

John Dewey's *Experience and Nature*

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John Dewey's *Experience and Nature* has the potential to transform several areas of philosophy. The book is lengthy and difficult, but it has great importance for a knot of issues in epistemology, metaphysics, and philosophy of mind. It bears also on metaphilosophy, devoting many pages to the discipline's characteristic pathologies, and advancing a view of what sort of guidance "naturalism" provides. Later chapters move on to discuss art, morality, and value. So this is a major statement by Dewey. It may one day transform moral philosophy as he hopes, but this review will focus on the central ideas of the first two thirds of the book. Here Dewey does succeed, I think, in motivating us to look at his core topics – experience and nature – in a new way. And though Dewey's language is often obscure and unhelpful, some of the main ideas are simpler than they look.

Earlier "pragmatist" philosophical work was novel in its focus on the relation between thought and action. This work had a broadly empiricist orientation, but discarded much of the psychological picture associated with traditional empiricism, both for philosophical reasons and because science has moved beyond it. Drawing on Alexander Bain, Charles Peirce and William James understood belief in terms of its effects on *habits of action*. This shift, they thought, should change our views of justification, truth, and other epistemological topics. John Dewey, in his training and early inclinations, comes

out of an idealist philosophical tradition, influenced by Hegel and the “St Louis Hegelians.” But in part through the influence of James’s *Principles of Psychology*, and Dewey’s time at the University of Chicago, he moved towards a more naturalistic outlook. *Experience and Nature* is a mature statement of the view that has been reached.

A simple way to relate this work to earlier pragmatist ideas is to say that if earlier pragmatism broadened the empiricist treatment of thought by attending to the links between thought and action, Dewey broadens it further, to consider two kinds of relationships between cognition and the environment of the thinker. Thought is a response to the changeable, unstable aspects of nature – what he calls its “precarious” side. This is what prompts inquiry. And while other pragmatists emphasized that beliefs are expressed in action, those actions, Dewey adds, transform the environment in which the agent lives and operates. Some actions change our relations to the environment, but not the structure of the environment itself – you can leave this room and enter another one. Other acts change the enduring physical structure of our surroundings – rather than leaving the room you can rearrange it, take it apart, or build something new. If all goes well, the actions guided by intelligence transform the factors that gave rise to the problem your environment was posing. In doing so, actions change what will be experienced at the next stages – from moments to years – in time.

That actions typically transform an agent’s environment is a familiar everyday fact, in no sense a philosophical discovery. Anyone reading these words is experiencing an environment whose physical structure has been shaped to at least some extent by human action. The common pattern is like this: experience arises from our physical commerce with the environment, thought responds to experience, thought gives rise to action, and action alters the environment that will shape the next round of experience. These facts about our continual ordinary remaking of the world are not usually seen as especially important to philosophical debates about mind, knowledge, and reality. Debates about realism often examine whether the world “exists independently” from thought. In one obvious sense, much of the world does not; people change it as a consequence of what they believe and want. In current debates about realism this is not usually seen as the issue at hand. Writers sometimes note that there is a “mundane sort of empirical dependence” of many objects on thought (Miller 2011, see also Devitt 1991),

and set it aside. Even philosophers who are receptive to “idealist” views (such as John McDowell, 1994) do not make much of it.

These facts about our effects on the world might be humdrum from a philosopher’s point of view, but in no other sense; we spend much of our lives engaged in the cycle: encountering situations in the environment, working out what is going on, working out how to act in response, and remaking our surroundings. Dewey wants to give these facts a large-scale philosophical role. He thinks there will be two kinds of payoff. First, we’ll be able to formulate a more empirically grounded view of the relations between mind and the rest of nature. Second, he sees his positive account as leading to an understanding of why philosophy so often gets so strange. This happens, Dewey thinks, through an ongoing neglect or denial of a range of everyday facts, a denial arising for recurring, diagnosable reasons. *Experience and Nature* is full of sweeping historical stories, running back and forth over the centuries. They describe how the political and economic context of philosophical work interacts with evident features of everyday experience to produce errors and distortions, especially the postulation of gulfs and gaps between things that in ordinary experience are straightforwardly related to each other. I will say more about these diagnostic stories below, but first I’ll look more closely at Dewey’s positive views and how they bear on current debates.

Dewey, as I said, thinks it is an evident fact that nature contains a combination of “precarious” and “stable” elements. The former pose problems for us in a way the latter do not. Stable factors also provide resources for dealing with the instabilities. This is the way in to Dewey’s quasi-ecological embedding of earlier pragmatist ideas. Inquiry (whether casual or systematic) is an attempt to deal with problems that stem from variable, unstable aspects of nature. Especially in some of his other work, Dewey sometimes takes a further step, probably a step too far. Not only is action a response to problems deriving from instability, but the intended effect of inquiry and action is to generate or restore a kind of stability or order in what Dewey calls the “situation.” This strongly directional view has a kind of neatness, but it is not as empirically grounded as the more basic moves Dewey makes. The ideas I see as essential here do not include this directional element, and the claim is not especially prominent in *Experience and Nature*.

What is essential to Dewey’s position is the idea that human life exhibits a

combination of receptivity and activity, taking things in and imposing structure on one's surroundings. But this combination is only present in virtue of action and its effects, as well as perception, thinking, and theorizing. It is impossible to make sense of this combination within a view that considers thought in isolation from action; any attempt to do so will inevitably lead to incoherence, or to magical thinking. And that, for Dewey, is exactly what has happened. Many philosophers have wanted to recognize and hold onto the constructive role of thought – the fact that it is not a mere bystander and recorder, the fact that it has consequences – within a truncated view of thought and its place in human life. This leads to claims that the world at large is mind-dependent in a way that does not involve the practical role of action. That is the road one part of the idealist philosophical tradition has taken. Idealists sense the wrongness of a view that sees external nature calling the shots, and mind simply as responding. They sense the wrongness of this and insist that thought is constructive, not only in its internal dynamics but in its consequences. But without the link between thought and action, there is no way for thought to actually achieve this.

The crucial point is expressed in this passage from Dewey's book:

[I]t is not thought as idealism defines thought which exercises the reconstructive function. Only action, interaction, can change or remake objects. The analogy of the skilled artist still holds. His intelligence is a factor in forming new objects which mark a fulfillment. But this is because intelligence is incarnate in overt action, using things as means to affect other things. (p. 158)

As Dewey puts it elsewhere, the attempt to hold onto the idea that thought makes a difference to the world within a truncated view of cognition results in the impossible claim that thought constructs external things, not by means of “practical overt acts having a temporal quality, but by some occult internal operation” (1929, p. 22). Dewey here is reminiscent of Karl Marx, in his *Theses on Feuerbach* (1845). Marx complained that in previous philosophy, “the active side was left to idealism.” Dewey wants to reclaim the active side, not for “materialism,” as I'll discuss below, but for a naturalistic view that treats organisms and environments in an empirical way.

For Dewey, the “realist” side of standard debates is right that the structure of the environments in which we live – a structure that does not depend on our mere thoughts or

categories – determines the consequences of action, whether we succeed or fail. The “idealist” side is right that much of what effective action does is make changes to these circumstances, altering how things are laid out and hence what experience will bring in the next time-step. Above I noted that in familiar debates about realism, a standard question is whether the world exists “independently” of what people think and say. The physical dependence of many external things on thought might be briefly noted and set aside. For Dewey, if we have a naturalistic orientation then this is a bizarre way to proceed. Independence claims run afoul of the naturalistic fact that mind is part of the world’s ongoing operation; mind is “an instrumental method of directing natural changes” (p. 160). Why would mind arise at all, if the rest of nature went on “independently” of it? God might bring mind into existence out of sheer whimsy, but evolution is not likely to do that.

This point, as I’ve described it so far, might be expressed by saying that standard expressions of *realism* are in tension with *materialism*; if mind is part of the material world, it will be embedded in the causal nexus with everything else. But Dewey does not see himself as a materialist. This is a further claim, optional with respect to the ideas above. For Dewey, “matter” is a term we use for a particular aspect of the world’s working – a regular and uniform part, one that is not homeostatic or goal-directed. “Mind” is a term for another part of the world’s workings. Between mental and physical, a third and intermediate grade of complexity is the “psycho-physical” – roughly, the biological. Walter Cannon’s term “homeostasis” (1932) is not used by Dewey in describing the first steps away from physical patterns, but this is the basic idea, though combined with an emphasis on transformation of external factors as well as adjustment of the internal. So for Dewey, there is no question of reducing mind to matter, or vice versa. He thinks the mind/body problem is the mistaken result of reifying two aspects of natural processes, treating them as substances or things: “if there were an interdict placed for a generation upon the use of mind, matter, consciousness as nouns, and we were obliged to employ adjectives and adverbs, conscious and consciously, mental and mentally, material and physically, we should find many of our problems much simplified” (p. 75 – quote marks absent in the original).

Dewey chooses the term “emergentist” for his view of the mind, though it might

be better to see this as a version of *neutral monism*, and a more genuinely “neutral” one than some other views described with that term. Nature’s activities are not grounded in the physical any more than in the mental. What we call the “physical” or “material” is part of what goes on; what we call the “mental” is another part.

These ideas also tie the doubt-thought-action aspect of the pragmatist tradition to another side, an optimistic and progressive side. In James, this theme was inchoate and cosmic – James hoped to justify the hope that the things that “throw the last stone” in the universe are the good things, rather than morally empty ones. In James this cosmic optimism was never well integrated with the treatment of belief and action. Dewey’s book does better; it is not foolish to be optimistic about our capacity to improve things, but this improvement goes by way of the contingent effects of intelligence at work in a structured, constraining world. It is a bad philosophical error to look for a pre-existing guarantee of outcomes that can only be achieved contingently and by effort. It is as much an error to use philosophical ideas to run down, or relegate to unreality, the capacity of intelligent action to make genuine improvements.

Despite all this emphasis on action, Dewey is not a *behaviorist*, or at least not in the usual sense. He does not think there is no more to an agent’s psychology than their dispositions to behave in observable ways. Dewey does hold that thought only exists in a context in which agents are engaged in symbol-using behavior, and for Dewey symbol-using behavior is social. But there is no attempt to explain away or deflate private individual subjectivity. This is because we can turn our communicative capacities within. Mind only exists in a community of language-using agents, but once it exists, it can be “privatized.” Dewey thinks that other philosophers have been rather blind to the psychological role of inner speech. Hume said that he could not find within him a unified “self,” but only a sequence of impressions and ideas (“some particular perception or other, of heat or cold, light or shade, love or hatred, pain or pleasure”). Dewey replies: “It is altogether likely that the “ideas” which Hume found in constant flux whenever he looked within himself were a succession of words silently uttered” (pp. 169-170). The private domain that is

created by turning language inwards becomes a field of spontaneous creativity, and something valuable for us in itself; the inner life is “a new, readily accessible and cheaply enjoyed esthetic field,” a domain for rehearsal and storytelling. So there is no attempt to belittle the subjective and private side of the mind, but Dewey sees the valuable features of individual subjectivity as products of social life.

Here Dewey is working alongside others in recent cognitive science who emphasize the organizing role of inner speech and the internalization of public language as a psychological tool (Dennett 1991, Carruthers 2003, Spelke 2003, Clark 2010; Lev Vygotsky, working in the Soviet Union in the 1920s and 1930s, is an important early figure in this tradition). Dewey gives less detail on the psychological side than these other writers, and within his rather brief discussions, it is surprising to me how much emphasis Dewey puts on the aesthetic role of inner story-telling, as opposed to its deliberative and experimental side. He does say that creative individual thought, the product of privatization of language, is the “counterpart” of what distinguishes modern science – “experimental, hypothetical,” embracing “individual temperament, ingenuity” – from its precursors, and this is the counterpart also of “modern politics, art, religion and industry,” where the individual again is given “room and movement.” But this talk of a “counterpart” relation is weaker than the claim Dewey might have made at this spot; he might have said that the creative subjective mind, running on internalized language, is a crucial tool by which these features of modern culture are achieved.

Rather than looking closely at the psychology, Dewey discusses how the role of communication in shaping a mere “substratum of organic psycho-physical actions” into genuine thought affects broader philosophical issues. Interaction between different kinds of work in this area might benefit all sides. Compare, for example, the arguments of Clark and Chalmers (1998) about external tools for thinking, and what they call “the extended mind.” Clark and Chalmers think that the routine use of notebooks, smartphones and the like motivates a view in which some of these devices are seen as inside, not outside, the mind itself. They accept a framework in which boundaries should exist somewhere, and their response to the cognitive role of these tools is to extend the boundaries of the mind outward. I think that Dewey sees a relocation of the boundary as the wrong response. It is central to Dewey’s outlook that the entanglement between mind

and the rest of nature brought about by communicative technologies is local and constrained, but not in a way that involves a boundary, either standard or unorthodox, between the two.

In other ways Dewey's treatment could be usefully augmented by attention to this work. Dewey's view is based on consideration of very simple communicative phenomena – speech, for the most part. Other communicative and cognitive technologies do not play much of a role in the discussion, and these should surely be part of the story. I have in mind especially the technologies of memory, and the cognitive integration of external artifacts that memory often involves (Sutton 2010). Human transformation of an environment is sometimes done for immediate purposes (heating a room) and sometimes for epistemic ones (making notes and records). The dependence of the “external” on thought, achieved via action, becomes more elaborate as technology develops, as Dewey emphasizes. One feature of this change, though, is a shift in what human control is aimed at. A huge amount of effort and energy now goes into the organization of enduring external marks that function as memory, some tightly and routinely bound to our “inner” processes, others more loosely bound.

The direction Dewey wants to take us in here is promising and the ties to cognitive science are rich, but he sometimes goes too far in his claims about the dependence of thought on communicative behavior.

It is safe to say that psychic events, such as are anything more than reactions of a creature susceptible to pain and diffuse comfort, have language for one of their conditions. (p. 169)

Here Dewey surely oversteps. A view in which non-verbal animals are restricted to mere reactions to pain and comfort is empirically unsupportable. Work on how some nonverbal animals deal with space, in particular, has shown great sophistication; there is more going on inside than Dewey allows (see Emery and Clayton 2004, Gallistel and King 2010).

Next I will spend some time looking at the historical and critical side of the book. Dewey wants to understand how philosophy winds up in the strange places it does. He does this

in part by charting its history, from ancient times onwards. The stories he tells are rich, though very abstract – “The Greeks” did this, and “medieval theology” did that. This intellectual history is told in a way that notes, with similar abstraction, changing political and economic circumstances. I find many of these stories quite convincing, but I am not a historian. Here I’ll say something about the form of Dewey’s treatment of the relations between philosophical ideas and their context.

The pathologies of philosophy as Dewey tells the story come from human responses to evident features of experience in the peculiar context of philosophical work. Some of those evident features of experience were described above: a combination of the variable and stable, with variability posing problems in a way stability does not. Philosophers sense these features of human life, as everyone does, and in their theories respond to them. At earlier times in history, when the capacity for control was very limited, much effort went into placating deities and rationalizing events. In philosophy, too, we see attempts to banish the changeable to unreality, especially in the Greek tradition. Modern times have seen an increase in real control, but philosophy has not fully caught up to this fact about our changed circumstances. Dewey sees in recent philosophy a continuation of the tradition of offering empirically unfounded insistences on stability and security.

Our magical safeguard against the uncertain character of the world is to deny the existence of chance, to mumble universal and necessary law, the ubiquity of cause and effect, the uniformity of nature, universal progress, and the inherent rationality of the universe. (p. 44)

Dewey also has an interesting account of how the extravagant details of philosophical systems arise. For Dewey, an essential element in all theoretical work is what he calls “selection” or “selective emphasis.” We ignore, or imagine away, most of what is present in a system, to concentrate on what we think is most relevant.

Selective emphasis, with accompanying omission and rejection, is the heart-beat of mental life. To object to the operation is to discard all thinking. But in ordinary matters and in scientific inquiries, we always retain the sense that the material chosen is selected for a purpose; there is no idea of denying what is left out, for what is omitted is merely that which is not relevant to the particular problem and

purpose in hand. But in philosophies, this limiting condition is often wholly ignored. (p. 25)

What Dewey calls “selective emphasis” is also discussed under the (contested) headings of *abstraction* and *idealization*, a discussion mostly taking place in the philosophy of science, not the philosophy of philosophy. Dewey thinks that philosophy has a problem with the mishandling of these operations, in part because the theoretical structures reached by means of philosophical idealization are not usually tested empirically. So philosophers throw away most of the contents of whatever they are studying (which is fine), build a theory with what remains, but then conclude that the things that were deliberately omitted do not exist at all.

Different times and different collections of workers make different choices, and these choices are influenced by what seems especially salient in a cultural setting. But philosophers tend in similar ways to obscure the nature of their choices. The result, Dewey says, is those “astounding differences in philosophic belief that startle the beginner and that become the plaything of the expert” (p. 30).

Many of the ideas I have emphasized in this review involve Dewey’s taking up a link between thought and action that is characteristic of classical pragmatist philosophy, and extending the theme. Given this, it is notable that writers working in a broadly pragmatist tradition since the 1950s have generally given less and less role to this connection; other ideas have become more prominent. In dating the change to around 1950, I have in mind especially Quine, in the closing passage of “Two Dogmas,” followed in the 1970s by Rorty, and then philosophers such as Brandom and Price. A strong recent statement of the shift that has occurred is seen in a paper by Macarthur and Price (2007); pragmatism, they say, is *linguistic priority* in philosophy without *representationalism*. Similarly, in Brandom’s “analytic pragmatism” of 2010, the central move made concerns language – he wants people to move from asking about the *meaning* of expressions to asking about their *use*. Wittgenstein is an overt inspiration for some of this shift. Another side of recent pragmatism, also influenced in some cases by Wittgenstein, is an opposition to giving

positive theories in most parts of philosophy, especially in metaphysics and epistemology. This is seen prominently in Rorty (1982), who regards pragmatism as *anti-essentialism* about just about all standard philosophical topics. Kitcher, too, distances Dewey as much as he can from epistemological and metaphysical debates (2010), doing so to prioritize moral and social philosophy. Macarthur and Price link their treatment of language to an anti-metaphysical orientation.

To note these shifts in pragmatist thinking is not to object to them. The pragmatist lineage evolves. Perhaps the new focus constitutes progress. Dewey's book, though, would return the tradition to the ideas that set it in motion, and is opposed to both currents described above. The book is steeped in metaphysics, trying to give a better account of the "generic traits of existence" than its predecessors, rather than dropping the topic. Dewey would say of "linguistic priority" that a focus on language can sometimes be helpful in dissolving problems – he often sees errors of reification, for example, as illustrated by the quote I gave about "mind" and "mental" – but Dewey is trying for an overall picture of experience, cognition, and action, and his approach to language is to integrate linguistic behavior with other aspects of human life.

Many other issues are covered in the book. Dewey claims that scientific theories are concerned with relations and patterns, not the intrinsic natures of things. Does this make Dewey a *structural realist* of some kind, like Worrall (1989) and Ladyman (2013)? Specifically, *ontic structural realism* holds that given what physical theories are telling us, we should conclude that all there is in the world, in some sense, is structure. Dewey rejects this view: "all structure is structure of something," he says. Dewey's response to a structural realist argument is to note that the features of nature that science is concerned with do not exhaust nature; science is only *interested* in patterns, but that does not mean that "qualities," for example, do not exist, or that we have no dealings with them. We have non-epistemic dealings with them; not all experience is a matter of thinking and knowing. Dewey's discussion of this topic also makes progress in another area that has been problematic for pragmatism, the relation between practical and epistemic goals. Dewey calls relations and connections "instrumental" features of nature – they are the features relevant to manipulation, prediction, and control. For Dewey, a crucial advance in the transition to modern science was to focus on these as subject-matter. That move

yielded many practical benefits. But, Dewey says, the best way to investigate these features of nature is *not* to do so with much of an eye on present practical projects. Recognizing this – fusing empirical methods with a theoretically curious, open-ended orientation – was another historical advance. Science, for Dewey, could be described as the disinterested study of instrumentality.

Truth has been a perennial topic and often a difficult one for pragmatism. Dewey keeps (almost) clear of the issue, so much so that one wonders whether he has taken on board Rorty's suggestion (1986) that the best view of truth for a pragmatist is a deflationary one, in which the word "true" is seen not a name for a real property but as a logical and conversational device. A weaker aspect of Dewey's book, though, is its handling of a representationalist view of thought and other signs, when this view is treated as a contribution to an area of central concern to him – control and the transformation of environments. Dewey rejects "correspondence," and related notions, as the basis for a theory of the relations between thought and the world. A false dichotomy in this area has undermined many discussions of pragmatism, a dichotomy between representing the world and modifying it. There is no choice to make there, because representing things as they are might be a *means* to later modifying them. Perhaps, despite appearances, that is an error; perhaps accurate representation of things is not a good route to their effective modification. If so, that needs to be worked out. Dewey, however, does not grapple with this option, and some of his discussions fall into the false dichotomy. He discusses maps; surely a good map represents the world as it is? Dewey replies that a map, too, is an instrument of transformation; once America appeared on maps viewed in Europe, its future was changed. That is true. But there is a before-and-after to consider. A good map might correspond to the terrain mapped at one time, and be used later to change that very terrain. An irony can be seen here: the error being made involves time and the relations between before-and-after, a topic Dewey handles so well elsewhere.

I mentioned another deficiency above – an overstated treatment of the role of language in thought, as seen in claims made about animals. I also noted a tendency (not as marked as in some of his other work) to generalize in overly simple ways about the causes and consequences of effective action. In this area we can distinguish an initial

Deweyan move from more contentious additional claims. The initial move is to note that the actions caused by beliefs have effects on agents' environments; any empiricist should care about these effects, because by this route action shapes later experience, and this first move can also be seen as an extension of functionalism. Dewey's further moves offer generalizations about the typical circumstances that prompt inquiry, and the typical effects of the actions that result. Is it true that in a core set of cases, or a historically important set, there is a central role for "precarious" or variable conditions as the sources of problems, and "stable" features as resources? Perhaps this is how things work (or worked) in simple cases, but with less and less uniformity as human goals become more complex and idiosyncratic. What generalizations can then be made about the effects of action, both as it bears on organism-environment relationships and on the structure of environments themselves? How do the parts of nature subject to intelligent action tend to change?

Decades will be required to digest this material. My focus here has been on the first two thirds of the book, before the fact/value gap is confronted. The treatment of value builds on these earlier chapters. It would be a distortion also to focus exclusively on the negative side of this work, the charting of past and present errors. The errors, for Dewey, are correctable errors about experience and about nature, and they arise because of comprehensible interactions between basic features of human life, changing political and technological contexts, and the way in which philosophy is done.

Dewey does not call his work here "pragmatist." He says his aim is an empirical naturalism, or naturalistic empiricism. This is indeed an important alternative to the more heavy-handed naturalism associated with Quine, and the aspiration to collapse epistemology into psychology. But though Dewey does not label this a pragmatist work, it is the culmination of much of that tradition. As I noted above, recent years have seen a number of philosophers influenced by pragmatism giving up on the attempt to use ideas from the classical pragmatists to give positive theories in epistemology and related areas, and seeing the best contributions of James and Dewey elsewhere. Dewey's book shows that the move away from positive theory was premature. *Experience and Nature* is – despite its excesses, its endless repetition, its occasional incomprehensibility – the best book written in the pragmatist lineage so far.

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