Simon Prosser. *Experiencing Time*. Oxford University Press 2016. 240 pp. \$74.00 USD (Hardcover ISBN 9780198748946).

One of the central debates in contemporary discussions of the philosophy of time is the one between the A-theory and B-theory. It has been claimed that one advantage the former theory has over the latter one is that we seem directly to experience the passing of time, either by experiencing motion, change, or causation. In his *Experiencing Time*, Simon Prosser attempts to accomplish two goals. The first is to show that it is 'quite impossible for any experience to be an experience of time passing' (x). The second is to explain how certain aspects of experience that might initially seem to refute the B-theory turn out upon examination not to do so (x). As I will explain below, even if Prosser accomplishes his second goal, he does not accomplish his first one.

In chapter one, Prosser defines the A-theory and B-theory, and distinguishes between several versions of those views. He defines the A-theory as the theory 'according to which time passes and change is dynamic' (1). He defines the B-theory as the theory according to which 'none of the apparent dynamic features of time are real' (1), where by 'dynamic feature of time,' he means 'those apparent features of time for which there is no spatial analogue' (1). One aspect of Prosser's taxonomy about which I was not entirely clear was why Presentism should count as a version of the A-theory, given his definitions. After all, if Presentism is the view that 'reality consists entirely of the present' (6), it is difficult to see how anything at all could be dynamic, given that presumably something could be dynamic in the first place only if its entire existence were not confined just to one moment—which, of course, it would be if its entire existence were confined just to the present moment. Still, this is a minor point, and nothing below will turn on it.

Having defined the A-theory and B-theory, in chapter two Prosser turns to the task of defending two arguments that purport to undermine the claim that the former theory has an advantage over the latter one in terms of our ability to experience the passing of time. He calls the first argument the detector argument. Its conclusion is that 'experience fails to favor the A-theory over the B-theory' (33). He calls the second argument the multi-detector argument. Its conclusion is that 'the passage of time cannot be experienced at all' (33). I will examine each of these arguments in turn.

The detector argument turns on the issue of whether one could create 'a physical device that could detect whether or not time was passing, and thus tell us whether or not the A-theory was true' (33). The specific proposal Prosser considers is whether one could construct a physical device with a single light on top that illuminates if and only if time is passing. He calls this light the A light. Regarding this proposal, he writes:

There is a very simple argument that shows that there can be no such device, and fortunately one need not know much about physics to understand it. The argument is as follows. The A-series and the B-series are both series of events. Moreover, each series contains the same physical events in the same order (where a 'physical event' is an event described only using the vocabulary of physics). So the debate between the A-theory and the B-theory has no bearing on the question of which physical events occur. Given the initial conditions, both theories agree that the laws of physics predict future events insofar as they are predictable at all; and where there are unpredictable, merely probabilistic processes (as there are in quantum theory) it would make no difference to the outcome whether the A-theory or B-theory were true. In that case, the A-series would contain the event of the A light illuminating if and only if the B-series also contained the event of the A light illuminating. Consequently the question of whether the A-theory or the B-theory is

correct, and hence the question of whether or not time passes, would have no bearing on whether the light would illuminate. So there could be no physical system that would detect the passage of time (34).

Unfortunately for Prosser, however, it simply is not the case that the A-series would contain the event of the A light illuminating if and only if the B-series also contained that event. On the one hand, if we constructed a physical device whose A light illuminated if and only if time passed, then if we constructed that device in a world in which the A-theory is true, then since there would be such a thing as the passing of time in that world, the series of events in that world would include the event of the A light's illuminating. But, on the other hand, if we constructed the same device in a world in which the B-theory is true, then since there would be no such thing as the passing of time in that world would not contain the event of the A light's illuminating. Of course, at this point, one might object that the device in question should be understood, not as one whose A light illuminates if and only if the passes, but rather either as one whose A light illuminates if time passes or as one whose A light illuminates only if time passes. Unfortunately, however, despite whatever merit this objection may have, it is not one open for Prosser to make; for if we understood the device in such a way, it simply would not be a device that would tell us *whether or not* time is passing.

The multi-detector argument turns on the issue of whether one could construct a physical device that could detect not only the passing of time, but also a variety of other phenomena. The specific proposal Prosser considers is whether one could construct a physical device with six lights on top such that one and only one of those lights illuminated if and only if time passes. He refers to this light as light 6. With respect to this proposal, Prosser sees two problems. The first is as follows:

It is hard to know how to make sense of the idea that the illumination of light 6 would be caused by the passage of time. How would we trace a causal chain leading from the passing of time to the illumination of light 6? More importantly, though, it is hard to see how there could be a causal relation that held between the passage of time and the illumination of light 6 that did not also hold between the passing of time and the illumination of any other light that was illuminated. (44)

The second problem is this:

In addition to the problem of explaining how the passage of time could stand in a detection relation to just one light, there is also a potential problem in explaining how light 6 could be a detector of the passage of time rather than some other phenomenon [e.g., the value of Planck's constant]. (45)

However, regarding the former problem, if time passes in a world, then if the passing of time is a spatially all-pervasive phenomenon in that world in the sense that it passes in all spatial regions of that world (perhaps doing so more slowly in some regions than in others), it seems that the proponent of the A-theory can happily concede that the passing of time will causally impact all of the lights of the device equally. And, regarding the latter problem, if it is granted that the passing of time is a spatially all-pervasive phenomenon in the sense specified, it is unclear why the proponent of the A-theory cannot also happily concede that all of the lights on the device will be equally acted upon by all other spatially all-pervasive phenomena.

Having offered the detector and multi-detector arguments, Prosser turns to the task of explaining how certain aspects of experience that might have seemed incompatible with the B-theory are compatible with that theory. In chapter three, he discusses the relation of attitudes such as belief and desire to past, present, and future times. In chapter four, he discusses our experience of duration and rates of change. In chapter five, he examines the issue of the so-called specious present, i.e., the

view that our experience itself has temporal extension. In chapter six, he attempts to explain how our experiences can seem to have a dynamic quality. Finally, in chapter seven, he explains both how we seem to experience temporal motion towards the future and away from the past, and how we seem to experience the future as approaching. Despite the fact that the detector and multi-detector arguments fail to undermine the A-theory, there are still many interesting and useful suggestions in these chapters pertaining to the issue of how to make sense of certain features of human experience in terms that are amenable to the B-theory. For this reason, I highly recommend Prosser's book to anyone working in the field.

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