Responding to how things seem: Bergmann on skepticism and intuition

Michael Bergmann's important new book on skepticism is attractively systematic and thorough. He places familiar ideas under an exceptionally bright spotlight, exposing features we might not have noticed in casual survey. He draws out hidden consequences of his starting points with admirable courage, even when these consequences look like trouble for him. Before getting into this trouble, and some differences in how I would tackle it, I will begin by highlighting some ground we share.

First, I like Bergmann's fundamental epistemic optimism in the face of the skeptical challenge. When the radical skeptic suggests that close attention to our natural epistemic self-trust should erode it, I'll agree with Bergmann that closer attention can vindicate it. Indeed, my optimism about epistemology extends all the way to holding that scrutiny of our instinctive epistemic self-trust can refine it, by alerting us in advance to some odd situations in which these natural instincts of ours can be expected to fail, and giving us a solid, non-skeptical understanding of just why this is so. Back on the positive side, I agree warmly with Bergmann that in general, perceptual judgment and epistemic intuition are in good shape: our sensory faculties really do yield extensive knowledge of the world, and, moving up a level, our natural capacities for mindreading do yield extensive knowledge of the wide range of states of knowledge we possess (and, derivatively, states of justified belief – like Bergmann, I take knowledge to entail justified belief). I am not sure that Bergmann would favor the label 'mindreading' on our capacity for epistemic intuition, but I think that classifying it this way is entirely compatible with Bergmann's common-sense Reidian approach. Understanding our instinctive mindreading capacities is one way of learning about ourselves, taking Bergmann's 'autodidactic' turn (p.147), rather than attempting to convert the skeptical adversary directly. Perhaps some points can be scored against sloppy Academic skeptics who dogmatically maintain that knowledge is impossible—we can certainly challenge the positive claims they will need to make about the nature of knowledge, or the conditions of our existence, in order to argue for their repellent conclusion. But we should have no hope of directly converting the stronger Pyrrhonian skeptic, who simply maintains a chronic stance of questioning everything. There are dim prospects for constructing an anti-skeptical argument against him, starting from premises he will be bound to accept. As long as he is on the ball, the Pyrrhonian can keep raising an eyebrow at any attempt to

formulate such premises, and the argument against him will never get going. Still, the power of an autodidactic approach should not be underestimated: for anyone who hasn't already slipped into this ultimately sterile Pyrrhonian way of thinking, a healthy course of self-examination can fortify them against the threat of slipping into that trap in the future.

One more key point which I think Bergmann gets absolutely right concerns the New Evil Demon (NED) intuition, according to which the good case perceiver enjoys precisely the same epistemic justification as his bad case counterpart. Bergmann writes, "The main thing I want to say on behalf of the NED intuition is that when we think of evidence in the way I am in this book, we have very good reason to endorse the NED intuition." (p.24) I think this conditional is clearly true: Bergmann's conception of evidence locks us firmly into the NED intuition. But whether this is a point in favor of the NED intuition, or a point against Bergmann's conception of evidence, is another matter. In what follows, I will argue that Bergmann's way of thinking of evidence is somewhat problematic, and a frankly more commonsense approach will serve us better, whether we are thinking of the kind of evidence we gain from the senses, from a priori reasoning, or from epistemic intuition itself.

Let's start with perception. On a commonsense way of thinking, our sensory capacities are responsive to objects in our environment: we see apples, not retinal stimulation arising from apples. Cognitive science agrees with common sense in taking conscious perception to be fundamentally object-directed. Contemporary theories of perception stress that we are not simply passive recipients of sensation, but active explorers in the world, whose interactions with objects are essential to disambiguating data received from the activation of our sensory receptors (e.g. Hohwy, 2013). Sensory stimulation changes as we navigate through a world of particulars, shifting our angles of view on the objects we encounter, or even as our eyes saccade, or as attention zooms in on something. While raw signals like retinal activation change equally as objects move, or as we move, what we consciously experience is not this raw flux of sensation, but instead a stable set of worldly objects. Sub-personal processes interpret changes in sensation as arising from shifts in us on the one side, and from shifts in the world, on the other, and they generally do so accurately, by integrating exteroceptive and proprioceptive signals with past experience of similar interactions with similar objects in the world. What is consciously available at any given time is therefore never raw incoming sensory stimulation, but instead our mind's single best current "hypothesis" about the stable reality

in which we are now embedded; indeed, this hypothesis forms the content of our unreflective perceptual judgments. Thanks to helpfully selected genetic endowments and extensive experience in our generally stable world, this hypothesis is typically true—indeed, safely true, constituting perceptual knowledge. In good cases, perceptual judgments are safely true in part because our perceptual systems have actively ruled out competitor hypotheses in the nearby modal space (Munro, 2021). Because the calculations supporting conscious visual experience are sub-personal, ordinary perceptual knowledge about our environment is non-inferential at the personal level: as you bite into an apple, for example, your perceptual system is responsive to that apple itself in an epistemically appropriate way, safely integrating current multimodal experience with past knowledge of how things tend to be in the world.

If our perceptual systems are generally structured to reveal the features of objects in our environment, this is not to say that they are invariably accurate. Perceptual illusions arise at the edges of the heuristics that generally serve us well. In the "rotating snakes" illusion, for example, sequential patterns of higher and lower contrast trigger microsaccadic eye movements that keep refreshing the retinal image in a way that our perceptual systems misinterpret as motion in the world (Otero-Millan, Macknik, & Martinez-Conde, 2012). This is a robust illusion: even looking at it in ink on paper, well aware that there can be no actual movement of the colored forms, we will continue to experience apparent motion. The way it feels to us, visually, is very much the way it feels when we are observing actual motion in the world, and this is unsurprising, given that what is happening in the visual cortex, which supports conscious perception, is exactly the same kind of motion detector activation as we would have in the presence of objective motion. We have here a strong seeming, with "felt veridicality": the way it feels when we observe this apparent motion is just like the way it feels when we observe real motion in the world.

Known illusions of this sort reveal an interesting feature of the relationship between consciousness and belief. Visual processing is encapsulated from cognition in a way that enables it to continue to deliver percepts we know to be misleading; the firm reflective belief that nothing is moving on the printed page is powerless to stop the visual impression of movement (Firestone & Scholl, 2016). But the possibility of this dissociation in cases of known illusion should not make us think that the formation of beliefs about perceptible qualities such as motion is generally decoupled from sensory processing. One's considered judgment that nothing is moving on the page is an inferential

judgment overriding the initial naïve perceptual judgment of motion; touching the page, knowing what we do about ink and paper, we conclude that the visual impression of motion is illusory. The possibility of such overriding judgments is consistent with the fact that ordinary perceptual judgments are involuntary in the absence of an override, and non-inferential at the personal level. Typically, you judge that an oncoming car is moving towards you without any second thought, and without any prior contemplation of available evidence. In the good case, your visual system enables you to be responsive to the approach of the car in the right sort of way; ordinary perceivers are sensitive to objects in the world in a way that is epistemically fitting. To characterize things this way is to accept Williamson's idea that unreflective perceptual beliefs serve as evidence, rather than requiring conscious evidence for their formation: "When we acquire new evidence in perception, we do not first acquire unknown evidence and then somehow base knowledge on it later. Rather, acquiring new evidence is acquiring new knowledge." (Williamson, 2014, 4)

Not all objects fall within the range of unreflective perceptual knowledge: the limits of our perceptual faculties will bar us from making epistemically fitting naïve perceptual judgments about the rotating snakes image, for example. Our perceptual systems are not built for that, any more than they are built to discern shades of ultra-violet light or hypersonic vibrations. Of course, the rotating snakes illusion is one of many; others exploit features of ocular drift, and so on. But given our actual environment, susceptibility to these peculiar illusions still does not constitute a huge restriction on our capacity for perceptual knowledge: most objects are not patterned like that (and doubtless if more of them were, evolution would not have left us vulnerable to these particular illusions).

Bergmann also defends a noninferential account of perceptual judgment, but in his view, it is responsive not to objects, but to sensory experience conceived in a way that is neutral between hallucination and sensory perception. We generate epistemically appropriate responses to these experiential seemings, in his view: "our perceptual beliefs are justified *noninferentially* in virtue of the fact that they are formed in response to sensory experience in an epistemically appropriate way" (pp.152-3). He has a series of interesting arguments for this point, and I can't hope to do them all justice in this brief commentary. Skipping over his arguments against inferentialism, which I found highly persuasive, I'll focus on some points he makes in criticizing disjunctivism, because these points also threaten my kind of view. His motivating thought here is that "evidence is the kind of thing on which our beliefs are based," (p.24) a thought I'm inclined to resist. But he continues in a

way that sounds right to me: "For a belief to be based on something is, in part, for it to be responsive to it in the right sort of way. Hence, if we learn that our beliefs are *not* responsive to something in that way, that suggests that our beliefs aren't based on that thing." (p.24) I will argue that Bergmann then succeeds in describing a counterfactual scenario in which our beliefs wouldn't be responsive to objects, but just imagining this counterfactual case doesn't suffice for us to learn that our beliefs aren't responsive to objects in the actual world.

Bergmann imagines a scenario in which you are seeing a basketball at close range, and then "a little later, a powerful deceptive demon instantly annihilates the basketball but at the same moment produces and sustains in you a hallucinatory visual experience as of a basketball" (pp. 24-5); soon afterwards, the demon cancels that hallucination. Bergmann suggests that perceptual belief, in this scenario, is responsive not to the factive state of seeing that a ball is present, but is instead responsive to "your visual experience as of seeing a basketball." I share Bergmann's dislike of the disjunctivist way of handling this case, and agree that belief is not responsive to the factive state of seeing that a ball is present. (For what it's worth, I think the state of seeing that a ball is present already entails both knowing and believing that a ball is present, so it makes no sense to say that belief is based on it.) But I don't think we need to go to a layer of seemings to make sense of what is going on. In good cases of perception, I think perceptual belief is responsive to the presence of the ball. Until the demon approaches, your belief is generated by a perceptual system that safely delivers the truth about such matters, and it is an epistemically fitting response to the object you see. When the demon interferes, your continuing belief that there is a ball in front of you is no longer an epistemically fitting response to what is before you, not that you could be expected to discern this sad fact through either perception or introspection. You are now responsive to the machinations of the demon, as opposed to the ball. In a dystopian world in which such interventions were frequent, our perceptual beliefs would no longer be epistemically fitting even in the moments where we really found ourselves in front of basketballs: such judgments would no longer be safely right, or responsive to objects. Similarly, if most objects around us were suddenly covered with novel patterns designed to trick the eye into interpreting those objects as moving, then the perceptual systems we currently have would no longer support epistemically fitting beliefs about movement. In

¹ In the dystopian world, the interventions are intermittent, because I am not ruling out the idea that an agent hooked up to a completely coherent and immersive BIV world could perhaps have perceptual knowledge of the digital objects within that simulation, as in (Chalmers, 2022).

the basketball case, the demon's victims can't tell introspectively that their beliefs are no longer epistemically appropriate, or indeed how these beliefs are based; however, susceptibility to the hypothetical machinations of demons fortunately does not constitute a large curb on our epistemic powers in the actual world as we know it. The fact that our beliefs would not be responsive to objects in the intermittent demon world does not show that they fail to be responsive to objects in the actual world. So, reflection on this thought experiment doesn't amount to *learning* that our beliefs are generally unresponsive to objects; we are just imagining a counterfactual scenario in which they would be unresponsive to objects.

I wonder whether Bergmann sees perceptual belief as responsive to perceptual seemings rather than outer objects because of some temptation to understand our responsiveness in terms of what we can control, at the personal level. We have the cognitive flexibility and power to override a naïve perceptual judgment with reflective second thoughts; with effort, we can suspend judgment for a moment on the scene before our eyes and wonder whether things are as they appear. Conscious experience is available for report and reconsideration, and we can actively experiment with taking a more controlled view of the present situation. Perhaps that is not a sheep on the hill, but something that just looks like one, at least viewed from this side. Of course, here again we can wonder what constitutes a good exercise of this epistemic control. Should we stop the train and get out for a closer look? When we get really close, should we still worry that this might be a convincing animatronic replica, rather than the mammal it outwardly appeared to be? It is exhausting to keep up this game in practice, but we can pursue it for long enough to get the sense that belief formation is always subject to our agential control, simply because we can exercise this control to put involuntary beliefs into suspension, and fall back to weaker judgments about mere appearances. Epistemological reflection, in particular, can trigger efforts to seize control, if we let it put our first-order judgments into question.

And if it eventually just seems more epistemically fitting to relax and judge that one is facing a sheep as opposed to an empty basement, we can raise a further level of skeptical worries about these involuntary impressions of what is fitting, as Bergmann is very much aware. I would not dispute Bergmann's claim that we have strong epistemic intuitions favoring a non-skeptical stance here, but I wonder whether we can say something more satisfying. Sheer strength of intuition seems problematic as a basis for normative evaluation: after all, psychotic hallucinators can have extremely

strong intuitions of veridicality, and the delusional can have overpowering feelings about what is epistemically fitting. Because individual seemings can be idiosyncratic in their content and strength, the power of seemings does not seem adequate to sort justified from unjustified beliefs.

To gauge the real function of seemings, it may help to take a closer look at what is consciously available in perceptual experience. I have suggested that the real basis of perceptual belief is an interaction with the environment, supported by complex sub-personal mechanisms. But these sub-personal mechanisms deliver more than just beliefs about environmental objects. Consciousness also has a metacognitive dimension. Whether intuitive and perceptual mechanisms respond rapidly and forcefully, or slowly and weakly, their deliverances come with a consciously available feeling of fluency, enabling a report of subjective certainty (Alter & Oppenheimer, 2009). We do not simply see the basketball, we always see it with some particular level of clarity, sharply illuminated or dimly lit; we remember a trivia fact immediately and with a flood of detail, or slowly, and after some searching among other contenders. Over time, we learn the generally positive correlation between experienced fluency and truth (Christian Unkelbach, 2006; C. Unkelbach & Greifeneder, 2013); learning this metacognitive fact about ourselves enables us to exercise our cognitive flexibility better in future judgments.

One appealing way of understanding the global workspace of consciousness is to see it as a forum where deliverances from multiple cognitive sources are integrated; to support this integration, all our various representations need to have some common currency of felt confidence (Shea & Frith, 2019). This metacognitive dimension of experience has a double role. First, it guides epistemic action: when a perceptual judgment is disfluent and effortful, this is a sign that we are nearing the outer edge of a perceptual ability, and need to focus attention, step closer, engage another sensory modality, or turn up the lights. Second, metacognition must be available to conscious report because it aids information sharing between agents: when perceivers can share not just the contents of their judgments, but also their confidence levels, they systematically defer to the more confident agent in ways that optimize group accuracy (Bahrami et al., 2010). This generalizes to memory and other powers of the mind: if the answer to a pub quiz question comes to me faint and slow, and to you immediately and with a wealth of detail, your sharper fluency is generally a good sign that we should go with your answer. The sense of fluency is a byproduct of the cognitive processing an answer, inferred from cues such as speed, frequency and amount of information in the answer. We can

create metacognitive illusions, such as illusory tip-of-the-tongue states (Schwartz, 1998) by manipulating these cues, but this is not a sign that metacognitive signals generally lack value: they are a fallible guide to some features of the basing of our beliefs.

If we are challenged on a judgment, or if we stop to challenge ourselves, wondering about its epistemic status, we can focus on what is available in metacognition. But it is a form of confabulation to take our metacognitive feelings as the foundation of our first-order judgments: these feelings are rather consciously accessible byproducts of the way in which these judgments have been reached, fallible markers of their ranking in the marketplace of belief. If I wonder whether I know that there is water in the glass ahead of me, I can focus on the fluency of the relevant impression, but my original unreflective judgment that there was water there was not a response to that fluency. Au contraire: I needed to reach that judgment swiftly to produce the feeling of fluency. We have a helpfully simplified form of self-modelling in metacognition, because metacognitive signals enable us to weigh the relative likely strength of our judgments, but introspectively available appearances here are not revealing the true nature of our epistemic predicament. These appearances, however, can generate the sense that all justified human beliefs must be based on prior evidence, explaining why it is controversial that there are some beliefs which are not so based (cf. p.120).

One of the great strengths of Bergmann's book is the depth of the parallels he finds between sensory and a priori judgments. In particular, his parallel Underdetermination Arguments are beautifully crafted. In both cases, he does an excellent job of supporting the key premise (5), that "None of us is able to infer the truth of our a priori beliefs via good reasoning from the existence or occurrence of our intellectual-seemings evidence." (p.91), or in the sensory case, that no sound reasoning will get us from perceptual seemings to empirical beliefs (p.29). In both cases, however, I think the skeptic is most vulnerable to attack on the earlier premise (2), that the relevant beliefs are based on seemings, whether these are intellectual seemings or experiential ones. A full treatment of this point lies beyond the scope of this commentary, but one relevant move here has to do with the semantics of seemings. Bergmann draws a close connection between epistemically significant seemings and truth: "When we reflect on our seemings and focus on their felt veridicality—i.e. their feel of revealing or presenting the world to us as being a certain way—these seemings seem to us to be veridical." (p.136) For me, this way of putting it brings to mind an ancient debate between the Nyāya realist school and their skeptical Buddhist adversaries. Where the Buddhists argued that all

appearances were deceptive—after all, they remind us, you might mistake a post in the distance for a man—the Nyāya countered that the very notion of mistaking something for a man is dependent on having some prior awareness of men. To someone who has never seen a man, nothing can seem to be a man: seemings are parasitic on originals (Dasti, 2012). If I introspect, and discover that some moment of perceptual or intellectual cognition of mine has some resemblance to a state of mind whose character is to reveal the world as being a certain way, my capacity to sense this resemblance is dependent on my prior awareness of states really having that world-revealing character. We have a word for states of mind whose fundamental character is veridical: knowledge. I am not hostile to the idea that introspection can suggest that some internally characterized states have an interesting resemblance to knowledge, but I would venture that the sheer presence of these seemings is parasitic on an earlier grasp of the thing itself, and our original grasp of knowledge is not generated by looking within.

Here I think that Bergmann's attention to paradigmatic cases of perceptual or intellectual knowledge is very helpful: what we see there does indeed activate clearly positive epistemic intuitions. But perhaps the best way to understand these intuitions will be again to look at their typical generation in a world shared with other intelligent agents whose expertise is valuable to us, both in predicting their behavior, and in learning about reality. Starting at the age of 9-10 months, we are naturally sensitive to what other agents can and cannot see, and by two years of age, we are making heavy use of the verb to know, in conversational exchanges with caregivers (Harris, Ronfard, & Bartz, 2017). We learn to detect states of knowledge in the world in roughly the same way as we learn to detect ordinary environmental features: patterns of knowing, for creatures like us, are a relatively predictable function of our position and orientation. Crucially, we can see others as knowing truths that are not directly accessible to ourselves: the tall person knows what is on the other side of the fence, the person looking into the box knows what is inside it. The capacity to discern who knows what enables us to learn selectively from knowledgeable others: if we see who knows what, we know whom to ask (Kuzyk, Grossman, & Poulin-Dubois, 2020). At first we are able to track predictable patterns of immediate sensory access to the world; over time, we generalize to mapping epistemic territories by topic in a more abstract way (Heritage, 2012; Nagel, 2019). Our mature capacity for mindreading delivers a strong intuitive sense that an observed agent knows some fact, in a paradigm case: the audience knows that the lights have just gone out in the theatre, the speaker knows that she is standing behind a podium. This capacity can be self-directed: clearly, one knows whether one is

now wearing shoes, for example, because this is a point firmly within one's own epistemic territory. But the legitimacy of these judgments does not come from their feeling of subjective ease: it comes from their being produced by a system that is in fact appropriately sensitive to states of knowledge in the world, whether in ourselves or in others.

In closing, I want to focus on an intriguing line in Bergmann's discussion of the problem of what makes a belief fit an experience. If we despair of finding any sound argument deriving the truth of the belief from the experience, we might worry that we are unconstrained in what beliefs we may hold, so that there is no more reason to think that you are facing a beautiful lake as opposed to being in a dark basement, upon having an experience as of facing a beautiful lake. But surely, Bergmann argues, "what matters is that the belief *does* fit the experience and that it is based on it, not that the believer thinks that it fits or thinks it is based on that experience" (p.155). As a fellow noninferentialist, I am glad to agree that what matters is not whether the believer thinks that the response is fitting or appropriately based, in part because a delusional person could have idiosyncratic thoughts on this score, and in part for reasons of regress and the like, reasons well canvassed in Bergmann's earlier (2006) book on justification. I've argued that in the perceptual case, we should cut out the middleman of seemings, and say that what matters is that your state of mind fits and is based on how things are. So also in the epistemic case, I want to say, what ultimately matters is that our epistemic intuitions are actually responsive to states of knowledge in the world, not just that they seem that way to us. Once that capacity to detect knowledge is in place, we can have a derivative capacity to detect states resembling knowledge, where one important form of this resemblance is justification, a state similar to knowledge in its appearance to the subject. But just as we couldn't take anything to resemble a man without having seen men, we couldn't detect states of justification without prior awareness of states of knowledge. Perhaps something like this idea sometimes motivates Bergmann as well. In his discussion of radical skepticism, he notes that however interesting it may be to puzzle over such questions, it's quite something else "to lose your grip on things you know are true" (p.113). The primitive attraction of knowledge is hard to deny. Ultimately, when one trusts one's senses, one's memory, and one's capacity for abstract reasoning, Bergmann concludes, "these are epistemically appropriate (externally rational) epistemic intuitions to have." (p.253) My path to that idea differs somewhat from Bergmann's, but I agree whole-heartedly that it is the right place to end up.

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