategies of resisting epistemic relativism attempt to meet the justification requirement. By contrast, I reject the requirement and the *relativist jump* that it licenses from an inability to show that any epistemic practice is truth-conducive to the conclusion that all epistemic practices are equally legitimate. My point is not that the justification requirement cannot be met, but that its being met is neither a necessary nor a sufficient condition for avoiding epistemic relativism, which explains why anti-sceptical responses to the argument for epistemic relativism have been unsuccessful. Rather than attempting to justify naturalistic methods, my strategy is to *vindicate* them in such a way that the naturalist presumption is defended and epistemic relativism is avoided.

This new strategy crucially involves a novel focus on the ways in which epistemic methods can depend on one another. Anti-sceptical strategies focus exclusively on the sceptic's claim that the *justifications* of methods depend on further methods, for it is this claim that sets the stage for the Agrippan trilemma. If my being justified in consulting the weather forecast depends on my justified use of inductive reasoning, which in turn must be justified by the deliverances of another method, then the threat of a regress looms large. However, this focus has obscured the fact that epistemic methods can also depend on one another for their *applications*. My being able to consult the forecast depends on my capacity to perceive and recall its contents. Thus, in appealing to the forecast, I must *presuppose* that my perception and memory are trustworthy sources of information.

The insight that the outcomes of epistemic methods can function as *necessary presuppositions* as well as sources of justification constitutes the starting-point of my anti-relativist strategy. By identifying some of these necessary presuppositions, I argue that a cogent defense of the naturalist and absolutist presumptions can be mounted. In Chapter 9, I offer two lines of argument to this effect. First, I point out that non-naturalistic methods necessarily depend on naturalistic methods for their application.

In order to consult Biblical scripture, poison oracles, or crystal balls, one must make use of empirical methods such as perception, memory, and inductive inference; if these methods systematically lead us astray, then they cannot be counted on to deliver accurate information about non-naturalistic sources of justification. The opposite is not the case: naturalistic practices do *not* depend on non-naturalistic methods for their application; a naturalist can use perception, memory, and inductive reasoning to justify her beliefs without relying on Biblical scripture, poison oracles, or crystal balls. Given the asymmetrical relation of dependence between these two kinds of epistemic practices, it follows that *naturalistic methods must be at least as truth-conducive as their non-naturalistic alternatives*. This fact, I submit, constitutes definitive grounds for the naturalist presumption. And, unlike many anti-sceptical responses, this defense of the naturalist presumption does not presuppose methods that non-naturalists reject, so it is not guilty of begging the question. The fact that this strategy trades on the non-naturalist's own presuppositions is what makes it *dialectical*.

This rationale, however, is incapable of specifying *which* naturalistic methods are most effective. There are both empirical and non-empirical naturalistic methods; radical empiricists privilege the former, and radical rationalists privilege the latter, but neither group can justify their favoured methods in a way that avoids the Agrippan trilemma. The familiar result is that there is no way of choosing between these methods that isn't epistemically arbitrary.

This objection is addressed by the second line of argument in Chapter 9. While there are few asymmetrical relations of dependence between empirical and non-empirical methods, there are many *symmetrical* relations of dependence between them; the use of either requires deliverances from the other. Empirical methods without non-empirical methods are rationally inert; non-empirical methods without empirical methods are inapplicable to questions about the physical world. Therefore, neither type of method can be reasonably privileged over the other, and only those systems that include *both* types can be of any use to naturalists.

This line of argument falls short of a *justification* of naturalistic methods because it does not show that they are sufficiently truth-conducive to generate knowledge. It is thus not a reply to Pyrrhonian scepticism. It also fails to satisfy the justification requirement because it is compatible with the possibility that *none* of our epistemic practices, including

naturalistic ones, are truth-conducive. What the argument does establish is that naturalistic methods give us the *best chance* to approach the truth because they must be *at least as truth-conducive* as the non-naturalistic methods that depend on them. This vindication is reason enough to think that naturalistic methods are objectively better than their non-naturalistic counterparts, which turns the naturalist and absolutist presumptions into defensible principles.

Though the principal lines of argument for Pyrrhonian scepticism and epistemic relativism are tightly entwined, it is a mistake to try to sever them both at once. A better strategy is to unwind the braid, so that we have a better chance of severing each strand with distinct responses. My goal is to contribute to this effort by producing an effective argument against epistemic relativism.

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The Principal Argument for Epistemic Relativism

It is easy to understand why anti-sceptical strategies of resisting epistemic relativism are so popular. Scepticism and relativism are both radical epistemic positions with significant meta-philosophical implications. They even have similar Greek origins. Most importantly, they share a number of arguments in common. It seems like a good bet, then, that an effective antidote to one will prove effective against the other.

The purpose of this chapter is to formulate the principal argument for epistemic relativism, and to elucidate the sceptical arguments it relies on. In the process, I will draw attention to some of the important differences between the two positions; foremost among them are their views on the epistemic status of *non-basic* beliefs and methods: sceptics maintain that they cannot be justified, while relativists insist that they can, but only relative to an epistemic system. Because of this difference, relativists can make only an attenuated use of sceptical arguments.

2.1 THE FIVE MODES OF PYRRHONIAN SCEPTICISM

The classic source of Pyrrhonian scepticism comes not from Pyrrho himself, nor from any of his disciples, but from Sextus Empiricus's *Outlines of Scepticism*. Among its most important and persuasive arguments are the five modes of scepticism, which Sextus summarizes as follows:

According to the mode deriving from dispute, we find that undecidable dissention about the matter proposed has come about both in ordinary life

and among philosophers. Because of this we are not able either to choose or to rule out anything, and we end up with suspension of judgement. In the mode deriving from infinite regress, we say that what is brought forward as a source of conviction for the matter proposed itself needs another such source, which itself needs another, and so *ad infinitum*, so that we have no point from which to begin to establish anything, and suspension of judgement follows. In the mode deriving from relativity, as we said above, the existing object appears to be such-and-such relative to the subject judging and to the things observed together with it, but we suspend judgement on what it is like in its nature. We have the mode from hypothesis when the Dogmatists, being thrown back *ad infinitum*, begin from something which they do not establish but claim to assume simply and without proof in virtue of a concession. The reciprocal mode occurs when what ought to be confirmatory of the object under investigation needs to be made convincing by the object under investigation; then, being unable to take either in order to establish the other, we suspend judgement about both. (*Outlines of Scepticism*, 41)

The modes from infinite regress, hypothesis, and the reciprocal mode, together, form the *Agrippan trilemma*, which has received the lion's share of attention from epistemologists concerned with scepticism and epistemic relativism. However, the modes from relativity and dispute are no less important, especially in light of the fact that they constitute the locus of disagreement between sceptics and relativists. Indeed, I will argue that, in a bizarre twist, epistemic relativists are less relativistic than their sceptical counterparts, and consequently, they use narrower versions of the Pyrrhonian modes to motivate a less ambitious thesis about justification. Before making this case, I will first examine the effect to which the sceptics put the five modes of Pyrrhonism, beginning with the Agrippan trilemma.

2.1.1 *The Agrippan Trilemma*

The Agrippan trilemma has two incarnations: the epistemic regress problem and the problem of the criterion. The epistemic regress problem is supposed to undermine the possibility of justifying *beliefs*; the problem of the criterion is supposed to undermine the possibility of justifying epistemic *methods*.

The mode from infinite regress (the epistemic regress problem) is outlined in the passage from Sextus. The argument begins with the

seemingly innocent supposition that a belief is justified when it is supported by a good reason. My belief that it will be sunny tomorrow would be unjustified if I had no reason, or only a poor reason, for thinking that this will be the case. Good reasons have two essential features: they must be truth-conducive, and they must themselves be justified beliefs. So, my belief that the weather forecast in the local newspaper is calling for sunny weather is a good reason to believe that it will be sunny tomorrow only if it provides rational support for the truth of my belief, and is, in turn, rationally supported by a good reason. The sceptic uses this seemingly innocent reasoning to draw a sobering conclusion: if every justifying reason must itself be justified, then the process of reason-giving must go on indefinitely. Without some “point from which to begin to establish anything”, every justification is necessarily *provisional*, having the form: *if* r_1 *is a good reason to believe* r_2 , *then reasons* r_2 – r_n *provide rational support for the truth of belief* b . The sceptic concludes that “suspension of judgement follows” because the consequent of a conditional cannot be affirmed until the antecedent is, and the infinite regress means there will *always* be an unaffirmed antecedent. A provisional justification is no justification at all.

Those who wish to avoid this conclusion have only two options: the mode from hypothesis and the reciprocal mode. The Dogmatists who subscribe to the first mode halt the regress at a hypothesis they have no good reason to believe. But in this case the hypothesis is an arbitrary assumption, and because arbitrary assumptions are not warranted, they cannot transmit warrant to those beliefs that are inferable from them. I cannot justify my belief that it will be sunny tomorrow by invoking my belief that the forecast is calling for sun, if I have no reason to believe that the latter belief is *true*, rather than merely assumed. The mode from hypothesis, then, is no better than the mode from infinite regress. The reciprocal mode avoids the infinite regress by invoking a target belief in its own justification. So, I believe that it will be sunny tomorrow because the forecast is calling for sun, and I believe that the forecast is calling for sun because it will be sunny tomorrow. This type of justification is neither provisional nor dogmatic: every reason is supported by another reason, yet there are a finite number of them. It is, however, logically circular. The problem with logically circular arguments is that they are incapable of distinguishing true from false beliefs since *any* belief can be supported by means of such an argument. One could just as easily believe that it will be rainy tomorrow because the forecast is calling for

rain, and believe that the forecast is calling for rain because it will rain tomorrow.

According to the epistemic regress problem, any attempt to justify one's beliefs with reasons must fall prey to *Agrippa's trilemma*: it must result in an infinite regress of reasons, a dogmatic assertion, or a circular argument. Since *none* of these eventualities yield justified beliefs, sceptics conclude that none of our beliefs can be justified, and in this situation the only rational course of action is to suspend judgement.

The problem of the criterion arrives at the same conclusion by slightly different means. The sceptic begins by claiming that beliefs are the outcomes of epistemic methods, or "standards", such as perception, memory, and inductive reasoning. The argument continues:

Now he will say of this standard either that it is true or that it is false. If false, he will be unconvincing. But if he says that it is true, then he will say that the standard is true either without proof or with proof. If without proof he will be unconvincing. But if with proof, he will certainly need the proof to be true – otherwise he will be unconvincing. Then when he says that the proof which he adopts to make the standard convincing is true, will he do so after judging it or without judging it? If he has not judged it he will be unconvincing. But if he has judged it, then clearly he will say that he has judged it by means of a standard – but we shall demand a proof of that standard, and then a standard for that proof. For a proof always requires a standard in order to be confirmed, and a standard always requires a proof in order to be shown to be true. A proof cannot be sound if there is no standard there already, nor can a standard be true if a proof has not already been made convincing. In this way standards and proofs fall into the reciprocal mode, by which both of them are found to be unconvincing: each waits to be made convincing by the other, and so each is as unconvincing as the other. (ibid., 30–31)

This is readily recognizable as another instance of the Agrippan trilemma. It hinges on the supposition that an epistemic method is trustworthy only if we have good reason to believe it is reliably truth-conducive, and a belief is justified when it is the outcome of a trustworthy method. So, if our belief in the trustworthiness of a method, *M*, is justified, then it must be the outcome of a demonstrably reliable method, *N*. If we are going to avoid blind dogmatism, then we must have some reason to trust the weather forecast in the local newspaper, and this reason must also be the outcome of an epistemic method.

If N is distinct from M , then we must have a good reason to believe that it too is trustworthy, and we are off once again on an infinite regress. If we have no reason to trust N , then its deliverances cannot be used to justify M . And if N and M are one and the same method, then our argument for the trustworthiness of M is circular. Once again, we are faced with Agrippa's trilemma: *any* attempt to justify an epistemic method will result in infinite regress, arbitrary stipulation, or circularity. Since *none* of these outcomes yield justification, none of our epistemic methods are trustworthy, and therefore, none of their results can be justified.

2.1.2 *The Modes from Relativity and Dispute*

The mode from relativity tells us that "Everything appears relative" (ibid., 35). This mode has its roots in the ten modes of Aenesidemus, which list all of the ways in which appearances are relative to different animals, persons, sense organs, etc. Since appearances influence beliefs, it follows that epistemic agents are bound to have differing and conflicting beliefs, giving rise to disputes on all questions concerning the world beyond appearances. And the mode from dispute tells us that there is no non-dogmatic way of addressing these disagreements:

When the self-satisfied Dogmatists say that they themselves should be preferred to other humans in judging things, we know that their claim is absurd. For they are themselves a part of the dispute, and if it is by preferring themselves that they judge what is apparent, then by entrusting the judging to themselves they are taking for granted the matter being investigated before beginning the judging. (ibid., 25)

Any claim that the world is one way rather than another will presuppose one of the views at stake in the dispute, and therefore, will assume what needs to be proven. Of course, every party to a dispute is free to indulge in such dogmatism, but this manoeuvre is dialectically illegitimate, leaving the dispute unresolved. Consequently, it makes more sense to suspend judgement on all disputes than to dogmatically take sides. The sceptic assures us that this is the only path to tranquility.

Markus Lammenranta (2008) claims that the mode from dispute is the sceptic's strongest argument; indeed, he despairs that "...there seems to be no satisfactory response to the dialectical version of the Pyrrhonian problematic" (30). I will argue that epistemic relativists do have a

satisfactory response to the dialectical version of the Pyrrhonian problematic, though they use a similar argument to motivate their own view of justification.¹

2.2 THE RELATIVIST'S RESPONSE

Sceptics and relativists seem to agree that knowledge requires reasoned agreement. Sceptics proceed to argue that there can be no knowledge whatsoever because no two people can reach the same conclusion about any matter of fact. Relativists, by contrast, think that we have knowledge of a good many things, and therefore, agreement can or has been reached on these things. There is plenty of empirical evidence suggesting that relativists are correct on this score; peoples' beliefs seem to agree much more often than they disagree. If I were to tell my neighbour that it will be sunny tomorrow, and invoke the newspaper's forecast as evidence, he would likely accept my claim. If he did not, calling into question my source of evidence, I could defend my use of the forecast by appealing to its track-record of success, or by pointing out that it agrees with a forecast from another source. Once again, I would probably succeed in convincing him. If this sort of dialectical process were not routinely successful, communication and common inquiry would be impossible.

Epistemic relativists, then, deny the sceptical claim that *everything* appears relative. They argue that there is widespread agreement in our beliefs because we subscribe to very similar processes of belief formation, evaluation, and revision. My neighbour and I can reach a reasoned agreement about tomorrow's weather because we both regard testimony and inductive reasoning as trustworthy sources of knowledge. The crucial corollary to this insight is that when disputants *disagree* because they endorse *different* epistemic practices, their disagreement will be *immune to rational resolution*. Suppose, for example, that I were to encounter someone who tells me that it will snow tomorrow. Surprised, I ask her why she believes this, and she tells me that she has been so informed by a weather controlling deity that speaks only to her. If I had nothing better

¹J. Adam Carter (2016, 76) points out that a similar dialogic argument has been understood as motivating epistemic relativism.

to do, I might inform this person that the newspaper's forecast conflicts with her own. To this, she replies that the forecast must be wrong. I counter that the newspaper's short-term forecast is rarely mistaken. My strange interlocutor answers that past success is no guide to future performance. At this point, it would seem that my spade is turned²; I have no further recourse. I walk away thinking I have met someone with very strange and ill-informed beliefs, and she does the same. Epistemic relativists insist that we are *both* right to do so. Given our respective epistemic commitments, neither of us has provided the other with any reason to change his/her mind or suspend judgement. What this shows, according to relativists, is that epistemic assessments are necessarily *local*. The mode from dispute establishes that knowledge is *relative*, not impossible. Indeed, as we shall see in the next section, it forms the jumping off point of the principal argument for epistemic relativism.

2.3 EPISTEMIC SYSTEMS, PLURALISM, AND INCOMMENSURABILITY

What is the authority of epistemic assessments relative *to*? The most straightforward answer is: *epistemic systems*. An epistemic system is generally characterized as a set of beliefs and methods that are *basic* in the sense that they cannot be rationally evaluated by means of any further beliefs or methods.³ My belief in the trustworthiness of inductive reasoning is basic, but my belief in the trustworthiness of the newspaper's forecast is not. This is because I can justify the latter by means of an inductive argument, but I cannot justify the former without an inductive argument. Everyone who subscribes to a particular epistemic system accepts its basic commitments without argument, and it is because they do so that they can achieve progress and consensus on those matters that are subject to argument. This is, I take it, the relativist's motivation for claiming that epistemic achievements are system-relative.

Relativists also claim that there are many *different* epistemic systems, a commitment known as *epistemic pluralism*. While inductive reasoning,

²See Wittgenstein (1963, §217): "If I have exhausted the justifications, I have reached bedrock and my spade is turned. Then I am inclined to say: "This is simply what I do.""

³See, for example, Boghossian (2006, 67), Lynch (2010, 263), and Seidel (2014, 165).

deductive reasoning, perception, and memory are all basic with respect to naturalistic systems, they are not necessarily basic in all epistemic systems; someone may regard them as non-basic, or possibly even illegitimate. My intransigent interlocutor would be one such person, for she rejects my inductive reasoning for the trustworthiness of the newspaper's forecast because she thinks that the past is a poor guide to the future. Furthermore, inquirers may treat some beliefs and methods as basic, while I regard them as non-basic or illegitimate. I deny that my interlocutor has a hotline to a weather controlling deity. Relativists will stress, however, that we needn't look to such fictional scenarios to find different epistemic systems at work. Some of the people in our midst accept Biblical scripture as a basic source of information, while others reject it entirely; this is a difference not only in our beliefs, but in our fundamental ways of evaluating beliefs.

From the system-bound nature of epistemic judgements and the doctrine of epistemic pluralism follows the possibility of *epistemic incommensurability*. Cases of epistemic incommensurability arise when inquirers endorse conflicting epistemic judgements *because* they subscribe to different epistemic systems. These disagreements do not admit of rational resolutions because there isn't the common epistemic ground required to facilitate a conclusion that is rationally acceptable to all parties.⁴ To illustrate the nature of these disagreements, let's consider three putative cases of epistemic incommensurability; all three are cases of real disagreements, though only the first two figure prominently in the literature on relativism.

(a) *The Western anthropologist and the foreign tribe*

Epistemic systems are, at least in part, products of culture. Consequently, we might expect that they differ from one place and/or time to another. Whether or not this is true is an empirical question that must be answered by anthropologists who study the epistemic practices of foreign cultures. One such well known anthropological study is Evans-Pritchard's *Witchcraft, Oracles and Magic Among the Azande*.

⁴The important role of epistemic incommensurability in the argument for epistemic relativism is discussed at length in Baghrarian (2004, Ch. 6), Hales (2006, Ch. 3), Pritchard (2011), and Carter (2016, Ch. 5).

Evans-Pritchard reports that the Azande believe in the existence of witchcraft and its pervasive influence on their daily affairs. Events that we would attribute to natural causes, such as a crop failure or the outbreak of disease, the Azande may attribute to the malevolent influence of witchcraft. When the Azande want to know whether or not a witch is responsible for the occurrence of a particular event, they consult a poison oracle. This process involves administering a dose of poison to a chicken and treating its subsequent behaviour as a sign that indicates the presence or absence of witchcraft.

Given our epistemic commitments, we are bound to see the poison oracle as nothing more than ceremonial superstition. We believe the Azande are wrong to consult poison oracles because we know that crop failures and diseases have naturalistic causes that must be revealed by empirical methods. Furthermore, we can think of no plausible account of any causal connection between these misfortunes and the behaviour of a poisoned chicken. For reasons such as these, Barry Barnes admits that he regards the poison oracle as being "...little different from the coin oracle we use to decide which team occupies which half in a football game; it imposes regularity on chance sequences" (Barnes 1974, 28). However, he doesn't see himself, or anyone else, as having any *objective* grounds for regarding it as an irrational epistemic practice:

In practice we see their oracle as inefficacious because of our *theory* of their oracle. To relate rationality to efficacy as we define it is an undercover way of giving special status to our own theories. When the trick is exposed we are left without arguments, for we cannot justify the special status of our theories by an argument which assumes it. (ibid., 29)

Relative to *our* epistemic system, there are good reasons to reject the existence of witchcraft and the practice of consulting poison oracles. The epistemic sleight of hand occurs when we think of these as reasons that *the Azande* should abandon oracular revelation as a means of detecting witchcraft, for they do not subscribe to our epistemic system. Perhaps relative to their epistemic system, our empirical evidence of the naturalistic causes of their misfortunes is undermined by the deliverances of a poison oracle, which takes precedence in such cases. In this situation, we find ourselves in a stalemate: our beliefs about the existence and effects of witchcraft must be evaluated relative to an epistemic system, and because we and the Azande subscribe to systems that yield conflicting

beliefs on this matter, we are incapable of reaching an agreement by rational means.⁵

(b) *The Biblical literalist and the naturalist*

We need not look outside our own culture for cases of epistemic incommensurability, however. Epistemic relativists may also draw attention to the West's long and ongoing history of intractable debates that pit literalist theologians against naturalistically inclined inquirers. One of the more famous of these debates took place four hundred years ago between Galileo and the Catholic Church. In 1610, Galileo published *Sidereal Messenger*, which detailed his telescopic observations of the earth-like surface of the moon, a vast array of newly visible stars, the phases of Venus, and the moons orbiting Jupiter. He used these observations to mount an impressive case against the prevailing geocentric cosmology. The book was interpreted by Galileo's enemies as an attack on Aristotelian orthodoxy and Biblical doctrine. In 1616, the matter was put before a congregation of Papal Qualifiers who deemed Galileo's Copernicanism "...foolish and absurd, philosophically and formally heretical, inasmuch as it expressly contradicts the doctrine of the Holy Scripture in many passages, both in their literal meaning and according to the general interpretation of the Fathers and Doctors" (quoted in De Santillana 1955, 121). Biblical scripture contains several passages that would be difficult to interpret as espousing anything other than geocentrism:

...tremble before him, all earth; yea, the world stands firm, never to be moved (1 Chronicles 16:30)

The Lord reigns; he is robbed in majesty; the lord is robbed, he is girded with strength. Yea, the world is established; it shall never be moved. (Psalms 93:1)

Say among the nations, "The Lord reigns! Yea, the world is established, it shall never be moved; he will judge the peoples with equity. (Psalms 96:10)

⁵This case, and its role in the principal argument for epistemic relativism, is discussed in Boghossian (2006, Ch. 5), Sankey (2010), Seidel (2014, Ch. 3), and Carter (2016, Ch. 5).

Given the Qualifiers' verdict, Cardinal Robert Bellarmine had little choice but to order Galileo to cease teaching and promoting Copernicanism.⁶

The disagreement between Galileo and the Qualifiers concerns not only the dynamics of the solar system, but the *methods* that are appropriate for resolving this controversy. Galileo is himself a professed Christian, but he favours empirical evidence over accepted interpretations of Biblical doctrine when it comes to questions about the natural world. On the other hand, the Qualifiers must rely on their senses to negotiate their way around the world, but they regard revealed scripture as being an infallible source of information that always trumps empirical evidence. In other words, empirical methods—perception, memory, inductive inference, and so on—are *basic* for Galileo, but not for the Qualifiers, while Biblical revelation is *basic* for the Qualifiers, but not for Galileo. Consequently, there is no more fundamental ground on which they can hope to rationally resolve their disagreement about the motion of the earth. Their disagreement is one that pits not only one epistemic judgement against another, but one epistemic system against another, and thus, would seem to constitute a case of epistemic incommensurability.⁷

A similar disagreement now exists between naturalists and young earth creationists. The latter use a Biblical chronology to date the earth at just over six thousand years old. The former have used the results of radiometric dating of terrestrial, lunar, and meteorite samples to come up with the figure of 4.5 billion years. Naturalists reject the Biblical timeline because it conflicts with clear and compelling empirical evidence. Young earth creationists insist that this evidence cannot be definitive

⁶Several authors have pointed out that Bellarmine is unfairly characterized by the likes of Rorty (1979), and Boghossian (2006) as being rigidly dogmatic in his dealings with Galileo (Williams 2007, n. 12; Seidel 2014, 173–177). Bellarmine, unlike the Papal Qualifiers, did not insist that Galileo *must* be mistaken because his cosmological views conflict with the accepted interpretation of Biblical passages. Instead, he finds that Galileo's evidence is too weak to warrant an alternative interpretation of the relevant passages, but that if such empirical evidence can be found, an alternative interpretation will have to be provided. For this reason, I will focus on the Papal Qualifiers, rather than Bellarmine.

⁷This case, and its role in the principal argument for epistemic relativism, is discussed in Rorty (1979, 328–330), Boghossian (2006, Ch. 5), Siegel (2011), Seidel (2014, Ch. 3), and Carter (2016, Ch. 4). Hales (2006, Ch. 2) argues that cases of epistemic incommensurability proliferate in philosophy as well because Christian revelation yields beliefs that are inconsistent with those that result from appeals to a priori intuitions.

because it conflicts with the infallible word of God. Once again, we have a recalcitrant debate without a common epistemic system in which it can be mediated, and consequently, we have a case of epistemic incommensurability.⁸

(c) *The rationalist and the empiricist*

It may come as no surprise that naturalists and Biblical literalists cannot reach any sort of reasoned agreement on questions concerning the age and motion of the earth, given that they belong to very different epistemic communities. But we also find cases of incommensurability arising *within* epistemic communities, and within the discipline of philosophy specifically. Oddly enough, these examples are often ignored in the literature on epistemic relativism.

Some of the prime examples come from the many celebrated debates between rationalists and empiricists of the Early Modern era. Consider, for example, their debate concerning the existence of God. Descartes's arguments for the existence of God begin with "...the idea that gives me my understanding of a supreme God, eternal, infinite, <immutable, >omniscient, omnipotent and the creator of all things that exist apart from him..." (Descartes 1641 [1984], 28). From this idea alone, he is able to derive the existence of God, which then serves as the foundation of his metaphysical knowledge.

In his Objection VII to the *Meditations*, Hobbes responds:

It seems, then, that there is no idea of God in us. A man born blind, who has often approached fire and felt hot, recognizes that there is something which makes him hot; and when he hears that this is called 'fire' he concludes that fire exists. But he does not know what shape or colour fire has, and has absolutely no idea or image of fire that comes before his mind. The same applies to a man who recognizes that there must be some cause of his images or ideas, and that this cause must have a prior cause, and so on; he is finally led to the supposition of some eternal cause which never began to exist and hence cannot have a cause prior to itself, and he concludes that something eternal must necessarily exist. But he has no idea which he can say is the idea of that eternal being; he merely gives the name

⁸For opposing views on this case, see Lynch (2010) and Pritchard (2011).

or label ‘God’ to the thing that he believes in, or acknowledges to exist. (ibid., 127)

For an empiricist like Hobbes, metaphysical entities must be either directly observable or inferable from what is observed. We have ideas of the former, but not of the latter. God, being unobservable, must be posited to explain the genesis of the causal chain of natural events, without being grasped by the mind in an idea. Locke provides a similar cosmological argument for the existence of God, based on our observations of the series of natural events (Locke 1690 [1997], Bk. IV, Ch. 10). For the more radically empiricist Hume, even this position amounts to little more than rationalist superstition. God’s unobservability prevents Him from figuring in a causal account of natural events because causation consists in nothing more than the constant conjunction of objects presented *in experience*. Those things that are never presented in experience—God, soul, substance—cannot be said to cause anything, and any talk of them must be committed to the flames.

Descartes replies to Hobbes:

Here my critic wants the term ‘idea’ to be taken to refer simply to the images of material things which are depicted in the corporeal imagination; and if this is granted, it is easy for him to prove that there can be no proper idea of an angel or of God. But I make it quite clear in several places throughout the book, and in this passage in particular, that I am taking the word ‘idea’ to refer to whatever is immediately perceived by the mind. ... I used the word ‘idea’ because it was the standard philosophical term used to refer to the forms of perception belonging to the divine mind, even though we recognize that God does not possess any corporeal imagination. And besides, there was not any more appropriate term at my disposal. I think I did give a full enough explanation of the idea of God to satisfy those who are prepared to attend to my meaning; I cannot possibly satisfy those who prefer to attribute a different sense to my words than the one I intend. (Descartes 1641 [1984], 127–128)

Here Descartes distinguishes between *mental* representations—whatever is immediately perceived by the mind—and *sensory* representations—images of material things conjured by the corporeal imagination. He uses the word ‘idea’ to pick out the former, though Hobbes understands him as meaning the latter. Descartes then argues that God can be represented in an idea, without being presented to our senses. This dialectic

plays itself out several times in the Objections and Replies, as Hobbes argues that Descartes lacks an idea of soul (Objection VI) and substance (Objection IX), to which Descartes responds that Hobbes has again confounded ideas and sensory impressions.

Descartes's distinction between mental and sensory representations is one that empiricists are committed to denying. Hume famously insists that one cannot have an idea without a corresponding sensory impression (Hume 1748 [1977], §II). This difference leads Descartes and Hume to radically divergent metaphysical views, and can be traced back to a difference in their basic epistemic methods. For Hume, experience is *the* basic source of knowledge about the world; nothing factual can be known without being based, directly or indirectly, on the contents of experience. For Descartes, rational intuition and a priori reasoning are the *only* reliable sources of information about the world; they alone provide us with clear and distinct ideas, as opposed to the confused and obscure ideas of sensation. This being the case, it is understandable that the rationalist-empiricist divide remained throughout the Early Modern period.

These three disagreements do not seem to admit of rational resolutions because they do not take place within a *single* epistemic system. Instead, the disputants subscribe to different systems of basic principles and methods, which lead them to conflicting conclusions. Any evidence that is offered to resolve the conflict will be judged differently by the two parties.

Nevertheless, we might think that such disagreements can be resolved indirectly, by evaluating the epistemic systems in which the conflicting judgements are justified. If the naturalist can meet the justification requirement by showing that her epistemic system is more truth-conducive than the system of the Biblical literalist, then the literalist ought to be convinced that the naturalist has better reasons in favour of her beliefs about the history and motion of the earth. To block this possibility, epistemic relativists use a narrow version of the Agrippan trilemma.

2.4 THE NARROW AGRIPPAN TRILEMMA

The Agrippan trilemma is meant to show that any attempt to justify a belief or method is bound to result in regress, dogmatism, or circularity, and is therefore doomed to fail. By contrast, relativists insist that justification is possible, though its efficacy is limited to the system of principles and methods in which it takes place. When persons who subscribe

to distinct systems legitimately arrive at conflicting conclusions about the truth of a belief or the reliability of a method, all of their conclusions are justified, though none of them possess any authority over the others. This is because no *epistemic system* can be justified in a way that avoids the trilemma.

Epistemic systems, you will recall, consist of basic beliefs and methods. Thus, the epistemic relativist is saying that no basic belief or method can be justified without regress, dogmatism, or circularity. Indeed, we can identify precisely the horn on which such a justification must land. Presumably, basic beliefs and methods cannot be justified by fiat, but they also cannot be justified by means of further beliefs and methods, given that they are *basic*. The only remaining option is to justify basic beliefs and methods by means of those same beliefs/methods, which makes the justification circular. This point has been made repeatedly and forcefully by relativists, among them Barnes and Bloor:

In the last analysis, [the relativist] acknowledges that his justifications will stop at some principle or alleged matter of fact that only has local credibility. The only alternative is that justifications will begin to run in a circle and assume what they were meant to justify. (Barnes and Bloor 1982, 27)⁹

In the relativist's hands, the Agrippan trilemma is transformed into a simpler *reductio* argument. If one wishes to justify an epistemic system, she must do so within an epistemic system, and it stands to reason that she should do so within the very system she is defending; but

⁹See also Barnes (1974, 29), quoted above, as well as Bloor (1997, 500, 2007, 261). This argument can also be found in Hacking (1982, 56). Rorty, on the other hand, uses the dogmatist horn of the Agrippan trilemma to argue for epistemic relativism:

...objectivity should be seen as conformity to the norms of justification (for assertions and for actions) we find about us. Such conformity becomes dubious and self-deceptive only when seen as something more than this – namely, as a way of obtaining access to something which “grounds” current practices of justification in something else. Such a “ground” is thought to need no justification, because it has become so clearly and distinctly perceived as to count as a “philosophical foundation.” This is self-deceptive not simply because of the general absurdity of ultimate justification's reposing upon the unjustifiable, but because of the more concrete absurdity of thinking that the vocabulary used by present science, morality, or whatever has some privileged attachment to reality which makes it *more* than just a further set of descriptions. (Rorty 1979, 361)

this renders any such justification circular.¹⁰ Relativists insist that circular arguments cannot meet the justification requirement: the naturalist can no more establish the superior truth-conduciveness of her epistemic system by naturalistic means than the Biblical literalist can establish the truth-conduciveness of hers by appealing to Holy Scripture.

If there is no principled way of evaluating alternative epistemic systems, then there is no way to rationally resolve cases of epistemic incommensurability. So, relativists conclude, no belief or method can receive anything more than a *relative* justification i.e., a justification that lends it credibility only within the epistemic system in which it is evaluated.

2.5 CONCLUSION: THE PRINCIPAL ARGUMENT FOR EPISTEMIC RELATIVISM

By way of a conclusion, I will summarize the argument for epistemic relativism in its entirety:

(R1) The *system-bound* nature of epistemic judgements: reasoned epistemic judgements are made possible by systems of basic beliefs and methods.

(R2) *Epistemic pluralism*: there are many alternative epistemic systems.

(R3) *Epistemic incommensurability*: given (R1) and (R2), two or more inquirers may differ with respect to an epistemic judgement because they subscribe to distinct epistemic systems.

(R4) The *narrow Agrippan trilemma*: no system of basic beliefs and methods can be justified without dogmatic assertion, infinite regress, or, more likely, circularity.

(R5) The *narrow Agrippan conclusion*: since beliefs and methods cannot be justified by means of dogmatic assertion, infinite regress, or circular argument, basic beliefs and methods cannot be justified.

(R6) *Epistemic equality*: given (R5), there can be no objective grounds for preferring any epistemic system over its alternatives – i.e., the justification requirement cannot be met – and therefore there can be no principled way to resolve cases of epistemic incommensurability.

¹⁰If, on the other hand, she wishes to provide a justification within *another* epistemic system, then it is *this* epistemic system that she should be defending.

(R7) *Epistemic relativism*: the justification of a belief or method can lend it rational credibility only within the epistemic system within which it is being evaluated.¹¹

This argument, and variations thereof, is generally considered to be “the fundamental argument for epistemic relativism” (Williams 2007, 94).¹² It is the argument that relativists seem to rely on most heavily, and it is the argument that non-relativists respond to most often.¹³ This is the case, I believe, not only because it is one of the more compelling arguments for epistemic relativism, but because it appears within two of the most influential and naturalistically inclined philosophical movements of the twentieth century: logical positivism and pragmatism.

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¹¹The relativist thesis can be understood in one of two ways. According to the first version, justification is system-relative because there are *no absolute epistemic facts*, on the second, it is because we do not have *access* to absolute epistemic facts (Seidel 2013, 146). Since a refutation of (R7) would be a refutation of *both* positions, I will not distinguish between them hereafter.

¹²See also Sankey (2012, 186).

¹³See, for example, Luper (2004), Hales (2006, 119–120), Boghossian (2006, Ch. 5), Sankey (2010, 2011, 2012), Seidel (2014, Ch. 3), and Kusch (2016). Sankey (2011) also finds the Agrippan argument for epistemic relativism discussed in Bartley (1984), Worrall (1989), Popper (1994), and Motterlini (1999).

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Epistemic Relativism in the Analytic Tradition

Kant's transcendental philosophy provided a clear and compelling rationale for the absolutist and naturalist presumptions. However, his view that the exact sciences issue synthetic a priori principles whose truth is guaranteed by the necessary structures of cognition was rendered untenable by revolutionary developments within the exact sciences. One of the principal tasks of analytic philosophy in the twentieth century was to produce an epistemology capable of accommodating these developments. Two of the main candidates for this epistemology—Carnap's logical positivism and Kuhn's pragmatism—are widely understood as relinquishing the absolutist and naturalist presumptions in response to the argument outlined in Chapter 2. This chapter is dedicated to presenting, without endorsing, these relativist readings of Carnap and Kuhn, in an effort to reveal just how insidious a threat epistemic relativism has been within the analytic tradition.

In the first half of the twentieth century, the Logical Positivists espoused a conventionalist epistemology that understood fundamental theoretical principles as constitutive of the linguistic frameworks in which empirical inquiry takes place. The most influential version of this view belonged to Rudolf Carnap, whose principle of tolerance, on one prominent reading, is a straightforward espousal of epistemic relativism. Since all inquiry necessarily takes place within a linguistic framework, and there are many alternative frameworks, Carnap is understood as insisting that there can be no non-circular grounds for preferring one framework over

another, which is why he recommends a tolerant attitude towards foreign linguistic forms.

In the latter half of the twentieth century, the Positivists' formal treatment of scientific knowledge gave way to a pragmatic naturalism that emphasizes the psychological and contextual aspects of scientific rationality. This shift was in no small part the result of Thomas Kuhn's *The Structure of Scientific Revolutions* (1962). Kuhn argues that cumulative scientific progress necessarily takes place within theoretical paradigms composed of principles, methods, and values that secure consensus on the problems and solutions within various disciplines. A scientific discipline undergoes a revolution when the prevailing paradigm loses its grip on practicing scientists, who transfer their allegiance to a new paradigm because of its ability to resolve the anomalies that led to their crisis of confidence. These episodes, Kuhn emphasizes, do not constitute straightforward epistemic progress because they call into question the very standards that are used to rationally assess theoretical claims. Furthermore, no argument can rationally compel a scientist to adopt a new paradigm since the argument will be presented within the very paradigm in question; scientific revolutions, like political revolutions, must be carried out by means of arational persuasion. When a revolution is successful in achieving consensus on a new theoretical paradigm, rational progress can once again be made by solving the problems that arise in applying the paradigm. This account of scientific rationality has struck more than a few readers as embodying a radical form of epistemic relativism.

Kant, Carnap, and Kuhn agree on the system-bound nature of epistemic judgements; they share the conviction that rational inquiry must take place within a system of basic beliefs and methods. Kant's view that there is only *one* such system, whose immutable principles and methods issue from the exact sciences, secures his absolutism and naturalism. It is also this aspect of his position that is undermined by revolutionary developments within the exact sciences. In light of these developments, Carnap and Kuhn claim that there are many possible systems, forcing them to distinguish between disagreements that take place *within* a system and disagreements *about* the legitimacy of alternative systems. The former can be rationally adjudicated by appeals to commonly held principles and methods, while the latter can proceed only by means of pragmatic arguments that may fail to produce consensus. Their drawing this distinction arguably commits them to an epistemic relativism that

undermines the absolutist and naturalist presumptions—an epistemic relativism they are reluctantly pushed towards by means of the argument outlined in the previous chapter. Before examining the case for these conclusions, I will first outline Kant’s absolutist position.

3.1 KANTIAN ABSOLUTISM

In Kant’s theory of knowledge, the threats of scepticism and relativism become starkly uncoupled. On the one hand, Kant is a sceptic who believes that we cannot know things-in-themselves, yet on the other, he is an absolutist who forcefully defends the naturalist presumption. Both of these commitments follow straightforwardly from his so-called Copernican Turn in epistemology, which eschews the supposition that cognitive representations must mirror the structure of the external world. In its place, Kant suggests that we think of the external world as having to conform to the necessary structures of cognitive representations, if it is going to be represented in the mind at all:

Hitherto it has been assumed that all our knowledge must conform to objects. But all attempts to extend our knowledge of objects by establishing something in regard to them a priori, by means of concepts, have, on this assumption, ended in failure. We must therefore make trial whether we may not have more success in the tasks of metaphysics, if we suppose that objects must conform to our knowledge. (Bxvi)

Kant’s second big departure from Early Modern philosophical tradition is his conviction that *both* sensibility *and* the understanding play an indispensable role in cognition; he argues that both faculties constrain the possible structures of representations. Sensibility contributes to cognition the two *pure forms of intuition*: space and time. However, our capacity to represent objects of experience requires something more than the spatio-temporal manifold of sensible intuition; it also requires that objects be *conceptualized* by the understanding. While most concepts arise from experience, Kant argues that there are a priori concepts that are required for any experience of objects whatsoever, such as the concepts of *unity*, *plurality*, and *totality*. These are the pure categories of the understanding.

The world that we experience is intelligible to us only insofar as it conforms to the pure forms of sensible intuition and the categories of the

understanding. Kant calls this the *phenomenal world*. What philosophers have long wondered is: how well does the world of experience match the world of things-in-themselves, or what Kant calls the *noumenal world*? This is a question on which Kant insists we must suspend judgement: "...knowledge has to do only with appearances, and must leave the thing in itself as indeed real per se, but as not known by us" (Bxx). Since we can form no representation that is not subject to the pure forms of intuition and the categories, we cannot so much as represent the noumenal world; it is not only unknowable by us, but *unintelligible* to us. Kant thus espouses a very strong form of scepticism.

However, because Kant believes that the pure forms of sensible intuition and the categories of the understanding are common to *all* human minds, he is able to avoid epistemic pluralism, and therefore epistemic relativism. If human beings must subscribe to one and the same epistemic system, then there cannot be legitimate cases of epistemic incommensurability; all epistemic disagreements must admit of rational resolutions by means of commonly held principles and methods. Moreover, because this shared epistemic system consists of principles and methods *belonging to the natural sciences*, Kant sees himself as giving grounds not only to *prefer* naturalistic epistemic practices, but to think that there are *no other* fundamental epistemic practices.

In keeping with his Copernican Turn, Kant does not think of the principles of the exact sciences as expressing analytic truths without content or a posteriori truths whose content can be empirically confirmed, but as synthetic a priori truths concerning the necessary structures of our representations. The principles of Euclidean geometry are known by means of constructions that are necessarily constrained by the form of outer intuition. The truths of arithmetic are known through the construction of numbers by means of the iterative procedure of successive progression—successively adding one to a number to yield its successor—which is made possible by the pure intuition of time. The laws of physics, in particular the conservation of mass and Newton's laws of motion, instantiate the categories of *substantiality*, and *causality* and *community* (respectively), and in so doing, define a spatio-temporal framework in which the concepts of *true motion* and *time* become objectively applicable to experience.¹ Thus, the principles of the exact sciences

¹The details of Kant's understanding of Newtonian physics are lucidly presented in Friedman (1992, Ch. 3).

have a *transcendental justification* that others lack: they express constitutive conditions on the concept of the objects of possible experience. For this reason, they must not only be accepted, but regarded as *basic* by anyone who is capable of representing the world at all.

3.2 LOGICAL POSITIVISM

Kant's transcendental epistemology was definitively undermined not by philosophical arguments, but by scientific discoveries. The formalization of mathematics, and the prospect of reducing arithmetic to logic, seemed to banish a priori intuition from mathematical knowledge. The discovery that non-Euclidean geometries are mathematically possible, and that the spaces they describe are conceivable, revealed that geometry does not describe the necessary form of outer intuition. And the triumph of the theories of relativity made it clear that the spatio-temporal framework of Newtonian physics fails to capture the structure of the phenomenal world. All of this meant that Kant's transcendental justification of the principles of the exact sciences was untenable: they could no longer be regarded as expressing necessary conditions of the possibility of experience. And with his transcendental idealism went his naturalistic absolutism.

In the face of these developments, the Logical Positivists introduced a new and influential 'scientific world conception'. They shared Kant's naturalistic orientation, but unequivocally rejected his doctrine of synthetic a priori knowledge; from their perspective, Kant was one more in a long line of rationalist philosophers who mistakenly thought that there are necessary features of reality that are discoverable by means of a priori reflection. They replaced this view with a rigorous brand of empiricism, according to which every factual statement must be empirically verifiable.

The Positivists recognized the existence of a priori knowledge, but they insisted that it concerns neither the world, nor the conditions of the possibility of experiencing the world, but the language(s) in which we communicate about the world. In their view, all a priori truths are *conventions* of one of two kinds: analytic conventions or theoretical conventions. Logico-mathematical truths are *analytic conventions*. The basic principles of logic and arithmetic define primitive logico-mathematical expressions, such as 'or', 'not', and 'successor'; non-basic principles are consequences of these definitions. The basic principles of geometry and physics express *theoretical conventions* because they empirically define

fundamental theoretical expressions, such as ‘straight line’, ‘distance’, and ‘simultaneity’. Both types of conventions make empirical knowledge possible. Analytic conventions provide the inferential frameworks that license predictions and explanations, and theoretical conventions bestow empirical content on theoretical statements. Yet neither type of convention admits of a transcendental justification because they do not *uniquely* make empirical knowledge possible: one can do physics within a Newtonian or an Einsteinian spatio-temporal framework; scientists can use classical or intuitionistic forms of reasoning to generate their predictions and explanations. The decision to adopt one set of conventions over another is constrained only by *practical* considerations:

The construction of the physical system is not effected in accordance with fixed rules, but by means of conventions. These conventions, namely, the rules of formation, the L-rules, and the P-rules (hypotheses), are, however, not arbitrary. The choice of them is influenced, in the first place, by certain practical methodological considerations (for instance, whether they make for simplicity, expedience, and fruitfulness in certain tasks). (Carnap 1937, 320)

But, of course, the force of practical reasons depends on the ends that one has in mind. If one favours power and efficiency over safety from contradiction, then one has good reason to adopt a system of classical logic; if one favours the latter over the former, then one has good reason to adopt a non-classical system (Carnap 1939, 50–51). Thus, the Positivists’ doctrine of conventionalism results in a relativistic view of non-empirical knowledge. There are no objectively better or worse conventions; there are only conventions that do a better or worse job of facilitating our subjective goals.

It is important to emphasize, however, that this relativism is significantly tempered by the Positivists’ naturalistic commitment to empiricism; choices among analytic and theoretical conventions must ultimately be made with an eye towards what is most conducive to successful empirical science:

...the logical clarification of scientific concepts, statements and methods liberates one from inhibiting prejudices. Logical and epistemological analysis does not wish to set barriers to scientific enquiry; on the contrary, analysis provides science with as complete a range of formal possibilities as

is possible, from which to select what best fits each empirical finding (for example: non-Euclidean geometry and the theory of relativity). (Neurath et al. 1929, 316)

In short, the Positivists are absolutists about empirical knowledge, and therefore they can be understood as subscribing to the naturalistic presumption, but they are relativists about non-empirical knowledge.

Carnap claims that philosophy too, when properly understood, concerns non-empirical conventions, or what he calls *the logic of science*. He thinks, for example, that the realism-idealism debate has long resisted a principled resolution because its participants fail to recognize that they disagree not about any factual claim, but about the language in which factual claims should be expressed. The guiding methodological maxim of the logic of science is Carnap's *principle of tolerance*:

It is not our business to set up prohibitions, but to arrive at conventions...

In logic, there are no morals. Everyone is at liberty to build up his own logic, i.e. his own form of language, as he wishes. All that is required of him is that, if he wishes to discuss it, he must state his methods clearly, and give syntactical rules rather than philosophical arguments. (Carnap 1937, 51–52)

Instead of arguing about the ultimate nature of reality, realists and idealists should clarify the rules of their languages—the physicalist and sense-data languages, respectively—and highlight their pragmatic virtues.

On a traditional reading, Carnap's tolerant approach to logic, mathematics, and philosophy follows from the Positivist tenets of empiricism and conventionalism: since non-empirical principles concern the *language* of science rather than its *factual* subject-matter, they cannot be correct or incorrect, but only more or less convenient for the purposes of expressing factual knowledge.

On an increasingly popular *deflationary* reading of tolerance, however, Carnap undergoes a revolutionary change of philosophical perspectives shortly before writing *The Logical Syntax of Language* (1934). The advocates of this interpretation—principally Warren Goldfarb and Thomas Ricketts—insist that Carnap was neither an empiricist nor a conventionalist. Instead, they see him as putting forward a variant of the principal argument for epistemic relativism which extends his relativism from the fundamental principles of logic, mathematics, and

philosophy to *all* knowledge.² If this is Carnap's view, then it marks a significant departure from the naturalism of Kant and the Logical Positivists. Indeed, if the deflationary reading is correct, then the most influential member of the most naturalistically inclined philosophical school of the first half of the twentieth century attempts to undermine the possibility of justifying the absolutist and naturalist presumptions.

3.3 THE DEFLATIONARY READING OF TOLERANCE

A threatening tension seems to lurk within the traditional understanding of Carnap's tolerance. On the one hand, he insists that philosophy has been *misguided* insofar as it has focused on pseudo-factual arguments rather than linguistic conventions. On the other hand, he appears to *argue* for this position on the basis of what he regards as substantial philosophical commitments, i.e. empiricism and conventionalism. Since these commitments are themselves non-empirical, Carnap seems to be guilty of making precisely the mistake that he accuses other philosophers of making.³

Goldfarb and Ricketts claim that this isn't a problem for Carnap because "...Carnap's position in *LSL* is *deflationary*. It is not based on any substantial commitments of its own" (Goldfarb 1997, 61). Indeed, they think that the traditional view gets things backwards: Carnap's conventionalism and empiricism are *subject to*, rather than the motivation for the principle of tolerance. This much is suggested by Carnap's own characterization of the principle of empiricism as a *linguistic proposal* rather than a substantial epistemological doctrine:

It seems to me that it is preferable to formulate the principle of empiricism not in the form of an assertion – "all knowledge is empirical" or "all synthetic sentences that we can know are based on (or connected with) experiences" or the like – but rather in the form of a proposal or requirement. As empiricists, we require the language of science to be restricted in a certain way; we require that descriptive predicates and hence synthetic sentences are not to be admitted unless they have some connection with possible observations, a connection which has to be characterized in a suitable way. By such a formulation, it seems to me, greater clarity will be

²Goldfarb and Ricketts do not label Carnap a relativist, and they may resist the label. As I will argue in the next section, however, the deflationary argument for the principle of tolerance is indistinguishable from the principal argument for epistemic relativism.

³For a classic articulation of this problem, see Putnam (1983).

gained both for carrying on discussion between empiricists and anti-empiricists as well as for the reflections of empiricists. (Carnap 1936 [1953], 84–85)⁴

Here Carnap suggests that the principle of empiricism should not be expressed as a substantial thesis, for it does not express an epistemological fact. Rather, it should be expressed as a proposal to adopt a language of science in which theoretical terms and statements are appropriately connected to observational terms and statements. Presumably, Carnap regards rationalists as having a similar obligation to put forward a candidate language of science that represents their philosophical views. A decision can then be made to adopt one or the other language on the basis of its pragmatic benefits to scientific inquiry. In this way, Carnap thinks that empiricists and rationalists can avoid talking past one another and engage in a clearer and more fruitful discussion.

To read Carnap in the traditional way, argue Goldfarb and Ricketts, is to impute to him *absolute* conceptions of the factual and the conventional. If empiricism and conventionalism are absolutely true, then the fact-convention and analytic–synthetic distinctions are independent of the language in which they are expressed. Yet, Carnap explicitly claims that whether a statement expresses a fact or a convention depends on the language to which it belongs; more specifically, it depends on the language’s transformation rules and consequence relation.⁵ Since the principle of tolerance tells us that we can adopt *any* language that suits our purposes, we are free to draw the fact-convention distinction in any number of different ways, including ways that conflict with the Positivist doctrine of conventionalism. To effectively defend one particular way of drawing the distinction, and therefore one particular language, one must

⁴See also Carnap (1963b, 917):

Thus I would interpret, e.g., the principle of verifiability (or of confirmability), or the empiricist principle that there is no synthetic a priori, as consisting of proposals for certain explications (often not stated explicitly) and of certain assertions which, on the basis of these explications, are analytic.

⁵See, for example, Carnap (1937, 44):

Dubislav has pointed out that the concept [of analyticity] is a relative one; it must always be referred to a particular system of assumptions and methods of reasoning (primitive sentences and rules of inference), that is to say, in our terminology, to a particular language.

cite its pragmatic benefits rather than argue, inevitably vaguely, that it accurately captures the sources of human knowledge.

This deflationary reading eases the tension in Carnap's position: if his empiricism and conventionalism are linguistic proposals, then Carnap is offering linguistic rules rather than philosophical arguments, as the principle of tolerance recommends. A new question emerges, however: if empiricism and conventionalism are not Carnap's motivation for his tolerant approach to philosophical problems, then what is? Why should we replace philosophical arguments with linguistic rules? The answer, according to Goldfarb and Ricketts, has to do with the doctrine of *logocentrism* that Carnap inherits from Frege. According to this doctrine, "...any enquiry must draw on, and so presuppose, logic. There is then no perspective from which to theorize *about* logic. The fundamental principles of logic can only be displayed: they admit no extralogical justification" (Ricketts 1994, 182). To rationally theorize about anything is to reason in conformity with the laws of logic. Therefore, logic itself cannot be the subject of rational theorizing because any such theorizing would necessarily presuppose the laws of logic. This is a kind of Kantian position according to which formal logic, rather than the pure forms of intuition and the categories of the understanding, is essential to human cognition. The principles of logic, on this view, have a *transcendental* justification: they must be accepted by anyone capable of rational inquiry.

The key difference between Frege and Carnap is that Frege is a universalist who thinks that there is only one set of logical principles implicit in rational thought, while Carnap is a pluralist who recognizes the possibility of many different linguistic frameworks. Carnap believes that all rational inquiry must take place within a linguistic framework, but not in any particular framework. He accordingly distinguishes between two kinds of inquiries: inquiries *within* a single framework, and inquiries *about* one or more framework(s). The former are concerned with what he calls *internal* questions and the latter with *external* questions.⁶ Internal questions, such as whether or not there are prime numbers larger than 100, can be definitively answered by appealing to the rules of any linguistic framework that includes mathematics. External questions, such as whether or not numbers are objects, cannot be answered in the same way because they concern linguistic rules that belong to some frameworks but

⁶Carnap first draws this distinction in Carnap (1950).

not others—some frameworks permit quantification over the numbers, while others don't. Those who subscribe to frameworks that are different in this respect cannot offer epistemic reasons for their positions because such reasons can only be recognized *within* a linguistic framework. This, for Goldfarb and Ricketts, is the thrust of the principle of tolerance:

A linguistic framework is given by the rules for formation of sentences together with the specification of the logical relations of consequence and contradiction among sentences. The fixing of these logical relations is a precondition for rational inquiry and discourse. There are many alternative frameworks, many different logics of inference and inquiry. Since justification can proceed only grounded in the logical relations of a particular framework, justification is an intraframework notion. Thus there can be no question of justifying one framework over another. Carnap voices this pluralistic standpoint in his *Principle of Tolerance*.... (Goldfarb 1996, 225)

On the deflationary reading, the principle of tolerance follows straightforwardly from Carnap's logical pluralism and logocentrism. According to logical pluralism, there are many possible linguistic frameworks in which rational inquiry can take place, and according to logocentrism, none of these frameworks admit of a non-circular justification. Consequently, external questions must be settled on pragmatic rather than theoretical grounds. Since all legitimate philosophical questions are external questions—including questions about the sources of factual and mathematical knowledge—all philosophical disputes are subject to the principle of tolerance. As such, philosophers should attempt to clarify their linguistic frameworks rather than offer arguments that must be evaluated within their linguistic frameworks.

On this deflationary reading, Carnap's argument for tolerance is a thinly veiled version of the argument for epistemic relativism. It can be reformulated as follows to highlight the similarity:

(RC1) *Logocentrism*: justification necessarily takes place within a linguistic framework.

(RC2) *Logical pluralism*: there are many alternative linguistic frameworks.

(RC3) *Linguistic incommensurability*: given (RC1) and (RC2), two or more inquirers may differ with respect to an epistemic judgement because they subscribe to distinct linguistic frameworks.

(RC4) The *narrow Agrippan premise*: the justification of a linguistic framework would have to presuppose a set of logical principles; presumably these would be principles that belong to the framework in question.

(RC5) The *narrow Agrippan conclusion*: since the justifications of linguistic frameworks have to take place within the frameworks in question, linguistic frameworks cannot be theoretically justified.

(RC6) *Framework equality*: given (RC5), there can be no objective grounds for preferring any linguistic framework over its alternatives, and therefore, there is no principled theoretical way to resolve cases of linguistic incommensurability.

(RC7) *Epistemic relativism*: the justification of a belief can lend it credibility only within the linguistic framework in which it is being evaluated.⁷

What is exceedingly odd about this result is that Carnap is ostensibly *not* an epistemic relativist; he clearly subscribes to the naturalist presumption. Carnap himself reports that from an early age he believed that "... the scientific method was the only method of obtaining well-founded, systematically coherent knowledge..." (Carnap 1963a, 7). It is this conviction that fuels his project of replacing traditional philosophy with a properly *scientific* discipline, i.e. the logic of science:

Perhaps we may say that the researches of non-metaphysical philosophy, and especially those of the logic of science of the last decades, have all, at bottom, been syntactical researches, although unconsciously. This essential character of such investigations must now also be recognized in theory and systematically observed in practice. Only then will it be possible to replace traditional philosophy by a strict scientific discipline, namely, that of the logic of science as the syntax of the language of science. The step from the morass of subjectivist philosophical problems on to the firm ground of exact syntactical problems must be taken. Then only shall we have as our subject-matter exact terms and theses that can be clearly apprehended. Then only will there be any possibility of fruitful co-operative work on the part of the various investigators working on the same problems—work fruitful for the individual questions of the logic of science, for the scientific domain which is being investigated, and for science as a whole. (Carnap 1937, 332–333)

Carnap thinks that philosophy should be done by scientific means and for the benefit of science. Underlying this vision is his belief in the supremacy of scientific methods. Yet this is not something that Carnap

⁷For an insightful discussion of the relativist threat facing Carnap, see Friedman (2002, Part One, III).

can effectively *argue* for on the deflationary reading. Any such argument would have to be expressed within a framework that enshrines scientific methods in its linguistic rules, and consequently, would have to presuppose what it aims to establish.

The epistemic relativism incurred by the deflationary reading has another drawback, related to Carnap's metaphilosophical aims. Carnap laments the fact that philosophers have made little progress in their inquiries because they fail to conceptualize their problems and possible solutions in the same way:

...most of the controversies in traditional metaphysics appeared to me sterile and useless. When I compared this kind of argumentation with investigations and discussions in empirical science or in the logical analysis of language, I was often struck by the vagueness of the concepts used and by the inconclusive nature of the arguments. I was depressed by disputations in which the opponents talked at cross purposes; there seemed hardly any chance of mutual understanding, let alone of agreement, because there was not even a common criterion for deciding the controversy. (Carnap 1963a, 44–45)

It would make sense, then, to see Carnap as attempting to remedy this situation, using his new discipline of the logic of science. Yet, if the logic of science is governed by the deflationary principle of tolerance, then Carnap will be unable to do so, because other philosophers do not subscribe to it:

...Carnap's position will not convince an anti-conventionalist like Gödel that it is otiose to posit a capacity for intuitive knowledge of a realm of mathematical objects and facts; for Gödel's view addresses philosophical questions that Carnap discards. From Gödel's perspective, or from Quine's naturalistic one, Carnap's position simply looks empty. (Goldfarb and Ricketts 1992, 71)

On the traditional reading, Carnap and Gödel disagree about the source of mathematical knowledge: Carnap thinks that it follows from the formal rules of our linguistic framework, while Gödel thinks that it rests on the deliverances of a priori intuition. On the deflationary reading, they also disagree about how to *adjudicate* debates about the source of mathematical knowledge: Carnap thinks that their philosophical positions should be expressed as linguistic proposals that can be evaluated on the

basis of their pragmatic merits, while Gödel thinks that their philosophical positions concern a factual question whose proper answer must be determined on the basis of sound argument. This difference in methodological orientation condemns them to talking at cross purposes without any chance of agreement or understanding, because they do not recognize a common criterion for deciding their controversy. This is precisely the kind of situation that Carnap wishes to avoid. It is unavoidable, however, for anyone who endorses the relativist's line of argument, which is why epistemic relativism poses such a serious threat to philosophy generally.⁸

3.4 SCIENTIFIC PARADIGMS

Kuhn's account of scientific progress played a significant role in undermining the Logical Positivists' philosophy of science. On their broadly influential view of scientific progress, the analytic rules of logic and mathematics are used to deduce factual statements about observable states of affairs from theoretical hypotheses. If an observation statement is a prediction which is found to be accurate, then the hypothesis is confirmed. If the observation statement expresses a known fact, then the theoretical statement functions as an explanation of the fact. These are the core commitments of the hypothetico-deductive account of confirmation and the deductive-nomological model of scientific explanation. On this view, scientific inquiry is a cumulative enterprise in which scientists deduce an ever greater number of observation statements from theoretical principles. Sometimes this will involve extending the application of theoretical principles, and others it will involve abandoning one set of theoretical principles in favour of another.

Kuhn rejects not only this account of scientific progress, but the logical methodology that produced it. Instead of reconstructing scientific episodes within the logic of science as contributions to contemporary scientific knowledge, Kuhn advocates a more historical approach to the philosophy of science that attempts, as best it can, to reconstruct the actual processes responsible for such episodes. The result of this "historiographic revolution" is an account of science that challenges the traditional assumption that scientific investigation consists in a set of stable

⁸Perhaps these are reasons enough to *reject* the deflationary reading of Carnap's tolerance. For thorough arguments along these lines, see Doyle (2013).

epistemic practices that yield ever greater expanses of knowledge when applied to ever larger domains of natural phenomena.

Kuhn finds that by ignoring the historical contexts in which scientific discoveries take place, the Positivists' view of scientific methodology largely ignores the conditions that make cumulative scientific progress possible. One of his central insights is that confirmation and explanation require *consensus*; scientists must agree about what it is they are observing, which observations are relevant to their theories, and how their observations impinge on scientific theories. This consensus is achieved by adherence to a common theoretical *paradigm*, which consists of four main components (Kuhn 1970 [1996], 182–187):

- (i) Symbolic generalizations: general laws of nature, e.g. $f = ma$.
- (ii) Exemplars: particular instances of scientific theories that have been used to solve theoretical problems, e.g. the use of the inclined plane in physics.
- (iii) Metaphysical principles: beliefs in models that aid in the solving of theoretical problems, e.g. the kinetic theory of heat.
- (iv) Epistemic values: criteria that are used to facilitate theory-choice, e.g. simplicity and consistency.

In the absence of a disciplinary paradigm, rival theories guide experimental work in different directions, without being able to secure rational consensus. Consequently, inquirers engaged in pre-paradigm inquiry dedicate most of their energies to reinforcing the foundations of their theories rather than applying and extending a commonly accepted theory. This can be seen, for example, in pre-Newtonian optics, which was populated by a variety of schools—the Platonic, Aristotelian, Euclidean, and Epicurean schools—all vying for adherents without making much in the way of progress.

Once a theory takes hold within a scientific discipline, becoming a theoretical paradigm, cumulative progress is possible, in part because the paradigm supplies scientists with a common foundation that frames theoretical discussions. Progress within a paradigm, which Kuhn calls 'normal science', consists in extending the application of the paradigm to cover ever wider domains of natural phenomena. Physicists in the seventeenth century sought to apply Newton's laws to terrestrial phenomena; chemists in the eighteenth century searched for undiscovered elements that could be classified within the new chemical theory. Extending a

paradigm in this way frequently involves confronting problems that can be solved only by articulating the paradigm in a way that increases its scope, precision, and accuracy. Kuhn calls these *puzzles* because they have two important features: they admit of solutions, and their solutions must be arrived at in conformity with a paradigm's rules. Thus, paradigms make cumulative scientific progress possible insofar as they produce both the puzzles that require solutions and rules that dictate the form that solutions must take.

Some highly salient puzzles, which Kuhn calls *anomalies*, stubbornly resist solution, leading to a period of *crisis* in which confidence in the prevailing paradigm begins to waver. The failure of pre-modern chemistry to account for the varieties and properties of gases precipitated one such crisis; the failure of Newtonian physics to detect motion with respect to the ether precipitated another. In times of crisis, the prevailing paradigm begins to lose its grip on scientists who loosen their standard rules and methods in an effort to resolve anomalies, giving rise to a variety of candidate solutions, but no consensus on which one is best. Several hypotheses were proposed to salvage the theory of phlogiston in the face of the experimental fact that metals gain weight when burned or roasted, but none were able to satisfy all pre-modern chemists. Fresnel, Stokes, Lorentz, and Fitzgerald offered alternative explanations for the undetectability of motion relative to the ether, but none were universally accepted.

Eventually, scientists with only a weak allegiance to the dominant paradigm propose new paradigms in which anomalies are not only resolved but emerge as natural consequences of their basic principles. The increased weight of burned or roasted metals is a straightforward consequence of Lavoisier's theory of combustion. Special relativity's light postulate explicitly rules out the possibility of detecting differences in the speed of light. When a new paradigm is able to gain the consensus of working scientists who regard it as successfully resolving critical anomalies, Kuhn deems a *scientific revolution* to have taken place.

3.4.1 *Incommensurability and Relativism*

The theories that produce revolutions—Lavoisier's new chemistry, the special theory of relativity—are typically regarded as extraordinary contributions to ongoing scientific research. However, Kuhn insists that unlike developments within normal science, scientific revolutions are *non-cumulative* episodes. Lavoisier and Einstein did not add to our understanding

of chemical elements and space-time; they effectively *changed* our understanding of these things.

Accordingly, Kuhn claims that new paradigms cannot be understood as *extensions* of existing paradigms, as some of the Logical Positivists believed. One might think of Einsteinian physics as an extension of Newtonian physics on the grounds that Newton's laws are derivable from the laws of relativistic dynamics in certain limiting conditions (Schlick 1920, 63). However, Kuhn argues that this is a mistake; Newton's laws cannot be derived from the laws of relativity theory because the terms in those laws, though identical, have different, incompatible meanings. The terms 'force', 'mass', 'length', and 'simultaneity' are supposed to pick out invariant quantities in Newtonian physics, and relative quantities in Einsteinian physics. Therefore, Kuhn concludes, they cannot express the same concepts, or pick out the same things. Moreover, he insists that this is generally the case. The meanings of theoretical terms are determined by the basic principles in which they figure. Since paradigms inevitably differ in their fundamental principles, they must assign distinct meanings to their primitive terms. And because paradigms are *semantically incommensurable*—there is no straightforward translation of one theoretical vocabulary into another—we cannot evaluate rival paradigms in terms of how accurately they describe one and the same set of theoretical entities. Einstein's laws are not more accurate descriptions of space-time and mass-energy than Newton's laws; they express alternative *definitions* of the terms 'space', 'time', 'mass', and 'energy'.⁹

Paradigms are the source not only of theoretical concepts, but of the methods, standards, and values that scientists use to evaluate theories. So, scientists who subscribe to different paradigms will disagree both on what constitutes a problem in need of solution and on the types of solutions that are admissible. Cartesian physicists rejected Newtonian physics because it provided no mechanical explanation for the propagation of gravity. Newtonian physicists were prepared to dismiss this

⁹It is worth noting that this insight is indistinguishable from the conventionalist doctrine of the Logical Positivists explained above. For this reason, Kuhn and Carnap's views of scientific progress are more similar than Kuhn thinks. For more on the similarities between Carnap and Kuhn, see Friedman (2003).

deficit in the light of their theory's impressive predictive power. Indeed, by the eighteenth century, when Newtonian physics had won universal assent, no one was terribly concerned about the physical unintelligibility of gravity; it simply ceased to be a problem for working physicists. Newtonian physics did not supersede Cartesian physics because it proved to be the more successful theory in respects that all physicists recognized as being important. Rather, it succeeded in part because it was able to convince scientists to change the criteria they used to evaluate physical theories. Scientists have no recourse to extra-paradigmatic methods and standards to gauge the success of their theories; the proponent of a particular paradigm cannot rightfully say that theirs is objectively superior to its alternatives because paradigms are *methodologically incommensurable*. Paradigms include different solutions to different problems, and different means of evaluating those solutions. There is no real sense, then, in which adherents to distinct paradigms are working towards a common goal.

Kuhn's views of semantic and methodological incommensurability make it tempting to see him as claiming that the theoretical import of observations varies from one paradigm to another. This suggests, however, that proponents of distinct paradigms interpret *one and the same* set of empirical data differently. In fact, he sees the difference between paradigms as running even deeper than this; he thinks that a scientist's theoretical commitments partially determine not just how she observes, but *what* she observes. Observations are always theory-laden, never theoretically neutral. Proponents of distinct paradigms may have the very same retinal imprint, but see very different things. Where Galileo sees a pendulum, Scholastic physicists see an object in a state of constrained fall; where Lavoisier sees the effects of oxygen, Priestly sees the effects of de-phlogisticated air. This insight turns classic empiricist epistemologies on their heads: observations are determined by theoretical paradigms, not the other way around. Scientists adopt a paradigm not because they are convinced by the theory's capacity to capture empirical facts that are expressible in a neutral observation language, but because they are persuaded to recognize empirical facts that were unavailable to them before. There is, then, no objective empirical basis on which to justify one's choice of theoretical paradigm; distinct paradigms are *perceptually incommensurable*.

According to Kuhn, the fact that paradigms are incommensurable in these three ways—semantically, methodologically, and

perceptually¹⁰—undermines the supposition that revolutionary science constitutes a cumulative leap in our theoretical knowledge (Kuhn 1970 [1996], 150). Paradigms cannot be empirically confirmed or falsified because confirmation and falsification necessarily take place within an infrastructure of principles, methods, and values that make theoretically meaningful observations possible. Since this infrastructure is provided by a paradigm, arguments in favour of any paradigm are bound to be circular, and therefore found wanting by anyone who does not antecedently accept them:

Like the choice between competing political institutions, that between competing paradigms proves to be a choice between incompatible modes of community life. Because it has that character, the choice is not and cannot be determined merely by the evaluative procedures characteristic of normal science, for these depend in part upon a particular paradigm, and that paradigm is at issue. When paradigms enter, as they must, into a debate about paradigm choice, their role is necessarily circular. Each group uses its own paradigm to argue in that paradigm's defense. (*ibid.*, 94)

When scientists subscribe to a single paradigm, their decisions to accept or reject a scientific theory can be rationalized by appealing to considerations they share in common; this is what happens in normal science. This common ground is lacking in cases of revolutionary science, so that rational argumentation necessarily breaks down. Consequently, Kuhn says that “The transfer of allegiance from paradigm to paradigm is a conversion experience that cannot be forced” (*ibid.*, 151). It is these considerations that seem to push Kuhn towards a fairly radical form of epistemic relativism: “As in political revolutions, so in paradigm choice – there is no standard higher than the assent of the relevant community” (*ibid.*, 94).

Though Kuhn's focus is on the justification of scientific theories in particular, his relativist conclusion can be seen as following from an instance of the more general argument for epistemic relativism:

¹⁰Kuhn summarizes these three varieties of incommensurability in Kuhn (1970 [1996], 148–150).

(TK1) The *paradigm-bound* nature of scientific judgements: reasoned scientific judgements are made possible by paradigms of basic principles, methods, and values.

(TK2) *Epistemic pluralism*: there are many alternative theoretical paradigms.

(TK3) *Incommensurability*: given (TK1) and (TK2), two or more inquirers may differ with respect to a theoretical judgement because they subscribe to distinct paradigms.

(TK4) The *narrow Agrippan premise*: no theoretical paradigm can be justified without circularity.

(TK5) The *narrow Agrippan conclusion*: since paradigms cannot be justified by means of circular arguments, paradigms cannot be justified.¹¹

(TK6) *Epistemic equality*: given (TK5), there can be no objective grounds for preferring any paradigm over its alternatives, and therefore no principled way to resolve cases of incommensurability.

(TK7) *Epistemic relativism*: the justification of a scientific judgement can lend it credibility only within the theoretical paradigm in which it is being evaluated.¹²

As such, it is small wonder that so many relativists have motivated their positions using arguments drawn from Kuhn's theory of scientific paradigms (see Sect. 3.4.3).

3.4.2 *Moderate Relativism*

Many of Kuhn's readers reject his account of scientific revolutions because they claim that it recognizes neither the progress that results from episodes of revolutionary science, nor the rationality involved in bringing them about.¹³ Yet Kuhn explicitly denies that his position entails either of these claims.

While the incommensurability of rival paradigms prevents their proponents from producing definitive arguments—or what Kuhn calls “proofs”—in favour of their own paradigms, Kuhn does not think that

¹¹The role of the Agrippan argument in Kuhn's account of revolutionary science has been repeatedly stressed by Howard Sankey (2011, 2012, 2013).

¹²Friedman (2002, Part One, III) does an admirable job of showing how Carnap and Kuhn's views of scientific rationality motivate epistemic relativism.

¹³For classic examples, see Lakatos (1978, 90–91), Scheffler (1967, 84), Shapere (1984, 51), and Siegel (1987, 51–54).

such arguments constitute the *only* rational means of producing a conversion experience. He also describes “techniques of persuasion” that scientists can use to *rationally* convert their colleagues. These techniques do not involve appeals to evidence that is made possible by the paradigm in question, but to super-paradigmatic values that *all* scientists prize in their theories, including: accuracy, consistency, breadth of scope, simplicity, and fruitfulness.¹⁴ Scientists can rationally persuade their colleagues to accept a new paradigm by arguing that it possesses these virtues, or some subset of them, to a greater extent than its competitors. Yet rational persuasion has its limits. Kuhn admits that these arguments cannot be definitive because of the subjective factors involved in weighing and applying these values:

If two men disagree, for example about the relative fruitfulness of their theories, or if they agree about that but disagree about the relative importance of fruitfulness and, say, scope in reaching a choice, neither can be convicted of a mistake. Nor is either being unscientific. There is no neutral algorithm for theory-choice, no systematic decision procedure which, properly applied, must lead each individual in the group to the same decision. (Kuhn 1970 [1996], 199–200)

Here we see Kuhn endorsing a moderate form of relativism that stems from the insight that rational theory choice is underdetermined by scientists’ shared values. On this view, revolutionary science differs from normal science not because it is irrational or arbitrary, but because it depends on what Duhem calls ‘good sense’ rather than conclusive empirical evidence (Duhem 1954, Ch. VI). The good sense required to facilitate a conversion is not prompted by any single pragmatic argument, but by a series of such arguments that gradually wear down the defenses of the holdouts:

Because scientists are reasonable men, one or another argument will ultimately persuade many of them. But there is no single argument that can

¹⁴Kuhn makes this argument in the Postscript to the second edition of *The Structure of Scientific Revolutions* (1970) and in “Objectivity, Value Judgement and Theory Choice” (1977), but he also makes it in the first edition of *SSR* (153–159). Thus, as Markus Seidel points out, Kuhn does not abandon radical epistemic relativism in favour of a more moderate doctrine in the wake of the criticism that he faced *after* publishing *SSR* in 1962 (Seidel 2013).

or should persuade them all. Rather than a single group conversion, what occurs is an increasing shift in the distribution of professional allegiances. (Kuhn 1970 [1996], 158)

There comes a time when one's loyalty to a fading paradigm becomes irrational or unscientific—none of today's working scientists should subscribe to Newtonian physics or the theory of phlogiston, for example—but this is not the result of any *particular* event or argument.

Kuhn explains that the outcome of a scientific revolution cannot contribute to existing scientific knowledge because the new paradigm does not address all of the problems of its predecessor, nor does it permit the same kinds of puzzle solutions. Nevertheless, he hastens to add that this claim is importantly distinct from the claim that revolutions do not constitute scientific progress. Though there is no set of puzzles common to all paradigms, we can compare their relative capacities to solve *their own* puzzles. This comparison, Kuhn claims, leads to the verdict that scientific revolutions almost exclusively involve the adoption of *better* paradigms:

Later scientific theories are better than earlier ones for solving puzzles in the often quite different environments to which they are applied. That is not a relativist's position, and it displays the sense in which I am a convinced believer in scientific progress. (ibid., 206)

Kuhn's conclusion is that scientific knowledge is progressive, but not cumulative. However, he is careful to distinguish this view from the realist's position that successive scientific theories come ever closer to The Truth about the natural world. Since there is no theory-independent way to describe the natural world 'as it truly is', Kuhn sees no way to defend this position. In this respect, we can see Kuhn as advocating a neo-Kantian epistemology whose relativism is mitigated by our ability to assess the virtues and problem-solving capacities of scientific paradigms without recourse to circular arguments.¹⁵

Kuhn clearly rejects the radical relativism implied by (TK1)–(TK7) in favour of a more moderate relativism about knowledge *within* science.¹⁶

¹⁵Kuhn himself describes his position as a neo-Kantian one in Kuhn (1979).

¹⁶For a criticism of Kuhn's attempt to mitigate the relativism implied by his account of scientific revolutions, see Friedman (2002, Part One, III).

Some claim, however, that his argument can be generalized to yield a radical form of relativism *about* science, i.e. a relativism that undermines the naturalist and absolutist presumptions. It is to this generalized argument that I will now turn.

3.4.3 *Epistemic Relativism*

Kuhn's fundamental insight is that consensus is a precondition for rational progress. The cumulative progress of normal science is made possible by scientists' adherence to a common theoretical paradigm. The shift from one paradigm to another during scientific revolutions also constitutes progress, when judged by means of the super-paradigmatic values and concerns that all scientists share. These notions of rationality and progress are necessarily *internal* to the scientific communities within which consensus is achieved. Those who fall outside the scientific community may see things differently, though, and they may lack the commitments that would make it possible for scientists to convince them otherwise. This type of trans-disciplinary incommensurability would reinstate the threat of radical epistemic relativism.

Though Kuhn uses the concept of a paradigm to account for the possibility of normal science, it may also be used to account for consensus achieved in non-scientific fields, such as theology, which he identifies as the discipline that most closely resembles science in important respects (Kuhn 1970 [1996], 136). Theological paradigms address problems by means of principles, methods, and values that are often foreign to scientists. Theologians take for granted the existence of supernatural entities and miraculous occurrences that have no place in science. Furthermore, as Rorty notes, Biblical literalists understand epistemic values differently than scientists:

Bellarmino thought the scope of Copernicus's theory was smaller than might be thought. When he suggested that perhaps Copernican theory was really just an ingenious heuristic device for, say, navigational purposes and other sorts of practically oriented celestial reckoning, he was admitting that the theory was, within its proper limits, accurate, consistent, simple, and perhaps even fruitful. When he said that it should not be thought of as having wider scope than this he defended his view by saying that we had excellent independent (scriptural) evidence for believing that the heavens were roughly Ptolemaic. (Rorty 1979, 329)

Of course, naturalists will scoff at Bellarmine's appeal to Biblical scripture to justify his assessment of the scope of Copernican astronomy. In response, Rorty says:

But can we then find a way of saying that the considerations advanced against the Copernican theory by Cardinal Bellarmine – the scriptural descriptions of the fabric of the heavens – *were* “illogical or unscientific?”. ...Kuhn does not give an explicit answer to the question, but his writings provide an arsenal of argument [sic] in favor of a negative answer. (ibid., 328)

Given that this passage appears in a section entitled “Kuhn and Incommensurability”, it seems safe to assume that Rorty has Kuhn's incommensurability arguments in mind. Bellarmine perceives a stationary earth under his feet; Galileo sees the sun at rest within the earth's orbit. According to Bellarmine's Aristotelian conception of motion, terrestrial objects strive to come to rest on the earth's surface; on Galileo's inertial conception, terrestrial objects share in the earth's circular motion. Most importantly, Bellarmine regards Biblical Scripture as the fundamental source of information about the cosmos, while Galileo relies most heavily on empirical methods.¹⁷ The paradigms of Bellarmine and Galileo are perceptually, semantically, and methodologically incommensurable. And because they also recognize different problems and understand epistemic values differently, Rorty denies that there is any objective sense in which either of their cosmological views is rationally superior to the other.

Kuhn and Rorty both deny that scientific theories can be judged on the basis of how well they capture mind-independent facts about the natural world. Instead, they must be evaluated in terms of how well they solve salient problems in their respective disciplines. This determination must be made by means of methods, standards, and values inherent to the paradigms that give rise to the problems. Paradigms themselves must

¹⁷As I noted in the previous chapter, it is unfair to see Bellarmine as a radical cleric who gives no credence whatsoever to Galileo's empirical arguments. This characterization is much more apt when applied to the Papal Qualifiers whose deliberations led to Bellarmine's intervention. Since this observation changes nothing of substance in Rorty's argument, though, I have followed his lead in focusing on Bellarmine.

be evaluated less straightforwardly, in terms of the extent to which their solutions embody the values that all scientists recognize. A thoroughgoing pragmatism, such as Rorty's, will seek to generalize this theory of rational inquiry, yielding the result that *every* discipline is properly concerned with solving puzzles rather than mirroring nature.¹⁸ The scientific rationality that Kuhn describes is but *one* kind of rationality, beholden to one set of overarching concerns and values. To the extent that inquiry within other disciplines, such as theology, philosophy, or literary criticism, is beholden to different concerns and values, there are no objective grounds for privileging the results of science.¹⁹ When Kuhn's theory of paradigms is generalized in this way, it seems to undermine the possibility of defending the naturalist and absolutist presumptions.

3.5 CONCLUSION

The doctrine of epistemic relativism is often associated with schools of philosophy that are hostile towards naturalism and the analytic tradition more generally (Baghramian 2004, Ch. 3). However, the principal argument for relativism comes not only from these quarters but also from two of the twentieth century's more naturalistic epistemologies: Carnap's conventionalism and Kuhn's pragmatism. Therefore, the relativist concludes, epistemic relativism is not an exogenous threat that analytic philosophers can simply ignore; rather, a case can be made that it is a consequence of their own views. The fact that this doctrine is inconsistent with two of analytic philosophy's fundamental commitments—the absolutist and naturalist presumptions—points to a tension that lurks within the discipline that must be resolved. I will now turn my attention to various attempts to resolve this tension by undermining the principal argument for epistemic relativism, beginning with the oldest of anti-sceptical strategies: the positions of foundationalism and coherentism.

¹⁸Indeed, Rorty draws a distinction between 'normal' and 'abnormal' discourse that is modelled on Kuhn's distinction between normal and revolutionary science, but that "...cuts across the distinction between science and nonscience" (Rorty 1979, 333).

¹⁹This use of Kuhn's work to support a general epistemic relativism can also be found in Barnes (1982, 10).

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CHAPTER 4

Foundationalism and Coherentism

This chapter examines two internalist answers to the epistemic regress problem—foundationalism and coherentism—and assesses their prospects of addressing the threat of epistemic relativism.¹ Foundationalists argue that the regress of reasons comes to an end at basic beliefs whose justification is non-inferential. Coherentists claim that there is no regress because the primary bearers of justification are systems of inferentially related beliefs, rather than individual beliefs which must be justified in turn. If either of these theories can overcome the regress argument, we might reasonably hope that they can meet the justification requirement without falling prey to the narrow Agrippan trilemma (R4). Foundationalists will insist that they can evaluate epistemic systems without circularity, dogmatism, or regress by appealing to non-inferential sources of justification; coherentists will claim to do so by determining their relative coherence. If either of them finds naturalistic systems to be more truth-conducive than their alternatives, then they can provide a principled defense of the naturalist and absolutist presumptions, and epistemic relativism will be provably false.

Unfortunately, there are good reasons to think that internalist varieties of foundationalism and coherentism cannot rise to the challenge of

¹Epistemic internalism is the view that the factors responsible for a belief's justification are *internal* to the believer, such that the believer has mental access to those factors. Common internalist candidates for justifiers include: evidence, reasons, arguments, and mental states.

either Pyrrhonian scepticism or epistemic relativism. Recall that the epistemic regress problem is just one of two manifestations of the Agrippan trilemma, the other being the problem of the criterion which has to do with the justification of epistemic methods. Even if foundationalism or coherentism can solve the epistemic regress problem, they cannot solve the problem of the criterion because they are incapable of establishing the trustworthiness of the methods they rely on without vicious circularity. And since their answers to epistemic relativism rely on their answers to the narrow Agrippan trilemma, they too must fail. What's more, because internalism requires justifiers to be subjective, and potentially variable, it opens the door to the doctrines of epistemic pluralism and incommensurability that figure so importantly in the argument for relativism. The result is that neither foundationalists nor coherentists can defend the absolutist and naturalist presumptions in a way that meets the justification requirement.

4.1 FOUNDATIONALISM

Recall the sceptic's epistemic regress problem outlined in Chapter 2. When justifying a belief, we must provide a reason to think that the belief is true; this reason is another belief from which the target belief can be inferred. Not just any reason will do, however. If the reason adduced in favour of a belief is not itself justified—if we have no reason to think that it's true—then it is not a warrant-conferring reason and the justification fails. My claiming to have been abducted by aliens is not a good reason to believe in the existence of extraterrestrial life forms unless I can present some compelling evidence that I was in fact abducted. The justification of a belief, then, cannot end with the presentation of a reason for thinking it is true; it must also include grounds for believing that the reason is itself true. If every reason must be similarly well-founded, then the process of good reason giving cannot come to an end. This being the case, justification must take one of two forms: it must consist in an infinite chain of non-repeating reasons or a set of reasons that circles back on itself. The former can amount to nothing more than a conditional justification, and the latter amounts to assuming what must be established. Since these are the *only* three possibilities—a chain of justification must terminate at an unjustified assumption, go on indefinitely, or circle back on itself—and *none* of them yield justification, the sceptic concludes that beliefs cannot be justified.

Foundationalists argue that the epistemic regress problem relies on the false supposition that *all* justification is inferential. They acknowledge that beliefs are often justified by means of inferences from further, well-founded beliefs, but they deny that this must *always* be the case. In particular, foundationalists claim that chains of justification terminate at basic beliefs that are *non-inferentially justified*. Basic beliefs inferentially transmit justification to other beliefs, but need not rely on other beliefs for their justification; they are the unmoved movers in foundationalist epistemology.

Foundationalism provides a particularly plausible description of the process of justification in mathematics, where theorems are proven by being derived from other propositions whose truth has been likewise demonstrated. This process of demonstration inevitably comes to an end once we reach a theory's axioms—or basic beliefs—whose truth is discerned without relying on any further proposition. The most familiar example of an axiomatic system is Euclid's geometry. Euclidean geometry begins with axioms such as: things which are equal to the same thing are also equal to one another. From these 'common notions', together with five postulates and twenty-three definitions, Euclid was able to derive hundreds of propositions, which were the final word on the nature of space for twenty-three hundred years. Mathematicians generally treated the Euclidean axioms as too obvious to require demonstration; indeed, since any proof of the axioms would depend on propositions that are less obvious than the axioms themselves, it would seem that they do not even admit of inferential demonstration. Rather, according to foundationalists, the axioms are self-evident in the sense that we *rationally intuit* their truth upon understanding their content.²

Foundationalists claim that empirical knowledge has a similar structure. Our beliefs about objects and their properties rest on a foundation of basic beliefs that are non-inferentially justified by the contents of our experiences. I believe that it will be sunny tomorrow because the local forecast is calling for sunny weather, and I believe that the local forecast is calling for sunny weather because I'm looking at the forecast in today's newspaper. My belief that I'm visually apprehending the forecast is not justified by any further belief, but by my *experience* of seeing the forecast. Memory and introspection are other sources of non-inferential

²For influential accounts of rational intuition as a source of non-inferential justification, see Bealer (1992) and BonJour (1998).

justification for basic beliefs. My belief that I'm scared of snakes is justified by my fear of snakes, and my belief that I recall being in a bike accident as a child is justified by my memory of the accident. Our beliefs about the external world are justified by being inferred, directly or indirectly, from our basic beliefs about 'the given' in experience.³

On the foundationalist view, an epistemic justification is neither circular nor infinite, since it terminates at one or more basic beliefs. Nor is it dogmatic, since the deliverances of rational intuition and experience non-inferentially justify basic beliefs.⁴ In this way, foundationalists avoid the epistemic regress problem by attacking the hyper-inferentialist theory of justification that is tacitly endorsed by sceptics. Furthermore, it is natural to think, as Michael Williams points out, that a foundationalist answer to the epistemic regress problem could also be leveraged to address the problem of epistemic relativism: "But traditional foundationalism has another motive: to articulate the fundamental epistemic framework within which all significant disputes can, in principle, be rationally resolved" (Williams 2007, 96). If the Agrippan argument can be overcome, then it seems likely that the narrow Agrippan argument can be undermined as well. Without this crucial premise—(R4)—the principal argument for epistemic relativism fails. Furthermore, foundationalists will attempt to defend the absolutist presumption by distinguishing those belief systems that properly rest on foundations of rational intuition and experience from those that don't. If they find that naturalistic systems fall into the former category—which seems entirely likely—then the naturalist presumption can be justified as well.

Unfortunately, this kind of internalist foundationalism can meet neither of its objectives: it cannot overcome Pyrrhonian scepticism or epistemic relativism. It cannot overcome Pyrrhonian scepticism because

³BonJour and Fumerton defend similar versions of empirical foundationalism in DePaul (2001). See also BonJour (1999a, b) and Fumerton (1995).

⁴It is important to note that this is *not* a species of relative justification for foundationalists, since experiences and intuitions are not part of our epistemic system, i.e., they are neither beliefs nor methods, and therefore, foundationalists are not claiming that the justification of basic beliefs is system-relative. Indeed, experiences and intuitions are supposed to provide an *absolute* justification for basic beliefs that does not depend on one's other commitments. In the following section, I argue that strictly internalist foundationalists cannot successfully argue for this conclusion, and in Sect. 4.2.4, I argue that foundationalism collapses into epistemic relativism if experiences and intuitions are subjective and variable, as they seem to be.

it cannot justify the *sources* of non-inferential justification, i.e., experience and a priori intuition. Consequently, it cannot use the deliverances of these sources to justify beliefs or to discriminate trustworthy from untrustworthy methods in order to avoid epistemic relativism.

4.2 THE PROBLEM OF THE CRITERION

Sceptics may provisionally concede that some beliefs can be non-inferentially justified, yet renew their attack by pointing out that while the justification of basic beliefs does not inferentially depend on other beliefs, it certainly does depend on *methods* of non-inferential justification. Basic beliefs must be justified by the deliverances of rational intuition or experience. More generally, sceptics insist that *every* justified belief, basic or not, must be the outcome of one or more epistemic method(s). But, of course, not all methods generate warrant for beliefs; wishful thinking and uninformed speculation are clearly not sources of justification. Justified beliefs must be the outcomes of *trustworthy* methods. A method's trustworthiness is, in turn, a function of its outcomes, though epistemologists tend to disagree on the kinds of outcomes a trustworthy method must produce. Some say they must be reliably true, others that they must be sufficiently probable, and still others that they must be coherent. Let's not take a stand on this issue, and simply acknowledge that in order to be trustworthy, a method must meet some set of conditions, C_1-C_n . Crucially, sceptics also insist that a method cannot be trustworthy unless we *know* it meets these conditions. In other words, every trustworthy method must be *demonstrably* trustworthy. Strict internalists, of both the foundationalist and coherentist persuasions, accept this requirement, which I will call the *knowledge condition*:

(KC) S can use method M to justify her beliefs only if S *knows that* M meets conditions C_1-C_n .⁵

So, S can use M to justify her beliefs only if she has a justified belief that M is trustworthy, i.e., that it meets conditions C_1-C_n . Since every

⁵Some claim that this condition, or something akin to it, is a "core tenet" of internalism (Van Cleve 2003, 45). There are, however, self-professed internalists who reject it, such as Chisholm (1982) and Boghossian (2001). For internalists who do endorse this requirement, see BonJour (1980), Lehrer (1990), and Fumerton (1995).

justified belief must be the outcome of a trustworthy method, S must justify her belief that M is trustworthy by appealing to the deliverances of another trustworthy method. Thus, while the foundationalist theory of non-inferential justification may block the regress of *beliefs*, it cannot halt the regress of epistemic *methods*. Put another way, foundationalists have denied sceptics the resources required to level the epistemic regress problem, but granted them the crucial internalist assumption underlying the problem of the criterion. Anyone who endorses (KC) cannot escape the latter sceptical argument, as I will show in the sections below. This means that foundationalists also cannot answer the *narrow* Agrippan argument by justifying *basic* epistemic methods—consulting a priori intuition and experience—without dogmatic assertion, infinite regress, or vicious circularity, and therefore they are incapable of undermining the principal argument for epistemic relativism.

4.2.1 *Epistemic Principles*

Epistemic principles tell us that a particular method is trustworthy, i.e., that it meets the conditions required of a source of justification. The following principles, or principles like them, are of special importance to foundationalists because they concern sources of non-inferential justification:

(E) If S has the experience that p is the case, then S is prima facie justified in believing that p is the case.

(I) If S has a rational intuition that p is the case, then S is prima facie justified in believing that p is the case.

If (KC) holds, then we can non-inferentially justify basic beliefs only if we know that (E) and (I) are true. But in that case, such beliefs are not actually basic because their justification depends on the justification of other beliefs, namely these epistemic principles. This reintroduces the threat of the Agrippan trilemma, for foundationalists must now provide an account of how epistemic principles are justified. They might be justified by the deliverances of some further method, but only if we know that this method is trustworthy.

One might expect foundationalists to respond to this methodological regress in the same way they respond to the epistemic regress: by claiming that there are *basic methods* whose warrant does not depend on

the outcomes of any other method. But this means that the warrant for such methods must come from their own deliverances, or from no epistemic deliverance at all. Neither of these are genuine possibilities. If M is a trustworthy method for S, then S must have the *justified belief* that M is trustworthy. And justified beliefs must be the outcomes of *trustworthy methods*. Therefore, the warrant for basic methods must depend on the outcomes of some method or other. Yet, the warrant for a basic method cannot come from the method in question. Suppose that p is a principle telling us that method M is trustworthy. Given (KC), this means that p must be known *before* M can yield justification for beliefs. Therefore, M cannot be used to justify p.

The problem of the criterion has been particularly insidious for foundationalists. Its best known instantiation is Arnault's objection to Descartes's foundationalist project in the *Meditations*. Descartes seeks to overhaul Scholastic epistemologies in favour of a rationalist program that places knowledge on the firm foundation of clear and distinct ideas. In the fifth meditation, Descartes claims that God's beneficence safeguards the truth of these ideas:

Now, however, I have perceived that God exists, and at the same time I have understood that everything else depends on him, and that he is no deceiver; and I have drawn the conclusion that everything which I clearly and distinctly perceive is of necessity true. (Descartes 1641 [1984], 48)

In the same meditation, he argues that his clear and distinct idea of a maximally real God is reason enough to believe that God exists:

But if the mere fact that I can produce from my thought the idea of something entails that everything which I clearly and distinctly perceive to belong to that thing really does belong to it, is not this a possible basis for another argument to prove the existence of God? (*ibid.*, 45)

This prompts Arnault to accuse Descartes of viciously circular reasoning:

I have one further worry, namely how the author avoids reasoning in a circle when he says that we are sure that what we clearly and distinctly perceive is true only because God exists.

But we can be sure that God exists only because we clearly and distinctly perceive this. Hence, before we can be sure that God exists, we

ought to be able to be sure that whatever we perceive clearly and evidently is true. (ibid., 150)

Arnault's last sentence is an endorsement of (KC): Descartes can use clear and distinct ideas to justify basic beliefs only if he knows that these ideas faithfully track the truth. So, he cannot justify his belief that they do track the truth by means of his clear and distinct idea of God. This predicament has come to be known as the *Cartesian Circle*, and it is an instance of the more general *problem of epistemic circularity*.⁶

Fumerton's more recent brand of foundationalism is beset by the same problem. On his view, empirical and a priori knowledge bottom out at our direct acquaintance with the truth-makers of basic beliefs:

When I know that black is darker than white or that bachelors are unmarried, the source of my knowledge is direct acquaintance with relations that hold between either thoughts or properties... When I know noninferentially that I am in pain, I am directly acquainted with me being in pain. (Fumerton 1995, 199)

Basic beliefs serve as the foundation from which non-basic beliefs can be inferred. This inferential knowledge is licensed by epistemic principles of the form: E makes probable P. I can infer that I am seated at my desk (P) from my having the experience of sitting at my desk (E) only if experience is a source of probable beliefs. Fumerton (1995, 198) claims that epistemic principles express synthetic a priori truths about probabilistic relations with which we are directly acquainted. More recently, however, he has expressed doubts that inferential internalism is up to the task of justifying epistemic principles without vicious circularity:

When we turned our attention to the problem of the criterion as it relates to the question of how, if at all, we can discover epistemic principles (principles concerning sources of knowledge and justified belief), I argued that the inferential internalist is committed to the view that *if we have any inferential knowledge or justification, it had better be possible to justify belief in propositions describing evidential connections without having to rely on*

⁶It has been argued that Descartes himself is not actually caught in the Cartesian circle because, unlike Arnault, he rejects (KC) (Van Cleve 1979). This response to the problem of the criterion will be discussed at length in the next chapter. There is a vast literature on the problem of epistemic circularity, beginning with (Alston 1986).

knowledge of the epistemic status of beliefs reached through inference. Because I think that inferential internalism is true (for at least the most philosophically interesting senses of justification), and because I think that getting the relevant knowledge of epistemic principles is, at best, problematic, the spectre of skepticism looms large. (Fumerton 2008, 49–50, emphasis added)

Fumerton is rightly pessimistic about the prospect of justifying epistemic principles without relying on the inferences they license. It seems that any attempt to establish experience as a trustworthy source of knowledge about the external world would have to rely on beliefs arrived at by means of experience. Moreover, Fumerton's endorsement of (KC) in the italicized passage presents a problem for his account of *non-inferential* knowledge as well. If we are to have such knowledge by acquaintance, then it had better be possible to justify beliefs in propositions describing the evidential connections between the deliverances of acquaintance and basic beliefs without having to rely on knowledge reached through acquaintance. Since there is no more basic source of justification, no such justification can be forthcoming.⁷

An epistemic principle tells us that a method meets conditions C_1 – C_n , qualifying it is a trustworthy source of justified beliefs. If our knowing the principle is among these conditions, then it cannot be known by means of the method in question. If the principle concerns an epistemically basic method, then it cannot be justified by any further method, and so it cannot be justified at all. Consequently, internalist foundationalists can answer neither the original Agrippan trilemma, nor its narrow relativistic version, when applied to epistemic methods.

4.2.2 Cornerstone Principles

There is another class of principles that internalist foundationalists cannot justify. Unlike epistemic principles, these principles do not say that a method meets the conditions required of a source of justification, though *their being justified is a necessary condition of our knowing that method is such a source.*⁸ I will call these principles, following Wright

⁷On this point, see Lemos (2004, 261).

⁸More specifically, their being unjustified is incompatible with our knowing that a method is a source of *internalist* justification, such as evidence, reasons, arguments, or mental states.

(2004), *cornerstone principles*. When a principle is a cornerstone with respect to a method, it cannot be justified by that method without vicious circularity. And if the principle is a cornerstone with respect to a *basic* method, it cannot be justified by any other method. A few examples will suffice to illustrate this point.

Modus ponens (MP), which is the logical rule licensing the inference from ‘p implies q’ and ‘p’ to ‘q’, is a cornerstone principle with respect to deductive reasoning. A minimal condition on trustworthy deductive reasoning is that it be truth-preserving. It cannot be truth-preserving if modus ponens is invalid. So, if we have no reason to think that MP is a valid rule of inference, then we have no reason to think that deductive reasoning is trustworthy. And since any deductive argument for the validity of MP must itself be a truth-preserving inference, it must presuppose the very principle it is meant to justify. In response, one might claim that the truth of MP can be rationally intuited, but there is good reason to think that this option is not available to strict internalists. Recall the epistemic principle concerning rational intuition:

(I) *If S has a rational intuition that p is the case, then S is prima facie justified in believing that p is the case.*

When conjoined with the intuitive judgement that MP is true, this principle yields the result that MP is justified, but only by means of a deductive inference that is itself licensed by MP.⁹ Since any other method is going to have to make use of similar reasoning, MP cannot be justified without vicious circularity.¹⁰

Hume’s principle that “...instances of which we have had no experience, must resemble those of which we have had experience, and that the course of nature continues always uniformly the same” (Hume 1740 [1975], 89) is a cornerstone principle with respect to inductive reasoning. If past experience were a poor guide to natural regularities or nature did not obey any laws, then inductive reasoning would fail to be truth-conducive. Consequently, if the principle of uniformity

⁹Carroll’s “What the Tortoise Said to Achilles” (1895) nicely illustrates this point. See also Boghossian (2000).

¹⁰On this point, see Putnam (1978). Barnes and Bloor (1982, 40–42) use the inevitable circularity involved in justifying MP as a crucial component in their argument for the relativity of logical knowledge.

is unwarranted, then we cannot be justified in believing that generalizations are true when they are arrived at by means of reasoning from past experiences. Since the principle of uniformity is itself a generalization, it cannot be argued for inductively unless it is presupposed. This forecloses the possibility that it could be empirically justified. And because the principle does not express a necessary truth, it cannot be known a priori, either. Hume thus arrives at the sceptical conclusion that the principle of uniformity cannot be justified at all.

Another cornerstone principle is the supposition that the world did not spring into existence one hundred years ago. This is a cornerstone with respect to historical inquiry. If the world sprung into existence one hundred years ago, complete with fossils, artifacts, documents, and human beings with faulty memories, then none of these things could be sources of knowledge about the distant past. Without some assurance that this is not the case, historians have no reason to trust these kinds of evidence. Therefore, they cannot appeal to such evidence to rule out the possibility that the world sprung into existence one hundred years ago. Since there is no method of historical inquiry that doesn't rely on these sources of evidence, the historian's belief that the world did not spring into existence one hundred years ago cannot be justified.

If our knowing a method's cornerstone principles is among the conditions that must be satisfied to secure its trustworthiness, then basic cornerstone principles cannot be known for the same reason that basic epistemic principles cannot be known: any justification for them is bound to be viciously circular. Consequently, the Agrippan arguments for scepticism and epistemic relativism cannot be answered by strict internalists.

4.2.3 *(KC) and the Problem of the Criterion*

What this discussion shows is that foundationalists who are committed to (KC) cannot escape the following version of the problem of the criterion:

(PC1) A justified belief must be the outcome of a trustworthy epistemic method.

(PC2) S can use method M to justify her beliefs only if M's epistemic and cornerstone principles are justified for S.

(PC3) Epistemic and cornerstone principles cannot be justified by the methods that presuppose them.

- (PC4) Basic epistemic and cornerstone principles cannot be justified by means of any other methods.
 (PC5) Therefore, basic epistemic and cornerstone principles cannot be justified.
 (PC6) Therefore, S cannot use basic methods to justify her beliefs.

This argument establishes that foundationalists cannot justify basic methods or their outcomes. The result is full-fledged scepticism.

Epistemic relativists welcome the finding that basic methods cannot be justified without vicious circularity, for this same point is expressed in their narrow Agrippan trilemma. Like foundationalists, however, they wish to resist the sceptical conclusion that basic methods cannot be used to justify beliefs. The only way they can maintain these commitments consistently is to reject (PC2), i.e. (KC). But in the absence of (PC2), it's unclear why epistemic and cornerstone principles cannot be justified by the methods that presuppose them. By rejecting strict internalism, epistemic relativists are in danger of depriving themselves of the Agrippan reasoning that figures in premise (R5) of their argument. This point will be addressed in the next chapter.

However, even if the problem of the criterion could somehow be answered by foundationalists, thus allowing them to resist the narrow Agrippan trilemma, the relativist threat would remain, as I will argue in the next section.

4.2.4 *The Problem of Subjective Foundations*

Let's grant to foundationalists the supposition that there are basic sources of non-inferential warrant, including experience and rational intuition. This concession enables her to answer the epistemic regress problem and problem of the criterion in a way that avoids global scepticism. Another sceptical threat remains, however, for in order to avoid a devastating constellation of local scepticisms, foundationalists must show how we get from non-inferentially justified beliefs about the contents of our experiences to inferentially justified beliefs about the material world, the past, other minds, and theoretical entities. From the fact that I am having the experience of being seated at my desk, it does not logically follow that I am actually in this situation; I could be dreaming or deceived by an evil genius who's in control of my stream of consciousness. Indeed, there are

no beliefs about the external world that can be logically inferred from *any* foundation of basic beliefs drawn from experience and rational intuition. I will call this the problem of *impoverished foundations*.

Fumerton claims that this problem is insoluble as long as foundationalists focus strictly on *logical* relations between beliefs:

In short, the only way for the inferential internalist to avoid massive (not necessarily global) skepticism is to find a relation weaker than entailment that holds between our foundations and the propositions we infer from them, a relation that we could discover noninferentially. (Fumerton 1995, 190)

The relation that Fumerton favours is epistemic probability. My experience of being seated at my desk makes it probable that I am sitting at my desk. As we've seen, he thinks that relations of epistemic probability are themselves apprehended by means of acquaintance. So, while we are not acquainted with the external world, we can arrive at knowledge of the external world by means of what is presented in acquaintance, i.e., the contents of experience and relations of epistemic probability. The same can be said for knowledge of the past, other minds, and theoretical entities. This being the case, Fumerton argues that our foundations are not cripplingly impoverished.

This response to the sceptical objection invites another question, though: if basic beliefs and epistemic principles can be used to justify some of our beliefs about the external world, why not *many* inconsistent belief systems? We know that persons can undergo wildly different experiences, and there's no a priori reason to think that everyone is acquainted with one and the same set of probabilistic relations. It would stand to reason that, as a result, persons may be justified in believing very different things about the world: what one person believes to be an encounter with the divine, another dismisses as hallucination. Without some *objective* means of adjudicating these sorts of disagreements, foundationalism succumbs to the threat of epistemic relativism. Fumerton's foundationalism lacks these resources. By insisting that all knowledge ultimately relies on acquaintance, he commits himself to a form of epistemic solipsism. The deliverances of acquaintance are *subjective*, and therefore, when they differ from person to person, there cannot be any common ground on which epistemic disputes can be rationally resolved. Any appeal to such deliverances will amount to unduly privileging one's

own experiences and/or intuitions over an interlocutor's.¹¹ A mystic cannot rationally convince an atheist of her divine encounter by appealing to objects and relations that she alone is acquainted with. This is a narrow version of the sceptic's arguments from relativity and dispute (see Sect. 2.2). Whereas sceptics claim that no two people have the same experiences, making it impossible for them to rationally agree on any matter of fact, relativists make the more reasonable claim that people *sometimes* differ in their experiences and intuitions, such that they cannot be made to rationally agree on *some* basic beliefs. In short, because the objects of acquaintance are subjective and variable, they cannot constitute a foundation on which we can justify any *one* epistemic system.

To avoid this problem, it seems we must be able to specify an *objective* property that confers justification on beliefs, i.e., a property of beliefs that can be recognized by *all* cognitive agents. Being non-inferentially supported by the deliverances of acquaintance is no such property. By contrast, coherentists can plausibly claim to avoid this problem. They maintain that a belief is justified when it is embedded in a coherent system of inferentially related beliefs. If coherence is an objectively recognizable property, then coherentism enjoys a marked advantage over foundationalism. Moreover, coherentists claim to succeed where foundationalism failed in producing a satisfactory response to Pyrrhonian scepticism. It might be hoped, then, that coherentism is a more compelling source of relief from the threats of scepticism and relativism. This possibility will be examined, and rejected, in the remaining sections of this chapter.

4.3 COHERENTISM

Sceptics and foundationalists suppose that knowledge cannot be had if all justification is inferential. The foundationalist response is to deny the sceptic's further supposition that all justification is inferential. Coherentists, by contrast, accept the second supposition, but not the first; they argue that sceptics and foundationalists have been misled by a mistaken view of the inferential structure of knowledge. If warrant must be transmitted from *one* belief to another, then scepticism does indeed result. However, coherentists deny that justification proceeds in such a

¹¹ Stich (1990) makes a similar point in favour of his brand of relativism.

linear fashion. Instead, they insist that a belief is justified when it is inferentially embedded in a coherent *system* of beliefs.¹² My belief that it will be sunny tomorrow is justified because it coheres with my beliefs about the forecast in the newspaper, the trustworthiness of the newspaper, the reliability of my senses and memory, typical weather patterns at this time of year, alternative sources of meteorological information, and so on. My reason for thinking that my belief is true is not some further belief in need of justification, but the fact that it coheres so well with many of the other things I believe. Thus, from the coherentist perspective, there simply is no regress that prevents us from justifying our beliefs.

Coherentists, then, have a ready answer to both Pyrrhonian sceptics and epistemic relativists. They claim that the Agrippan trilemma rests on a faulty understanding of inferential justification. Once we appreciate that belief systems, rather than individual beliefs, are the primary bearers of justification, the epistemic regress problem fails to take hold. Since many of our beliefs do cohere with one another, coherentists conclude that they are justified candidates for knowledge. And since some epistemic systems yield more coherent beliefs than others, coherentists also claim to have objective grounds for thinking that some ways of investigating the world are preferable—more truth-conducive—to others. For example, they will presumably favour the naturalist's epistemic system over the creationist's, on the grounds that it yields a more coherent set of beliefs about the earth's history.¹³

It appears that coherentists can meet the justification requirement in defending the absolutist and naturalist presumptions without falling prey to the narrow Agrippan trilemma. This appearance is illusory, however, at least in the case of coherentists who endorse strict internalism. These coherentists, like foundationalists, necessarily fall prey to the problem of the criterion, as I will show in the next section.

4.3.1 *The Problem of the Criterion Revisited*

For coherentists, the justification of a belief crucially involves two processes: (i) identifying the relevant belief system in which a belief is inferentially embedded, and (ii) determining the coherence of those beliefs.

¹²This coherentist response to scepticism was first presented in Bosanquet (1920). See also BonJour (1985, Chap. 5).

¹³For a defense of this view, see Kitcher (1982, 2007).

For example, to justify the scientist's belief that the earth is more than six thousand years old, the coherentist will have to uncover the network of convictions that are inferentially related to this belief—convictions about fossils, crystals, radiometric dating, forces of geological change, evolution, and so on—and then show that these beliefs cohere in such a way that it is highly unlikely that they are uniformly inaccurate. The completion of these two tasks requires the use of epistemic methods, such as introspection, perception, memory, and deductive reasoning. If these methods must be known to be trustworthy *before* they can be used to justify beliefs, then coherentists are no better able to solve the problem of the criterion than foundationalists.

In order to accomplish (i), the coherentist must form a justified meta-belief about the contents of a belief system, e.g.: B_{100} : my beliefs about the history of the earth form a system, S_1 , composed of beliefs B_1 – B_{99} . And how does she justify B_{100} ? By establishing that it coheres with what she believes. But this amounts to showing that B_{100} coheres with the beliefs in system S_1 . Therefore, her justification of B_{100} cannot proceed without taking that very belief for granted. More generally, BonJour says that coherentists must presuppose the following principle (BonJour 1999b, 126):

(IN) Introspection yields accurate representations of our belief systems.

(IN) must be true if introspection is capable of generating warrant for beliefs. And if coherentists accept (KC), they must *know* that (IN) is true *before* they can use introspection to justify their beliefs. But the only way to justify (IN) is to show that it is embedded in a coherent belief system, and this requires reliable introspective access to one's beliefs. Since the justification of (IN) crucially relies on introspection, and introspection cannot yield justified beliefs until (IN) has been established, (IN) cannot be justified and introspection cannot be trustworthy. This is why BonJour calls (IN) the *doxastic presumption*: it is a presumption that coherentists cannot justify without vicious circularity because it is constitutive of their method of justifying beliefs. This being the case, he argues that they cannot issue anything but *provisional* justifications of the form: “*if* my representation of my system of beliefs is correct, then such-and-such a particular belief is justified in the sense of being likely to be true” (ibid., 126–127). Since coherentists are unable to justify the antecedent,

BonJour concludes that coherentism entails “a very deep and troubling version of skepticism” (ibid., 129).

Coherentists can do no better when attempting to accomplish (ii), i.e., establishing the coherence of a belief system. The issue of what coherence consists in is a contentious one among coherentists. Some think that the coherence of a set of beliefs is determined by their logical relations, others focus on their probabilistic relations, and still others stress the importance of their explanatory relations.¹⁴ Whatever one’s preferred notion of coherence happens to be, establishing that beliefs bear the relations in question—logical, probabilistic, or explanatory—will require the presupposition of epistemic and cornerstone principles of logical, probabilistic, or abductive reasoning. If coherentists accept (KC), these principles must be known *before* the coherence of a belief system can be established. But to justify these principles, they must show that they are embedded in a coherent belief system.

Every coherentist admits that logical consistency is a minimal requirement that must be met by coherent belief systems. Establishing the logical consistency of a set of propositions requires an appeal to logical principles, such as *modus ponens*. And how do coherentists justify these principles? They will have to do so by showing that the principles belong to a coherent, and therefore logically consistent, system of beliefs. But to accomplish this task, they will have to presuppose some of the very principles they are attempting to justify. They cannot show that MP *inferentially* coheres with a body of beliefs without making use of the form of inference it licenses. The problem, once again, is that this circular justification is rendered vicious by (KC): we cannot use logical reasoning to justify MP because our knowing MP is a precondition of the trustworthiness of logical reasoning.

Similarly, determining the probabilistic and explanatory relations between beliefs requires coherentists to take certain principles for granted. One of these is an epistemic principle concerning memory:

(M) If S seems to recall that p is the case, then S is *prima facie* justified in believing that p is the case.

¹⁴For instances of these coherentist positions, see Ewing (1934), Lewis (1946), and Thagard (2000), respectively.

This is an essential principle for coherentists because our probabilistic and abductive judgements rely on our knowledge of how the world works, i.e., our knowledge of empirical regularities. For example, we know that John's being found with cookie crumbs on his face makes it likely that he ate the last cookie because we know that cookies don't suddenly disappear, and that eating cookies can leave crumbs on one's face. Our knowledge of empirical regularities depends on our memories of previous experiences. Sometimes we experience regularities directly, and other times we learn about them through the testimony of others, but in any case, we must be able to *recall* this information in order to arrive at generalizations about how the world works. But what grounds do we have to believe that we can accurately recall information that's been presented to us in the past? Why does seeming to recall something give us reason to believe it's true? Coherentists must justify (M) by showing that it coheres with what they believe about the workings of human memory: its past performance, its evolutionary origins, etc. Yet, these are generalizations that themselves rely on the inputs of memory. Given (KC), these generalizations cannot be known until (M) is justified. And without these sorts of generalizations, coherentists are left with no way of showing that (M) probabilistically or abductively coheres with her belief system.¹⁵

Coherentism, like foundationalism, is faced with the problem of the criterion when conjoined with (KC). The argument is only slightly different:

(PC1*) A justified belief must be the outcome of a trustworthy epistemic method.

(PC2*) S can use method M to justify her beliefs only if M's epistemic and cornerstone principles are justified for S.

(PC3*) Epistemic and cornerstone principles cannot be justified by methods that presuppose them.

(PC4*) There are methods whose use is essential to determining the coherence of a belief system.

(PC5*) Therefore, the epistemic and cornerstone principles of any such essential method cannot be justified.

¹⁵For more on the problem that memory poses for coherentism, see Bonjour (1999b, 130) and Van Cleve (2005, 174).

(PC6*) Therefore, the methods S requires to establish the coherence of her beliefs cannot be trustworthy for S.

(PC7*) Therefore, S cannot establish the coherence of her beliefs.

Once again, epistemic relativists will welcome (PC3*–PC5*) as grounds for the narrow Agrippan trilemma, but seek to avoid full-blown scepticism by rejecting (PC2*). They claim that we *can* establish the coherence of our beliefs without thereby producing an objective reason to prefer our epistemic system over its alternatives. I will present the argument for this view in the next section.

4.3.2 *The Relativity of Coherence*

In Sect. 4.2.4 it was assumed that coherence is an *objective* property of belief systems, such that given any two belief systems, one is definitively more coherent than the other. Epistemic relativists will deny both components of this supposition. Even if coherence is an objective property of beliefs systems, it is a property that is instantiated to the same degree by many systems: “...there are many possible belief-sets that are equally coherent, equally capable of being held in wide reflective equilibrium, but inconsistent with each other” (Hales 2006, 79).¹⁶ Moreover, epistemic relativists can reject the view that coherence is an objective property of belief systems. Establishing the coherence of a belief system requires that we take certain methods and their fundamental assumptions for granted. If two people differ in their fundamental principles, they may also differ in their assessments of a belief system’s coherence. Galileo argues that the observations reported in his *Sidereal Messenger* cohere better with a Copernican cosmology than a Ptolemaic-Aristotelian one. The congregation of Papal Qualifiers declare Galileo’s cosmology to be incoherent on the grounds that it conflicts with authoritative interpretations of scripture. This is a case in which the disputants do not simply disagree about the relative coherence of conflicting belief systems;

¹⁶Hales (2006, 79) provides the following example: “The Catholic worldview is as meticulous and all-encompassing as the most ambitious philosophical system, indicating that belief-sets resulting from revelation fare quite well by the standards of comprehensiveness, consistency, explanatoriness and similar criteria.”

they disagree about *what it means* for a belief system to be coherent. From Galileo’s naturalistic perspective, a belief system fails to be coherent when it does not yield accurate predictions of natural phenomena. For the Qualifiers, a belief system fails to be coherent when it conflicts with well established Biblical doctrine. This being the case, relativists can argue that coherence is not the objective property that we took it to be; justification by coherence is no less subjective and variable than justification by acquaintance.¹⁷

Furthermore, relativists can use premises (PC3*–PC5*) to motivate their conclusion that there can be no rational resolution to such deep disagreements about the coherence of competing belief systems. The Qualifiers subscribe to an epistemic system that includes the following principle:

(Q) One is always justified in believing the literal word of Biblical scripture, as it is interpreted by Church authorities, and never justified in believing that which conflicts with the inerrant word of God.

Galileo subscribes to a more moderate principle:

(G) One is always justified in believing the literal word of Biblical scripture, as it is interpreted by Church authorities, unless it conflicts with well established empirical facts.

Galileo thinks of his telescopic observations as revealing empirical facts—about the lunar surface, the moons of Jupiter, and the phases of Venus—that require us to reinterpret Biblical passages that seem to endorse a geocentric cosmology. The Qualifiers insist that Galileo’s view is “foolish and absurd” because the existence of such facts is ruled out by the deliverances of scriptural revelation. Putting one’s trust in a tube of glass rather than the messengers of an omniscient God is truly incoherent!

These principles are constitutive of Galileo and the Qualifiers’ conflicting notions of coherence. For this reason, neither principle can be shown

¹⁷Consider also Rorty’s point, discussed in Sect. 3.4.3, that our understanding of the epistemic values that are constitutive of coherence—scope, accuracy, fruitfulness, consistency, and simplicity—is system-relative.

to belong to a coherent belief system without being presupposed from the outset. Relativists will not view this result as undermining the possibility of justifying beliefs by means of scriptural revelation or empirical investigation; rather, they see it as a definitive reason to dismiss the possibility of rationally privileging either of these methods of establishing coherence. Galileo has established the coherence of the heliocentric model with his observations, and the Qualifiers have established the coherence of the geocentric model with a literal understanding of scripture, but they've done so using very different notions of coherence, neither one of which is demonstrably superior to the other.

4.4 CONCLUSION

Strict internalists have sought to resist the threats of scepticism and relativism by denying crucial assumptions in the epistemic regress problem. Foundationalists deny the supposition that all justification is inferential, while coherentists deny that inferential justification is necessarily linear. Even if the epistemic regress problem can be avoided by such measures, the problem of the criterion cannot because it relies on a supposition that internalists accept: that epistemic methods can generate warrant for beliefs only if they're known to be trustworthy. Since establishing the trustworthiness of fundamental epistemic methods necessitates an appeal to the results of those same methods, this cannot be done without vicious circularity.

Strictly internalist versions of foundationalism and coherentism are thus incapable of meeting the justification requirement in a way that avoids the narrow Agrippan trilemma. Furthermore, relativists welcome the fact that on these views, putative sources of justification—acquaintance and coherence—are subjective and variable, for this, together with the system-bound nature of justification, is exactly what's required to get the narrow Agrippan trilemma off the ground. When two people disagree about the objects of acquaintance, or the nature of coherence, there can be no non-circular way of resolving this disagreement because there is no more fundamental source of justification that can be appealed to.

In order to avoid Pyrrhonian scepticism and epistemic relativism, it seems a view must reject (KC) and recognize sources of justification that are objective and invariable. Chapter 5 is a critical examination of just such a view: process reliabilism.

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Externalism

Ernest Sosa writes: “Today skepticism cum relativism has spread beyond epistemology and ethics, beyond philosophy and even beyond the academy, and its champions often wield circularity as a weapon. But, again: Is such circularity vicious?” (Sosa 2009, 195–196). As we saw in the last chapter, strict internalists answer this question affirmatively. Because they believe that epistemic methods cannot yield justified beliefs until they’re known to be trustworthy, they must reject any argument for the trustworthiness of a method that relies on its own deliverances. Yet, any attempt to justify basic methods, such as perception, memory, and introspection, must appeal to the outcomes of those same methods. The result is that basic methods cannot be trustworthy, and therefore, they cannot be used to justify beliefs. This is the problem of the criterion.

Epistemic relativists also answer Sosa’s question affirmatively. When two people disagree about the trustworthiness of their basic methods, neither party can offer anything but a question begging argument in favour of their own epistemic system. But, unlike sceptics, relativists must claim that basic methods *can* be used to justify beliefs, albeit only relative to the epistemic systems in which they function. Thus, relativists must reject the knowledge condition (KC) to avoid the problem of the criterion.

Epistemic externalists can avoid scepticism because they too reject (KC) (Van Cleve 2003).¹ The most popular species of externalism, and the main focus of this chapter, is *process reliabilism*. On the most straightforward understanding of this position, a belief is justified if it is caused by a cognitive process that reliably produces true beliefs.² Reliabilists point out that cognitive processes can *be* reliable even if we don't *know* that they're reliable, and therefore, we can have justified beliefs even if we cannot show that their sources are trustworthy.³ This is their rationale for rejecting (KC). Several reliabilists also point out that in the absence of (KC), there is no reason to think, as sceptics and relativists do, that basic methods cannot be justified by circular arguments.⁴ If a cognitive process can regularly deliver true beliefs without our knowing that it is reliable, then some of these beliefs might be used in an argument that shows the process to be reliable. Externalists thus see themselves as relieving sceptics and relativists of their main weapon: the Agrippan trilemma. More specifically, externalists reject the Agrippan conclusion that circular arguments cannot justify beliefs and methods, and thus, they can be understood as attacking premise (R5) of epistemic relativism's principal argument. Furthermore, the justifiers in a reliabilist epistemology are *objectively ascertainable* in a way that internalist justifiers are not. While objects of acquaintance and conceptions of coherence can vary from one person to another, the reliability of a cognitive process is an objective feature of the world that is potentially accessible to all epistemic agents. These considerations suggest that externalists might succeed where strict internalists failed in defending the absolutist and naturalist presumptions.

I will argue that this is not the case. While some epistemically circular arguments may be capable of generating warrant for their conclusions, they will not be rationally convincing for anyone who doesn't *already*

¹Epistemic externalism is the view that the factors responsible for a belief's justification are *external* to the believer, such that the believer need not have mental access to those factors in order for them to confer justification on her beliefs.

²Some externalists draw a subtle distinction between cognitive processes and epistemic methods. To keep the discussion in this chapter as continuous as possible with previous chapters, I will draw no such distinction.

³In some cases, perhaps very many, we cannot even correctly *identify* the sources of our beliefs. Once again, this does not prevent them from being reliable sources of true beliefs, in which case the beliefs that they produce are justified.

⁴See, for example, Van Cleve (2003, 47), Sosa (1994, 279), and Alston (1993, 271).

accept their conclusions. This will not pose a problem for the externalist's response to scepticism, if, as some argue, anti-sceptical arguments need not be dialectically effective. If an epistemically circular argument makes use of reliable cognitive processes, then its conclusion is no less justified when sceptics cannot be convinced of its truth. However, in order to successfully address the threat of epistemic relativism, arguments for basic methods and principles *do* need to be dialectically effective. If no epistemic system can be defended in a way that is rationally convincing to those who subscribe to alternative systems, then epistemic incommensurability and relativism prevail. At best, then, reliabilism can successfully meet only one of Sosa's two targets.

5.1 RELIABILISM AND THE REJECTION OF (KC)

Let's review the sceptical consequences of (KC). (KC) says that a method cannot be trustworthy unless we *know* it is trustworthy, i.e., unless we know that it meets the conditions required of a justification conferring method. It follows that a method can be trustworthy only if its epistemic and cornerstone principles are justified, since their being unjustified is incompatible with our knowing that the method is trustworthy. So, for example, deductive reasoning cannot be trustworthy unless we are justified in believing that modus ponens (MP) is a truth-preserving rule of inference. It also follows that epistemic and cornerstone principles cannot be justified by the methods that presuppose them. Since we must be justified in believing that MP is truth-preserving *before* deductive reasoning can be trustworthy, we cannot use deductive reasoning to prove that MP is truth-preserving. The sceptical conclusion is that basic methods whose epistemic and cornerstone principles must be defended by means of epistemically circular arguments, cannot be trustworthy, and therefore they cannot yield justified beliefs.

We can avoid this kind of radical scepticism by denying what (KC) asserts, namely that our knowing that an epistemic method meets the conditions required of a trustworthy method is itself one of the conditions that must be met. If we don't need to *know* that a method is trustworthy in order for it to *be* trustworthy, then the problem of the criterion can be averted. Without this further condition, we are no longer committed to the view that a method cannot be trustworthy unless its epistemic and cornerstone principles are justified. Instead, these principles need only be *true* (Van Cleve 1979). If deductive reasoning is

trustworthy, then MP must simply *be* truth-preserving, not *provably* truth-preserving. And if our being entitled to a method's epistemic and cornerstone principles is not a precondition of its trustworthiness, then there is no reason to think that we cannot use a method to justify its own epistemic and cornerstone principles. If deductive reasoning is trustworthy, then MP is truth-preserving, and one of the things that we can come to know via deductive reasoning is that MP is truth-preserving.

This same strategy will suffice to break the Cartesian Circle. Descartes claims to know that his clear and distinct ideas faithfully represent the world on the grounds that they were implanted in his mind by God. Arnault accuses Descartes of viciously circular reasoning because his argument for God's existence makes essential use of his clear and distinct ideas. If Descartes must establish the trustworthiness of his clear and distinct ideas *before* they can function as a source of justification, then his reasoning for God's existence is indeed viciously circular. Arnault thinks that this is the case, but Descartes can be read as committing himself to the view that his clear and distinct ideas need only deliver the truth in order to be a source of justification—he doesn't need to *know* that they deliver the truth. If Descartes is correct, then his argument is not viciously circular; he can appeal to his clear and distinct ideas to establish the existence of God, as long as these ideas faithfully represent the world. Since he does not need to know that they faithfully represent the world in order for the argument to be successful, he doesn't need to presuppose that there is a God who safeguards the truth of his clear and distinct ideas.

Externalists are especially well positioned to endorse this strategy for avoiding the problem of the criterion, since they claim that the factors responsible for the justification of beliefs and methods can be external to the cognitive perspectives of epistemic agents. There are many variations of externalism, but this chapter will focus on process reliabilism because of its popularity. A method can clearly be a reliable source of true beliefs without our knowing that this is the case, therefore reliabilists need not be committed to (KC). And if a method does reliably yield true beliefs, it can be used to track its own reliability without vicious circularity. As long as deductive reasoning is conditionally reliable, a soundness proof arrived at deductively is sufficient to show that it is conditionally reliable. More generally, Sosa says:

Suppose W is our total way of forming beliefs. If we believe that W is reliable, $R(W)$, our belief $B: R(W)$ is itself formed by W . And if a belief is justified iff formed in a reliable way, then our $B: R(W)$ is justified iff W is reliable (given that it is formed by W). $B: R(W)$ is justified, therefore, iff W is reliable. (Sosa 1994, 279)

Justifications of our basic methods *must* be epistemically circular. Therefore, radical scepticism can be avoided only if such arguments can confer warrant on their conclusions. Reliabilists insist that they can.

In order to avoid scepticism, it is enough to deny that (KC) *always* holds. Thus, reliabilists are free to claim that *sometimes* methods must meet (KC) in order to be trustworthy. Sosa maintains such a moderate position; he distinguishes between two types of knowledge on the basis of whether or not they must satisfy (KC). What he calls *animal knowledge* need only be produced by a reliable cognitive process: my dog and I both know that it is sunny outside because we can see that it is sunny. This knowledge does not depend on our knowing that the cognitive processes involved are reliable, i.e., it need not meet (KC). This is why it's *animal* knowledge: my dog obviously cannot defend his belief that it is sunny outside on the grounds that his visual perception is reliable. I, on the other hand, can defend my belief in this way, which gives me a capacity for *reflective knowledge* that my dog lacks. In order to do so, I must be able to justify my conviction that my visual perception is reliable, so reflective knowledge does have to meet (KC).

Sosa recognizes that arguments for the reliability of basic methods must be epistemically circular, but he denies that they must be *viciously* circular. This claim relies on the insight that reflective knowledge requires animal knowledge, but we can have animal knowledge without having reflective knowledge. This being the case, we can give a coherent account of our animal knowledge as arising from reliable cognitive faculties without having to presuppose that they are reliable. One such argument goes as follows:

(V1) I know that it's sunny outside, that there is a tree outside my window, that my neighbour is mowing his lawn, etc.

(V2) I can see that it's sunny outside, that there is a tree outside my window, that my neighbour is mowing his lawn, and that is how I know these things.

(V3) So my visual perception of these things explains how it is that I know them.

(V4) But my visual perception could not be a source of knowledge if it were an unreliable epistemic faculty.

(V5) So, my visual perception must be a reliable epistemic faculty.⁵

The argument is epistemically circular because (V1) cannot be true unless (V5) is true. But because (V1) expresses animal knowledge, it can be *known* independently of my reflective knowledge of (V5): I can have animal knowledge of the things that I see *without* knowing that my visual perception is a reliable source of true beliefs, as long as it *is* a reliable source of true beliefs.

The externalist's strategy blocks the move from the Agrippan *trilemma* to the Agrippan *conclusion*; in the argument for epistemic relativism, this is the step from (R4) to (R5). Externalists recognize that arguments for the truth-conduciveness of an epistemic system must be epistemically circular, but deny the supposition, shared by sceptics and relativists, that epistemically circular arguments can *never* generate warrant for their conclusions. Unlike strict internalists, externalists do not attempt to meet the Agrippan challenge, but *reject* the challenge altogether. They argue that if an epistemic system is reliably truth-conducive, then it has the resources necessary to establish that this is the case. And if it is *more* truth-conducive than its alternatives, then it has the resources to establish this too. Consequently, there's no reason to think that the absolutist and naturalist presumptions cannot be defended in a way that meets the justification requirement.

5.2 PROPER ASSURANCE OBJECTIONS

Strict internalists insist that externalists cannot use epistemically circular arguments to answer the Pyrrhonian challenge because such arguments cannot be *rationally convincing*, even if they do confer justification on our beliefs. There are several such arguments, which I will call *proper assurance objections*. Each objection seeks to highlight a particular respect in which the epistemically circular arguments are deficient. Responses to these objections typically claim that the arguments do not possess the

⁵For a similar argument, see Sosa (2009, 184–185).

deleterious feature in question, or that they do but the feature is not deleterious.

I will present three proper assurance objections, together with their responses, without taking a stand on whether or not they succeed in undermining the externalist's strategy of avoiding scepticism. Instead, I wish to show that an epistemically circular argument can meet the conditions externalists identify as being necessary for an adequate response to scepticism, yet nonetheless fail to provide us with the kind of justification required to defuse the threat of epistemic relativism. This result reinforces my main contention that Pyrrhonian scepticism and epistemic relativism present distinct challenges that require distinct responses.

5.2.1 *The No Doubt Constraint*

The first objection targets not only epistemically circular justifications, but reliabilist justifications more generally. Internalists argue that reliabilists can provide nothing more than a *conditional* justification for their beliefs:

If, for example, an epistemologist claims that a certain belief or set of beliefs, whether his own or someone else's, has been arrived at in a reliable way, but says this on the basis of cognitive processes of his or her own whose reliability is merely for him or her merely an external fact to which he or she has no first-person access, then the proper conclusion is merely that the belief or beliefs originally in question are reliably arrived at (and perhaps thereby are justified or constitute knowledge in externalist senses) if the epistemologist's own cognitive processes are reliable in the way that he or she believes them to be ... But the only apparent way to arrive at a result that is not ultimately hypothetical in this way is for the reliability of at least some processes to be establishable on the basis of what the epistemologist can know directly or immediately from his or her own first-person perspective. (BonJour 2001, 64)

According to reliabilists, I am justified in believing that I am seated at my desk *if* my perceptual faculties regularly produce true beliefs. For internalist foundationalists, on the other hand, my justification for this belief ultimately depends on the contents of my experience with which I am immediately acquainted. Internalists can thus provide what Fumerton calls an unconditional "assurance of truth" that reliabilists cannot, and

it is this assurance, he argues, that's required to adequately answer the sceptical challenge (Fumerton 2006, 2008).

Of course, reliabilists claim that our perceptual faculties *are* reliably truth-conducive, and therefore our perceptual beliefs are justified. But this response only pushes the problem back a step, for internalists and sceptics want to know *how* reliabilists know that our perceptual faculties are reliable. At this point, as we've seen, reliabilists must resort to an argument that appeals to the deliverances of perception. There is nothing vicious about such an argument from their point of view, but it will be successful only *if* its conclusion is true, i.e., only if perception is a reliable cognitive faculty. Reliabilists, then, are *never* in a position to offer anything more than a conditional justification. And what's more, Fumerton maintains that reliabilists are reticent to even affirm the antecedents of their conditional claims:

To be sure, [externalists] might argue that if memory is reliable then we can form justified beliefs about the reliability of memory this way [by appealing to memory and inductive reasoning], but they feel uncomfortable simply asserting that they have justified belief about the reliability of memory formed in this way. Why? Because at some level they realize that in asserting the critical antecedent of the conditional claims they go beyond what they are in a position to assert qua philosophers trying to satisfy philosophical curiosity. (Fumerton 2006, 189)

By contrast, internalists can know by means of direct acquaintance that perceptual, recollective, and inductive beliefs are highly probable, and therefore, they are once again able to provide the kinds of philosophical assurances that reliabilists cannot.

While some reliabilists may be uncomfortable asserting the antecedents of their knowledge claims, this is certainly not true of all or perhaps even most of them. Sosa, for one, proclaims:

...I see no reason why the perceivers must be restricted to affirming only the conditional that *if* perception is reliable then they know. I see no reason why they cannot also affirm the antecedent, why they cannot believe, both rationally and aptly, that perception *is* reliable and does enable them to know. (Sosa 2009, 202)

Reliabilists like Sosa claim to know that their basic cognitive faculties *are* reliable on the basis of knowledge achieved through these faculties.

If this reflective knowledge is coherent, and their faculties are reliable, then nothing more could be asked of them. Of course, it could turn out that their faculties are not reliable, but they no more have to countenance this possibility as part of their knowledge claims than internalists have to admit the possibility of error in theirs (Kornblith 2014, 155). In their view, reliabilists are no less capable of making unconditional knowledge claims than internalists.

Reliabilists insist that if our basic cognitive faculties are reliable, then we can come to know that they're reliable by exercising these same faculties. And they assert that these faculties *are* reliable. This is why they see themselves as offering something more than a merely hypothetical justification. Thus, in addition to its being true that perception is reliable, reliabilists must *not doubt* that perception is reliable, in order for their epistemically circular arguments for the reliability of perception to succeed.

The *no doubt constraint*: if the conclusion of an epistemically circular argument is in doubt, then the argument fails to justify the conclusion.⁶

When the no doubt constraint is violated, reliabilists cannot achieve reflective knowledge of the reliability of their basic cognitive faculties; one cannot coherently doubt the reliability of perception while using its deliverances to establish its reliability.

When the no doubt constraint is satisfied, reliabilists' epistemic claims are not conditional, but *contingent*: perception *could* be unreliable, in which case our perceptual beliefs would be unjustified, but reliabilists don't think that it is. For internalists like Fumerton, on the other hand, perceptual experiences *necessarily* confer non-inferential justification on basic beliefs. Perhaps this is another reason why he thinks that internalists can provide an 'assurance of truth' that reliabilists cannot. Yet, as Kornblith points out, externalists are not interested in these sorts of assurances:

⁶This constraint, or something like it, is endorsed by a number of externalists. See Alston (1986, 15), Bergmann (2004, 717), Pryor (2004, 365), and Markie (2005, 409). For an internalist who endorses this constraint, see Boghossian (2006, 100). For doubts concerning the no doubt constraint, see Vogel (2008, 538–539).

Externalists do not in any way fail to meet their own standards; they merely fail to meet internalist standards. And this does not show a problem with externalism – that they cannot make unconditional claims to have justified beliefs – unless there is an independent [*sic*] argument that externalism is an inadequate theory of justified belief. (Kornblith 2014, 156)

If one thinks that the epistemic status of a belief is determined by the reliability of the cognitive process(es) that caused it, it would be foolhardy to seek or expect any *necessary* truths about which of her beliefs are justified. In the absence of some further reason to reject this view of justification, her position constitutes a coherent alternative to scepticism.

5.2.2 *Dialectical Effectiveness*

Though the no doubt constraint doesn't prevent externalists from coming to know that their basic cognitive faculties are reliable, it does impose a rather significant limitation on epistemically circular arguments. Bergmann writes:

...an argument is commonly evaluated in terms of how useful it would be in convincing someone who initially doubts its conclusion. An epistemically circular track record argument [for the reliability of perception] fails abysmally by that standard. It is of no use whatsoever to anyone who begins by questioning its conclusion. (Bergmann 2004, 720)⁷

In particular, epistemically circular arguments will be ineffective when deployed against Pyrrhonian sceptics. Since sceptics do doubt the conclusions of epistemically circular arguments for the reliability of basic cognitive faculties, they cannot be rationally convinced by such arguments. This fact calls into question the legitimacy of presenting epistemically circular arguments as *responses* to Pyrrhonian scepticism.

Fumerton can be read as making this point:

⁷For similar remarks on the limitations of epistemically circular arguments, see Alston (1986, 15), Pryor (2004, 366), and Markie (2005, 415).

...if as a philosopher I start wondering whether perceptual beliefs are accurate reflections of the way the world really is, I would not dream of using perception to resolve my doubt. Even if there is some sense in which the reliable process of perception might yield justified beliefs about the reliability of perception, the use of perception could never satisfy a *philosophical curiosity* about the legitimacy of perceptual beliefs. When the philosopher wants an answer to the question of whether memory gives us justified beliefs about the past, that answer cannot possibly be provided by memory. (Fumerton 1995, 177–178)

If the reliabilist is correct, then her cognitive faculties are reliable and she knows that they are reliable by means of those same faculties. Even so, she cannot *rationally persuade* a sceptic who doesn't believe that his faculties, or anyone else's, are reliable (though he doesn't believe that they are unreliable, either). And because epistemically circular arguments are incapable of satisfying philosophical curiosities, they fail to count as successful replies to Pyrrhonian scepticism.

This objection reveals that arguments can have two functions: they can *justify* the beliefs of epistemic agents, and they can be used by epistemic agents to *show others* that their beliefs are justified. It is important to notice that arguments can satisfy the first of these goals without satisfying the second. Such arguments achieve what Boghossian (2001) calls a *non-suasive* justification, as opposed to a *suasive* justification, which accomplishes the second aim. Thus, as Pryor points out, epistemically circular arguments can fail to be rationally persuasive, yet succeed in conferring non-suasive justifications on their conclusions:

[An epistemically circular argument] doesn't give [an epistemic agent] a piece of reasoning she can *rationally* accept, while starting from a position of having that doubt. To be sure, that's some kind of failing. But it's a deficiency in the argument's *persuasive* power, not in its justificatory structure. (Pryor 2004, 366)

The central point of contention concerns whether or not an argument's failing to confer a *suasive* justification on its conclusion disqualifies it as a successful response to scepticism. If, as Fumerton seems to think, this is the case, then reliabilists' epistemically circular arguments are so disqualified.

Sosa argues, however, that a suasive justification is not a reasonable goal of anti-sceptical arguments:

Of course, one could not thus “show” the radical enough skeptic the error of his ways, *with dialectical propriety* (which precludes question-begging). However, since this is so obviously impossible even for God to attain, we should simply reject the implication that we fall short in any way that matters, if we cannot attain it. Falling short of the obviously impossible simply shows that we are wasting our time with an improper endeavor. (Sosa 2012, n. 12)⁸

The fact that sceptics cannot be rationally persuaded to believe (or disbelieve) *anything*, far from a confirmation of their position, actually removes them from our realm of epistemological concern. There is no point in engaging such persons in reasoned argument, because they eschew the aim of such a process, namely to publicly justify one’s beliefs. Similarly, we cannot play chess with those who refuse to recognize the rules of the game, but this limitation is not a failing of *ours*. Thus, we cannot be faulted when our arguments fail to convince sceptics of the reliability of our basic cognitive faculties, for no one has an epistemic obligation to do so.

5.2.3 *The Discrimination Problem*

Alston insists that arguments for the reliability of an epistemic method have yet another function: to *discriminate* reliable from unreliable methods. And though he thinks that epistemically circular arguments are capable of justifying our reliable methods, he denies that they can fulfil this discriminatory function:

...if *sense perception is reliable*, a track-record argument will suffice to show that it is. Epistemic circularity does not in and of itself disqualify the argument. But even granting that point, the argument will not do its job unless we are justified in accepting its premises; and that is the case only if sense perception is in fact reliable. And this is to offer a stone instead of bread. We can say the same of any belief-forming practice whatever, no matter how disreputable. We can just as well say of crystalball gazing that if it is reliable, we can use a track record argument to show that it is reliable. But when we ask whether one or another source of belief is reliable, we are interested in *discriminating* those that can reasonably be trusted from those that cannot. Hence merely showing that if a given source is

⁸For a similar view, but with an internalist orientation, see Boghossian (2001, 37).

reliable it can be shown by its record to be reliable, does nothing to indicate that the source belongs with the sheep rather than with the goats. I have removed an allegedly crippling disability, but I have not given the argument a clean bill of health. (Alston 1993, 120).

An epistemically circular argument for the reliability of perception does nothing to distinguish it from other methods, such as crystal ball gazing, because many other methods can be justified by means of their own deliverances. The crystal ball gazer can read the reliability of crystal ball gazing in her crystal ball just as the empiricist can justify perception on the basis of its perceived successes. So, even if such arguments can serve as a proper response to scepticism, they are deficient in an important respect.

In response, Sosa denies that epistemically circular arguments suffer from this deficiency. While the empiricist and the crystal ball gazer have the same reflective justification for their methods, only one of their methods actually is reliable, and this is what distinguishes them. He argues that the gazer's epistemically circular argument can neither justify her method nor distinguish reliable from unreliable methods, but the empiricist's epistemically circular argument can accomplish both of these things:

...why not distinguish between the gazers and the perceivers in that, although both reason properly and attain thereby coherence and justification, only the perceivers are more fully epistemically competent and attain knowledge?

On this view, the crystal-gazers differ from the perceivers in that gazing is not reliable while perceiving is. So the theory of knowledge of the perceivers is right, and that of the gazers wrong. Moreover, the perceivers *can* know their theory to be right when they know it in large part through perception, since their theory *is* right and perception can thus serve as a source of knowledge. The gazers are by hypothesis in a very different position. Gazing, being *unreliable*, cannot serve as a source of knowledge. So the perceivers have a good source or basis for their knowledge, but the gazers, lacking any such source or basis, lack knowledge. (Sosa 2009, 200)

Empiricists have empirical evidence that perception is a reliable epistemic method and crystal ball gazing is not. Since perception *is* a reliable method, they *can* distinguish it from unreliable methods. Crystal ball gazers have crystal ball evidence that crystal ball gazing is a

reliable epistemic method. But because crystal ball gazing is *not* a reliable method, they *cannot* distinguish it from unreliable methods. In short, the fact that *some* epistemically circular arguments fail to discriminate reliable from unreliable methods does not entail Alston's conclusion that *all* of them fail to do so.

Battaly (2012) argues that this response fails to address Alston's key concern in the problem of discrimination. Using Alston's terminology, she says the problem is that the empiricist can justify perception by means of an epistemically circular argument, but cannot *show* the crystal ball gazer that perception is reliable by means of such an argument. Consequently, she claims that we cannot use epistemically circular arguments to distinguish reliable from unreliable methods, or to guide our epistemic practices.⁹

Once again, Sosa balks at this objection, saying that what Alston and Battaly call 'showing' is indistinguishable from reflective, competent justification. If one's methods *are* reliable, one *believes* that they are reliable, and one is *justified* in believing that they are reliable, then one *can* show her dialectical opponent that they are reliable (Sosa 2012, 230). What more could be necessary?

Alston and Battaly do not explicitly spell out how showing differs from justification, but I think we are now in a position to do so in a way that brings the discrimination problem into sharper focus. In the last section, we distinguished between non-suasive and suasive justifications, and noted that arguments can accomplish the former without accomplishing the latter. I now want to say that what Alston and Battaly call showing is suasive justification. A suasive justification must satisfy what Lynch calls the recognition constraint:

The recognition constraint: "where *A* gives a reason ...of some type to *B* for some *p*, it must be possible for *B* to recognize, from his standpoint, that it is a reason". (Lynch 2010, 27)

Sosa's account of reflective knowledge motivates this constraint. Reflective knowledge is achieved by producing an apt, *coherent* account

⁹Battaly also thinks that epistemically circular arguments cannot show sceptics that our basic methods are reliable, but as we've seen, Sosa doesn't think that we are under any epistemic obligation to accomplish this impossible task.

of one's beliefs and their reliable sources. If *B* does not recognize the reason offered by *A* for *p* as a justifying reason, then it would be *incoherent* for *B* to accept *p* on those grounds. Arguments that fail to satisfy the recognition constraint cannot produce reflective knowledge in their target audience because their premises fail to confer a suasive justification on their conclusions. Such arguments can be sources of non-suasive justification, however.

Epistemically circular arguments that fail to satisfy the no doubt constraint will also fail to satisfy the recognition constraint. If the crystal ball gazer doubts that perception is a reliable source of true beliefs, the empiricist's track-record argument cannot *show* her that this is the case, because the gazer will not recognize the premises as reasons to accept the conclusion. If perception is a reliable source of true beliefs, the empiricist's argument constitutes a non-suasive justification that licences her belief that this is the case, but not a suasive justification that obliges the gazer to believe the same thing. And this is what leads to the problem of discrimination. Though one person can distinguish reliable from unreliable methods using epistemically circular arguments, a *group* of people using *different* methods cannot use epistemically circular arguments to collectively determine whose methods are reliable and whose aren't. Lynch makes the same point: "We may well know (via an epistemically circular argument perhaps) which basic methods are reliable. But that fact has absolutely no traction when one is trying to justify employment of a method in the face of disagreement" (*ibid.*, 270).

The problem of discrimination is often framed as a problem with the externalist's response to scepticism. Battaly herself frames it this way (Battaly 2012, 304–306).¹⁰ When posed in this way, however, it doesn't seem all that troubling. We cannot be expected to show sceptics that our epistemic methods are reliable because sceptics refuse to countenance any methods at all; they are not interested in discriminating reliable from unreliable methods, and regard any attempt to do so as ill-fated. On the other hand, we do want to be able to show those who use methods other than ours that our basic methods are reliable. If epistemically circular arguments are our only means of doing so, and they cannot yield a suasive justification when their conclusions are in doubt, then we must fail in this endeavour. Thus, we now see that the problem of discrimination

¹⁰So does Stroud (1989).

actually turns out to be the problem of epistemic relativism. With this new understanding in hand, we can be even more specific about what the problem is.

5.3 EPISTEMIC CIRCULARITY, BEGGING THE QUESTION, AND EPISTEMIC RELATIVISM

If reliabilists are correct, then epistemically circular arguments *can* be sources of suasive justification. One empiricist can rationally convince another empiricist that she is right to accept the deliverances of perception by pointing out that perception has a track record of reliably producing beliefs whose truth has been perceptually confirmed. Epistemically circular arguments cannot be a source of suasive justification when their conclusions are in doubt. Descartes cannot convince an empiricist of the reliability of his clear and distinct ideas by appealing to his clear and distinct idea of a benevolent God. Thus, the problem is not with epistemically circular arguments per se, but with *question-begging* arguments.¹¹ Since these arguments fail to meet the recognition constraint, they are incapable of conferring suasive justifications on their conclusions, and therefore, they cannot be used to rationally resolve cases of epistemic incommensurability (Lynch 2010). If alternative epistemic systems cannot be defended *without* question-begging arguments, then relativists gain their point. We can thus revise the principal argument for epistemic relativism as follows:

(R1*) The *system-bound* nature of epistemic judgements: reasoned epistemic judgements are made possible by systems of basic beliefs and methods.

(R2*) *Epistemic pluralism*: there are many alternative epistemic systems.

(R3*) *Epistemic incommensurability*: given (R1*) and (R2*), two or more inquirers may differ with respect to an epistemic judgement because they subscribe to distinct epistemic systems.

(R4*) *Begging the question*: in the face of disagreement about epistemic systems, no system of basic beliefs and methods can be defended without a question-begging argument, i.e., the recognition constraint cannot be satisfied.

¹¹On this point, see Markie (2005).

(R5*) *No suasive justification*: since question-begging arguments do not confer a suasive justification on their conclusions, basic beliefs and methods cannot be justified by rationally compelling reasons.

(R6*) *Epistemic equality*: given (R5*), there can be no objectively compelling grounds for preferring any epistemic system over its alternatives, and therefore there can be no principled way of resolving cases of epistemic incommensurability.

(R7*) *Epistemic relativism*: the justification of a belief or method can lend it rational credibility only within the epistemic system within which it is being evaluated.¹²

In this revised argument, (R4) and (R5) have been replaced by (R4*) and (R5*), while the other premises remain unchanged. This amounts to replacing the narrow version of the Agrippan argument with a narrow version of the argument from relativity and dispute (see Sect. 2.2). If this is a more accurate and charitable reconstruction of the principal argument for epistemic relativism, then it is small wonder that responses to the Agrippan trilemma have failed to adequately address the threat of relativism. This point will be revisited in the next chapter.

It is worth emphasizing that the recognition constraint does *not* rule out circular justifications. This means that our defense of the absolutist and naturalist presumptions *can* presuppose the resources of a particular epistemic system, as long as those resources are not doubted by those who subscribe to rival systems. I will present just such an argument in Chapter 9.

5.4 CONCLUSION

One way of avoiding the problem of the criterion is to reject (KC). This is the route taken by reliabilists, who claim that beliefs are justified when they are produced by reliable cognitive processes, regardless of whether or not we know the processes to be reliable. Furthermore, reliabilists insist that if a cognitive process is reliable, then its deliverances can be used to determine that it is reliable. This procedure is circular, but not viciously so in the absence of (KC).

¹²To put this conclusion in Sosa's terms: the kind of justification required for *reflective* knowledge is system-relative. The kind of justification required for animal knowledge, i.e., brute reliability, is not.

If relativists avoid scepticism by rejecting (KC) as well, then they have no grounds on which to pronounce that all epistemically circular arguments are vicious. Reliabilists have identified conditions that such arguments must meet in order to confer a justification on their conclusions. What these arguments cannot accomplish, however, is to rationally persuade those who doubt their conclusions. While this may not be a problem for the reliabilist's response to scepticism, it does prevent her from adequately responding to a more nuanced argument for epistemic relativism. This argument focuses on the need for suasive justifications to resolve cases of epistemic incommensurability, and exploits the fact that question-begging arguments are incapable of generating this type of justification. If epistemically circular arguments can generate warrant for their conclusions only when those conclusions are not in doubt, then we can justify our epistemic system to those who already subscribe to the system, thus avoiding scepticism, while being unable to justify it to those who subscribe to incompatible systems, thus reinforcing relativism.

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Particularism and Methodism

One way of avoiding the problem of the criterion is to deny the sceptic's supposition that an epistemic method cannot yield justified beliefs unless we know it to be trustworthy—I have called this requirement the *knowledge condition*, or (KC) for short. As we saw in the last chapter, several externalists have taken this approach, and indeed it fits well with their conception of epistemic justification. However, Roderick Chisholm's (1982) classic treatment of the problem of the criterion reveals that externalists are not alone in rejecting (KC); some internalists do so as well, including Chisholm himself. He calls the position that results from rejecting (KC) *particularism* because it says that particular beliefs can constitute knowledge *without* having been arrived at by demonstrably trustworthy methods. Chisholm also formulates a second response to the problem that involves rejecting a different sceptical supposition, namely that epistemic methods are not trustworthy until they can be shown to yield justified true beliefs. He calls the position that results from rejecting this supposition *methodism*. Yet another approach, that Chisholm does not discuss, is to think of beliefs and methods as being in a relation of reciprocal epistemic dependence: beliefs and methods must be adjusted so as to achieve a *reflective equilibrium* that confers epistemic justification on them both. Each of these positions involves biting the Agrippan bullet. Methodists and particularists claim that epistemic methods and beliefs can be justified without recourse to further methods and beliefs; from the sceptic's perspective, this amounts to terminating the regress of justification by means of dogmatic assertion. Those who favour reflective

equilibrium insist that epistemic methods and beliefs can justify one another in a circular fashion.

If any of these positions is correct, then the Agrippan challenge doesn't have to be met in order to justify epistemic methods and beliefs, and scepticism can be averted. And if *basic* methods and beliefs can be justified without having to meet the Agrippan challenge, then the fifth premise (R5) of the principal argument for epistemic relativism, as it is formulated in Chapter 2, is false. It would make sense, then, to exploit one of these positions in an effort to resist epistemic relativism. Howard Sankey and Steven Luper have done precisely this. Yet, I will argue that their anti-sceptical strategies fail to undermine epistemic relativism. Having reformulated the argument for epistemic relativism in the last chapter, we now know that it is *question-begging* arguments, rather than dogmatic or circular arguments, that must be avoided when defending an epistemic system because such arguments fail to generate suasive justification. Since the particularist, methodist, and reflective equilibrium approaches to evaluating alternative epistemic systems do involve question-begging arguments, they cannot successfully mitigate the threat of epistemic relativism.

6.1 PARTICULARISM, METHODISM, AND REFLECTIVE EQUILIBRIUM

On Chisholm's reconstruction, the problem of the criterion arises when one attempts to answer the following questions (Chisholm 1982, 65):

- (A) *What* do we know? What is the *extent* of our knowledge?
- (B) How are we to decide *whether* we know? What are the *criteria* of knowledge?

The first question asks which of our beliefs are justified and true. The second asks what methods we have of determining when a belief is justified and true. The problem is:

You cannot answer questions A until you have answered question B. And you cannot answer question B until you have answered question A. Therefore you cannot answer either question. You cannot know what, if anything, you know, and there is no possible way for you to decide in any particular case. (ibid., 66)

This argument depends on the following two commitments:

- i. In order to be known, a belief must be justified by a trustworthy epistemic method.
- ii. In order to be trustworthy, an epistemic method must yield justified, true beliefs.

One cannot determine whether a belief is justified and true unless one knows how to demarcate true or justified beliefs from false or unjustified ones. And one cannot determine which methods of demarcation work best unless one knows which beliefs are justified and true. If we accept (i) and (ii), then we must admit that neither (A) nor (B) can be answered first, and therefore, neither can be answered at all. The result, Chisholm concedes, is the sceptical conclusion that we are incapable of justifying our beliefs and methods, and therefore we should adopt the policy of suspending judgement.

However, he argues that the sceptic's approach to answering (or not answering) (A) and (B) by presupposing (i) and (ii) is only *one* possible approach among others. Alternatively, the *particularist* approach is to accept (ii) and reject (i). Particularists begin by identifying paradigmatic instances of justified, true beliefs, without having to establish the trustworthiness of the methods used to know them. They then use these beliefs to determine which epistemic methods are trustworthy. Chisholm finds this strategy exemplified in Moore's proof of an external world. Moore confirms his belief that he has two hands by holding them up in plain sight. Armed with this knowledge, together with his knowledge of its genesis in visual perception, Moore can make the case that visual perception is a trustworthy epistemic method.

The *methodist* approach is to accept (i) and reject (ii). She begins by countenancing paradigmatically trustworthy methods, without appealing to their deliverances, and then uses these methods to discern what it is that she knows. Chisholm sees this approach taken by the British empiricists whose philosophical programmes presuppose that experience is a source of knowledge. Indeed, many of these programmes seek to show that experience is our *only* source of knowledge. From this perspective, facts about our two hands, like all facts about the external world, can be known only because experience is a trustworthy guide when distinguishing true beliefs from false ones.

The particularist and the methodist answer (A) and (B) without circularity, but they do so by taking certain beliefs or methods for granted. Consequently, the sceptic can rightfully accuse them of falling on the dogmatist horn of Agrippa's trilemma by assuming what they need to defend, e.g.: that one is justified in believing that he has two hands, or that perceptual experience is a source of knowledge. Chisholm admits that this is the case, but sees no alternative for avoiding the sceptic's conclusion:

What few philosophers have had the courage to recognize is this: we can deal with the problem only by begging the question. It seems to me that, if we do recognize this fact, as we should, then it is unseemly for us to try to pretend that it isn't so.

One may object: "Doesn't this mean, then, that the skeptic is right after all?" I would answer: "Not at all. His view is only one of the three possibilities and in itself has no more to recommend it than the others do. And in favor of our approach there is the fact that we *do* know many things, after all." (ibid., 75)

Particularists and methodists realize that the Agrippan trilemma cannot be avoided. But where sceptics see this as a reason to suspend judgement, they see it as cause to believe that knowledge must arise in one of the three Agrippan forms, namely the form of dogmatism. Thus, particularists and methodists do not seek to answer the problem of the criterion because they do not recognize it as a problem in the first place.

Those who seek to justify beliefs and methods by reaching a reflective equilibrium take a different approach. They accept both (i) and (ii) but deny the sceptic's further supposition that because neither (A) nor (B) can be answered first, they cannot be answered at all. This is a false dilemma, for it may be that these questions can be answered *concurrently*. Indeed, if knowledge is possible, and neither question can be answered first, then they *must* be answered concurrently. We must determine what we know by using trustworthy methods, *and* determine which methods are trustworthy by consulting what we know. I know that I have two hands on the basis of my visual perception, and I am assured that visual perception is trustworthy because it confirms the fact that I have two hands.

Of course, this approach also begs the sceptic's question because it assumes that there's nothing amiss with circular justifications. It is, like

the particular and methodist responses, a *rejection* of the problem of the criterion, rather than a solution to it.

If the problem of the criterion can be rejected in favour of one of these three approaches, then perhaps the same approach offers the resources necessary to resist epistemic relativism. If we can reject the sceptic's insistence that we avoid the Agrippan trilemma when justifying beliefs and methods, perhaps we can reject the relativist's insistence that we do likewise when justifying basic beliefs and methods. Sankey and Luper have both attempted to exploit this possibility. Sankey advocates a particularist response to the threat of epistemic relativism, while Luper's response is neutral with respect to the three positions. I will argue that neither of these responses succeed because they cannot be used to defend the absolutist or naturalist presumptions in a way that meets the recognition constraint.

6.2 SANKEY'S NATURALISTIC PARTICULARISM

According to Sankey's naturalistic particularism:

It is possible to combine a particularist stance with the naturalistic view that epistemic norms are subject to empirical evaluation. For if we think of epistemic norms as themselves subject to empirical test, then we are able to evaluate norms on the basis of knowledge that is obtained in an empirical manner. (Sankey 2010, 8)¹

This approach is *particularist* because it begins by identifying facts about the trustworthiness of epistemic practices without having to provide a justification for the methods that reveal these facts. It is *naturalistic* because the facts at issue are empirical facts about the reliability of the practices in question. On this approach, epistemic practices are trustworthy when they have an empirical track record of generating true beliefs, and disagreements about rival epistemic practices are resolved by comparing their track records. In this way, Sankey says, naturalistic particularism "...enables a distinction to be made between epistemic norms for which there is an objective, rational justification, and those for which there is no such justification" (ibid., 9).

¹Sankey defends this strategy in a series of articles: Sankey (2010, 2011, 2012, 2013, 2014a, 2015).

Sankey applies his naturalistic particularism to the case of the Azande tribe who treat poison oracles as reliable sources of information about the world (see Sect. 2.3.a). This practice will appear to the uninitiated as superstitious nonsense, yet it plays a central role in the affairs of the Azande. How do we rationally arbitrate this epistemic dispute? Sankey answers:

...empirical evidence of the reliability of the poison oracle is required in order to determine whether or not the poison oracle is an instrument that is capable of providing questioners with truth or knowledge in relation to the questions that are posed to it. (ibid., 10)

He admits that this cannot be done straightforwardly, since one of the poison oracle's primary functions is to detect witchcraft substance, which is not empirically detectable. However, it can be done indirectly, using what Kitcher (2001) calls the *Galilean strategy*. Galileo used his telescope to gather information about things that are invisible to the naked eye, such as the moons of Jupiter and the phases of Venus. Thus, Galileo had no way of independently confirming his telescopic observations, which were frequently dismissed because they conflicted with the long-standing Ptolemaic-Aristotelian cosmology (Sect. 2.3.b). But Galileo also used his telescope to make observations that could be independently checked, observations of distant buildings and ships coming into harbour. Using his telescope's track-record of making accurate observations on a relatively small scale, Galileo argued that it can also be counted on to deliver accurate information about phenomena at a much greater distance. Sankey argues that the same strategy can be used to assess the trustworthiness of the poison oracle. In addition to detecting witches, the poison oracle is used by the Azande to answer empirical questions, "...which include questions relating to such matters as births and deaths, sicknesses, where to build a home, whether to take a job, how to end a drought, and so on" (ibid., 10). So, the naturalistic particularist can use the oracle's track record in answering these empirical questions to rationally evaluate its reliability in delivering information about non-empirical phenomena. If the poison oracle does little better than chance when predicting weather, sickness, natural disasters, and so on, then the particularist has good reason to reject the Azande's epistemic practice as superstition. If, on the other hand, we find that it has a positive track record that cannot be attributed to its surreptitious reliance on some other epistemic method, then the particularist has reason to accept it.

As long as epistemic methods deliver results whose accuracy is open to empirical investigation, the naturalistic particularist can use the results of these investigations to evaluate alternative epistemic systems. If it turns out that a naturalistic epistemic system outperforms its rivals, then the absolutist and naturalist presumptions can be defended.

6.2.1 *Begging the Question: The First Charge*

At first glance, the naturalistic component of naturalistic particularism seems to prevent the approach from yielding *objective* evaluations of epistemic practices, for it privileges *empirical* facts about the performance of such practices. When presented with this approach, the Azande may legitimately respond: why should we not use the pronouncements of a poison oracle to evaluate epistemic practices instead? Is the naturalist not begging the question in favour of their own epistemic system? According to this line of criticism, the naturalistic particularist "...seeks to impose the scientific norms of our Western culture upon the non-scientific culture of the Azande" (ibid., 12).

Sankey is obviously aware of this objection and offers a defense of his naturalistic approach. He argues, in essence, that empirical evidence regarding the reliability of epistemic practices is bound to meet the *recognition constraint*: it will be recognized by all parties as constituting a reason for or against the practices in question. The argument begins by highlighting the fact that beliefs function as guides to practical, goal-oriented action. We also know that true beliefs do a better job of facilitating successful action than do false beliefs, so the more successful one is in achieving her goals, the more truth-conducive her epistemic system is likely to be. Finally, Sankey points out that our success or failure in achieving our goals is empirically detectable. Since *all* agents *must* be sensitive to this empirical information in order to survive—animals that cannot distinguish success from failure die quickly—we may conclude that it will be universally recognized as evidence for or against epistemic practices.² The naturalist, then, is not begging the question by imposing

²For Sankey's formulation of this argument, see Sankey (2010, 14). I criticized what I took to be his argument in Bland (2013). Sankey replied that I had misunderstood his argument, which he clarifies in Sankey (2014b). I have attempted to capture the argument more faithfully here. I stand by my original objection, however, which will be presented in the next section.

her epistemic norms on the practices of the Azande; she is evaluating their practices in ways that they themselves are bound to find compelling. If the poison oracle generates false conclusions about where to build a home, or how to end a drought, then the Azande are in a position to recognize this empirical fact as telling against their practice of oracular revelation. Sankey concludes: "...given the facts of Azande existence, it is most unlikely that they would be insensitive to the outcomes of an empirical test of the efficacy of the oracle" (ibid., 14).

6.2.2 *Begging the Question: The Second Charge*

Sankey defends his naturalistic approach by arguing that because everyone must be sensitive to empirical information about their successes and failures, all inquirers will *recognize* the force of empirical evidence for/against their epistemic practices. I agree with his premise, but not with his conclusion. While it is true that everyone must be sensitive to empirical information about their practical successes and failures, it does not follow that everyone must recognize the epistemic authority that naturalists grant empirical information generally. To recognize empirical information as a source of evidence for or against *all* epistemic practices is to regard such information as *basic*, i.e., as a source of rational evaluation that is not itself subject to a non-circular rational evaluation. It seems, however, that one can be sensitive to empirical information *without* regarding it as epistemically basic. I will make this argument by considering the two other cases of epistemic incommensurability discussed in Sect. 2.3: the case of Galileo and the Papal Qualifiers, and the case of Descartes and the British empiricists. If the argument is successful, then the naturalistic particularist's empirical evidence does not meet the recognition constraint, and she can be rightly accused of begging the question.

Consider first the case of Galileo and the Papal Qualifiers who disagree about the motion of the earth. Galileo is a committed Christian who takes Biblical scripture seriously, but he thinks that the interpretation of scripture must be constrained by empirical facts. Consequently, in light of his evidence for a Copernican cosmology, he thinks that Biblical passages that seem to suggest the immobility of the earth must be reinterpreted. On the other hand, the Qualifiers routinely trust their perceptions in their daily affairs, but have more confidence in the word of God, as it is understood by the Church Fathers, than they do in the

reliability of their own cognitive faculties. Accordingly, they reject the Copernican system in light of their scriptural evidence. The disagreement between Galileo and the Qualifiers arises because they subscribe to distinct epistemic systems; this is what makes it a case of epistemic incommensurability.

The naturalistic particularist's strategy for rationally resolving this disagreement consists in subjecting the relevant components of the rival epistemic systems to empirical tests. Of course, she will find Galileo's telescopic observations and abductive inferences to be fairly reliable sources of information; he was right, after all, about the phases of Venus, the surface of the moon, the moons of Jupiter, and the sudden appearance of distant stars. Presumably, she will also find that Biblical scripture is a decidedly less reliable source of information about natural phenomena, such as the age of the earth, the origins of species, and the causes of illness. On this basis, the particularist concludes that Galileo's epistemic system is more truth-conducive than the system of the Papal Qualifiers, and therefore, Galileo's beliefs about the structure of the cosmos are justified, while those of the Qualifiers are ill informed.

It seems clear that this argument in favour of Galileo's epistemic system will *not* meet the recognition constraint: the Qualifiers will *not* recognize the naturalist's empirical evidence as rational grounds for rejecting their basic convictions. This is not because they are insensitive to empirical sources of information, but because they think these sources cannot be correct when they yield results that are inconsistent with the word of God. They trust their senses to make their way through the Vatican, but not to undermine the truths that God has revealed. From their perspective, the naturalistic particularist has begged the question by presupposing empirical facts in her evaluation of their epistemic system; she has not rationally resolved the disagreement, but merely taken a side. The Qualifiers could just as easily offer a particularist justification for their epistemic system by citing the following sorts of facts: the authors of the Bible were inspired by the one true God, God is infinitely perfect and knowledgeable, God is not a deceiver, etc. In this case, the naturalist can, with equal right, accuse the Qualifiers of begging the question. This puts Galileo and the Qualifiers in precisely the situation that relativists say they're in.³

³I make this same argument against Sankey's naturalistic particularism in Bland (2016).

Now consider the disagreement between Descartes and the British empiricists concerning their knowledge of God's existence. Descartes claims that God can be directly apprehended through rational intuition, while Hobbes and Locke regard Him as a theoretical entity posited on the basis of empirical information, and Hume writes Him off entirely as a philosophical superstition. This is another case of incommensurability that involves a clash of epistemic systems. Once again, the naturalistic particularist will look to resolve the disagreement by empirically evaluating the epistemic practices at issue. And once again, she will be guilty of begging the question, for Descartes will *not* recognize the epistemic authority of empirical methods to evaluate the reliability of rational intuition any more than empiricists would recognize the epistemic authority of rational intuition to evaluate the reliability of empirical methods. Descartes is nevertheless keenly sensitive to empirical information. Indeed, he acknowledges that such information is essential in guiding our actions, though it fails to meet the standards required for true knowledge:

For the proper purpose of the sensory perceptions given me by nature is simply to inform the mind of what is beneficial or harmful for the composite of which the mind is a part; and to this extent they are sufficiently clear and distinct. But I misuse them by treating them as reliable touchstones for immediate judgement about the essential nature of the bodies located outside us; yet this is an area where they provide only very obscure information. (Descartes 1641 [1984], 57–58)

So, for example, we rightly trust our senses to identify sources of heat that may be beneficial or harmful, but we should not trust our senses to reveal the true nature of heat. Our sense of heat seems to indicate that it exists as a property in external objects, when in fact it is an emergent secondary property resulting from the rapid oscillation of insensible particles. Since extended substance and its motions are subjects of mathematics, whose truths are known a priori, this clear and distinct understanding of heat is achieved by means of thought alone. Descartes thus concedes the *instrumental* value of perception in helping us to achieve what is desirable (warming ourselves) and avoid what is undesirable (getting burned), but he denies that this constitutes a reason to take its deliverances more seriously than the clear and distinct ideas of rational intuition. Furthermore, because perception often leads us astray, while

the reliability of the intellect's clear and distinct ideas is safeguarded by the infinite goodness of God, it would be foolhardy to proceed as the naturalist does.

Particularists attempt to avoid the problem of the criterion by identifying a set of basic beliefs whose justification does not depend on our being able to establish the trustworthiness of their sources. It is unable to resist epistemic relativism because those who subscribe to different epistemic systems will identify *different* sets of basic beliefs. In addition to Sankey's naturalistic particularism, which privileges empirical facts, there could be theological and rationalist versions of particularism, which privilege Biblical doctrines and a priori insights, respectively. Against such positions, Sankey says:

...I imagine that some may continue to insist on the priority of non-empirical considerations even in the face of the attempts to connect epistemic norms with experience. Here, I am afraid, one can only argue in an *ad hominem* manner by pointing to the pragmatic contradiction that arises from saying one thing while doing another. Someone who looks before crossing the street gives due weight to empirical considerations whatever they may say about non-empirical factors. Their practice belies their claims to the contrary. (Sankey 2014b, 6)

I have argued, however, that both Biblical literalists and radical rationalists are admittedly sensitive to empirical considerations, especially when it comes to negotiating their ways through the world. Yet this does not constitute a departure from their practices of treating Biblical doctrines and rationalist insights as *basic* starting points of inquiry since one can recognize the accuracy or usefulness of empirical beliefs *without* granting them the last word on epistemic matters. This being the case, there is no reason to think that the naturalist's empirical evidence regarding the reliability of epistemic practices will always meet the recognition constraint. When it fails to do so, it cannot constitute a suasive justification for the superiority of any epistemic system.

This point can be expressed differently by invoking Habermas's distinction between *instrumental* and *communicative* rationality:

If we start from the noncommunicative employment of knowledge in teleological action, we can make a prior decision for the concept of *cognitive-instrumental rationality* that has, through empiricism, deeply marked

the self-understanding of the modern era. It carries connotations of successful self-maintenance made possible by informed disposition over, and intelligent adaptation to, conditions of a contingent environment. On the other hand, if we start from the communicative employment of propositional knowledge in assertions, we make a prior decision for a wider concept of rationality connected with ancient conceptions of *logos*. This concept of *communicative rationality* carries with it connotations based ultimately on the central experience of the unconstrained, unifying, consensus-bringing force of argumentative speech, in which different participants overcome their merely subjective views and, owing to the mutuality of rationally motivated conviction, assure themselves of both the unity of the objective world and the intersubjectivity of their lifeworld. (Habermas 1984, 10)

The universal human capacity to master and adapt to our contingent environment is made possible by our sensitivity to empirical information. Thus, instrumental rationality is thoroughly empirical. But this is a narrower faculty than the one responsible for reasoned consensus. So while the empirical success or failure of an epistemic practice is of paramount importance to instrumental rationality, it need not be so for communicative rationality. This is why clerics like Osiander could recognize the instrumental value of Copernican astronomy without being convinced of its truth.⁴ Our ability to negotiate our way through the world using experience as our guide does not by itself entitle us to treat experience as a basic source of information that can facilitate rational agreement. For this reason, Sankey's argument for naturalistic particularism fails.

6.3 LUPER'S NEUTRAL POSITION

Luper also sees the problem of the criterion as playing a central role in motivating both Pyrrhonian scepticism and epistemic relativism. And like Chisholm and Sankey, he thinks that the only way to respond to the problem is to beg the question in favour of one of the Agrippan modes (Luper 2004, 283). Having done so, he provides an argument for an epistemic system—the 'ordinary epistemic standard'—that is meant to show that it is both authoritative and rationally preferable to

⁴Rorty makes this same point in the passage quoted on pages 57–58.

its alternatives. However, his argument is neutral with respect to the approaches of particularism, methodism, and reflective equilibrium.⁵

According to Luper, an epistemic standard (which is what we've been calling an epistemic system) is *authoritative* when it is truth-conducive, and is *rationally preferable* to its alternatives when it constitutes the core component of all truth-conducive standards (ibid., 284–285). The ordinary epistemic standard, he argues, satisfies both conditions. It consists of the following naturalistic rules (ibid., 285):

- (1) Do not reason in ways that violate rules of deductive logic.
- (2) Other things being equal, retain beliefs prompted by your senses.
- (3) Other things being equal, believe the best explanation of your data.
- (4) Continue to believe what you do unless you have good reason to stop.
- (5) Other things being equal, prefer (as more authoritative) one [belief] management rule over a competitor when you have good reason to believe it is more truth-conducive.
- (6) Continue to operate by these six management rules unless you have good reason to stop.

As the sceptic points out, we can determine that the ordinary epistemic standard reliably yields true beliefs only if we have some antecedent idea of what the world is like, i.e., of *which* beliefs are true. Luper admits that he is taking for granted a 'commonsense' view of the world when arguing for the ordinary epistemic standard: "In the commonsense world of tables, pumpkins and people, adhering to these principles gives us a good chance of reaching the truth" (ibid.). So, his argument is unavoidably *conditional*: *if* we take for granted our commonsense view of the world, *then* we have reason to believe that the ordinary standard is truth-conducive, and therefore, authoritative. He also admits that by presupposing the truth of this worldview, his argument can rightly be accused of being either circular or dogmatic.

⁵In Bland (2013), I argue that Luper uses a methodist strategy of resisting scepticism and epistemic relativism. I now think that is an overly narrow construal of his position, as I will argue below.

Is this a problem? It certainly is from the sceptic's perspective, because it means that the argument falls prey to the Agrippan trilemma. However, by endorsing the Agrippan conclusion that justification cannot be secured by means of regress, circularity or dogmatic assertion, Luper claims that sceptics are committed to an epistemic system in which (4) and (6) are replaced by the following rules:

(S4) Adopt or retain a belief only if you can provide an adequate justification for it, a justification that does not involve circularity, arbitrariness or dialectical deadlock.

(S6) Adopt or retain a management rule only if you can provide an adequate justification for it, a justification free of circularity, arbitrariness or dialectical deadlock. (ibid., 286)

The problem with these rules, says Luper, is that they prohibit one from adopting *any* belief or epistemic method, including the rules themselves. Such a system cannot possibly be truth-conducive, since it cannot yield any beliefs, and therefore, it cannot be authoritative. We are better off, he concludes, using the ordinary epistemic standard, in which case his argument for its truth-conduciveness is entirely in order:

Only against the backdrop of a worldview can we assess how truth-conducive a standard is, and only with an epistemic standard can we assess the truth of a worldview. So we must either argue, circularly, from our worldview to our standard and back again, or, arbitrarily, take one or the other for granted. (ibid., 287)

The first sentence concisely expresses the problem of the criterion. The second expresses the solutions of reflective equilibrium, particularism, and methodism. Rules (4) and (6) of the ordinary epistemic standard allow us to adopt any one of these solutions.

If our commonsense worldview is broadly correct, or the ordinary epistemic standard is reliably truth-conducive, then any one of these solutions may be capable of successfully overcoming scepticism, for in this case the ordinary standard is authoritative and can be shown to be authoritative by its own lights. Yet we cannot show that the ordinary standard is *rationally preferable* in the same way. The relativist will argue that there are many different epistemic systems, and many different worldviews according to which they are truth-conducive. Biblical literalists, for example, will augment the ordinary epistemic standard with a rule like the following:

- (7) Believe everything that you read in the Holy Bible, and everything that is properly inferable therefrom.

They will also make changes to rules (1)–(6), such as replacing (3) with:

- (3*) Other things being equal, believe the best explanation of your data, unless it conflict with what is written in the Holy Bible or what is inferable therefrom.

Biblical literalists also subscribe to a worldview in which such a theological epistemic standard is truth-conducive. They believe in God and the devil, eternal souls, angels, heaven, hell, divine intervention, the story of creation, the resurrection of Christ, and all other manner of supernatural doctrines contained in their holy book. Moreover, from their perspective, the theological epistemic standard is *more* truth-conducive than other standards, including the ordinary epistemic standard, and therefore, it is rationally preferable. At best, then, it looks like Luper's strategy can yield a *non-suasive* justification for the ordinary epistemic standard, i.e., a justification that fails to meet the recognition constraint for those who do not already subscribe to the ordinary epistemic standard. As we've seen, this justification will be found wanting by epistemic relativists.

6.3.1 *A Pragmatic Vindication of the Ordinary Standard*

In response to this objection, Luper says:

This challenge is based on the assumption that there are groups of people committed to worldviews that are so widely divergent from each other as to support entirely different epistemic standards. But this assumption is not plausible. Take any worldview that is actually accepted, at least by sane people. In the world as it would be if that worldview were correct, the ordinary epistemic standard is truth-conducive. (ibid., 291)

Here I interpret Luper as offering a *pragmatic vindication* of the ordinary epistemic standard that's akin to Reichenbach's pragmatic vindication of induction. I will briefly explain Reichenbach's pragmatic vindication before discussing Luper's argument.

Hume famously argues that inductive reasoning cannot be justified because there can be no cogent reason for thinking that it's truth-conducive. Since inductive inferences are invalid, we cannot know a

priori that their conclusions are true, and because any appeal to the past performance of induction would itself be an instance of inductive reasoning, we cannot know a posteriori that their conclusions tend to be true. And because knowledge must be either a priori or a posteriori, Hume concludes that this is not something we're capable of knowing.

Reichenbach agrees with Hume's reasoning, but not with his conclusion that inductive inference does not admit of justification. He claims that the use of inductive reasoning can be justified *without* showing that it is truth-conducive. This can be done by showing that induction is our *best chance* for arriving at the truth. Reichenbach claims that "*The aim of induction is to find a series of events whose frequency of occurrence converges toward a limit*" (Reichenbach 1938, 350). This limit is the true *probability* of the event, so the purpose of inductive reasoning is to assign accurate probabilities to predictable events. Now, Reichenbach concedes that there is no credible reason to think that this aim is achievable; for all we know, the world may be so unpredictable that we cannot possibly determine the limits of the frequencies of natural events. But if this is the case, then *every* method of assigning probabilities to natural events will be unsuccessful. If, on the other hand, the world is sufficiently predictable to find the limits we seek, then inductive reasoning will do so.⁶ This is *not* true of *any* other method of assigning probabilities to natural events. A professed clairvoyant may be able to glimpse nature's regularities, but we have no guarantee that this is the case. To assess someone's powers of clairvoyance, says Reichenbach:

...we demand the forecast of the clairvoyant and compare it with later observations; if then there is a good correspondence between the forecasts and the observations, we shall infer, by induction, that the man's prophecies will also be true in the future. Thus it is the principle of induction which is to decide whether the man is a good clairvoyant. This distinctive position of the principle of induction is due to the fact that we know about its function of finally leading to the true value of the limit, whereas we know nothing about the clairvoyant. (ibid., 354)

Induction is distinguished by the fact that it is *guaranteed* to assign ever more accurate probabilities to natural events over time, as long as the world is sufficiently predictable. And because it has this feature, it is

⁶Reichenbach's defense of this claim is presented in Reichenbach (1938, 353–355).

uniquely well suited to determine the accuracy of all other possible methods of assigning probabilities. Thus, epistemically speaking, we have everything to gain and nothing to lose by using inductive reasoning. This is what Salmon (1963) calls a *pragmatic vindication* for the rational use of inductive reasoning, rather than a justification of its truth-conduciveness.

Luper uses similar reasoning to vindicate the ordinary epistemic standard. There are possible worlds in which the ordinary standard is not truth-conducive, but he insists that none of these correspond to any living worldview. On the other hand, the ordinary epistemic standard will be truth-conducive if *any* living worldview is correct. Some worldviews are markedly different from those of the naturalistic variety, but Luper argues that they are not so different that the ordinary epistemic standard would fail to be authoritative in the worlds they posit:

Consider that there are people who believe that incantations will produce certain effects magically. I claim that, in a world in which magic occurred, the ordinary epistemic standard would help people reach true beliefs. For experience would bear out the efficacy of the spells, and lead people to a host of accurate relevant beliefs. We can conclude that the authoritative-ness of the ordinary standard is defensible for every actual person in spite of the differences in their specific beliefs. Hence for everyone it is reasonable to think that the ordinary standard is the correct one, and that absolutism is true. (Luper 2004, 291)

Luper thinks that the ordinary epistemic standard has the same advantages that Reichenbach attributes to induction. If every worldview is radically mistaken, then no one's epistemic system is truth-conducive, but if *any* worldview is accurate, then the ordinary epistemic standard is authoritative. This is not true of any other epistemic system. If we live in a world without magic, then the magician's epistemic system will fail to be truth-conducive. Furthermore, the ordinary epistemic standard is *rationally preferable* to all of its alternatives because its use alone allows us to identify and adopt foreign methods that prove to be truth-conducive.

6.3.2 *Begging the Question*

Reichenbach argues that inductive reasoning should be favoured over its alternatives, first, because it alone is guaranteed to succeed if epistemic success is possible at all, and, second, because it alone can accurately

track the success of other methods. Luper claims the same two advantages for the ordinary epistemic standard, but he cannot provide the same sort of argument that Reichenbach does for his conclusion. Reichenbach's conclusion is supposed to follow *deductively* from his definition of the limit of a series.⁷ Luper does not have a deductive argument for his conclusion; it certainly does not logically follow from his definition of what it means for an epistemic system to be authoritative. In fact, he does not provide *any* argument for his conclusion, apparently taking it as self-evident that the ordinary epistemic standard has these advantages. However, there are good reasons to think that Luper's conclusion is mistaken, and therefore, that his pragmatic vindication of the ordinary epistemic standard fails.

Biblical literalists are led by scriptural revelation to believe that the universe is a mere six thousand years old, that all living things were created separately by God, that the sun and the planets rotate around a stationary earth, that human bodies are animated by immaterial souls, that sickness can be caused by maleficent demons, and a good many other things that seem to be contravened by empirical evidence. If this is the world we live in, then our use of the ordinary epistemic standard has resulted in nothing more than partial success: it has produced accurate beliefs about tables and pumpkins, but generated gross falsehoods on central matters of cosmology, geology, biology, psychology, medicine, etc. The literalist's epistemic system, which adds (7) to rules (1) through

⁷Reichenbach formulates the principle of induction as follows:

For any further prolongation of the series as far as s events ($s > n$), the relative frequency will remain within a small interval around h^n ; i.e., we assume the relation

$$h^n - \varepsilon \leq h^s \leq h^n + \varepsilon$$

where ε is a small number (Reichenbach 1938, 340).

A few pages on, he provides a definition of the limit of a series, and points out that his straight rule of induction will always find the limit of a series, if it has one:

The frequency h^n has a limit at p , if for any given ε there is an n such that h^n is within $p \pm \varepsilon$ and remains within this interval for all the rest of the series. Comparing our formulation of the principle of induction (§38) with this, we may infer from the definition of the limit that, if there is a limit, there is an element of the series from which the principles of induction leads to the true value of the limit. In this sense the principle of induction is a necessary condition for the determination of a limit (ibid., 351).

(6), would be far *more* truth-conducive, and therefore, rationally preferable in this world.

The ordinary epistemic standard would be even *less* truth-conducive in the world as conceived by some rationalists. Consider, for example, the world that Leibniz describes: it is a world in which space, time, and efficient causation are nothing more than well-founded illusions, a world populated by a plenum of infinitesimally small, living, perceiving entities, all acting together in a pre-established harmony arranged by God so as to produce the best of all possible worlds. Leibniz arrives at this worldview by means of definitions and logical reasoning, while ignoring the deliverances of perception. It is completely at odds with any worldview arrived at by means of an epistemic system that takes empirical evidence seriously, such as the ordinary epistemic standard.

All of this is to say that the challenging assumption that Luper attacks—"that there are groups of people committed to worldviews that are so widely divergent from each other as to support entirely different epistemic standards"—is plausible. Leibniz is not only a sane epistemic agent but a philosophical genius of the highest order; yet the ordinary epistemic standard fails terribly on his worldview. Thus, the ordinary epistemic standard does *not* have the first advantage that Luper attributes to it: it is not guaranteed to succeed.

This need not be problematic for Luper if the ordinary epistemic standard has the second advantage, i.e., the advantage of having the unique capacity to accurately track the success of other methods. If using principles (1) through (4), we were to discover epistemic methods that are more truth-conducive than those we currently use, then principles (5) and (6) tell us to adopt those methods where appropriate. Thus, even if the ordinary epistemic standard does not include all authoritative methods, its use will eventually lead us to adopt these alternative methods and the beliefs they yield. If magical spells prove effective, we will adopt magic as a way of coming to know the world. Since they haven't proven effective thus far, we haven't. The same could be said about scriptural revelation and rationalist metaphysics: if we found them to be reliably truth-conducive, we would adopt them. We haven't adopted them because we haven't found them to be truth-conducive. On the other hand, magic, scriptural revelation, and rationalist metaphysics are incapable of tracking the reliability of the ordinary epistemic standard. For this reason, the latter is rationally preferable to the former; by using the ordinary epistemic standard, we have everything to gain, and nothing to lose.

This rationale will be found convincing only by those who *already* accept the ordinary epistemic standard. To accept an epistemic system is just to think that its basic methods are uniquely well suited to tracking the success of other epistemic practices. Those who accept the ordinary epistemic standard regard principles (1) through (6) as *basic*, i.e., as facilitating rational evaluation without being subject to any non-circular evaluation. But anyone who accepts an alternative epistemic system may use the same reasoning for the rational superiority of their basic methods. The Biblical literalist insists that the ordinary epistemic standard does not accurately track the reliability of scriptural revelation; rather, scriptural revelation reveals the limitations of naturalistic methods. The Leibnizian rejects the deliverances of perception because they conflict with what he has come to know through thought alone; if empirical methods were reliable, he would know it a priori.

The problem with this line of argument is that it can be used to establish the rational superiority of *any* epistemic system. Everyone thinks that their basic methods are the only ones that can be used to accurately track the reliability of other epistemic practices. Thus, instead of concluding that "...for everyone it is reasonable to think that the ordinary standard is the correct one, and that absolutism is true", we should conclude that for everyone it is reasonable to think that *their* epistemic standard is the correct one, and that absolutism is true. If absolutism is true, then only one epistemic system is authoritative and rationally preferable, though everyone has the same reason to think it's theirs. Every such argument is question-begging, and therefore, fails to satisfy the recognition constraint.

Luper's ordinary epistemic standard does not have the two advantages he attributes to it: it is not supported by every worldview on offer, and there is no universally recognizable reason to think that it can accurately track the reliability of all other epistemic methods. Consequently, his pragmatic vindication fails, and because *every* epistemic system admits of a particularist, methodist, or reflective equilibrium defense, we are left without a way of rationally arbitrating recalcitrant disputes about the authority and rational superiority of rival systems.

6.4 CONCLUSION

Chisholm rightly points out that particularists and methodists must beg the question when responding to the problem of the criterion. The same is true of those who advocate the pursuit of reflective equilibrium. To

make epistemic headway, we must accept beliefs without knowing that their sources are trustworthy, accept methods without knowing that they yield true beliefs, or accept beliefs and methods when they can accommodate one another. None of these strategies avoid the Agrippan trilemma, so their knowledge claims cannot possibly be found convincing by devoted sceptics. Yet, as we saw in the last chapter, this is not problematic if non-suasive justifications constitute satisfactory responses to scepticism.

What *is* problematic is that many different beliefs and methods can be defended in these ways. These defenses necessarily involve presupposing some significant component of an epistemic system, and therefore, they will beg the question when pressed against anyone who subscribes to an alternative system. This means that they cannot satisfy the recognition constraint, which prevents them from being legitimate sources of suasive justification. As a result, these strategies are rightly found wanting by relativists like Hales: “If naturalists and nonnaturalists are merely begging the question against each other in addressing the problem of the criterion, then neither side is making much headway” (2006, 155).

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The Charge of Incoherence

We have examined a number of anti-sceptical strategies for resisting epistemic relativism. In doing so, we have assumed that sceptics and relativists are putting forward coherent positions that are worth challenging. Another time honoured strategy is to show that we need not undermine these positions because they are *self-undermining*. One way of doing this is to press sceptics and relativists with the following dilemma: if your conclusion is true, then it cannot be defended, and if it is false, then it is not worth defending. In the sceptic's case, if it is true that we cannot possess knowledge, then we cannot know that this is the case, and if it is false, then we should reject scepticism. In the relativist's case, if it is true that no knowledge claims admit of absolute justification, then we cannot be absolutely justified in knowing this to be so, and if it is false, then we should reject epistemic relativism. This strategy of attacking scepticism and relativism exploits the fact that the conclusion of the Agrippan argument must itself fall prey to the argument.

This chapter will argue that neither position is self-undermining, and consequently, neither position can be so quickly dismissed. Sceptics and relativists can accept the first horn of the dilemma without rendering their conclusions indefensible or their positions incoherent. Sceptics can suspend judgement on the sceptical conclusion while showing that it follows from principles that non-sceptics accept. Relativists can rest content

with a relative justification of their position that appeals to principles and standards that non-relativists accept. Both sceptics and relativists can thus be seen as engaged in a *dialectical* exercise that attacks the positions of their opponents without thereby undermining their own positions.

Markus Seidel has recently pressed epistemic relativists with another dilemma. Relativists must either deny that epistemically circular arguments can confer warrant on basic principles and methods, in which case all epistemic systems are equally groundless, or accept such arguments, in which case all epistemic systems are equally well grounded. If they opt for the first horn, then relativism is indistinguishable from scepticism, and if they opt for the second, then relativism is impotent at best and incoherent at worst. This dilemma, however, only applies to relativists who make use of the Agrippan argument. Since there is a version of the principal argument for epistemic relativism that does not include the narrow Agrippan argument, the dilemma can be avoided. More specifically, relativists can bypass the dilemma by claiming that one's basic principles and methods are justified *by default*. In this case, they can avoid scepticism, but defensibly maintain epistemic relativism by arguing that different epistemic systems of principles and methods are equally justified.

7.1 THE SCEPTIC'S DILEMMA

Pyrrhonian sceptics use the Agrippan trilemma to argue for the conclusion that beliefs and epistemic methods cannot be justified, and therefore, we should adopt the universal policy of suspending judgement. The epistemic regress argument, in particular, seeks to show that no proposition can be known because its justification will inevitably be infinite, dogmatic, or circular. If the argument is successful, however, it seems to undermine the possibility of our *knowing* that its conclusion is true, for it tells us that *its own* premises cannot be justified without an infinite regress, dogmatic assertion, or circularity. Sceptics thus find themselves faced with the following dilemma:

A question naturally arises concerning the status of skepticism itself as a claim about the human condition. Can it be known to be true? Is it itself a truth? One can easily see that no coherent answer is possible. If one answers "yes," the original claim is denied. If one answers "no," the original claim is again denied. In effect, the only consistent thing an absolute skeptic can do is to keep silent altogether. (Potter 1994, 17)

If sceptics wish to remain consistent, they should suspend judgement about whether or not human beings can possess knowledge. But this would prevent them from *advocating* for scepticism as a philosophical doctrine. Since sceptics *do* advocate for scepticism by means of the Agrippan argument, they cannot be suspending judgement. Consequently, their claim that human beings cannot possess knowledge is itself a knowledge claim, and they are faced with the following two possibilities: either the argument fails, in which case they have no grounds for advocating scepticism, or their argument succeeds, in which case they cannot know that its conclusion and premises are true. In neither case are sceptics *justified* in advocating for scepticism. By giving a reason to believe that the giving of reasons cannot constitute a proper justification, they have pulled the rug out from under their own feet.

7.2 THE RELATIVIST'S DILEMMAS

The charge that epistemic relativism is self-defeating goes back to Plato's *Protagoras*. Siegel (1987) has identified and reformulated two of the Socratic arguments for this conclusion. The first he calls the 'necessarily some beliefs are false' (NSBF) argument, which can be seen as presenting relativists with the following dilemma: either the thesis of epistemic relativism is absolutely justified by the relativist argument, or it isn't. If it is absolutely justified, then it is false, since the thesis claims that the rational credibility of *all* epistemic judgements is relative to the system in which they take place. If it isn't absolutely justified, then its epistemic status is system-relative. Naturally, relativists believe that their position is justified by their argument. Absolutists, on the other hand, reject both the conclusion and the argument on which it's based. Relativists will attribute this difference to the distinct epistemic systems in which their thesis and its argument are being evaluated, and for this reason, they must concede that absolutists are not incorrect in their evaluation. But this is to concede that absolutists are *justified* in believing that epistemic appraisal is *not* relative, which is precisely what the thesis of epistemic relativism denies. On either horn of the dilemma, then, the thesis is false.

The second argument Siegel calls the 'undermines the very notion of rightness' (UVNR) argument, which can be seen as pressing relativists with a different dilemma: either the thesis of epistemic relativism can be rationally defended, or it can't. If it can't be rationally defended, then it should be abandoned. If it can be rationally defended, then

there must be an argument in its favour that can be recognized *by absolutists* as an effective argument.¹ But if the cogency of their argument depends on the system in which it is evaluated, and relativists and absolutists are working within different epistemic systems, then relativists must acknowledge that they have no critically effective argument from the absolutist's point of view. This being the case, they *cannot* rationally defend epistemic relativism against the absolutist conception of knowledge. On either horn of the dilemma, the thesis of epistemic relativism ought to be abandoned.

Having reviewed the dilemmas that threaten scepticism and epistemic relativism, let us now see how sceptics and relativists might avoid the charge of incoherence.

7.3 THE SCEPTIC'S DILEMMA RESOLVED

In order to remain consistent, sceptics must suspend judgement on the claim that human beings cannot possess knowledge. But it was argued that sceptics do not suspend judgement on this claim; indeed, they *argue* that the claim ought to be *accepted* in virtue of the Agrippan argument. If their argument is successful, however, then it undermines their own claim that human beings cannot possess knowledge, and if it is unsuccessful, then it fails to provide any rational support for their philosophical thesis.

This incoherence can be avoided if it is possible to see sceptics as *both* suspending judgement on the possibility of human knowledge *and* arguing for the sceptical conclusion. The key to this seemingly impossible task is to distinguish between two possible intentions that sceptics might have when putting forward the sceptical argument: they may be *attacking* the non-sceptical view that we possess knowledge, or *defending* the sceptical doctrine that human knowledge is impossible. If they are doing the latter, then they cannot be suspending judgement, and so they cannot escape the charge of incoherence. However, they can accomplish the former while consistently maintaining their sceptical disposition. This is because they can attack the non-sceptical view on grounds that *non-sceptics* accept, without thereby committing themselves to those grounds.

¹This is not to say that absolutists must *accept* the argument, or even that they should accept it, but only that they should recognize it as a rational threat to their position.

Non-sceptics believe that beliefs must be justified by reasons that are well grounded by further reasons, which entails the conclusion that all attempts at justification must result in infinite regress or circular reasoning. Yet, *non-sceptics* do not believe that either of these eventualities yield warrant for beliefs. Thus, it is *non-sceptics* who are pushed to the incoherent conclusion that they are justified in believing that no belief can be justified. True sceptics, on the other hand, can accomplish this while suspending judgement on all of the premises and the reasoning that leads from the premises to the conclusion, as well as on the conclusion itself.

Moreover, I think that we should understand Pyrrhonian sceptics as using this kind of *dialectical* strategy given their meta-philosophical aims (see Chapter 1). Pyrrhonian scepticism is, first and foremost, a reaction to the supposition that philosophical disputes admit of unequivocal resolutions. The Agrippan argument is meant to undermine this supposition by showing that no one can defend a philosophical position even to *their own* satisfaction. This includes, of course, the non-sceptical position that we possess knowledge. Consequently, Pyrrhonian sceptics should not be seen as defending a philosophical doctrine, but as criticizing the philosophical enterprise of defending doctrines about the nature of reality and our knowledge of it.

7.4 THE RELATIVIST'S DILEMMAS RESOLVED

It seems as though relativists cannot answer the question of whether or not the thesis of epistemic relativism is absolutely justified without contravening that very thesis. If it is absolutely justified, then there are epistemic judgements whose rational credibility is not system-relative, which is what the thesis denies. If it is justified only relative to certain systems, then there will be absolutist systems in which it is unjustified. Therefore, relativists cannot deny that non-relativists are absolutely justified in rejecting the thesis of epistemic relativism, since this conclusion is licensed by their absolutist system.

Paul Boghossian denies that the second horn of the dilemma has this consequence:

If the relativist opts for saying that relativism is justified only relative to his (the relativist's) epistemic principles...it doesn't even follow that he is saying that relativism is justified only relative to epistemic principles that are unique to relativists. For all we are entitled to assume, he may mean that

relativism is justified by a set of principles that are endorsed by relativists and non-relativists alike. (Boghossian 2006, 83)²

It has been assumed that if the thesis of epistemic relativism is justified at all, it is justified *only* within a relativist's epistemic system. But this need not be the case. Indeed, Boghossian thinks that the relativist's argument relies on principles that relativists and absolutists *share in common*, such as: all rational justification takes place within a system of standards and presuppositions, there are many different epistemic systems, rational justification cannot be achieved by means of infinite regress, circular reasoning, or dogmatic assertion. Indeed, we have seen that such staunch naturalists as Carnap and Kuhn forcefully advocate for these tenets (see Chapter 3). As such, the relativist's argument against non-relativists has the same *dialectical* character as the sceptic's argument against non-sceptics. By appealing to principles that they have in common, the relativist is not providing her thesis with an absolute justification, but she doesn't need to; she need only show that her thesis is justified relative to *both* relativist *and* absolutist epistemic systems.³ If she can do this, then she can defend her doctrine without lapsing into incoherence.

Boghossian's response addresses Siegel's NSBF challenge, but Siegel insists that it does not constitute an adequate reply to the UVNR dilemma, which he takes to be the more serious of the two challenges:

As earlier, I think that Boghossian's reply on behalf of the relativist does not succeed. The refutation offered by the 'objectivist' (as Boghossian labels the relativist's opponent) has a better formulation than the one Boghossian gives it: namely, that if the relativist is *taking issue* with the objectivist/absolutist, and offering and *defending* a position which he takes to be superior to his opponent's position, which defense ought rationally to persuade his opponent, he has given up his relativism; while if not, he fails to challenge (as opposed to disagree with) that opponent's position. (Siegel 2007)

This is the anti-relativist argument that Siegel has stressed in his most recent work on the topic:

²A similar reply is given by Luper (2004, 282).

³Alternatively, she may show that her thesis is justified relative to a single epistemic system that *both* relativists *and* absolutists subscribe to. Given that they endorse many of the same epistemic principles, it is not unrealistic to think that this could be the case.

...insofar as [the relativist] is taking issue with her non-relativist philosophical opponent, the relativist wants both (a) to offer a general, non-relative view of knowledge (and/or truth or justification), and assert that that general view – i.e., that knowledge is relative – is epistemically superior and preferable to its rivals; and also (b) to deny that such a general, non-relative view is possible or defensible. (Siegel 2011, 203)

Relativists cannot successfully accomplish *both* (a) *and* (b) because meeting one goal precludes meeting the other, and so there can be no coherent defense of epistemic relativism.

Yet, it seems that Boghossian's observation can be used to overcome the UVNR challenge as well. To see this, we must first identify what Siegel means by a 'general, non-relative view of knowledge'. It would seem that Siegel means a doctrine that can be evaluated according to *neutral*, or *non-biased* standards: "The *assertion and defense* of relativism require one to presuppose neutral standards in accordance with which contentious claims and doctrines can be assessed; but relativism denies the possibility of evaluation in accordance with such neutral standards" (ibid., 203). There are, however, at least two possible senses in which epistemic standards can be neutral, only one of which is incompatible with a commitment to relativism. In the first sense, a standard is neutral if it can be rationally defended without falling prey to the Agrippan trilemma; such a standard would be neutral with respect to *all* possible epistemic systems because it could be rationally defended in any system. This will be called *absolute neutrality*. Relativists deny that any standard can be absolutely neutral. In the second sense, a standard is neutral if it is accepted by all of the participants in a particular inquiry; such a standard is neutral with respect to a set of *operative* epistemic systems because it figures in each one of them. This will be called *relative neutrality*. A commitment to epistemic relativism does *not* preclude the possibility of standards that are relatively neutral. Relativists do not deny that there can be some overlap between epistemic systems, such that two inquirers may appeal to the same standards and principles when evaluating a claim; their view is that when epistemic evaluations of a belief differ because they appeal to distinct standards and presuppositions, there is no principled way of determining who is right and who is wrong.

Boghossian's claim is that the relativist's theory of knowledge is *relatively neutral*; relativists and non-relativists alike acknowledge that all rational justification takes place within a system of presuppositions and

methods, and that rational justification cannot be achieved by means of infinite regress, circular reasoning, or dogmatic assertion. Furthermore, this position is compatible with the relativist's denial that a theory of knowledge can be *absolutely neutral*; though relativists and non-relativists have epistemic commitments in common, neither can justify these commitments in a way that avoids the narrow Agrippan trilemma.

Siegel claims that a consistent commitment to epistemic relativism, which denies the possibility of providing a neutral evaluation of distinct epistemic systems, precludes the possibility of being able to rationally defend that doctrine. However, if rational persuasion requires only relative neutrality, then relativists can rationally defend their position by appealing to principles and standards that they have in common with absolutists. If rational persuasion requires absolute neutrality, then it would seem that no one can be rationally persuaded of anything, and Pyrrhonian scepticism results. Thus, in a rather Socratic twist of fate, it is now Siegel who is faced with a dilemma.

7.5 A NEW RELATIVIST TRILEMMA

Markus Seidel (2013a, b, 2014) has recently pressed epistemic relativists with a related trilemma. He claims that the relativist's use of the Agrippan argument renders her position either indistinguishable from scepticism, incoherent, or indefensible.

The Agrippan sub-argument for relativism, as it was formulated in Chapter 2, goes as follows:

(R4) The *narrow Agrippan trilemma*: no system of basic beliefs and methods can be justified without dogmatic assertion, infinite regress, or, more likely, circularity.

(R5) The *narrow Agrippan conclusion*: since beliefs and methods cannot be justified by means of dogmatic assertion, infinite regress, or circular argument, basic beliefs and methods cannot be justified.

(R5) can then be used by relativists to support the thesis of epistemic equality:

(R6) *Epistemic equality*: given (R5), there can be no objective grounds for preferring any epistemic system over its alternatives, and therefore, there is no principled way to resolve cases of epistemic incommensurability.

If every epistemic system is equally groundless, then no epistemic system can be objectively preferable to its alternatives. The result, one might think, is epistemic relativism.

But Seidel claims that this argument goes too far. While relativists deny that beliefs and methods can be absolutely justified, they are committed to the view that they can be justified *relative to* an epistemic system; Galileo could not rationally convince the Papal Qualifiers that the earth is in motion, but he was nevertheless justified in this belief, given the epistemic system in which he was working. But in order for non-basic beliefs to be even relatively justified, they must ultimately rest on *basic* beliefs and methods that are themselves justified. Galileo defends his heliocentric view with his remarkable telescopic observations, and he defends his use of the telescope on more fundamental empirical grounds (see Sect. 6.2). So, if epistemic relativists are to avoid Pyrrhonian scepticism, they must recognize that basic beliefs and methods admit of relative justification. The problem is that this commitment is at odds with (R4) and (R5). Relative to the naturalist's epistemic system, an empirical argument for the authority of naturalistic practices is no more successful than a Biblical argument for the authority of Holy Scripture. If basic beliefs and methods must be justified by means of circular arguments, yet such arguments do not even yield relative justification, then scepticism is the result, not relativism. On this horn of the dilemma, the narrow Agrippan argument has the same effect as the sceptic's more sweeping Agrippan argument.

To avoid this result, epistemic relativists can alter the narrow Agrippan argument in a way that supports their conclusion. The most plausible way of doing so is to replace (R5) with:

(R5⁺) Since beliefs and methods *can* be justified by means of circular arguments, basic beliefs and methods *can* be justified.

The relativist's thesis of epistemic equality (R6) now follows from (R4) and (R5⁺), together with the assumption that all circular arguments are on an epistemological par: since virtually every epistemic system admits of a circular argument in its favour, and epistemic systems can be justified by means of circular arguments, almost every epistemic system is equally well justified. This way of formulating the argument seems to get relativists everything they want. Basic principles and methods can be justified relative to their epistemic systems; so, for example, naturalists can justify

their epistemic practices by means of an empirical argument. Yet principles and methods that are basic with respect to one epistemic system may be unjustified relative to another. Naturalists reject Biblical scripture as a source of cosmological information on empirical grounds. Nevertheless, they must recognize that Biblical literalists have *as strong* a justification for their basic beliefs and methods *relative to their epistemic system*, as naturalists do *relative to theirs*. In this way, relativists get relative justification, but rule out the possibility of absolute justification.

In response to the re-formulated argument, Seidel presents relativists with a familiar dilemma. He asks: is (R5⁺) absolutely justified or not? If it is, then epistemic relativism is self-refuting, and therefore, incoherent. To remain consistent, relativists must claim that (R5⁺) is justified *relative to their epistemic system*. But Seidel points out that this consistency comes at a high price: those who subscribe to epistemic systems that do not include (R5⁺) will not find the argument for epistemic equality rationally compelling. Moreover, he argues that this cost is especially significant given that most people outside of academic philosophy will reject (R5⁺):

Most of the users of ‘our’ epistemic system would not think, to take an example, that we are justified in thinking that a politician is trustworthy on the ground that she tells us that she is trustworthy. Analogously, nobody would say that we have any reason to trust the news in *The SUN* because the newspaper has as its banner that inside we will find nothing but the truth (the same goes, of course, for a more respectable newspaper). Usually, non-philosophically trained users of our epistemic system would point out that in order to be justified in trusting these sources we need some reason that is *independent* of the sources itself. To apply and trust the source to justify its own trustworthiness is epistemically dubious. (Seidel 2014, 158)

Consequently, most folk absolutists will dismiss the narrow Agrippan argument for epistemic equality by rejecting (R5⁺). And from the relativist’s perspective, they will be (relatively) justified in doing so, since (R5)—and not (R5⁺)—is part of their epistemic system. The cost, then, of using (R4) and (R5⁺) to support the relativist’s key doctrine of epistemic equality is that her argument thereby loses its dialectical character. By taking this route, relativists are rendered unable to defend their position in a way that absolutists will find rationally compelling. Here we see Seidel rehashing the ‘undermines the very notion of rightness’ argument against epistemic relativism. The difference between his formulation and

Siegel's is that he explicitly identifies a component of the relativist's argument that absolutists seem justified in rejecting given their basic epistemic commitments.

7.6 SANKEY'S REPLY: STRONG AND WEAK JUSTIFICATION

Sankey thinks that epistemic relativists can make coherent use of the problem of the criterion.⁴ This is why he advocates naturalistic particularism as an effective response to the threat of epistemic relativism. He responds to Seidel's objection by drawing the following distinction between *strong* and *weak justification*:

Let us define weak justification as justification of a belief on the basis of a given epistemic norm, whether or not the epistemic norm is itself justified. Let us define strong justification as justification of a belief on the basis of a given epistemic norm, where the epistemic norm is itself justified. (Sankey 2013, 142)

Sankey equates weak justification with *relative* justification, and strong justification with *absolute* justification. The problem of the criterion is supposed to establish that strong/absolute justification cannot be attained: basic norms cannot be justified without dogmatic assertion, regress, or circularity, so they cannot be justified at all. But Sankey argues that it does not rule out the possibility of weak/relative justification. This is why it is compatible with epistemic relativism: relativists claim that weak/relative justification is the *only* kind of justification possible. We can justify our beliefs and methods within an epistemic system, but we cannot justify our epistemic system. Epistemic relativists can thus have their cake and eat it too: they can use the problem of the criterion to defend their position without succumbing to scepticism, incoherence, or dialectical impotence.

There are two problems with Sankey's response. First, by equating relative justification with weak justification, Sankey seems to suggest that basic norms/methods are not themselves justified. This is a conclusion that relativists should avoid, since it would saddle them with the rather strange view that basic methods are *sources* of justification without themselves *being* justified. Furthermore, it would prevent them from

⁴See n. 12 in Chapter 2.

acknowledging the obvious fact that epistemic communities do distinguish between legitimate and illegitimate basic methods. Galileo's justification of telescopic observation would have been rationally ineffective had he appealed to clairvoyance rather than unaided observations. Basic methods must be justified, but only relatively so. The second problem is that basic methods admit only of strong justification. This is because their justification is inevitably circular: the method doing the justifying is also the method being justified. So, if the justification is successful, then it must be an instance of strong justification. If the justification is unsuccessful, then the basic method can be neither strongly nor weakly justified.⁵ It would be uncharitable, then, to equate Sankey's distinction between strong and weak justification with the relativist's distinction between absolute and relative justification.

Relativists continue to find themselves in a difficult position. To avoid scepticism, they must claim that basic beliefs and methods are relatively justified, but they cannot countenance the epistemically circular arguments required to justify them without undermining their ability to defend their position against absolutists. What they need is an account of the relative justification of basic beliefs and methods that doesn't appeal to epistemically circular arguments. I will present one such account in the next section.

7.7 THE RELATIVIST'S WAY OUT: DEFAULT JUSTIFICATION

Seidel argues that the relativist's use of the Agrippan argument forces her to take one of two stances on the efficacy of circular justification, neither of which is compatible with her position: if she adopts (R5), then her position is indistinguishable from scepticism, and if she adopts (R5⁺), then her position is either incoherent or indefensible. More specifically, this choice is forced by (R4): if basic beliefs and methods cannot be justified without epistemic circularity, then relativists must decide whether or not circular justifications can be successful. (R4), in turn, is motivated by the supposition that in order to be *justified*, beliefs and methods must have a *justification*. In other words, beliefs and methods are unjustified unless we have good grounds to adopt them. Michael Williams (2001, 24) calls this

⁵For alternative responses to Sankey's argument, see Seidel (2013b) and Carter (2016, §3.2.2).

the *prior grounding requirement*. By rejecting this requirement, relativists can dispense with (R4) and (R5), thereby avoiding Seidel's dilemma.

Rejecting the prior grounding requirement appears to have some dire consequences, though. If an epistemic agent can be justified in holding a belief *without* any grounds for thinking it's true, then it would seem that dogmatic stipulations *can* be justified. But this is patently implausible. My stipulation that I am the King of England gives me no justification whatsoever to believe that I am a British monarch. If the plausibility of epistemic relativism depends on this universally unpopular view, then relativists remain impotent when it comes to rationally defending their position.

Fortunately, there is a way of rejecting the prior grounding requirement without being saddled with such a counter-intuitive position. The relativist may claim that groundless beliefs and methods can be justified *by default*, rather than by stipulation. In this case, the agent does not *choose* which of her beliefs are justified, but *inherits* a system of commitments that she uses to guide her inquiries. A member of the Azande tribe trusts poison oracles precisely because she belongs to a community that takes oracular consultation seriously. This is a way of life for which she has no well reasoned grounds, though she bears no epistemic blame for taking part in it. If I were a member of the Azande tribe, I too would likely trust poison oracles. Instead, I belong to a distinct epistemic community whose members have naturalistic commitments, and this fact, all by itself, entitles me to those same commitments.

It strikes me that this *is* a widely held view about justification. People typically maintain their conviction that their beliefs and methods are justified even in the face of sceptical objections that they cannot answer.⁶ This may be because they are patently irrational, but it seems more likely that they see themselves as having certain entitlements in virtue of belonging to a particular epistemic community, rather than having earned them through cognitive achievements. Thus, relativists need not deploy a highly idiosyncratic notion of justification, which would render their argument dialectically impotent.

⁶Of course, this is an *empirical* claim that could be mistaken, so I am prepared to rescind it in the face of contrary evidence. My dataset is limited to those students to whom I have presented the Agrippan trilemma without being able to compel them to adopt the sceptical policy of suspending judgement.

Furthermore, in this way relativists can plausibly argue that basic and non-basic beliefs/methods are justified, but not in the same way, and not absolutely. Basic beliefs/methods are justified by default, while non-basic beliefs are justified, directly or indirectly, on the basis of basic beliefs/methods. I can defend my use of the newspaper's weather forecast by means of an inductive argument, and I am entitled to use inductive reasoning because it is part of the epistemic system in which I have been trained. The Agrippan argument for scepticism gets no traction on this view because we are entitled to our basic beliefs and methods despite the fact that we have no non-circular justification for them. Relativists can thus sidestep the prickly question of the effectiveness of epistemically circular arguments; neither (R5) nor (R5*) need play a role in their defense of relativism. Instead, they can employ an argument like (R1*)–(R7*), which makes no use of the Agrippan argument, to show that justification is inevitably relative (see Sect. 5.3).

The view that everyone has a default entitlement to their epistemic system allows relativists to avoid scepticism. And the doctrine of epistemic pluralism—(R2*)—which says that different persons are entitled to *different* systems, reinforces relativism. The Biblical literalist is entitled to her use of scriptural revelation, but she cannot generate a suasive justification for its trustworthiness when confronted with an atheist. The literalist cannot defend her basic method without an appeal to its deliverances, and (R5*) tells us that this procedure is questions begging, and consequently dialectically ineffective. According to (R4*), the same can be said about the basic beliefs and methods of all other epistemic systems. And this is why, as (R6*) says, there is no objective way of adjudicating between distinct epistemic systems and their outcomes, which results in epistemic relativism, i.e. (R7*). Of course, relativists should not claim that this rationale constitutes an absolute justification for their position, on pain of incoherence, but they needn't do so, since these commitments are tacitly shared by most absolutists.

My aim has not been to defend Seidel's contention that the relativist's use of the Agrippan argument leads her to scepticism, incoherence, or dialectical capitulation. Rather, what I've tried to show is that the argument for epistemic relativism can be reformulated so that it does not rely on the Agrippan argument, and therefore, does not run these risks. It should come as no surprise that answers to the Agrippan argument for Pyrrhonian scepticism prove ineffective against this reformulated

argument. A new strategy of responding to the threat of epistemic relativism is needed.

7.8 CONCLUSION

Neither scepticism nor epistemic relativism are incoherent positions. If sceptics see themselves as justifying their conclusion that justification is impossible, then scepticism is incoherent. But this isn't the case. Rather, the sceptic's argument is meant to show non-sceptics that they cannot coherently regard themselves as capable of justifying their beliefs or methods. Likewise, if epistemic relativists see themselves as absolutely justified in believing that epistemic evaluations are necessarily relative, then epistemic relativism is incoherent. But this isn't the case, either. This doesn't render relativism indefensible, as Siegel claims, because its argument rests on principles that are common to relativists and absolutists alike. These principles also need not entail scepticism, if they countenance default entitlements rather than the Agrippan trilemma. The next chapter will outline one such possible argument for epistemic relativism.

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The Wittgensteinian Position

Wittgenstein's last set of notes, posthumously published as *On Certainty*, contain his first sustained foray into epistemology. Epistemologists have only recently come to recognize their novelty and importance. Danièle Moyal-Sharrock and William H. Brenner boldly declare: "There is now a dawning acknowledgement that Wittgenstein was the author of three, not two great works: *On Certainty* is Wittgenstein's third masterpiece" (Moyal-Sharrock and Brenner 2005, 1). In these notes, Wittgenstein offers an importantly original account of the structure of knowledge, and deftly uses it to criticize both Cartesian scepticism and Moorean realism. Some philosophers claim that Wittgenstein's theory also entails, if not espouses, a radical form of epistemic relativism (Kusch 2010). Michael Williams and Duncan Pritchard, on the other hand, read Wittgenstein as offering distinct anti-sceptical responses to epistemic relativism. Williams argues that Wittgenstein advocates a form of epistemic contextualism which, like his own, is capable of disarming both Pyrrhonian scepticism and relativism (Williams 2007). Pritchard attributes to Wittgenstein a Davidsonian argument that addresses the twin threats of scepticism and relativism (Pritchard 2011).

My aim in this chapter is not to uncover the position that Wittgenstein was arguing for; I will leave this very difficult task to Wittgenstein scholars. Instead, I wish to show that an argument for epistemic relativism can be extracted from his remarks on 'hinge propositions', regardless of whether or not Wittgenstein saw himself as offering such an argument in these remarks. This argument is especially

noteworthy since it makes no use of the Agrippan trilemma. For this reason, it is not subject to Seidel's objection (see Sect. 7.5). And while Wittgenstein's remarks do bear some affinities to the positions of Williams and Davidson, they also undermine their rationales for rejecting epistemic relativism. Thus, this chapter seeks to criticize two more anti-sceptical arguments against epistemic relativism, and outline a non-sceptical argument for epistemic relativism. Before doing so, I will discuss Wittgenstein's account of hinge propositions, as well as its critical targets: Moore's common sense realism and Cartesian scepticism.

8.1 MOORE'S PROOF OF AN EXTERNAL WORLD

In "Proof of an External World", G. E. Moore takes on idealism and scepticism by showing how to construct arguments for the existence of mind-independent objects. All that's required of such arguments, he says, is to prove that some particular objects exist. If a pair of shoes exists, then there are at least two mind-independent objects populating the external world. And if we *know* that a pair of shoes exists, then we *know* that there exist at least two mind-independent objects. Consequently, the realist's task is to prove that there are particular objects: "Obviously, then, there are thousands of different things such that, if, at any time, I can prove any one of them, I shall have proved the existence of things outside of us. Cannot I prove any of these things?" (Moore 1939 [1959], 145). Moore thinks he can:

I can prove now, for instance, that two human hands exist. How? By holding up my two hands, and saying, as I make a certain gesture with the right hand, 'Here is one hand', and adding, as I make a certain gesture with the left, 'and here is another'. And if, by doing this, I have proved *ipso facto* the existence of external things, you will all see that I can also do it now in numbers of other ways: there is no need to multiply examples. (ibid., 145–146)

Moore knows that his two hands exist, and he knows that their existence doesn't depend on his mind, therefore, he knows that there are at least two mind-independent objects.

Though Moore's proof is neither profound nor sophisticated, he insists that it is "perfectly rigorous". In order to rigorously prove a conclusion, he claims that an argument must meet three conditions: it must

be non-circular, valid, and its premises must be known to be true. Moore maintains that his argument meets all three conditions: his conclusion does not presuppose the existence of his hands; if Moore's hands do exist, then there must be mind-independent objects; and Moore knows that his hands exist. Using the same procedure, he says, we can prove that there are misprints on a page of text by holding it up and pointing to three different misprints. If we're willing to accept this 'proof', then we ought to accept Moore's as well, since they are equally rigorous.

8.2 HINGE PROPOSITIONS

Wittgenstein rejects Moore's argument for the existence of the external world, not because it fails to adequately answer the sceptic's doubts, but because it attempts to address doubts that make no sense in the first place. He claims that both Moore and the Cartesian sceptic fail to appreciate the distinctive character of the beliefs whose epistemic status they are debating, beliefs such as: 'My two hands exist'. The sceptic argues that these beliefs should be doubted because they cannot be known, while Moore insists that they are known, so they shouldn't be doubted. Wittgenstein insists that these beliefs are exempt from both justification and doubt because they are *certain*. In a *subjective* sense, this means that we firmly believe that we are not mistaken about them; in an *objective* sense, it means that we *cannot* be mistaken about them:

With the word "certain" we express complete conviction, the total absence of doubt, and thereby we seek to convince other people. That is *subjective* certainty.

But when is something objectively certain? When a mistake is not possible. (OC §194)

By this, Wittgenstein does not mean that objectively certain beliefs are incorrigible; they can be false. His point is that an erroneous certainty has different *implications* than an erroneous belief that is not certain, such that the latter can be properly thought of as the result of a *mistake*, but the former cannot.

A mistake can take place only when there is a recognized procedure for *determining* and *correcting* errors. A friend of mine makes a mistake when he moves one of his Knights diagonally across the board midway through our game. I can point out the error—he thought the piece was

a Bishop—and he can correct it by restoring the Knight to its original position. On the other hand, someone who moves the pieces every which way across the board is not making a mistake in the game of chess, since she is not playing the game at all. Such a person can make mistakes only after they have become familiar with the rules of chess which tell her how the pieces are permitted to move. Similarly, someone who adds $29,567 + 58,321$, and gets 77,888 makes a mistake. When they realize their error—they have forgotten to carry the 1 when adding 9 and 8—they can perform the calculation properly to get the correct result: 87,888. On the other hand, a person who writes ‘ $1 + 1 = 314$ ’ has not miscalculated, since they aren’t calculating at all. Someone who doesn’t know that ‘ $1 + 1 = 2$ ’ is ignorant of the rules of addition, and therefore, this is a certainty about which one cannot be mistaken. The same is true concerning some of our beliefs about the world. Someone who looks for their car in the wrong part of the parking lot is making a mistake that can be corrected by reminding them that they parked in the orange section rather than the purple section. On the other hand, someone who believes he lives in Berlin when in fact he resides in Toronto is not making a mistake; he has not misplaced himself in the same way that the first person has misplaced her car:

If my friend were to imagine one day that he had been living for a long time past in such and such a place, etc. etc., I should not call this a *mistake*, but rather a mental disturbance, perhaps a transient one. (OC §71)

If I believe that I am sitting in my room when I am not, then I shall not be said to have *made a mistake*. (OC §195)

A person who cannot accurately determine his own location cannot be said to know the location of anything at all; he cannot be corrected because he is evidently unfamiliar with the rules that govern our practice of locating objects.

The distinction Wittgenstein is getting at can be put as follows. If you’ve formed an erroneous belief that is *not certain*, then you’ve made a mistake in arriving at that belief by means of a method of inquiry. If you’ve formed an erroneous belief about a proposition that *is certain*, then you’ve shown yourself incapable of arriving at beliefs by means of that method of inquiry. Beliefs that are certain are not immune to doubt because they are self-evidently true, but because they express the

minimal conditions that must be met to distinguish true from false beliefs by means of a particular method. A person who proves incapable of meeting these conditions cannot be said to be engaged in inquiry at all:

That is to say, the *questions* that we raise and our *doubts* depend on the fact that some propositions are exempt from doubt, are as it were like hinges on which those turn. (*OC* §341)¹

A door's hinges are not part of the door itself, but they are what allow the door to serve its function: to open and close. Likewise hinge propositions cannot be the results of our inquiries because they make such inquiries possible in the first place. From this fact, Wittgenstein claims, it follows that the debate between Moore and the Cartesian sceptic over the epistemic status of hinge propositions cannot make sense. In the next two sections, we will see why Wittgenstein thinks they are both mistaken.

8.3 AGAINST MOORE

Moore claims that his argument rigorously proves the existence of the external world on the grounds that it is non-circular, valid, and its premises are known to be true. The central premise of his argument is that he has two hands, which he justifies by holding them up so that he can apprehend them by sight. Wittgenstein insists that this justification does not succeed in generating warrant for Moore's belief about these mind-independent objects. Moreover, he maintains that *no argument* can justify this belief, so it is not something that Moore is capable of knowing. Thus, Moore's argument fails to meet one of the conditions that he himself lists as being essential to its being a rigorous proof.

The crucial principle at work in Wittgenstein's rebuttal is that a justifying belief must be *more certain* than the belief it is meant to justify:

One says "I know" when one is ready to give compelling grounds. "I know" relates to a possibility of demonstrating the truth. Whether someone knows something can come to light, assuming that he is convinced of it.

But if what he believes is of such a kind that the grounds that he can give are no surer than his assertion, then he cannot say that he knows what he believes. (*OC* §243)

¹See also *OC* §279.

The more certain a belief is, the less likely it is to be mistaken. I am less likely to be mistaken in believing that the sun will rise tomorrow than I am in trusting the newspaper's weather forecast, therefore I cannot use the forecast as evidence that the sun will rise tomorrow.

The sentence "I have two hands", when used in ordinary circumstances, expresses a hinge proposition; it is *maximally certain* because it is a belief about which one *cannot* be mistaken. Were I to disbelieve that I have two hands, I would not be making a mistake, but proving myself incapable of determining what exists in the world. The capacity to recognize that one has two hands is a *precondition* of entering into any sort of inquiry into what exists:

I should like to say: Moore does not *know* what he asserts he knows, but it stands fast for him, as also for me; regarding it as absolutely solid is part of our *method* of doubt and enquiry. (OC §151)

Moore's premise that he has two hands is not something that he is capable of knowing because his evidence for this belief cannot be more certain than the belief itself:

My having two hands is, in normal circumstances, as certain as anything that I could produce in evidence for it.

That is why I am not in a position to take the sight of my hands as evidence for it. (OC §250)

Wittgenstein illustrates this point as follows:

If a blind man were to ask me "Have you got two hands?" I should not make sure by looking. If I were to have any doubt of it, then I don't know why I should trust my eyes. For why shouldn't I test my *eyes* by looking to find out whether I see my two hands? What is to be tested by what? (OC §125)

If I held up what appeared to me to be three hands, I would not conclude that I was mistaken in believing that I had only two. Instead, I would conclude that there is something wrong with my vision because my being able to see properly requires that I am able to see my two hands. And if I can't use my visual perception to disconfirm my belief that I have two hands, then I cannot use it to confirm the belief either. Consequently, Moore's justification fails, and what's more, *any* other

justification he can offer will fail for the same reason. Since the belief cannot be justified, it cannot be known, and therefore, it cannot be used to rigorously prove Moore's conclusion that there exists an external world.

8.4 AGAINST SCEPTICISM

Sceptics claim to have legitimate grounds to doubt the existence of the external world, which leads them to suspend judgement on propositions such as 'I have two hands'. This claim necessarily involves taking for granted a standard that determines when it is reasonable to doubt a belief. Two such standards can be found in Descartes' *Meditations*, which is why scepticism about the external world is sometimes known as Cartesian scepticism. The high standard, embodied in the principle of hyperbolic doubt, requires him to doubt any proposition that could conceivably be false. Since it is possible to conceive of circumstances in which I do not have two hands—I could be an amputee who is dreaming that he has two hands, or a brain-in-a-vat that's been programmed to believe it has two hands—this belief fails to meet the high standard. According to the lower, more plausible standard, a proposition should be doubted when its negation is compatible with all of the available evidence. Moore's evidence that he has two hands consists in his being able to see them when held up in front of his face, but this evidence is compatible with his dreaming or being a handless brain-in-a-vat. Indeed, the fact that waking experience is indistinguishable from dreaming experience and artificially stimulated experience undermines the possibility of there being *any* definitive evidence for one's having two hands, so the belief also fails to meet the lower standard as well. Since the same is true of any empirical claim about the external world, the sceptic concludes that it is reasonable to doubt *every* claim about the external world.

Wittgenstein rejects both the low and the high standards of reasonable doubt because they permit doubts that violate his principle that one's grounds for doubt must be *more certain*, and thus less likely to be mistaken, than the proposition they are meant to call into doubt. Since I am less likely to be mistaken in believing that the sun will rise tomorrow than I am in trusting the newspaper's weather forecast, I cannot use the forecast as grounds to doubt that the sun will rise tomorrow. It follows from this principle that no proposition can call a hinge commitment into question because such commitments are *maximally certain*. I cannot

doubt, for example, that I have never been to the moon because “...my not having been on the moon is as sure a thing for me as any grounds I could give for it” (OC §111). If I were to doubt that I’ve never been on the surface of the moon because a friend tells me that I have, I would thereby prove myself unable to rationally evaluate evidence for or against my beliefs:

If someone doubted whether the earth had existed a hundred years ago, I should not understand, for *this* reason: I would not know what such a person would still allow to be counted as evidence and what not. (OC §231)²

Someone who doubts a hinge commitment fails to meet the minimal conditions necessary to distinguish true from false beliefs by means of a particular method of inquiry, and therefore, they cannot provide any rational motivation for doubting any proposition:

If you tried to doubt everything you would not get as far as doubting anything. The game of doubting itself presupposes certainty. (OC §115)³

Any standard that permits one to doubt such commitments, Wittgenstein thinks, is a poor standard of *reasonable* doubt.

The sceptic argues that Moore’s belief that he has two hands can be reasonably doubted because his evidence for the belief is compatible with scenarios in which he does not have two hands. However, Wittgenstein insists that Moore cannot have evidence for his having two hands because this belief is as certain as any proposition that can be used to justify it. For the same reason, sceptics cannot call this belief into doubt without compromising the grounds on which they do so. Hinge commitments, being maximally certain beliefs that are necessarily taken for granted in our rational inquiries, are not subject to justification or doubt.

8.5 EPISTEMIC RELATIVISM

If hinge commitments cannot be sensibly doubted, then Pyrrhonian scepticism is just as untenable as Cartesian scepticism. Pyrrhonian sceptics suspend judgement not only on claims about the external world,

²See also OC §§460, 490, and 506.

³See also OC §§315 and 337.

but on all claims whatsoever, including those about immediate experience, logic, and mathematics. As we have seen, they use the Agrippan trilemma to argue that no proposition can be adequately justified, such that knowledge will always remain beyond our reach.

In advocating the universal policy of suspending judgement, though, the Pyrrhonian necessarily takes for granted a host of commitments. These hinge commitments, because they are maximally certain, cannot be justified, but this does not mean that they are arbitrary stipulations from which we should withhold our assent. We believe them not because we have *decided* to do so, or *learned* to do so, but because our practices of justification and doubt *require* us to do so:

I do not explicitly learn the propositions that stand fast for me. I can *discover* them subsequently like the axis around which a body rotates. This axis is not fixed in the sense that anything holds it fast, but the movement around it determines its immobility. (*OC* §152)

Were we to suspend judgement on these commitments, as the Pyrrhonian recommends, we would no longer be capable of rational judgement at all.

The Agrippan argument presupposes that a belief cannot be rationally maintained unless it can be justified. The Wittgensteinian response is to reject this principle on the grounds that hinge commitments can be neither justified nor doubted because they are constitutive of our epistemic procedures. This same point, it seems, can replace the narrow Agrippan argument in the argument for epistemic relativism. Thus, we can read Wittgenstein as putting forward an argument for epistemic relativism that makes no use of sceptical resources. The argument, together with some of its textual sources, is as follows:

(LW1) The *system-bound* nature of epistemic judgements: epistemic judgements are made possible by a system of hinge commitments:

All testing, all confirmation and disconfirmation of a hypothesis takes place already within a system. And this system is not a more or less arbitrary and doubtful point of departure for all our arguments: no, it belongs to the essence of what we call an argument. The system is not so much the point of departure, as the element in which arguments have their life. (*OC* §105)

(LW2) *Epistemic pluralism*: there exist many radically different systems of hinge commitments:

I believe that every human being has two human parents; but Catholics believe that Jesus only had a human mother. And other people might believe that there are human beings with no parents, and give no credence to all the contrary evidence. Catholics believe as well that in certain circumstances a wafer completely changes its nature, and at the same time that all evidence proves the contrary. And so if Moore said “I know that this is wine and not blood”, Catholics would contradict him. (*OC* §239)⁴

(LW3) *Epistemic incommensurability*: two or more inquirers may differ with respect to an epistemic judgement because they have different hinge commitments:

But what men consider reasonable or unreasonable alters. At certain periods men find reasonable what at other periods they found unreasonable. And vice versa.

But is there no objective character here?

Very intelligent and well-educated people believe in the story of creation in the Bible, while others hold it as proven false, and the grounds of the latter are well known to the former. (*OC* §336)⁵

(LW4) *Wittgenstein’s principle*: hinge commitments admit of neither justification nor reasonable doubt because they are constitutive of our epistemic procedures:

At the foundation of well-founded belief lies belief that is not founded. (*OC* §253)⁶

(LW5) *Epistemic equality*: therefore, there can be no objective grounds for preferring any system of hinge commitments to its alternatives, and consequently, there is no principled way to resolve cases of epistemic incommensurability:

Supposing we met people who did not regard that [the testimony of a physicist] as a telling reason. Now, how do we imagine this? Instead of the physicist, they consult an oracle. (And for that we consider them primitive.) Is it wrong for them to consult an oracle and be guided by it? – If we call this “wrong” aren’t we using our language-game as a base from which to *combat* theirs? (*OC* §609)

⁴See also *OC* §§360–361.

⁵See also *OC* §108.

⁶See also *OC* §§166 and 403.

I said I would ‘combat’ the other man,— but wouldn’t I give him *reasons*? Certainly; but how far do they go? At the end of reasons comes *persuasion*. (Think what happens when missionaries convert natives.) (OC §612)⁷

(LW6) *Epistemic relativism*: the justification of an epistemic judgement can lend it credibility only relative to the system of hinge commitments in which it is being evaluated.

The only difference between this argument and the principal argument for epistemic relativism from Chapter 2 is that (R4) and (R5) have been replaced by Wittgenstein’s principle (LW4), that hinge commitments admit of neither justification nor reasonable doubt. Since (R4) and (R5) are the source of Seidel’s objection that epistemic relativism is either indistinguishable from scepticism or indefensible, the objection does not apply to Wittgenstein’s argument for epistemic relativism. And it fails to apply precisely because Wittgenstein can be understood as endorsing a theory of *default justification*. Though our hinge commitments cannot be justified by means of our epistemic practices, we are justified in believing them because they are essential to such practices:

But I did not get my picture of the world by satisfying myself of its correctness; nor do I have it because I am satisfied of its correctness. No: it is the inherited background against which I distinguish between true and false. (OC §94)

Because hinge commitments do not require justification, the problematic question of whether or not they can be justified by means of circular arguments is moot. And because there are different systems of hinge commitments, none of which admit of nor require justification, the threat of epistemic relativism remains.

In the remaining sections of this chapter, I will discuss two alternative readings of *On Certainty*, according to which Wittgenstein uses anti-sceptical strategies to undermine the threat of epistemic relativism. I will argue that neither of these strategies is successful for reasons that Wittgenstein himself identifies.

⁷See also OC §§188 and 217.

8.6 WITTGENSTEIN AS A CONTEXTUALIST

Williams argues that Wittgenstein is not an epistemic relativist, but a contextualist with respect to justification. Williams's breed of contextualism involves rejecting a host of commitments that inform traditional epistemology and motivate Pyrrhonian scepticism. The first is the doctrine of *epistemological realism*, which is "...the view that we have some fixed 'epistemic position' determined by facts about the nature of knowledge or the structure of justification" (Williams 2001, 171). These facts are supposed to be expressed by epistemic principles that reveal the *invariant* conditions sufficient for justification, e.g.: a belief is justified when it is based on observation, memory, a priori intuition, etc. The second is the *prior grounding requirement* discussed last chapter, according to which "...one is epistemically responsible in believing a given proposition only if one's belief is based on adequate evidence" (ibid., 24). Adequate evidence is typically understood as evidence that is licensed by epistemic principles. The third is the *claimant-challenger asymmetry*.

Whenever knowledge is claimed, the burden of justification lies with the claimant. If I represent myself as knowing that P, I invite you to ask me how I know. There is nothing you have to do, or no way that things have to be, in order for you to have the right to enter a challenge. (Williams 2007, 99)

If we are entitled only to those beliefs for which we can provide adequate grounds, as determined by our epistemic principles, then it will always be incumbent on a believer to have such grounds at the ready in case of a challenge to their beliefs. If a believer cannot adequately answer a challenge to one of their beliefs, then that belief is unjustified.

These three commitments are essential to the Agrippan arguments for scepticism. If *every* justified belief must be supported by adequate evidence, and the sceptic has the unqualified right to challenge *any* belief, then the epistemic regress problem is unavoidable; a series of indefinitely iterated challenges to one's beliefs will result in an infinite regress, dogmatic assertion, or circular argument. And if all justification depends on epistemic principles that are themselves subject to sceptical scrutiny and the prior grounding requirement, then the problem of the criterion is unavoidable as well.⁸

⁸On this point, see Chapter 4.

Williams rejects the prior grounding requirement and the claimant-challenger asymmetry, and he argues that Wittgenstein does as well. He replaces them with what Brandom calls the *default and challenge* conception of inquiry, according to which “One is entitled to a belief or assertion (which, remember, is an implicit knowledge claim, unless clearly qualified) in the absence of appropriate ‘defeaters’: that is, reasons to think that one is not so entitled” (Williams 2001, 149). On this model, challenges to knowledge claims are not unconditionally justified; *challengers* must be able to produce compelling reasons for questioning a knowledge claim. In the absence of such legitimate challenges, a believer is entitled to their beliefs. Thus, contra the prior grounding requirement, one can be entitled to a belief even if s/he *cannot* produce adequate evidence in its favour. We are entitled to maintain such beliefs *by default*.

Williams argues that “Rejecting the Prior Grounding Requirement thus defangs Agrippa’s trilemma. There is no presumption that requests for further justification can be repeated indefinitely. At some point, they are brought to an end by default entitlements” (ibid., 151). The power of the Agrippan trilemma is that it applies to *every one* of our beliefs; this is why it is an argument for *global* scepticism. If, however, we are entitled to some beliefs by default, then the Agrippan trilemma cannot be generated in the absence of some *additional* reasons to think that these beliefs are suspect. Without such additional reasons, the regress terminates at default entitlements.

Furthermore, following Wittgenstein, Williams claims that there will *always* be a class of default entitlements that *cannot* be appropriately challenged:

On the Default and Challenge conception, which insists that claimants and challengers share justificational responsibilities, no move in the game of giving and asking for reasons is presuppositionless. Quite the reverse: all moves depend for their legitimacy – perhaps even for their full intelligibility – on commitments currently not under scrutiny, at least some of which have the status of default entitlements. This applies to challenges, as much as to claims. A motivated, thus concrete, challenge will presuppose a large background of default entitlements. All questioning, hence all positive justifying, takes place *in some definite justificational context*, constituted by a complex and often largely tacit array of current entitlements. In abstraction from all such contexts, epistemic questions simply get no purchase. It follows that although (perhaps) *any* belief may be challenged

given appropriate stage-setting, there is no possibility of questioning the legitimacy of our beliefs in the *collective* way that the philosophical sceptic aspires to. (ibid., 151)⁹

If legitimate doubts require good *grounds*, and justification necessarily takes place against a background of *hinge commitments*, then the sceptic's goal of throwing *all* beliefs into doubt is unrealizable.

The contextualist also rejects epistemological realism, insisting that there are no facts—expressed by epistemic principles—that determine the epistemic status of our beliefs once and for all: “What is properly used to test what varies with our interests, the dialectical environment and our real-world circumstances” (Williams 2007, 106). More specifically, Williams insists that the factors that determine a belief's status as a default entitlement or a hinge commitment are variable and context-sensitive, and therefore, the range of legitimate doubts is contextually variable as well. Once again, he sees himself as following Wittgenstein in this regard:

It might be imagined that some propositions, of the form of empirical propositions, were hardened and functioned as channels for such empirical propositions as were not hardened but fluid; and that this relation altered with time, in that fluid propositions hardened, and hard ones became fluid. (OC §96)

One and the same sentence can express an empirical proposition in one circumstance and a hinge commitment in another. For example, the sentence “I am in Canada” expresses a hinge commitment about which I cannot be mistaken when I entertain it in my home office. However, it expresses an empirical proposition whose truth I am completely unsure of if I've been kidnapped and blindfolded.¹⁰

⁹Williams isn't as clear on this point as one might like him to be. He fails to distinguish a commitment to the default and challenge model of inquiry from the additional commitment to the existence of hinge propositions.

¹⁰Williams lists the following four context-sensitive factors that determine the hinge status of a commitment:

Semantic: The factors that determine whether or not a challenge to the commitment is intelligible.

Williams's claims that the epistemic status of a belief must be determined within a particular context, and that it can vary from one context to another, seem to put him firmly within the relativist camp.¹¹ He responds: "On the contrary, contextualism is the cure for all sceptical temptations, relativism included" (Williams 2007, 93). Thus, we have, once again, an anti-sceptical response to the threat of epistemic relativism. Let us now see how that response is supposed to work.

8.6.1 *The Contextualist Response to Relativism*

Epistemic relativists, like contextualists, claim that justification necessarily takes place against a background of essential presuppositions. This may be why the two positions are sometimes confused. However, Williams insists that relativists and contextualists think of these presuppositions very differently. Relativists think of a belief (or a method) as basic if it does not admit of a non-circular justification within an epistemic system. Since arguments for basic beliefs are necessarily circular, relativists conclude that they cannot be found compelling by anyone who does not already accept the beliefs/methods in question. Therefore, instances of epistemic incommensurability—disagreements that arise because two or more people subscribe to different epistemic systems—are *necessarily* irresolvable.

Williams claims that this view presupposes the doctrine of epistemological realism. Basic beliefs are supposed to not admit of non-circular justifications because they form an essential part of a *static* epistemic system relative to which *all* justification takes place within a particular community of inquirers. Whether or not a belief is basic with respect to an epistemic system is a factual matter that *does not vary* from one circumstance to another. Thus, because basic beliefs are *always* being

Methodological: The factors that determine whether or not a challenge to the commitment would undermine an operative epistemic practice.

Dialectical: The factors that determine whether or not a challenge to the commitment is relevant to a particular investigation.

Economic: The factors that determine whether or not a challenge to the commitment is worth addressing.

¹¹Indeed, he notes that sections from his *Unnatural Doubts* (1996) appear in a section entitled "Epistemological Relativism" in Kim and Sosa (2000).

presupposed by the users of an epistemic system, there are *no circumstances* in which a disagreement over basic beliefs can be rationally resolved.

As we have seen, Williams-style contextualists reject the doctrine of epistemological realism, and with it the relativist view that basic beliefs—or hinge commitments—are *invariably* basic, and therefore forever beyond the reach of rational argument. Williams and Wittgenstein think that the status of a belief as a hinge commitment is determined by factors that are *variable* and *context-sensitive*. In ordinary circumstances, I cannot be mistaken in believing that I have two hands; this is not something that is up for rational debate. But if I were to wake up after being in a violent car crash and discover that my arms are wrapped in bandages, I can legitimately wonder whether or not I have two hands. For this reason, Williams insists that contextualists are not relativists, but *fallibilists*. They believe that hinge commitments can be *false*, and that we can *discover* that they are false, sometimes through rational argument with those who have very different hinge commitments. However, this process of discovery essentially involves a shift in context whereby the factors that normally put a commitment beyond reasonable doubt are no longer operative. Consequently, the fact that two people disagree on an epistemic matter because they endorse different hinge commitments does not preclude the possibility that they can nevertheless *rationally resolve* their disagreement by changing the context in which the disagreement takes place.

Williams sums up the similarities and differences between relativism and contextualism as follows:

What we can argue for depends on rich commitments about the world around us. This means that individuals and groups can vary widely in their epistemic resources. Accordingly, whether you can convince another person by argument depends on how much common ground there is between you. However, these limitations are contingent and variable: they do not reflect imprisonment in permanently incommensurable world-views. (Williams 2007, 108–109)

Contextualists accept the system-bound nature of epistemic judgements and the doctrine of epistemic pluralism. They stop short of endorsing the doctrine of epistemic incommensurability, though, because unlike relativists, they do not think of inquirers as being trapped within unchanging epistemic systems.

8.6.2 *Drawbacks of the Contextualist Response*

There are three drawbacks to the contextualist response to epistemic relativism. First, as Pritchard (2011) points out, it seems overly modest. Williams thinks of contextualism as blocking the move from the system-bound nature of epistemic judgements and epistemic pluralism to epistemic incommensurability, i.e., the move from (R1) and (R2) to (R3) in the principal argument for epistemic relativism (see Sect. 2.5). From the fact that justification necessarily takes place within a system of basic principles and methods, and that there is more than one such system in use, it does not follow that there exist irresolvable cases of epistemic incommensurability. A change of context may precipitate a change of basic commitments, such that a disagreement that lacks a rational resolution in one circumstance becomes resolvable in another. In making this case, Williams is not arguing that putative cases of epistemic incommensurability *do* admit of rational resolutions, but that they *might*: “[Contextualists] think that resolvability is a contingent matter. We never know what we might find out, or think up, such that parties to even the most intractable dispute suddenly see matters in a new light” (Williams 2007, 111).

The critical effectiveness of this objection depends on the relativist’s position concerning epistemic incommensurability. If her position is that *there are* irresolvable cases of epistemic incommensurability, then Williams can be seen as providing grounds for thinking that she *might* be wrong; it might be that every epistemic disagreement can be rationally resolved by means of a suitable change in context. If, on the other hand, her position is that there *can be* such cases of epistemic incommensurability, then it would seem that Williams agrees: “As a rule, when people’s beliefs differ profoundly, there is no guarantee that there will be neutral epistemic principles for determining who is right and who is wrong” (ibid.). Resolvability, as he says in the previous quotation, is a contingent matter. Pritchard argues that this weaker claim is all relativists need to gain their point about justification, and therefore, by conceding it, Williams has given up the fight against epistemic relativism altogether (Pritchard 2011, 276–277). But even if relativists insist on the stronger thesis—that there *are* intractable cases of epistemic incommensurability—Williams has managed only to introduce additional considerations to keep in mind when evaluating that thesis. In either case, contextualists have no reason to think that the relativist view on the limits of justification *is* wrong.

There is another, deeper problem for the contextualist response to epistemic relativism, namely that it can actually be used to *reinforce* the relativist's position. There are two possible morals to draw from the contextualist's insight that a change of context can effect a change of hinge commitments. The moral that Williams draws is that a change of context can facilitate greater agreement between epistemic agents regarding their hinge commitments. He ignores, however, the converse moral that a change of context can also facilitate greater *disagreement*. This possibility is highlighted by Wittgenstein:

Catholics believe as well that in certain circumstances a wafer completely changes its nature, and at the same time that all evidence proves the contrary. And so if Moore said "I know that this is wine and not blood", Catholics would contradict him. (*OC* §239)

In most circumstances, Catholics and naturalists will give chemistry the last word on the material composition of objects. When it comes to the Eucharist, however, devout Catholics will defer to religious authorities. Thus, while contextualism highlights the possibility of resolving recalcitrant disputes by recontextualizing them, it also countenances the possibility that new contexts will give rise to new, irresolvable disputes. And because the contextualist's insight cuts both ways, it is no more an argument against epistemic relativism than it is for it.

Finally, one could argue that disagreements that are irresolvable in one context cannot be resolved in another because epistemic *disagreements* change with context as well. Williams argues that a change of context can precipitate a change in the evidential considerations that are relevant to beliefs, such that evidence for or against a hinge commitment that is unavailable in one context can be used in another to resolve putative cases of epistemic incommensurability. But if rational disagreements are distinguished in part by the evidence that can figure in their resolutions, then Williams's process of recontextualization can aspire only to *replace* one disagreement with another, not to bring a single disagreement to a rational conclusion. A disagreement about the material nature of a wafer that takes place in a church is different, both in number and kind, from one that takes place in a laboratory because theological authorities are a source of evidence in the first context but not in the second. Thus, a naturalist cannot disabuse the Catholic of her hinge

commitment by changing the scene of their disagreement. Rather than solving the problem of epistemic incommensurability, Williams has contextualized it.

8.7 WITTGENSTEIN AS A DAVIDSONIAN (OR DAVIDSON AS A WITTGENSTEINIAN)

Pritchard understands Wittgenstein as offering a more substantive response to epistemic relativism that undermines the *possibility* of epistemic disagreements that do not admit of rational resolutions. The key move in this response is to reject the doctrine of epistemic pluralism, i.e., the premise (R2) that says there are several *radically different* epistemic systems. Pritchard interprets *On Certainty* as offering a Davidsonian argument against epistemic pluralism. The original target of Davidson's argument is Pyrrhonian scepticism, so Pritchard is advocating one more anti-sceptical strategy of resisting epistemic relativism. Before outlining this strategy, let's take a brief look at Davidson's argument against Pyrrhonian scepticism.

Pyrrhonian sceptics use the Agrippan argument to show that there cannot be a good reason to believe that *any* of our beliefs are true. Rather than offering such a reason, and risk falling prey to the trilemma, Davidson presents a reason to believe that *most* of our beliefs are true. He makes the case that our being able to form and communicate beliefs prohibits the possibility that our beliefs are radically mistaken. Since sceptics take it for granted that we have beliefs—otherwise why would they go to the trouble of challenging them?—they too must accept Davidson's conclusion on this line of argument.

Davidson begins by introducing the notion of *radical interpretation*, which is the task of interpreting the linguistic behaviour of a speaker whose language is completely foreign to us. Accomplishing this task, he notes, presents interpreters with the following difficulty: one cannot determine the meanings of a speaker's utterances without knowing what they believe, but one cannot determine what someone believes without knowing what their utterances mean. If I say "There is a rabbit", you cannot understand this utterance unless you are capable of ascribing to me the belief that I have spotted a rabbit (as opposed to a field or a sunset), and you cannot ascribe this belief to me without knowing the meaning of the sentence. The fact that interpreters are caught in this vicious

circle is what Davidson calls the *problem of radical interpretation*. And it should be noted that *all* of us have faced this problem, since there was a time in each of our lives when we spoke no language at all. Yet we've all learned how to speak and understand at least one language. How have we managed this feat?

We have been able to interpret the utterances of foreign language users, says Davidson, by paying attention to the *causes* of their utterances:

This is a fair place to start the project of identifying beliefs and meanings, since a speaker's assent to a sentence depends both on what he means by the sentence and on what he believes about the world. Yet it is possible to know that a speaker assents to a sentence without knowing either what the sentence, as spoken by him, means, or what belief is expressed by it. (Davidson 1986, 315)

My being prompted to assert "There is a rabbit" when presented with a rabbit depends *both* on my belief that I have spotted a rabbit *and* on the meaning of the sentence "There is a rabbit". And the fact that I make this assertion in these circumstances is something that an onlooker can apprehend *without* knowing anything about my beliefs or my language. Thus, my interpreter is able to accomplish the task of radical interpretation by using what she knows—the causes of my utterances—to determine what she wants to know—what I believe and what my utterances mean. This would be impossible, however, if she did not exercise the *principle of charity*, which directs us to "...interpret what the speaker accepts as true when we can" (ibid., 316). It is not enough that my interpreter knows that my spotting a rabbit caused me to say "There is a rabbit"; she must also believe that I have *correctly* identified the creature that prompted my assertion. If she assumes that I am mistaken about the cause of my utterance, then she has no way of determining what I mean by the word 'rabbit', or what I believe when I say "There is a rabbit"; she has no way of determining what mistake I have made because there is no path that can lead her from what she knows—I have spotted a rabbit—to what I believe—I have spotted a squirrel? A groundhog? A toaster? Davidson explains:

The point of the principle [of charity] is to make the speaker intelligible, since too great deviations from consistency and correctness leave no common ground on which to judge either conformity or difference. From a

formal point of view, the principle of charity helps solve the problem of the interaction of meaning and belief by restraining the degrees of freedom allowed belief while determining how to interpret words. (ibid.)

The principle of charity, then, is an *essential presupposition* of radical interpretation because a speaker's utterances can be informative to an interpreter only if she assumes that the speaker shares many of her beliefs about the causes of those utterances, which of course she takes to be true.

However, the fact that speakers and interpreters must share many of their beliefs does not entail the anti-sceptical conclusion that most of their beliefs are *true*. We could, after all, share many false beliefs. Davidson naturally admits that *some* of our beliefs are false, but he denies that we can be *routinely* and *radically* mistaken about the causes of our utterances:

This can, and no doubt often does, happen. But it cannot be the rule. For imagine for a moment an interpreter who is omniscient about the world, and about what does and would cause a speaker to assent to any sentence in his (potentially unlimited) repertoire. The omniscient interpreter, using the same method of the fallible interpreter, finds the fallible speaker largely consistent and correct. By his own standards, of course, but since these are objectively correct, the fallible speaker is seen to be largely correct and consistent by objective standards. [...] Once we agree to the general method of interpretation I have sketched, it becomes impossible correctly to hold that anyone could be mostly wrong about how things are. (ibid., 317)

In communicating with fallible creatures like us, the omniscient interpreter must also exercise the principle of charity, i.e., she must assume that we share most of her beliefs, which she takes to be true. And because she is omniscient, her beliefs *are* true, so those beliefs that we share with her must be true.

By means of this argument, Davidson attempts to solve one of the classic problems with coherentist theories of justification. It has often been objected that a system of propositions can be highly coherent, yet generally false—the propositions that make up a novel is a typical example of this situation. Davidson argues that our beliefs must be generally true, and therefore, any belief that coheres with our belief system is likely to be true as well. In short, coherence by itself does not yield justification, but coherence plus the principle of charity does. And since the

principle of charity *must* be accepted by anyone who speaks a language and ascribes beliefs—this includes sceptics, of course—it would seem that Davidson’s breed of coherentism must be recognized as an effective antidote to Pyrrhonian scepticism.

8.7.1 *The Davidsonian Response to Relativism*

The weakest point in Davidson’s anti-sceptical argument is his use of the omniscient interpreter. If such a being were truly omniscient, wouldn’t it know what we believe independently of our utterances? If it didn’t know what we believe, what assurance do we have that it could interpret our utterances? Perhaps the interpreter’s invariably true beliefs would pose an unbreachable barrier to its understanding us. These difficult questions cast doubt on Davidson’s answer to Pyrrhonian scepticism.

As Pritchard points out, though, Davidson’s view can be used to attack one of the non-sceptical tenets of the argument for epistemic relativism: the doctrine of *epistemic pluralism*. Davidson’s central insight is that successful communication, and therefore rational disagreement, is possible only if speakers share many of their beliefs in common. The beliefs that they must share, he says, are *basic* to their epistemic systems:

...most of the sentences a speaker holds to be true – especially the ones he holds to most stubbornly, the ones most central to the system of his beliefs – most of these sentences *are* true, at least in the opinion of the interpreter. (ibid., 316)

Consequently, any two people engaged in a disagreement must subscribe to similar or identical epistemic systems; they cannot fundamentally disagree about epistemic systems themselves.

Pritchard sees Wittgenstein as making a similar point, and thus he eschews the relativist interpretation of *On Certainty*. Several of Wittgenstein’s passages seem to support Pritchard’s reading:

The *truth* of my statements is the test of my *understanding* of these statements. (OC §80)

That is to say: if I make certain false statements, it becomes uncertain whether I understand them. (OC §81)

In order to make a mistake, a man must already judge in conformity with mankind. (OC §156)

Every language-game is based on words ‘and objects’ being recognized again. We learn with the same inexorability that this is a chair as that $2 \times 2 = 4$. (OC §455)

If, therefore, I doubt or am uncertain about this being my hand (in whatever sense), why not in that case about the meaning of these words as well? (OC §456)

If someone were to look at an English pillar-box and say “I am sure that it’s red”, we should have to suppose that he was colour-blind, or believe he had no mastery of English and knew the correct name for the colour in some other language.

If neither was the case we should not quite understand him. (OC §526)

The hinge commitments that Wittgenstein discusses — $2 \times 2 = 4$, this is my hand, etc.—are the beliefs that we *must* agree on in order to communicate. Pritchard says: “...these propositions are in effect just exemplifying a general hinge conviction that we are not fundamentally in error in our beliefs about the world” (Pritchard 2011, 282).¹² The general hinge commitment is another version of Davidson’s principle of charity. In exercising this principle, we assume that others know that $2 \times 2 = 4$ and that they have two hands, because we are certain of these things and we could not understand someone who professed to doubt or reject them.

Pritchard concedes that the principle of charity does not imply that everyone shares *all* of the same hinge commitments, and therefore there can be disagreements that arise because two people are certain about conflicting beliefs:

Of course, since we do not all share the same beliefs, then it will follow that our general hinge commitment may manifest itself in a commitment to a differing set of specific propositions. When this occurs, we will have disputes that look as if they are epistemically irresolvable. (ibid., 282)

I believe what the astrophysicist tells me about imminent celestial events, while the Azande tribesman stubbornly believes in the prophecies of a poison oracle. Nevertheless, Pritchard assures us that “...there will be an appropriate epistemic path to resolution available since such disputes

¹²This reading is also presented in Pritchard (2009).

inevitably occur relative to a shared background of commitments” (ibid., 283). My epistemic system cannot be so different from the Azande’s that we cannot resolve our disagreement, otherwise there could be no intelligible disagreement in the first place. Pritchard thus accepts the thesis of epistemic incommensurability, but he denies the relativist’s conclusion that all such disagreements are irresolvable. Since epistemic agents necessarily share the majority of their basic beliefs and methods in common, *every* case of epistemic incommensurability is *necessarily* resolvable. He explains:

What happens in such cases is that the agents concerned (one of them anyway) will over time cease to regard a certain proposition as codifying the hinge conviction but as rather being a belief that is open to epistemic evaluation in the normal way. (ibid., 283)

When cases of epistemic incommensurability are rationally resolved, two things must happen:

- a. one of the disputants must cease to regard a belief or method as basic, and
- b. that same disputant must be convinced that the belief is false on the basis of evidence that they find compelling.

Pritchard’s central claim is that this will *always* be possible because the parties to epistemic disagreements necessarily share a critical mass of their basic commitments in common.

8.7.2 *Drawbacks of the Davidsonian Response*

Pritchard sees himself (and Wittgenstein) as offering a much more substantive response to epistemic relativism than Williams. He is not arguing that putative cases of epistemic incommensurability might be resolvable; he is arguing that they *must* admit of rational resolutions, for otherwise there could not be *intelligible* disagreements in the first place. His argument is as follows:

(DP1) In order for people to communicate and disagree, there must be significant overlap in their epistemic systems.

(DP2) Whenever there is significant overlap in people's epistemic systems, it is possible for them to rationally resolve cases of epistemic incommensurability.

(DP3) Every putative instance of epistemic incommensurability is an instance of intelligible communication and disagreement.

(DP4) Therefore, every putative case of epistemic incommensurability admits of a rational resolution.

The problem with this argument is that premises (DP2) and (DP3) are open to serious objections.

Against (DP3), one can present several putative cases of epistemic incommensurability where it is not at all clear that the disputants are successfully communicating. Empiricists like Hume claim that Leibniz's talk of monads is completely unintelligible to them because the idea (concept) of a monad has no corresponding impression (empirical content). More recently, analytic philosophers have said the same thing about metaphysical discussions within the Continental tradition. The Logical Positivists have been especially vehement on this point: "...meaningful metaphysical statements are impossible" (Carnap 1932 [1959], 76). Carnap continues: "This follows from the task which metaphysics sets itself: to discover and formulate a kind of knowledge which is not accessible to empirical science" (ibid.). Carnap is telling us that this communication breakdown is the result of an *epistemic* disagreement: the Positivists give empirical science the last word on metaphysics and meaning, while their Continental counterparts do not. It doesn't seem the least bit idiosyncratic to characterize this as a situation in which two schools of inquirers subscribe to radically different epistemic systems, preventing them from reaching a rational consensus on a certain range of problems. At any rate, this is how epistemic relativists are likely to characterize the situation.

Of course, analytic and Continental philosophers, and empiricists and rationalists more generally, can communicate about a good many *other* things: the weather, their favourite sports teams, the stock market, etc. But when it comes to discussions of metaphysics, analytic philosophers are unable to apply the principle of charity because they are at such an epistemic distance from their Continental peers that they find it impossible to assign *any* interpretation to their utterances. The same is true of empiricists with respect to the utterances of rationalists. The fact that

two people can successfully communicate about *most* things does not imply that they can successfully communicate about *everything*, or that their respective epistemic systems are similar in *every* respect. Only an overly holistic theory of meaning could compel us to think otherwise. Thus, the fact that two people can successfully communicate does not imply that they cannot find themselves irrevocably at odds on a matter of epistemic judgement.

Pritchard takes (DP2) for granted without anywhere providing an argument in its favour. And while it may be the case that inquirers with similar epistemic systems will typically be able to rationally resolve their disagreements, it is not at all clear that this is *always* and *necessarily* the case. Indeed, Williams argues:

The kind of variability in belief that draws people to relativism exists within the bounds of Davidsonian possibility. The animist thinks that trees are the homes of spirits; the scientifically minded person does not. In order to disagree about trees in this way, there is a lot the parties have to agree about. But their world-views remain deeply at odds, even though they agree at the level of 'That's a tree'. For all that the argument from charity shows, when it comes to disputes like that between an animist and a physicalist, relativism could be the right view. (Williams 2001, 223)

Wittgenstein provides another example:

Very intelligent and well-educated people believe in the story of creation in the Bible, while others hold it as proven false, and the grounds of the latter are well known to the former. (OC §336)

To say that some creationists are intelligent is to say, among other things, that they have many *true beliefs*. Many naturalists will happily admit this, and therefore have no problem exercising the principle of charity when interpreting the utterances of creationists. And if creationists truly *understand* the grounds on which naturalists reject the Biblical account of creation, as Wittgenstein suggests, then they must be able to interpret the utterances of naturalists. Naturalists and creationists will generally agree about the causes of their utterances, such that they are able to successfully communicate, but this does not preclude the possibility of their failing to reach a reasoned agreement about the origin of the planet and its inhabitants.

Pritchard is more optimistic. He imagines two fictional characters, Adam and Eve, who arrive at divergent beliefs about the genesis of the earth by theological and naturalistic means:

Adam is, we'll grant, a lover of truth, and keenly feels the need to know where to stand on the important issues of the day. Now Adam was raised in a religious community which takes the Bible as literal truth. He thus has a wealth of testimony from those around him that he should believe likewise. Moreover, he knows these informants to be generally reliable and honest folk. Their testimony about many other such matters – such as the time of day, or the world capitals – is typically true and can often be confirmed as such by independent sources. Adam thus arguably has an epistemic basis for his belief that the earth was created less than 10,000 years ago...

Now let's think of Adam's adversary, whom we will call "Eve." Eve acquired her belief about the age of the earth from studying the relevant areas of science at school (geology, etc.). This initial testimonial basis for her belief was epistemically sound because she had a wealth of independent evidence for supposing that this testimony was true – e.g., because she could ascertain for herself that the people proposing it (teachers, parents, and so on) were generally reliable and honest people. Over time, the epistemic basis for her belief has changed as she has become a scientist herself whose research takes in questions such as the earth's age. Thus she has come to gain first-hand experience and understanding of the nature of the scientific evidence in support of her belief that the earth is very old, and certainly much, much older than 10,000 years. (Pritchard 2011, 268–269)

In Pritchard's scenario, Adam and Eve share a number of epistemic practices in common. In particular, they arrive at their beliefs by the same means: testimony from *prima facie* reliable sources. This being the case, Pritchard asks:

Now given that Adam and Eve share such common knowledge, and indeed agree on so many things, and given also that they are open to the possibility of counter-evidence, why are we so confident that this dispute is epistemically irresolvable? (ibid., 280)

Relativists may respond that they are not at all confident that this dispute is irresolvable because it is clearly *not* a case of epistemic incommensurability. If we regard Adam's belief in the reliability of Biblical scripture as *empirically grounded* in the testimony of his community members, and

thus defeasible, then *it cannot be a hinge commitment*. Consequently, Adam and Eve clearly do not disagree on the age of the earth *because they subscribe to different epistemic systems*, contra-(LW3).¹³ If, on the other hand, Biblical revelation is a *basic* source of information for Adam—if his belief in the reliability of scripture is a hinge commitment—then it is immune from rational evaluation, just as Eve’s hinge commitment to her fundamental empirical methods is immune to rational evaluation (this follows from LW4). This would make the disagreement between Adam and Eve a genuine case of epistemic incommensurability, and it would also make it difficult to see how Adam and Eve can possibly reach a rational consensus. It *may* be that Eve can somehow leverage the commitments they share in common to compel Adam to both re-think the status of his creationist beliefs and later abandon them in the face of empirical evidence, but without an explanation as to *how* she would accomplish this, or an argument that establishes that she *definitely could* accomplish it, Pritchard is no better off than Williams.

8.8 CONCLUSION

There is in *On Certainty* an argument for epistemic relativism; whether or not Wittgenstein endorsed the argument is debatable. What’s important for our purposes is that the argument does not make use of the Agrippan trilemma, and therefore, is not in danger of collapsing into scepticism. Indeed, it is clear that Wittgenstein is hostile towards scepticism of both the Cartesian and Pyrrhonian varieties. As in Kant’s work, then, the threats of scepticism and epistemic relativism become uncoupled on Wittgenstein’s view of the structure of knowledge; the difference is that while Kant rejects relativism and adopts a species of scepticism, Wittgenstein can be read as doing the opposite.

¹³If I am correct, then the relativist will reject Pritchard’s formulation of the thesis of epistemic incommensurability: “It is possible for two agents to have opposing beliefs which are rationally justified to an equal extent where there is no rational basis by which either agent could properly persuade the other to revise their view” (Pritchard 2011, 296). She will reject it because it fails to identify the *reason* why such disagreements resist rational resolution, i.e., the fact that the parties subscribe to different epistemic systems. See, by contrast (R3) and (LW3), which I believe more accurately capture the relativist’s notion of epistemic incommensurability.

According to Williams's and Pritchard's anti-relativist readings of *On Certainty*, Wittgenstein is using an anti-sceptical strategy to undermine epistemic relativism. I have argued that like all the other strategies we've examined, they fail to hit their mark. In the next chapter, I will outline a more promising strategy for resisting epistemic relativism, one that in no way engages the threat of scepticism.

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A Dialectical Strategy

I have argued that anti-sceptical strategies of responding to epistemic relativism prove ineffective against reasonably sophisticated relativist positions. This would be a cause for concern if an answer to the challenge of relativism required an answer to scepticism. Fortunately such is not the case; Pyrrhonian scepticism and epistemic relativism are distinct challenges, motivated by distinct arguments, and vulnerable to distinct criticisms.

One way of attacking epistemic relativism, while leaving the threat of scepticism untouched, is to undermine the doctrine of epistemic pluralism, i.e., the view that there exist many different epistemic systems. This is what Boghossian (2006) does when he attempts to show that the disagreement between Galileo and Cardinal Bellarmine is not an instance of epistemic incommensurability. Seidel (2014) attempts to generalize this approach by introducing two criteria that specify when distinct methods belong to the same epistemic system. Using these criteria, he seeks to show that the parties in the much-discussed cases of the poison oracle and the cosmological debates share the same set of basic methods, thus defusing the threat of epistemic relativism.

In this chapter, I argue that Seidel fails to effectively undermine the doctrine of epistemic pluralism. Though I will not object to his criteria, I argue that they do not apply to the case of Galileo and Bellarmine. Nevertheless, Boghossian's analysis of this disagreement does open the door to a new strategy of resisting epistemic relativism. This strategy involves revealing not the foundational methods on which our epistemic

practices ultimately depend for their justification, but the methods that are *necessarily presupposed* when we engage in our epistemic practices. I trace this type of analysis back to Kant, and call it, following Collingwood (1940), *presuppositional analysis*. The outcomes of this type of analysis, I believe, provide us with our most convincing case for the absolutist and naturalist presumptions. While these outcomes do meet the recognition constraint, they give us no traction against the threat of Pyrrhonian scepticism.

After assessing the arguments of Boghossian and Seidel against epistemic pluralism, I will introduce the notion of presuppositional analysis and the epistemic structures of dependence it is meant to reveal. I will then carry out such an analysis in an effort to show that naturalistic systems must be at least as truth-conducive as their non-naturalistic counterparts, thus establishing the naturalist presumption. Finally, I will show that basic naturalistic methods depend on one another in such a way that radical rationalism and empiricism must be false, thereby revealing that overly restrictive naturalistic systems are not viable. Together, these results sufficiently narrow the range of plausible epistemic systems to justify the absolutist presumption without satisfying the justification requirement, i.e., without establishing that naturalistic methods are more truth-conducive than non-naturalistic methods.

9.1 BOGHOSSIAN'S INSIGHT

Boghossian argues that the disagreement between Galileo and Cardinal Bellarmine is not a case of epistemic incommensurability because they do not in fact subscribe to different epistemic systems.¹ Bellarmine does treat Biblical scripture as a source of information about the world, alongside perception, memory, induction and the like, but this does not constitute a departure from Galileo's epistemic system. Quite the opposite: Boghossian insists that Bellarmine cannot consult scriptural evidence without appealing to epistemic methods that Galileo regards as basic:

Yes, the Cardinal consults his Bible to find out what to believe about the heavens, rather than using the telescope; but he doesn't divine what the Bible itself contains, but rather reads it using his eyes. Nor does he check

¹Everything Boghossian says about Bellarmine is applicable to the more dogmatic Papal Qualifiers who should be his critical target—see Sect. 2.3.b.

it every hour to make sure that it still stays the same, but rather relies on induction to predict that it will stay the same tomorrow as it does today. And, finally, he uses deductive logic to deduce what it implies about the make-up of the heavens. (Boghossian 2006, 103)

Furthermore, Boghossian insists that there is no principled reason to trust naturalistic methods when investigating terrestrial objects but not when investigating celestial bodies. It would be incoherent for Bellarmine to trust the deliverances of perception, induction, and deduction when interpreting scripture, but not when determining the earth's state of motion. Consequently, Boghossian thinks that these naturalistic methods must be basic for Bellarmine, as they are for Galileo, while Biblical revelation is a *non-basic* method whose truth-conduciveness must be settled *empirically*. The disagreement between Galileo and Bellarmine, then, does not concern distinct epistemic systems, but the evidence for Biblical authority on matters of cosmology, considered within a *shared* epistemic system of naturalistic norms (ibid., 105).

9.2 SEIDEL'S ARGUMENT

Seidel sees himself as generalizing and improving on Boghossian's strategy of undermining epistemic relativism by attacking the doctrine of epistemic pluralism. He says: "Though I agree with Boghossian's conclusion, I think that his argument for it is not sufficiently precise because it is not completely clear what he means by a *derived norm*" (Seidel 2014, 165). If we cannot clearly distinguish basic (non-derived) from non-basic (derived) methods, then we cannot clearly distinguish one epistemic system from another.² Since an attack on epistemic pluralism can be sustained only if it can be shown that cases of entrenched disagreement take place within a single epistemic system, the ability to distinguish basic from non-basic methods is essential to this enterprise.

To remedy this situation, Seidel formulates two criteria for distinguishing between basic and non-basic methods, so that epistemic systems can be clearly and properly delineated. The criteria are as follows:

(Instance) If an epistemic system contains an epistemic norm N' and a different epistemic system contains a different epistemic norm N'' and both

²Here, as elsewhere, I make no distinction between epistemic methods and norms.

N' and N'' are just instances of a more general epistemic norm N contained in both epistemic systems, then the epistemic systems containing N' and N'' are not – at least, not because of this fact – fundamentally different epistemic systems. (ibid., 167)

(Derive) If an epistemic system contains an epistemic norm N' and a different epistemic system contains a different epistemic norm N'' , and the users of both epistemic systems are epistemically justified in believing N' and N'' or their outputs by the application of a fundamental epistemic norm N contained in both epistemic systems, then the epistemic systems containing N' and N'' are not – at least, not because of this fact – fundamentally different epistemic systems. (ibid., 170)

Seidel claims that if a disagreement meets *either* of these criteria, then it is an intra-system disagreement that may admit of a rational resolution, rather than an inter-system disagreement that will not. Since we can determine whether or not these criteria apply to the methods involved in *any* putative case of epistemic incommensurability, Seidel sees himself as generalizing Boghossian's strategy.

To illustrate the effectiveness of his criteria, Seidel endeavors to show how they apply to the cases of Galileo and Bellarmine, and the Azande poison oracle. I will consider only the first of these two cases. While remaining agnostic about the adequacy of the criteria themselves, I find that they do not apply to the case under discussion.

Boghossian ascribes to Bellarmine the following epistemic principle:

(Revelation) For certain propositions p , including propositions about the heavens, believing p is prima facie justified if p is the revealed word of God as claimed by the Bible. (Boghossian 2006, 69)

Seidel reports that this is not a principle endorsed by most naturalists, who appeal to a very different principle when faced with such empirical questions:

(Science) For certain propositions p , including propositions about the heavens, believing p is prima facie justified if p is included in the best physics books available. (Seidel 2014, 175)

Seidel argues that these principles cannot be basic with respect to theistic and naturalistic systems because they satisfy (Instance): both principles are instances of a more general principle that both parties accept, i.e., the

principle that books tend to be reliable sources of information. The disagreement between Bellarmine and the naturalist concerns the reliability of different kinds of books, not the reliability of radically different basic methods. Consequently, there is no reason to think of this disagreement as an instance of epistemic incommensurability.

Seidel himself recognizes that (Instance) doesn't apply to the methods used by Galileo and Bellarmine (*ibid.*, 250–251, n. 79). The difference between Galileo and Seidel's naturalist is that Galileo does *not* consult (Science) when arguing for the heliocentric model of the solar system. How could he invoke contemporary physics textbooks for his cause when such books advocated a *geocentric* view? Rather, his case for the heliocentric view rests on the telescopic observations and abductive inferences outlined in his *Sidereal Messenger*. The epistemic principles licensing these methods are clearly not instances of the same general principle as (Revelation), and therefore (Instance) does not apply here. It may be that the methods invoked in contemporary debates between Biblical literalists and consumers of popular physics meet the criterion, but this is not the case that's focussed on in the literature on epistemic relativism.

Seidel also claims, on the basis of Boghossian's insight, that the disagreement meets (Derive). After quoting the passage in which Boghossian points out Bellarmine's need to rely on perception, induction, and deduction when reading and interpreting the Bible (see pages 176–177 above), he says:

This observation should be uncontested – in order to use (Revelation) as an epistemic norm at all Bellarmine must apply and rely on more fundamental norms that he shares with me [the naturalist]. In applying (Science) I am also committed to using my eyes, to using induction not to read the same physics books over and over again, and to using logical principles in order to deduce their implications. However, that just means that the difference between the epistemic norms (Revelation) and (Science) is just a case of the criterion (Derive)... . (*ibid.*, 176)

Boghossian's uncontested insight does not have this consequence, though. The insight is that Bellarmine must *presuppose* perception, induction, and deduction in applying (Revelation). It does not follow that Bellarmine is *epistemically justified* in using (Revelation) by means of perception, induction, and deduction, i.e., that he *derives* the trustworthiness of the former from the latter. Presumably, Bellarmine will deny

that he is in possession of an empirical argument for (Revelation), despite the fact that he must trust his empirical evidence about the contents of scripture. Similarly, a biologist must presuppose the principles of arithmetic when engaged in experimentation, but she will not offer an arithmetical justification for any of her empirical results. Therefore, there is no reason to think that both (Revelation) and (Science) are non-basic methods that are derivable from the same naturalistic methods.

While the distinction between presupposition and justification undermines Seidel's attack on epistemic pluralism, it also opens the door to an alternative strategy for generalizing Boghossian's insight in a way that undercuts epistemic relativism. The critical target of this strategy, however, is not the doctrine of epistemic pluralism. Before presenting the strategy, I will focus in the next two sections on the distinction between presupposition and justification, and spell out its implications for the structure of epistemic systems.

9.3 STRONG AND WEAK DEPENDENCE

Boghossian's insight does not give us any straightforward way of undermining the doctrine that there exist many different, incompatible epistemic systems. It does, however, reveal that epistemic systems have a more complex structure than previously recognized. Epistemologists tend to focus exclusively on structures of *justificatory relations* when describing epistemic systems: they want to know what beliefs/methods rely on what other beliefs/methods for their *justification*. As we have seen, these relations are taken to be crucial for identifying and describing epistemic systems. Beliefs/methods that are justified by further beliefs/methods are regarded as *outcomes* of epistemic systems, while those that aren't are classified as *basic* and thought of as essentially belonging to an epistemic system.

What Boghossian's insight reveals is that methods can rely on one another not only for their justification, but for their *use*. It is in this sense that Bellarmine must rely on perception, induction, and deduction, and the biologist must rely on arithmetic. For the purposes of disambiguation, then, we shall say that method A *strongly depends* on method B when A's trustworthiness is an outcome of B. My practice of consulting the newspaper's weather forecast strongly depends on inductive reasoning because it is justified by my appeal to the forecast's reliable track-record. By contrast, method A *weakly depends* on method B when

A cannot yield outcomes without an application of B. I cannot consult the newspaper's forecast to justify my beliefs about imminent weather conditions without relying on the deliverances of my visual perception. It follows that there are two corresponding senses in which a method can be *basic*. When a method depends on no other method for its justification, it is *strongly basic*, and when it depends on no other method for its use, it is *weakly basic*.³ A complete description of an epistemic system, therefore, must capture relations of *both strong and weak dependence*.

Having made these distinctions, we can now see that Boghossian's insight does not establish that Bellarmine shares the naturalist's strongly basic methods, and consequently, it does not directly undermine the doctrine of epistemic pluralism. Instead, it establishes that one of the methods that Bellarmine regards as strongly basic—scriptural revelation—*weakly depends* on naturalistic methods. It is, then, an instance of *presuppositional analysis* rather than foundational analysis.

Epistemology has generally paid very little attention to relations of weak dependence. Like Seidel, epistemologists tend to focus on relations of strong dependence instead. This is not the case in the philosophy of science, however, where relations of weak dependence have been a focal point since Kant. Indeed, Kant's argument for the absolutist and naturalist presumptions rests on his analysis of the weak dependence of our empirical knowledge on synthetic a priori principles issuing from the exact sciences. I will now revisit Kant's original argument and its shortcomings, and briefly discuss Michael Friedman's attempt to rehabilitate the Kantian view that scientific knowledge is stratified by relations of weak dependence. As we saw in Chapter 3, neo-Kantian views like Friedman's seem to be in danger of collapsing into epistemic relativism. I will argue that a certain kind of presuppositional analysis can deliver us from this danger.

9.4 CONSTITUTIVE DEPENDENCE AND KANTIAN ABSOLUTISM

As we saw in Chapter 3, Kant claims that empirical judgements are *unintelligible* in the absence of synthetic a priori principles that are *constitutive* of the concept of the object of experience. This relation of constitutive dependence is weak dependence among *propositions*: when A is

³I make these distinctions in Bland (2013, 2014, 2016).

a constitutive condition of B, B depends on A not for its truth or justification, but for its having a truth-value or epistemic status (Friedman 2002, 74).⁴ One cannot make a meaningful claim about objects in the phenomenal world—a claim that is true or false, justified or unjustified—without *presupposing* that those objects are located in space, persist through time, and are subject to reciprocal relations of causal influence.⁵ Since our conceptions of space, time, and causation are defined by the principles of Euclidean geometry and Newtonian physics, these synthetic a priori principles constitute necessary preconditions of empirical knowledge. This, you will remember, is the crux of the Kantian argument against epistemic relativism: there can be no viable alternative to the naturalistic system of the exact sciences because its basic principles express conditions of the possibility of representing the phenomenal world. Like Seidel, Kant attacks the doctrine of epistemic pluralism, but he does so by focussing on relations of weak dependence rather than strong dependence; Kant engages in a presuppositional analysis rather than a foundational analysis.

The theories of relativity dealt a fatal blow to Kant's transcendental brand of absolutism by establishing not only that Euclidean geometry and Newtonian physics are not necessarily true, but that they are *empirically false*. This prompted many epistemologists to give up on the notion of a priori knowledge altogether, and with it, the notion of constitutive dependence. Quine led the charge by defending an epistemological holism that focuses exclusively on inferential relations between beliefs that "...face the tribunal of sense experience not individually but only as a corporate body" (Quine 1951 [1964], 41). On this view, every belief has the same function: to effect, in conjunction with a host of other beliefs, the derivation of accurate observation sentences, and to do so as efficiently as possible. Some beliefs play a greater role facilitating this end than others. The principles of logic and mathematics, and the

⁴There are also relations of weak dependence between *propositions* and *methods*, as is the case with Wittgenstein's hinge propositions. An epistemic method weakly depends on a proposition when the method cannot be competently used to yield results unless we presuppose that the proposition is true. So, for example, Wittgenstein argues that Moore cannot competently use his perceptions to justify beliefs about the external world unless he recognizes that he has two hands.

⁵The other necessary conditions on phenomenal objects are presented in the *Analytic of Principles*.

fundamental laws of physics are among the most central beliefs because they are involved in the derivation of so many observation sentences; revising one of these beliefs would require that we make large-scale changes elsewhere in our web of belief, so we do so only as a last resort.⁶ Thus, beliefs that have traditionally been labelled *a priori* are actually just well entrenched. The difference between these central beliefs and beliefs situated closer to the periphery, where the web of beliefs meets experience, is one of degree, not of kind. Therefore, *every* belief is ultimately evaluated on the basis of how well it allows us to accommodate the deliverances of experience.

Since Quine focuses exclusively on the role that beliefs play in the derivation of observation sentences, his web of beliefs is structured only by relations of strong dependence; this is the relation that obtains when one belief depends on another (or several others) for its *justification*. Neo-Kantians have argued that this is a mistake, none more influentially than Michael Friedman. Friedman acknowledges that Kant was wrong to think that synthetic *a priori* principles are forever immune to revision, but he insists that a careful examination of the move from classical to relativistic physics also reveals that Kant was right to think that the use of theoretical concepts in meaningful statements requires that certain principles be presupposed. Friedman wishes to keep this key insight intact, but he can do so only by making two important amendments to the Kantian position. First, the constitutive function of principles must be *localized* to scientific theories; constitutive principles are constitutive of theoretical concepts, not of the concept of the object of experience more generally. And second, a principle's constitutive function must be *theory-relative*, not absolute; while every spacetime theory has a constitutive component, no two theories have the same constitutive principles. This means that one and the same statement can express a constitutive condition of one theory and an empirical result of another.

Friedman claims that a theory's constitutive component consists in two parts: a *mathematical* part that describes its spatio-temporal framework, and a mechanical part that *coordinates* the framework with natural phenomena to yield empirical laws (Friedman 2002, 79–80). Both parts must be presupposed by a theory's empirical component; a theory's factual statements cannot be formulated in the absence of its mathematical

⁶This follows from Quine's 'maxim of minimum mutilation' (Quine 1970, 7).

principles, and cannot be empirically tested in the absence of its principles of coordination. Consider Newton's law of universal gravitation. This law is empirically meaningless without some means of identifying and measuring forces and masses. To do this, we must appeal to the laws of motion, which tell us (roughly) that accelerations are departures from inertial trajectories that are proportional to the forces impressed on accelerating bodies, and inversely proportional to their masses, and that forces between interacting bodies are equal in magnitude and opposite in direction. Once these laws are presupposed, the relative accelerations of celestial bodies reveal information about the masses of those bodies and the forces responsible for their accelerations. This information empirically confirms the universal law of gravitation. Notice, however, that the laws of motion, because they concern a body's change of position and velocity over time, must presuppose theories of space and acceleration. For this reason, Euclidean geometry and the calculus must also be constitutive of Newtonian physics; they make up the mathematical component of the theory whose application is secured by the laws of motion. Abandoning these principles would not render Newtonian physics unduly complicated, but *unintelligible*. For this reason, they are not happily viewed in the Quinean way, as well entrenched empirical principles in an undifferentiated web of beliefs.

This is not to say, of course, that they cannot be revised. Rather, the point is that their revision requires a *reinterpretation* of fundamental theoretical concepts—a new spatio-temporal framework in which empirical claims can be formulated and tested. Indeed, the spatio-temporal framework of classical mechanics was dispensed with in the special theory of relativity, and replaced by a framework in which the velocity of light, rather than distance and time, is the fundamental invariant. This shift also necessitated a new theory of gravity because it ruled out the possibility of a force's being instantaneously propagated through space. The new account was provided by the general theory of relativity, whose field equations describe how the presence of mass-energy warps spacetime. The curvature of spacetime, or rather of space, is a completely foreign notion in Euclidean geometry, so Einstein required a new mathematical framework for his dynamics. This new framework was provided by Riemann's theory of manifolds. And because special relativity revealed the inseparability of space and time, the new framework was one of a four-dimensional spacetime geometry. However, this semi-Riemannian geometry could be nothing more than a mathematical formalism in the

absence of criteria that determine the empirical applicability of its fundamental concepts, including the concept of a *geodesic*, or straightest possible path in spacetime. Friedman claims that the equivalence principle effects the required coordination between geodesics and freely falling “test particles” in a gravitational field (*ibid.*, 38–39). Thus, Einstein’s field equations could not be formulated without Riemann’s theory of manifolds, and could not be empirically tested without the equivalence principle; both of these components are constitutive with respect to the general theory of relativity, though they have distinct constitutive functions.

These revolutionary episodes in the development of physics reveal the dynamic nature of the constitutive component of theoretical knowledge. Euclidean geometry and the laws of motion are constitutive with respect to classical physics, and *empirically false* in the framework of general relativity. However, Friedman stresses that the empirical falsity of Euclidean geometry and the laws of motion could be established only *after* the relativistic framework had been adopted. Before that, there could be no empirical procedure for evaluating them because they make it possible for observations to carry theoretical information about space, time, and motion. In Friedman’s terminology, constitutive principles delimit a space of possibilities and provide the inferential infrastructure required to locate the physical world within that space by appealing to the results of observations (*ibid.*, 85). For the same reason, Newtonian physicists could not recognize the truth of Einstein’s field equations: from their perspective the equations do not so much as describe a real possibility. Friedman thus concurs with Kuhn that revolutionary science—a move from one set of constitutive principles to another—cannot proceed as normal science does, i.e., by marshalling empirical evidence for or against candidate scientific theories. Because constitutive principles make the empirical evaluation of theoretical claims possible, they are not themselves subject to straightforward empirical testing.

This insight, you will recall from Chapter 3, raises the specter of epistemic relativism. If accepting a framework of constitutive principles is a precondition of epistemically effective reasoning in the exact sciences, then any argument for a particular constitutive framework must presuppose the framework in question. Consequently, scientists who accept different frameworks have no common ground on which to rationally resolve their fundamental disagreements, and no principled way of finding such common ground. I will call this the *problem of*

scientific rationality. Kuhn attempts to solve it by positing the existence of super-paradigmatic values—accuracy, simplicity, consistency, fruitfulness, and scope—that all scientists use to evaluate competing theories. Friedman rejects Kuhn’s solution, and claims that the reasoned adoption of a new constitutive framework is facilitated by a shared set of philosophical principles. I will not weigh in on this disagreement, but instead point out that the move from Kant’s account of synthetic a priori knowledge to Friedman’s theory of the relativized a priori, or to Kuhn’s theory of paradigms, raises a more general relativist concern.

This more general concern stems not from the fact that a principle’s constitutive role is dynamic and theory-relative, but from the fact that it is *localized to scientific knowledge*. Kant’s case for naturalistic absolutism crucially relies on the supposition that synthetic a priori principles are constitutive of our knowledge of the phenomenal world. If our conception of causally efficacious objects in space and time necessarily presupposes the principles of Euclidean geometry and Newtonian physics, then the epistemic system belonging to the exact sciences is the *only* system in which empirical claims can be evaluated. But if the principles of Euclidean geometry and Newtonian physics are constitutive only of a certain *theoretical* understanding of space, time, and causality—an understanding that may not be shared by all theorists and non-theorists alike—then Kant’s argument for the exclusive status of the epistemic system belonging to the exact sciences has been lost.⁷ In other words, if Euclidean geometry and the laws of motion are constitutive with respect to the empirical component of Newtonian physics, but not of our knowledge more generally, then epistemic relativism cannot be ruled out. For in the event that there are conceptions of space, time, and motion that are not beholden to any such theoretical underpinnings, their proponents will not be susceptible to a transcendental argument. The Papal Qualifiers would presumably reject Newton’s conception of absolute motion in favour of one that qualified all objects moving relative to the earth as being in absolute motion. Of course, such a conception of

⁷Friedman appreciates this problem and its significance: “What is controversial, rather, is the further idea that the scientific enterprise thereby counts as a privileged model or exemplar of rational knowledge of – rational inquiry into – nature” (ibid., 53). However, he does not clearly distinguish this problem from the problem of scientific rationality, and therefore, he does not address the fact that his answer to the latter problem is not an answer to the former problem.

motion would make an utter mess of physics, but this would hardly have concerned them.

Discussing the dynamic nature of constitutive principles and the communicative rationality that they make possible, Friedman says: "... it is precisely because this kind of [communicative] rationality is defined only relative to one or another paradigm or framework that the threat of conceptual relativism then arises" (ibid., 58). I have suggested that this situation gives rise to *two* relativist threats. The problem of scientific rationality arises because constitutive principles are *relative* to a theoretical framework, rather than absolutely fixed. The more general problem of epistemic relativism arises because constitutive principles are relative to a *theoretical framework*, rather than to our knowledge more generally. It is the latter threat with which I am concerned.

In the remainder of this chapter, I will address this threat by proposing a neo-Kantian argument for the absolutist and naturalist presumptions. Unlike Kant's original argument, it does not rely on a rejection of epistemic pluralism or a privileging of scientific principles. Instead, it mounts a case in favour of scientific *methods*. The thrust of the argument is that the use of epistemic methods *in general* does not depend on any scientific theory, or subset of theoretical principles, but on methods that are common to all scientific theories. My presuppositional analysis, then, focuses on relations of weak dependence between epistemic methods rather than beliefs.

9.5 RESISTING EPISTEMIC RELATIVISM

My goal in the remainder of this chapter is to extend Boghossian's presuppositional analysis to yield a neo-Kantian argument for the absolutist and naturalist presumptions. To do so, I will first need to reconsider the problem of epistemic circularity discussed in Chapters 4 and 5.

The problem is that any attempt to justify strongly basic methods must appeal to the deliverances of those same methods. An argument for the trustworthiness of perception that draws on its track record of past successes relies on the *perceptions* of those successes. To put this point in our new terminology: inductive reasoning about the natural world weakly depends on perception because it consists in drawing general conclusions on the basis of past *experiences*. Therefore, every instance of such reasoning must presuppose that perception is reliable, including the reasoning that is supposed to establish that perception is reliable. If this type

of circularity is vicious, then basic methods cannot be justified, which would mean that non-basic methods cannot be justified either, since the latter strongly depend on the former: if perceptions fail to generate warrant for beliefs, then empirical evidence cannot be used to justify the use of other epistemic methods.

One way of arguing for the epistemic efficacy of this circular reasoning is to invoke the no doubt constraint, which permits us to presuppose a method when arguing in its defense if the trustworthiness of that method is *not in doubt* (see Sect. 5.2.1). If we have no legitimate reason to doubt the reliability of perception, then we can establish its reliability inductively, despite the fact that inductive reasoning weakly depends on perception. Since sceptics can give us no concrete reason to doubt our strongly basic methods, we can use epistemically circular arguments to justify our reliance on them, and the sceptical argument is defeated.

The problem with this solution, as we have seen, is that it leaves untreated the threat of epistemic relativism. Though the no doubt constraint permits us to justify our strongly basic methods by means of epistemically circular arguments, it does the same for agents who subscribe to epistemic systems that are radically different from ours. If Galileo can justify his naturalistic methods by means of empirical evidence, then Bellarmine can appeal to scriptural evidence when defending Biblical revelation, because neither Galileo nor Bellarmine doubt the reliability of the methods they're justifying. The worry is that the no doubt constraint staves off scepticism by permitting certain epistemically circular arguments, only to encourage relativism by being too permissive.

This is only part of the story, however. Proponents of different epistemic systems argue for their epistemic methods, but they also argue *against* one another's. The no doubt constraint applies not only to positive arguments, but to the *negative* arguments that are meant to put the reliability of an epistemic method *in doubt*. This means that negative arguments cannot rely on the deliverances of the method whose reliability they're meant to impugn. One cannot successfully argue that perception is generally unreliable on the basis of its past failures because inductive reasoning about natural phenomena weakly depends on perception; if perception is generally unreliable, then so too is the inductive reasoning that's supposed to show that it's unreliable.⁸

⁸The qualifier 'generally' is important here. We *can* argue that perception is unreliable *under certain circumstances* on the basis of its poor past performance in those

Galileo and Bellarmine can both be understood as putting forward negative arguments. Galileo uses his empirical findings to call established interpretations of Biblical scripture into question, while Bellarmine appeals to established interpretations of Biblical scripture to call the reliability of Galileo's empirical methods into question. Though both Galileo's and Bellarmine's positive arguments meet the no doubt constraint, such is not the case with regard to both negative arguments. In particular, Bellarmine's argument violates the constraint: he uses scriptural evidence to call the reliability of empirical methods *into doubt*, but scriptural revelation weakly depends on those methods; if perception, memory, and inductive and deductive reasoning are unreliable, then so too is scriptural revelation, because it makes essential use of these naturalistic methods. Galileo's argument does not violate the constraint: his challenge to scriptural revelation does not make positive use of Biblical scripture. So, it would appear that the no doubt constraint does restrict the range of admissible epistemic methods in a way that might help us avoid epistemic relativism.

It can rightly be said, however, that this treatment of Bellarmine is unfair because he does *not* call Galileo's strongly basic methods into doubt. It would be more accurate to see Bellarmine and Galileo as subscribing to the following norms (respectively):

- B. Believe the outcomes of naturalistic methods, unless they conflict with the word of revealed scripture, in which case the latter is more trustworthy than the former.
- G. Believe the word of revealed scripture unless it conflicts with the outcomes of naturalistic methods, in which case the latter are more trustworthy than the former.

On this view, Bellarmine does *not* call the reliability of naturalistic methods into doubt, and therefore he can coherently rely on their

circumstances, but this is because we can arrive at this knowledge in more favourable conditions. For example, we can determine that our vision in dense fog is unreliable by comparing it with our vision in fair weather. One *cannot* argue that perception is unreliable under *all* conditions because the argument must appeal to perceptions made in some circumstances. The negative arguments ruled out by the no doubt constraint, then, are those that seek to establish *unconditional* claims about the unreliability of a method.

deliverances when consulting scripture. Rather, his claim is that scriptural revelation is *more* reliable than the naturalistic methods that Galileo uses to justify his Copernican theory of the solar system. Bellarmine will concede that perception, memory, and inductive and deductive reasoning are reliable methods that ordinarily generate warrant for beliefs—including beliefs about the contents of scripture—but insist that they fail to do so when their results conflict with scripture. Since Bellarmine is not calling Galileo’s methods into doubt, the no doubt constraint cannot be used to rationally resolve their disagreement.⁹

If this is Bellarmine’s argument, then it does not violate the no doubt constraint. But it does violate a more general principle that motivates the no doubt constraint. We cannot establish the trustworthiness of an epistemic method by presupposing the results of a method whose truth-conduciveness is in doubt because we think that the former can be *no more truth-conducive* than the latter. If the reliability of perception is in doubt, then an inductive argument for the trustworthiness of perception cannot be effective because inductive reasoning can be no more truth-conducive than perception: if we are consistently misperceiving states of affairs, then our inductive generalizations from past experiences will be consistently incorrect. The principle at work in this rationale is:

The *weak dependence principle*: epistemic methods are no more truth-conducive than the methods on which they weakly depend.

If method B weakly depends on method A, then B will not be more truth-conducive than A because the errors that result from the use of A will contaminate the results arrived at using B.¹⁰ If a biologist is prone to

⁹More specifically, because Bellarmine is not making an *unconditional* claim about the unreliability of Galileo’s naturalistic methods, he cannot be accused of violating the no doubt constraint (see n. 8 above).

¹⁰Here I should make an important distinction between a *source* of information and our *use* of a source. Biblical scripture is a source of information, but it must be *used*—read, recalled, and interpreted—in order to justify beliefs. When I talk about epistemic methods, and their truth-conduciveness, I am talking about their *use*, not about the sources themselves. So, as I explain in the coming paragraphs, our use of scripture to generate and justify beliefs can be no more truth-conducive than the methods that we rely on in the process, regardless of the accuracy of what the Bible actually says. I am indebted to Emerson Doyle for encouraging me to make this distinction explicit.

making arithmetical mistakes, then the reported results of her experiment cannot be trusted.

The weak dependence principle must be qualified in some important respects, however. The principle may not apply if any of the following conditions obtain: (i) Method A is less truth-conducive *generally* than it is in those circumstances when it is presupposed in the use of method B. (ii) Method B only *minimally* depends on method A, such that A's outcomes have a negligible impact on B's outcomes. If B weakly depends on a host of highly reliable methods in addition to A, then A's errors may not appreciably compromise B's results. (iii) Method B has the resources necessary to *correct* the errors produced by the use of method A. Consider, for example, the use of scientific instruments—telescopes, microscopes, litmus paper, etc.—to justify theoretical claims. The users of these instruments must engage in causal reasoning to make theoretical sense of their observations, e.g.: the litmus paper turned red *because* the solution is acidic. Yet, their causal reasoning—indeed, everyone's causal reasoning—is beset by biases and fallacies: the post hoc fallacy, confusing correlation and causation, the narrative fallacy, blindness to the impacts of rare events, the genetic fallacy, the single cause fallacy, etc. Nevertheless, these flaws in causal reasoning may not pose a significant threat to the reliability of the use of scientific instruments because all three conditions obtain in these cases. First, it's plausible to think that the scientist's causal inferences in these contexts are more transparent and careful than they are in others; a scientist's thinking should be more rigorous in the lab than it is at a cocktail party. Second, the results of scientific observations only partially depend on the experimenter's causal reasoning; they also depend on their coherence with existing theory and the results of previous experiments. Finally, scientists use a variety of error detection and correction techniques when generating and evaluating empirical data: experiments must take place in carefully controlled conditions, the results must be repeatable, reports of the results must be peer reviewed, etc. All of this is to say that while the use of scientific instruments weakly depends on causal reasoning, the weak dependence principle does not apply in this case: causal reasoning may be less truth-conducive generally than instrument aided experimentation.

On the other hand, none of these conditions obtain with respect to scriptural revelation and the naturalistic methods on which it weakly depends. Perception, memory, and inductive and deductive reasoning are no less reliable generally than they are when used to read and

interpret Biblical scripture. Scriptural revelation weakly depends on few other methods, and it does not have the wherewithal to correct any significant number of the errors that arise from the use of naturalistic methods. Consequently, the weak dependence principle applies: scriptural revelation cannot be more truth-conducive than perception, memory, and inductive and deductive reasoning. Even if the Bible is the infallible word of God, our understanding of its contents can be no better than the methods that facilitate this understanding.

Bellarmino's norm B, then, is ruled out by the following argument:

(BG1) One method can be more trustworthy than another only if it is more reliable.

(BG2) Scriptural revelation weakly depends on Galileo's naturalistic methods.

(BG3) According to the weak dependence principle, if conditions (i)-(iii) obtain, then scriptural revelation cannot be more reliable than the naturalistic methods on which it weakly depends.

(BG4) Conditions (i)-(iii) obtain.

(BG5) Therefore, scriptural revelation cannot be more reliable than Galileo's naturalistic methods.

(BG6) Therefore, scriptural revelation cannot be more trustworthy than Galileo's naturalistic methods, contra-(B).

Notice that this same argument *cannot* be levelled against Galileo's norm G, since his naturalistic methods do not weakly depend on scriptural revelation. This, I submit, is a principled, non-question begging reason to prefer Galileo's epistemic system to Bellarmine's.

It may be that this more modest argument doesn't capture Bellarmine's objection, either. Perhaps Bellarmine is not taking issue with the empirical methods that scriptural revelation presupposes, but with the inferences that Galileo draws from his telescopic observations. He might, quite reasonably, have insisted that these observations do not constitute *conclusive* evidence for the heliocentric model. After all, as Williams points out, they do not rule out the Tychonic model of the solar system, according to which the earth is at rest (Williams 2007, n. 12). Furthermore, Galileo lacked a theory of dynamics capable of accounting for the cause of the earth's motion. In the face of such inconclusive grounds, Bellarmine was unwilling to sanction the rejection of well-established readings of Biblical scripture.

If this is Bellarmine's objection, then a presuppositional analysis cannot resolve his disagreement with Galileo.¹¹ But their disagreement, on this reading, is *not* a case of epistemic incommensurability: their dispute resists a rational resolution because neither hypothesis is conclusively supported by the empirical evidence available to them, not because they subscribe to radically different epistemic systems. Indeed, it would seem that they subscribe to the *same* epistemic system, since they are both willing to abandon a well-entrenched Biblical doctrine in the face of overwhelming empirical evidence; they simply disagree on the strength of Galileo's evidence. The rational resolution of this debate had to await Newton's dynamical analysis of the observed motions of the planets and their satellites, which certainly did constitute overwhelming evidence.

Though presuppositional analysis may not have been needed to rationally resolve this disagreement, there are some disagreements between naturalists and Biblical literalists—some true cases of epistemic incommensurability—in which it is needed. The evolution-creationism debate seems to be one such case.¹² Hard-line creationists do not typically reject the theory of natural selection on empirical grounds¹³; they tend to reject the presumption that empirical evidence has any kind of epistemic authority over Biblical doctrine. In this case, relativists argue, there is no way to reach a reasoned consensus because there is no method of doing so that is rationally acceptable to both parties. What the foregoing analysis has shown is that the naturalist's empirical methods ought to be acceptable to Biblical literalists since these methods must be used to engage in scriptural revelation. Conversely, naturalists are under no obligation to acknowledge the reliability of scriptural revelation because it is not essential to the use of their methods.

¹¹It can, however, be used to rationally resolve Galileo's disagreement with the Papal Qualifiers who were less sophisticated and scientifically literate than Cardinal Bellarmine—see Chapter 2.

¹²See Lynch (2010).

¹³Of course, some creationists claim to do so, but such objections quickly prove to be naive and ill informed.

9.6 THE DIALECTICAL ARGUMENT FOR THE NATURALIST PRESUMPTION

This point can be generalized to yield an argument in favour of the naturalist presumption. For it is not only scriptural revelation that weakly depends on the naturalist's strongly basic methods: oracular revelation, crystal ball gazing, and all other manner of non-naturalistic inquiries necessarily presuppose the naturalist's strongly basic methods. The deliverances of sacred books, poison oracles, crystal balls, and the like, must be apprehended, recalled, and interpreted, and these processes essentially involve perception, memory, and inductive, abductive, and deductive reasoning. On the other hand, the naturalist's methods do not similarly rely on non-naturalistic epistemic practices: perceiving, recalling, and reasoning do not essentially involve consulting sacred books, poison oracles, or crystal balls. There is, then, an *asymmetric relation of weak dependence* between naturalistic and non-naturalistic strongly basic methods. This fact, together with the principle of weak dependence, entails a kind of *vindication* of the naturalist presumption: *no* epistemic system's strongly basic methods can be more truth-conducive than the *naturalistic methods* on which they weakly depend.¹⁴ Since this is true *only* of naturalistic methods, they will succeed at tracking the truth if any other method does, but not vice versa.

If this argument is successful, then the relativist's doctrine of *epistemic equality* (R6) is untenable. Given that we wish to use the most reliably truth-conducive methods at our disposal, there is an objective reason to prefer naturalistic epistemic systems over non-naturalistic ones: they are the *most truth-conducive systems* at our disposal. Consequently, in cases of epistemic disagreements that pit naturalistic systems against non-naturalistic systems, as in the cases of the Azande poison oracle and the cosmological debate between Bellarmine and Galileo, we have a principled reason to side with the naturalist. In this way, the threat of epistemic incommensurability is alleviated, and the path to epistemic relativism is blocked.

Adopting a naturalistic epistemic system means adopting a strictly naturalistic set of *strongly basic* methods. Working within such a system, we could find that certain non-naturalistic methods are trustworthy, but this

¹⁴This assumes that conditions (i) (ii), and (iii) do not obtain. I see no reason to think that they do.

finding must ultimately be based on the outcomes of *naturalistic* methods.¹⁵ If we found a crystal-ball gazer with an impressive track-record of making correct predictions, we would have a defeasible reason to trust crystal-ball gazing under particular circumstances. And if crystal-ball gazers routinely get things wrong, then we should conclude that crystal-ball gazing is untrustworthy. On the other hand, we cannot evaluate the trustworthiness of perception, memory, and inductive reasoning using the deliverances of a crystal ball, because if the former are unreliable, then crystal ball gazing cannot yield reliable results, either, including results about the trustworthiness of naturalistic methods. More generally, if methods A and B yield outcomes in overlapping domains, and B weakly depends on A, then we can use the outcomes of A to evaluate the trustworthiness of B, but not vice versa. Under these conditions, an asymmetric relation of weak dependence between methods implies an asymmetric relation of strong dependence as well. We *could* find that some non-naturalistic methods are trustworthy by naturalistic means, but we *could not* find that strongly basic naturalistic methods are untrustworthy by non-naturalistic means.

This argument for the naturalistic presumption does not beg the question because it does not rely on presuppositions that are foreign to non-naturalists. Rather, its distinguishing feature is that it defends the naturalist presumption by identifying the presuppositions that non-naturalists—Papal Qualifiers, Azande tribe members, crystal ball gazers—must be committed to given the epistemic practices in which they're engaged. This is the feature that makes the argument *dialectical*, and ensures that *it meets the recognition constraint*. And because it does so, it is a more plausible response to epistemic relativism than the anti-sceptical arguments discussed in earlier chapters.

In those chapters, I argued that answers to Pyrrhonian scepticism do not suffice to address the threat of epistemic relativism. Now I wish to point out that my dialectical argument against epistemic relativism is *not* an answer to the Agrippan trilemma. The Agrippan argument is supposed to show that no epistemic system is demonstrably truth-conducive. In response to this argument, epistemologists have sought to either meet or reject the Agrippan requirement on justification, i.e., the requirement that a justification be finite, non-arbitrary,

¹⁵As such, I agree with Sankey's naturalistic particularism as a way of evaluating rival epistemic systems, but I've given it a non-question begging rationale that he does not.

and non-circular. This type of response is unnecessary when confronted with the threat of epistemic relativism because one can show that an epistemic system is objectively superior to its alternatives *without* showing that it is truth-conducive. The dialectical argument does precisely this: it shows that naturalistic systems must be at least as truth-conducive as any non-naturalistic system. This is compatible with the possibility that *no* epistemic system is truth-conducive, nevermind demonstrably so. Therefore, the justification and non-Agrippan requirements do not express conditions that must be met by an adequate response to epistemic relativism. There are, however, important objections to my dialectical response that I will take up in the next two sections in an effort to extend and solidify my position.

9.7 RELIGIOUS EXPERIENCE

The dialectical argument against epistemic relativism can be successful only if *every* strongly basic non-naturalistic method weakly depends on naturalistic methods. The non-naturalistic method that I have focussed on in framing this argument is scriptural revelation. Yet it can be reasonably argued that scripture is not the only source of theological information. Many individuals claim to commune with God *directly*, without any need of a textual intermediary. Might these religious experiences be a non-naturalistic source of justification that does not weakly depend on naturalistic methods? If so, then my dialectical vindication of naturalistic methods fails, and the threats of incommensurability and relativism are renewed.

In his classic book, *Varieties of Religious Experience* (1902 [2010]), William James argues that religious experiences are “absolutely authoritative” for those who undergo them, but have no *prima facie* authority for those who go without them (381). He acknowledges that sceptical naturalists have an epistemic obligation to empirically test the reliability of religious experience before passing judgement on its deliverances. However, he insists that,

[Religious experiences] break down the authority of the non-mystical or rationalistic consciousness, based upon the understanding and senses alone. They show it to be only one kind of consciousness. They open out the possibility of other orders of truth, in which, so far as anything in us vitally responds to them, we may freely continue to have faith. (ibid.)

Mystics have at their disposal a source of justified beliefs whose outcomes may conflict with the results of naturalistic inquiries, yet whose authority cannot be challenged on the basis of such inquiries. This seems to be a clear-cut case of epistemic pluralism and incommensurability, the likes of which crucially figure in the argument for relativism.

I will argue that this appearance is illusory on the grounds that religious experiences must be regarded as either (a) a *naturalistic* source of justification, (b) a non-naturalistic source of justification that *weakly depends on naturalistic methods*, or (c) *non-epistemic* states. In any case, religious experience is not a non-naturalistic epistemic method that can be deployed independently of naturalistic methods.

Those who undergo religious experiences frequently report having seen or been spoken to by God, and we might think of such episodes as being no different in kind than seeing or being spoken to by a friend or neighbour:

I talk to [God] as to a companion in prayer and praise, and our communion is delightful. He answers me again and again, often in words so clearly spoken that it seems my outer ear must have carried the tone, but generally in strong mental impressions. (quoted in James 1902 [2010], 70–71)

If this is the case, then it appears that the disagreement between mystics and naturalists does not arise because of a difference in their strongly basic methods: they both think of perception as a generally reliable guide to the way the world is. They disagree, instead, on which instances of perception are trustworthy. This is Seidel's diagnosis of the disagreement:

Both the heretic and the religious share very general epistemic norms. However, they differ quite fundamentally in – at least – one *belief*, namely whether God exists, and this difference has immense consequences for the specific form their shared epistemic norms have in many situations and also for the place their more specific epistemic norms have in their epistemic systems. Thus, we can say that they, in fact, differ with respect to very fundamental beliefs and that this affects what epistemic norms they regard as good ones, but they do not differ with respect to their fundamental norms. (Seidel 2014, 167)

Because sensory perception and mystical perception are *instances* of a common epistemic norm, they do not constitute radically different epistemic methods. On this view, the disagreement between naturalists and

mystics must concern auxiliary commitments, such as beliefs about the causes of mystical perception, or the principle that extraordinary claims require extraordinary evidence. There is no reason to think that disagreements of this kind cannot be rationally resolved, given sufficient agreement on the basic sources of knowledge.

On the other hand, mystical experiences are sometimes described by their subjects as having a completely different character than sensory experiences:

I think it well to add that in this ecstasy of mine God had neither form, color, odor, nor taste; moreover, that the feeling of his presence was accompanied with no determinate localization. It was rather as if my personality had been transformed by the presence of a *spiritual spirit*. But the more I seek words to express this intimate intercourse, the more I feel the impossibility of describing the thing by any of our usual images. At bottom the expression most apt to render what I felt is this: God was present, though invisible; he fell under no one of my senses, yet my consciousness perceived him. (quoted in James 1902 [2010], 68–69)

We might categorize such experiences as cases of non-sensory perception, but then it's not clear what sensory perception and mystical perception have in common that could make them instances of a *single* epistemic method.¹⁶ In the absence of a common, epistemically salient feature tying these two methods together, it would seem that we have a genuine case of epistemic pluralism. Moreover, if mystical perception is regarded as strongly basic by the theist, then, as James argues, naturalists have little chance of rationally convincing her that its deliverances are unreliable.

One feature that sensory and mystical perception do have in common is that they present, directly or indirectly, objects to a perceiver in experience. It is worth asking, though, how the objects of religious experience can be *recognized* by their perceivers. How is it that a particular experience gets interpreted as an experience *of* a particular entity? It seems plausible to suppose that some level of theological training is required in order to apprehend an object of experience *as* God, or Mary, or Saint Peter, in the same way that some level of musical training is required to perceive a note as C-major. Speaking to this point is James's story of a

¹⁶On this point, see Kusch (2017, 4699).

woman who was ignorant of Christian scripture until she moved to Germany, where her new friends compelled her to embark on a regiment of Biblical reading and prayer, whereupon she underwent the following experience:

The very instant I heard my Father's cry calling unto me, my heart bounded in recognition. I ran, I stretched forth my arms, I cried aloud, 'Here here I am, my Father,' Oh, happy child, what should I do? 'Love me,' answered my God. 'I do, I do,' I cried passionately. 'Come unto me,' called my Father. 'I will,' my heart panted. ... Since then I have had direct answers to prayer – so significant as to be almost like talking with God and hearing his answer. The idea of God's reality has never left me for one moment. (quoted in James 1902 [2010], 69–70)

I submit that this woman's reading of scripture was not only part of the causal genesis of her extraordinary experience, but essential to her ability to *interpret* its content. And I think this is true generally: one cannot have mystical experiences capable of generating warrant for theological claims without some level of theological training *which includes scriptural revelation*. Religious experience, no less than ordinary experience, is theory laden, and the theory it is laden with comes from scripture. Consequently, mystical experience *weakly depends* on scriptural revelation. Furthermore, weak dependence is a *transitive relation*: if method A weakly depends on method B, and method B weakly depends on method C, then method A weakly depends on method C. Since scriptural revelation weakly depends on a variety of strongly basic naturalistic methods, so does mystical perception. If one consistently misreads and/or misunderstands religious scripture, they can be expected to misidentify the objects of their religious experience. On this view, the objection at the beginning of this section fails; the dialectical strategy for resisting epistemic relativism applies just as well to mystical perception as it does to scriptural revelation because the former essentially involves the latter.

This response supposes that religious experiences always have a specific content that is informed by particular theological doctrines. James denies that this is so:

The fact is that the mystical feeling of enlargement, union, and emancipation has no specific intellectual content whatever of its own. It is capable of forming matrimonial alliances with material furnished by the most

diverse philosophies and theologies, provided only they can find a place in their framework for its peculiar emotional mood. We have no right, therefore, to invoke its prestige as distinctively in favor of any special belief, such as that in absolute idealism, or in the absolute monistic identity, or in the absolute goodness, of the world. It is only relatively in favor of all these things – it passes out of common human consciousness in the direction in which they lie. (James 1902 [2010], 383–384)

If mystical experiences have only emotional tones, and no theological content, then mystical perception does not weakly depend on scriptural revelation, and so by extension does not weakly depend on naturalistic methods. Given James’s description, though, it seems that these experiences lack philosophical and empirical content as well, which calls into question their capacity to justify *propositional* attitudes. He admits that “Vague impressions of something indefinable have no place in the rationalistic system” (ibid., 73), but he thinks of this as a *limitation* of the rationalistic system:

If you have intuitions at all, they come from a deeper level of your nature than the loquacious level which rationalism inhabits. Your whole subconscious life, your impulses, your faiths, your needs, your divinations, have prepared the premises, of which your consciousness now feels the weight of the result; and something in you absolutely *knows* that that result must be truer than any logic-chopping rationalistic talk, however clever, that may contradict it. (ibid.)

The truths delivered to the chosen few through mystical experiences do not fall within the realm of rational discourse because they lie *beyond* it. Mystical experiences, as James says, “...open out the possibility of other orders of truth”.

Here James misses the point. If religious experiences lack epistemically evaluable content, then they cannot provide warrant for beliefs that do have such content. Consequently, the deliverances of religious experience, whatever they may be, can neither be contradicted nor supported by the “logic-chopping rationalistic talk” of naturalists. My feeling of awe or despair reveals nothing about the world (outside of myself), and as such, cannot do any epistemic work for or against any claim about the world. James is thus faced with a dilemma: either religious experiences have cognitive content that depends on our reading, memory, and interpretation of theological doctrines, or they are theologically inert because

they have no cognitive content whatsoever. On the first horn, he can be pressed with the dialectical argument for the epistemic authority of naturalistic methods; on the second, religious experience is not an epistemic method, and therefore cannot be considered a radical alternative to the naturalist's strongly basic methods.

James convincingly argues that there are many varieties of religious experience. Some are informative, quasi-sensory perceptions, others are informative, non-sensory states, and still others are emotional states that carry no information. None of these are candidates for non-naturalistic methods that legitimately rival naturalistic methods in the way required by the argument for epistemic relativism.

9.8 RATIONALISM AND EMPIRICISM

The dialectical argument gives us an objective reason to prefer naturalistic to non-naturalistic epistemic systems, but it does not specify *which* naturalistic system we should prefer. Naturalists can and do disagree about which of their epistemic methods are properly basic. This is the disagreement at the heart of the Early Modern schism between rationalists and empiricists: rationalists privilege non-empirical methods, such as logico-mathematical reasoning and a priori intuition, while empiricists give experience the last word on all matters metaphysical. As a result, philosophical debates between rationalists and empiricists seem impervious to reasoned consensus. If there isn't an asymmetrical relation of weak dependence between empirical and non-empirical methods, then the dialectical argument outlined above cannot be used to rationally resolve these cases of epistemic incommensurability, and the threat of epistemic relativism remains.

This may well be true, but I am not advocating a single argument against epistemic relativism. Rather, I am suggesting that we take up a certain *approach* to meet the challenge of relativism: the approach of pre-suppositional analysis. Using this approach, I will attempt to show that we cannot rightly privilege any subset of strongly basic naturalistic methods because there are so many *symmetrical* relations of weak dependence among them; they must be applied jointly, or not at all. This is essentially Kant's resolution to the rationalist-empiricist debate, so I will begin by reviewing his argument.

Kant argues that neither experience nor reason, on their own, can be authoritative sources of information about the world because it is only

through their combined use that such information is possible: “The understanding can intuit nothing, the senses can think nothing. Only through their union can knowledge arise” (B75). If empirical methods are to yield intelligible conclusions about the world, they must presuppose principles that are not themselves outcomes of empirical methods. The principle of causality,¹⁷ for example, expresses a condition of the possibility of experiencing events in an objective temporal order, not a conclusion that can be arrived at by means of such an experience: “Experience itself – in other words, empirical knowledge of appearances – is thus possible only in so far as we subject the succession of appearances, and therefore all alteration, to the law of causality...” (B234). In order to distinguish events that take place in temporal succession from those that are merely perceived in succession, we must determine their irreversible causal order: if A caused B, then A necessarily happened before B, regardless of the order in which they were perceived. On the other hand, pure concepts of the understanding must be schematized, such that they are applicable to the objects of possible experience: “The schemata of the pure concepts of understanding are thus the true and sole conditions under which these concepts obtain relation to objects and so possess *significance*” (B185). The category of *causality* is applicable to events apprehended in experience only by means of the schema of temporal succession. Causal rules are intelligible insofar as they determine the necessary order in which events take place in time. Consequently, from Kant’s perspective, rationalists are right to think that metaphysics cannot be done inductively, and empiricists are right in thinking that metaphysical reasoning must concern possible objects of experience. Yet, rationalists and empiricists are wrong to privilege reason or experience in the acquisition of knowledge.

Kant arrives at this conclusion by means of a transcendental analysis that concerns the a priori conditions of the possibility of experience. A similar conclusion can be reached, however, by means of a more modest presuppositional analysis that comes with far less philosophical baggage. In particular, we need only consider the relations of weak dependence that exist between empirical and non-empirical methods, without concerning ourselves with the pure categories of the understanding, the manifold of intuition, or the schemata that connect them.

¹⁷“All alterations take place in conformity with the law of the connection of cause and effect” (B232).

9.8.1 *Against Radical Empiricism*

Radical empiricists claim that logic and mathematics are derivative forms of empirical knowledge, and they reject a priori intuition altogether. If empirical methods weakly depend on logic, mathematics, and intuition, then this position is untenable. For in that case, empirical justifications of logical and mathematical truths must presuppose some of those very truths, so that experience alone cannot be the source of logical and mathematical knowledge. And if the deliverances of a priori intuition are essential to the generation of empirical knowledge, then radical empiricists are no better off rejecting a priori intuition than Bellarmine would be in rejecting basic naturalistic methods. I will argue that strongly basic empirical methods do weakly depend on logic, mathematics, and intuition, and therefore, radical empiricism is untenable.

I will begin by establishing that strongly basic empirical methods weakly depend on logic and mathematics. In the case of inductive reasoning, this is fairly clear. Frege makes this point against radical empiricists, such as John Stuart Mill, who maintain that the basic principles of arithmetic are known on the basis of past experiences with aggregates. He responds: “Induction [then, properly understood,] must base itself on the theory of probability, since it can never render a proposition more than probable. But how probability theory could possibly be developed without presupposing arithmetical laws is beyond comprehension” (Frege 1884 [1980], 16–17). Inductive reasoning is inherently probabilistic, and because probabilities are represented *numerically*, probabilistic reasoning essentially involves arithmetical reasoning. From the fact that inductive reasoning weakly depends on arithmetical reasoning, Frege rightly concludes that the fundamental principles of arithmetic cannot be given a non-circular empirical justification.¹⁸

Things are not so straightforward when it comes to perception, though. The cognitive processes that *cause* perceptual beliefs certainly do make essential use of mathematical reasoning. Stereovision depends on the brain’s ability to perform trigonometric calculations involving the triangle created by the lines of sight from each eye to a common object, to determine the distance of that object from the perceiver. The ability

¹⁸Frege then draws the further rationalist conclusion, on which I reserve judgement, that arithmetic must be justified non-empirically, and proceeds to mount the case for his central thesis that its justification must come from logic alone.

to identify a three-dimensional shape on the basis of its two-dimensional projection on one's visual field requires the use of probability theory: since any such projection could come from any object, our brains are consigned to determining the object's most likely shape, given the environment in which it is perceived (Pinker 1997, 243). These cases may convince some externalists that perception weakly depends on mathematical reasoning—since weak dependence can be understood by them as a *causal dependence* between cognitive processes—but they will not be convincing for empiricists who sharply distinguish a belief's cause from its justification. These empiricists insist that perceptions can justify beliefs only if their contents stand in some sort of *evidential* relations to the propositions believed. Evidential relations are most naturally thought of as being *inferential*, be they deductive, inductive, probabilistic, or abductive. But this means that perceptual experiences cannot serve as evidence for or against empirical claims in the absence of a framework of inferential rules capable of specifying the rational contribution of these experiences. This relation of weak dependence is a special case of the *logocentrist* doctrine that motivates the deflationary reading of Carnap:

A linguistic framework is given by the rules for formation of sentences together with the specification of the logical relations of consequence and contradiction among sentences. The fixing of these logical relations is a precondition for rational inquiry and discourse. (Goldfarb 1996, 225)

Logic and mathematics cannot be derivative forms of empirical knowledge if the rational contribution that experience makes to our knowledge can be determined only *after* we have adopted a linguistic framework of logico-mathematical rules.

By using this insight to combat radical empiricism, though, we run the risk of undermining the absolutist presumption as well. As we saw in Chapter 3, Carnap can be understood as marrying the doctrines of pluralism and logocentrism to yield a permissive form of conventionalism that is indistinguishable from epistemic relativism; if there are many different linguistic frameworks, and rational inquiry cannot begin until one of them is adopted, then it seems that we cannot rationally defend the adoption of any particular framework. One way of avoiding this conclusion without giving up logocentrism is to re-conceive the epistemic role of experience, as Anil Gupta (2006) does in his *reformed* empiricism.

Gupta's reformed empiricism does away with the doctrine of the propositional given, i.e., the view that experience enhances our knowledge by delivering justified propositions. He argues that it is only against the backdrop of a *view* of the world—a set of “concepts, conceptions, and beliefs” (Gupta 2006, 76)—that experiences become informative. This being the case, a single experience can have different implications for those with distinct views: the experience of seeing a blue wall will yield a different conclusion for someone wearing yellow-tinted glasses than it will for someone who sees it without the glasses.¹⁹ Instead of being propositional in form, Gupta argues that the given in an experience, e , is a *function*, Γ_e , that takes views, v , as inputs, and yields classes of perceptual judgements $\Gamma_e(v)$ as outputs. Perceptual entitlements, then, are always conditional, depending as they do on the presuppositions that we bring to our experiences: “Experience does not yield, then, an absolute entitlement to any judgments. It yields at best only conditional entitlements: given such-and-such a view, one is entitled to such-and-such judgments” (ibid., 80). If an agent's view is radically false, unwarranted, or otherwise unacceptable, then she will lack entitlements to the perceptual judgements that take that view for granted.

This makes it seem that Gupta's reformed empiricism is itself in danger of collapsing into epistemic relativism: if our perceptual entitlements depend (in part) on our views, and there is a plurality of radically distinct views, then two persons may be equally entitled to conflicting perceptual judgements, even if they've had similar experiences. To avoid this conclusion, Gupta argues that over a sustained course of experiences, all rationally admissible initial views will undergo a series of revisions such that they *converge* towards our commonsense view of the world (ibid., §4B).²⁰ This convergence provides us with a *categorical* (absolute) justification for believing things like “...apples are good to eat, that we humans are mortal, and that the Earth has existed for more than a few centuries” (ibid., 178). It also provides empiricists with a significant victory: a reason to think that epistemic disagreements, no

¹⁹ Gupta calls this the *multiple-factorizability of experience* (ibid., §1B).

²⁰ Gupta claims that views that fail to converge in this way, such as scepticism and solipsism, are inadmissible for straightforwardly demonstrable reasons (ibid., §§5E and 6A).

matter how deeply entrenched, can be rationally resolved by appealing to experience.²¹

The doctrine of logocentrism gains an even deeper foothold in reformed empiricism, for there are three respects in which logico-mathematical principles are essential to the generation of empirical knowledge. First, the perceptual judgements that result from the conjunction of an experience with a particular view of the world must be determined by a framework of inferential rules. Second, the revisions made to a view in light of perceptual judgements will also be determined by such a framework. Finally, there is reason to think that a wide variety of mathematical principles are an indispensable component of any view that can yield perceptual judgements in the face of certain kinds of experiences.²² Take, for example, the mundane perceptual judgement that I see two red circles of the same size, side-by-side, against a black background. This judgement obviously takes for granted a view that includes modest mathematical assumptions about shape, size, and number.

The fact that logico-mathematical principles are necessarily presupposed by perceptual judgements does not entail the rationalist conclusion that they are insensitive to empirical evidence, for, as Gupta points out, the presuppositions that give rise to a class of perceptual judgements may in turn be undermined by those same judgements. Nor does it entail the deflationary principle of tolerance, since one may have considerable freedom when *initially* choosing a framework of inferential rules, but become increasingly constrained in one's choices by the revisions necessary to accommodate judgements arrived at within the framework over time. And if these revisions result in a convergence of views, then reformed empiricism has the resources necessary to resist epistemic relativism.

So, while Kant is right to insist that empiricists must take logico-mathematical methods for granted, we are not in the position that Kant envisions of being able to determine a priori *which* logico-mathematical principles must be presupposed to yield intelligible empirical judgements. Nor are we in the position that conventionalists envision of *choosing* which principles to adopt before engaging in empirical inquiry. Rather,

²¹This reason, however, will be plausible only to those who *already* accept the main tenets of empiricism. Radical rationalists and fundamentalist theologians will disagree, since they do not regard experience as a basic source of information.

²²This is persuasively argued for in Ray (2012).

our logico-mathematical presuppositions evolve with our empirical knowledge and are revealed by an analysis of the conditions that make such knowledge possible.²³ The point I wish to emphasize is the starting-point for all of these views: since empirical methods *weakly depend* on logic and mathematics, the former can enjoy no epistemic privilege over the latter. Though I think this point yields neither rationalism nor conventionalism, it does rule out radical empiricism.

Let's turn now to the method of consulting a priori intuition. Radical empiricists do not attempt to subsume a priori intuition to empirical knowledge, as they do with logic and mathematics. Instead they reject it altogether. But rationalists claim that appeals to intuition are an essential feature of logical and mathematical reasoning; they insist that this is the only way in which basic logical and mathematical truths can be known.²⁴ Given what's been said thus far, this point can be leveraged to argue that empirical methods weakly depend on a priori intuition.

I will not take a stand here on the role of a priori intuition in logico-mathematical knowledge, but instead focus on a separate line of rationalist argument, according to which empirical methods weakly depend on a priori intuition when generating *reflective* knowledge. George Bealer argues that the application conditions of the epistemological concepts involved in reflective justification—reasons, explanation, justification—must be apprehended in a priori intuition. These concepts are essential to rationalists and empiricists alike:

Indeed, there is a special irony here, for in their actual practice empiricists typically make use of a wide range of intuitions. For example, what does and does not count as an observation or experience? Why count sense perception as observation? Why not count memory as observation? Or why not count certain high-level theoretical judgments as sense experiences? ...What does and does not count as a theory, as justified (or acceptable), as an explanation, as simple? The fact is that empiricists arrive at answers to these questions by using as *prima facie* evidence their intuitions about what does and does not count as experience, observation, theory, justified, explanation, simple. In their actual practice, empiricists use such intuitions as evidence to support their theories and to persuade others of them.

²³This point is emphasized in Ray (2012), drawing on the work of Friedman (2002) and DiSalle (2006).

²⁴See, for example, Bealer (1992) and BonJour (1998, Chap. 4).

However, such use of intuitions contradicts the principle of empiricism, which includes only experiences and/or observations as *prima facie* evidence. So in their actual practice, empiricists are not faithful to their principles. (Bealer 1992, 105)

Radical empiricists claim that all beliefs must be justified on the basis of experience. But in order to determine what counts as a belief, a justification, and an experience, empiricists must consult their a priori intuitions. This is the case because such fundamental epistemic concepts do not refer to entities that can be straightforwardly apprehended in experience.²⁵ Furthermore, the contents of these concepts cannot be empirically determined by appealing to the ways in which they are used, for it does not follow from the fact that a term such as ‘justification’ is used in particular ways that it *should* be used in those ways. This further, normative conclusion can be reached only by appealing to our intuitions about the conditions in which the concepts correctly apply. We must intuit, for example, that the use of unreliable methods cannot yield justified beliefs.

It’s entirely possible that *unreflective* justification need not rely on the deliverances of a priori intuition.²⁶ An agent may be able to unreflectively justify her belief that it has rained recently by pointing to puddles on the ground without invoking a theory of justification. However, a reflective justification must establish that this constitutes *good* grounds for the belief; the believer might argue, for example, that the widespread presence of water on the ground makes it likely that it has rained recently. This kind of reflective justification must *presuppose* theories of justification, evidence, coherence, and the like. Since these theories are underpinned by a priori intuitions, all reflective justification, including justification of the empirical variety, weakly depends on a priori intuition. Consequently, radical empiricists cannot do away with a priori intuition altogether, without thereby undermining their capacity to generate reflective knowledge by empirical means.

²⁵On this point, Descartes is right and the empiricists are wrong; not every meaningful concept has a corresponding sensory impression (see Sect. 2.3.a).

²⁶Consider, for example, Sosa’s account of animal knowledge, according to which my dog knows that he’s going to be fed as long as his belief was produced by a reliable cognitive faculty (see Sect. 5.1). My dog can possess this knowledge in the absence of a theory or concept of justification.

9.8.2 *Against Radical Rationalism*

Radical rationalism is an easier critical target than radical empiricism. Radical rationalists, such as Descartes, claim that a priori methods alone are capable of yielding knowledge. However, a presuppositional analysis reveals that if this is the case, then we can know virtually nothing about the physical world.

The use of logic and mathematics does not depend on empirical methods: one need not appeal to the deliverances of experience when carrying out a deductive inference or a proof. Nevertheless, logic and mathematics do weakly depend on empirical methods in a more specific sense: particular *applications* of logico-mathematical theories to the *physical world* necessarily rely on empirical information. This fact constitutes an insurmountable objection to radical rationalism.

Descartes's goal in the *Meditations* is to reconstruct the sciences on a foundation that is sure to guide its practitioners away from error and ever closer to the truth. In the first meditation, he argues that perception is not up to this task since its deliverances do not pass the test of hyperbolic doubt. In the second meditation, he finds that rational thought, unencumbered by the senses, is the proper way to proceed. By the fifth meditation, however, he has still only managed to attain knowledge of himself and God. Yet in his knowledge of the infinitely perfect nature of God he discerns grounds to discharge his hyperbolic doubt in favour of the new methodological principle to trust only those things that he knows clearly and distinctly. With this criterion in hand, he begins the fifth meditation by turning his attention to the possibility of his coming to know the physical world. The wax argument in the second meditation shows that this cannot be done by relying on perception, for perception informs us only of an object's transitory properties, such as the wax's colour, texture, sound, smell, and taste. When the wax is moved closer to the fire, it loses all of these secondary properties, though its essential nature remains unchanged. Its essential nature consists of properties that belong to all physical matter: extension, mutability, and flexibility. These properties remain in the wax throughout its transformations and are grasped clearly and distinctly by the mind:

Quantity, for example, or 'continuous' quantity as the philosophers commonly call it, is something I distinctly imagine. That is, I distinctly imagine the extension of the quantity (or rather of the thing which is quantified) in

length, breadth and depth. I also enumerate various parts of the thing, and to these parts I assign various sizes, shapes, positions and local motions; and to the motions I assign various durations. (1641 [1984], 44)

Unlike secondary properties, the primary properties that essentially belong to extension—size, shape, motion, duration—are *quantifiable*, and are therefore subject to mathematical analysis. Indeed, Descartes thinks that mathematics concerns nothing other than the possible parts (arithmetic), shapes (geometry), and movements (physics) of extended matter. Since the principles of mathematics are known clearly and distinctly, their truth is safeguarded by the grace of God, such that they can be counted on as a reliable source of information about the physical world:

[Corporeal things] may not all exist in a way that exactly corresponds with my sensory grasp of them, for in many cases the grasp of the senses is very obscure and confused. But at least they possess all the properties which I clearly and distinctly understand, that is, all those which, viewed in general terms, are comprised within the subject-matter of pure mathematics. (ibid., 55)

The principal outcome of Descartes's *Meditations*, then, is a rationalist, mechanistic program of philosophy and science, according to which inquiries into extended substances concern only what can be discovered by a priori mathematical means, namely, truths about primary properties.

There are many empiricist responses to this brand of rationalism. Radical empiricists deny Descartes's supposition that the principles of logic and mathematics are known a priori. I rejected this position in the last section. Moderate empiricists admit that logic and mathematics are known a priori, but deny that they express truths about the world; Hume and the Logical Positivists defend this position. This view has fallen out of favour, in large part because of Quine's critique of the doctrine of analyticity. So, rather than going either of these routes, I will offer a *minimally empiricist* response to Descartes's rationalism, one that is compatible with the more modest brands of rationalism presently on offer.²⁷ The thrust of the minimal response is to point out that particular

²⁷The rationalist positions of Bealer (1992) and BonJour (1998) have been particularly influential.

applications of non-empirical theories to the physical world require input from empirical sources of information. Suppose, for the sake of the argument, that Descartes is correct in thinking of extended substance and its primary properties as being the subject-matter of mathematics. To apply mathematical principles to *particular* physical objects, one must possess information about their shapes, sizes, motions, and durations. And the primary properties of particular objects are apprehended *by the senses* no less than their secondary properties. Geometry tells us that figures that can be made congruent are equal, but to *apply* this criterion, we must be able to empirically ascertain *which* objects can be made congruent. Therefore, our success in applying the principles of mathematics to the physical world depends on the reliability of our *empirical* methods of apprehending the primary properties of extended substances.

Descartes himself seems to recognize this fact, albeit somewhat reluctantly:

What of the other aspects of corporeal things which are either *particular* (for example that the sun is of such and such a size or shape), or less clearly understood, such as light or sound or pain, and so on? Despite the high degree of doubt and uncertainty involved here, the very fact that God is not a deceiver, and the consequent impossibility of there being any falsity in my opinions which cannot be corrected by some other faculty supplied by God, offers me a sure hope that I can attain the truth even in these matters. (ibid., 55–56, emphasis added)

Here, Descartes admits that the senses must be reliable enough to yield true beliefs about the merely particular and the obscurely understood, though he is adamant that their outcomes fall well short of the level of certainty possessed by the products of the intellect. The problem, once again, is that if the products of the intellect are going to be applied to yield clear and distinct knowledge of the merely particular, then the senses must be capable of generating such knowledge as well. Since mathematical explanations of natural phenomena are a key component of Descartes's mechanistic program, he clearly thinks that such knowledge is not only possible, but indispensable.

Though pure mathematics can be used to generate warrant for beliefs without relying on empirical methods, the same cannot be said for *applied* mathematics. This being the case, we can press radical rationalists with the following dilemma: they can dismiss basic empirical methods

as unreliable, thereby dramatically limiting the applicability of their non-empirical methods, or they can accept empirical methods as sources of knowledge, which means giving up on radical rationalism.

The outcome of this presuppositional analysis is that naturalistic methods cannot be applied in isolation; even those few non-empirical methods that are weakly basic in naturalistic systems depend on other methods to yield particular conclusions about the physical world. This insight, I claim, constitutes an argument against the kinds of radically rationalist and empiricist programs that seem to give rise to cases of epistemic incommensurability. Since this argument presupposes neither empiricism nor rationalism, it too is a dialectical argument that meets the recognition constraint. However, like the dialectical argument for naturalistic epistemic systems, it does not give us reason to believe that empirical and non-empirical methods are in fact truth-conducive. Consequently, the outcome of this presuppositional analysis is no more effective in answering scepticism or meeting the justification requirement than the outcome of Kant's transcendental analysis.

9.9 CONCLUSION

This chapter contains my positive contribution to the topic of epistemic relativism. This contribution can be summarized in the following seven points:

1. By focusing exclusively on relations of strong dependence, foundational analyses fail to comprehensively capture the structures of epistemic systems.
2. For this reason, another type of analysis is needed—presuppositional analysis—which reveals relations of weak dependence between epistemic methods. While this analysis figures importantly in some branches of the philosophy of science, it is used infrequently in epistemology generally.
3. Foundational analyses that seek to undermine the doctrine of epistemic pluralism, such as Seidel's, have not done so adequately.
4. The principal argument for epistemic relativism can be adequately addressed by means of a neo-Kantian presuppositional analysis. The critical outcomes of my presuppositional analyses are expressed in points five and six.

5. Outcome #1: there is an asymmetric relation of weak dependence between naturalistic and non-naturalistic methods that constitutes good grounds for the naturalist presumption.
6. Outcome #2: there are many symmetric relations of weak dependence among naturalistic methods that constitute good grounds against radical empiricism and rationalism, and in favour of the absolutist presumption.
7. While these outcomes meet the recognition constraint, they do not engage the Agrippan argument for scepticism because they do not seek to show that naturalistic epistemic systems are truth-conducive, nevermind more truth-conducive than their alternatives. However, because the dialectical argument shows that they cannot be less truth-conducive, it constitutes definitive grounds for preferring naturalistic epistemic systems, while failing to satisfy the justification requirement.

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CHAPTER 10

Conclusions

Pyrrhonian scepticism and epistemic relativism pose dire threats to the deliberative practices philosophers have been traditionally involved in. For this reason, the temptation to exaggerate the scope and effectiveness of counter-arguments to these positions is an understandable one. Yet I have argued that this temptation is dangerous because it obfuscates the fact that scepticism and relativism pose distinct threats that must be addressed by means of distinct arguments. In an effort to defuse this danger and clarify the critical landscape, I have emphasized the limits of anti-sceptical strategies, and of my own anti-relativist approach. By way of a conclusion, I will briefly summarize these limitations.

Pyrrhonian sceptics are construed as challenging epistemologists, and philosophers more generally, to produce justifications that do not fall prey to the Agrippan trilemma. I have argued that this challenge cannot be met by strictly internalist versions of foundationalism or coherentism (Chapter 4), and cannot be dismissed as incoherent (Chapter 7). I've reserved judgement on the effectiveness of responses that involve rejecting the challenge altogether, such as externalists' circular justifications, and particularists' and methodists' dogmatic justifications. What I do claim is that these responses can be successful only if the generation of *non-suasive* justification is enough to defeat scepticism (Chapters 5 and 6). Yet because non-suasive justifications do not meet the recognition constraint—they cannot be understood as justifying their target propositions by anyone who does not antecedently believe them—these anti-sceptical strategies will prove fruitless when deployed against

sophisticated epistemic relativists. One can reject the Agrippan trilemma without avoiding epistemic relativism because the most charitable reconstruction of the argument for relativism does not rely on an attenuated version of the Agrippan argument. On this reconstruction, the problem with arguments for any particular epistemic system is not that they are circular, non-terminating, or dogmatic, but that they are unavoidably *question-begging* when presented to someone who does not subscribe to that system.¹ An adequate reply to epistemic relativism must either produce a non-question-begging argument for an epistemic system, or provide us with some principled reason for thinking that such an argument is unnecessary for the defense of absolutism. Since anti-sceptical strategies accomplish neither of these things, they cannot constitute adequate replies to epistemic relativism.

I have argued that broadly naturalistic methods can be defended without begging the question against non-naturalists (Chapter 9). This defense involves a presuppositional analysis of the relations of weak dependence that exist between naturalistic and non-naturalistic methods. Since non-naturalistic methods rely on naturalistic methods for their application, but the converse is not the case, the latter must be at least as truth-conducive as the former. And because empirical and non-empirical naturalistic methods stand in reciprocal relations of weak dependence, they must both figure in our best epistemic systems. This defense of the naturalist presumption does not presuppose methods that non-naturalists reject; rather, it proceeds by uncovering the presuppositions that their use of non-naturalistic methods commits them to. It thus meets the recognition constraint. It does not, however, establish that naturalistic methods are truth-conducive, or that they are more truth-conducive than their non-naturalistic alternatives. I am not offering an answer to Pyrrhonian scepticism, nor am I attempting to meet the justification requirement. Instead, I am arguing that anti-sceptical responses to epistemic relativism are motivated by a *false dilemma*: we must either show that naturalistic systems are more truth-conducive than their alternatives, or acknowledge that the naturalist presumption is groundless. If I am correct, then the naturalist presumption can be vindicated *without*

¹Though it does not make use of the Agrippan argument, this argument for epistemic relativism does make use of narrow versions of the sceptical modes from relativity and dispute.

showing that naturalistic methods are more truth-conducive than their alternatives, or even truth-conducive enough to produce knowledge.

I should also emphasize the limits of my use of the dialectical strategy to address the threat of relativism. First, I am not claiming that it is effective in circumventing non-epistemic forms of relativism, such as alethic, conceptual, and moral relativism. Others have made this case persuasively, however. In particular, Robert DiSalle argues that revolutionary theory change in physics does not involve a pragmatically motivated choice of one conceptual scheme over another, but “...an analysis of what physics presupposes about space and time, and of how these presuppositions must confront the changes in our empirical knowledge and practice” (DiSalle 2006, 2). Second, there are a number of arguments for epistemic relativism that my dialectical strategy does not engage, including the argument from underdetermination often invoked by advocates of the Strong Programme (Barnes and Bloor 1982, 33–35; Barnes 1992, 137; Bloor 1996, 841) and the semantic argument for ‘New Age’ epistemic relativism (MacFarlane 2005, 2007, 2014; Kölbel 2003; Lasersohn 2005; Wright 2009). I have focussed exclusively on the principal argument for epistemic relativism because it seems to exert the greatest influence on epistemologists, and because I think that the other arguments have been adequately addressed elsewhere.² Lastly, my strategy is silent on the broader issue of whether or not epistemic peers with the same evidence can have reasonable disagreements; its target is the more specific relativist claim that no reasonable consensus can be achieved in cases of epistemic incommensurability.

It should come as no surprise that two of the most enduring, influential, and threatening arguments in epistemology’s long history are not so easily dismissed. This becomes even more obvious when we see how different these arguments end up being when given their most charitable interpretations. Yet, this is not cause for despair, but for a more piecemeal approach to these problems than epistemologists have traditionally taken. My hope is that this work constitutes one useful contribution among others in this approach.

²For compelling responses to the argument from underdetermination, see Laudan (1996) and Seidel (2014, Chap. 2). For responses to the semantic argument, see Carter (2016, Chaps. 7–8) and Boghossian (2008).

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