Guest Editorial

Time & Experience: Twins of the Eternal Now?

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Abstract

In what follows, I suggest that, against most theories of time, there really is an actual present, a *now*, but that such an eternal moment cannot be found before or after time. It may even be semantically incoherent to say that such an eternal present *exists* since "it" is changeless and formless (presumably a dynamic chaos without location or duration) yet with creative potential. Such a field of near-infinite potential energy could have had no beginning and will have no end, yet within it stirs the desire to experience that brings forth singularities, like the one that exploded into the Big Bang (experiencing itself through relative and relational spacetime). From the perspective of the eternal now of near-infinite possibilities (if such a sentence can be semantically parsed at all), there is *only* the timeless creative present, so the Big Bang did not happen some 13 billion years ago. Inasmuch as there is neither time past nor time future nor any time at all at the null point of forever, we must understand the Big Bang (and all other events) as *taking place* right here and now. In terms of the eternal now, the beginning is happening now and we just appeared (and are *always just appearing*) to witness it. The rest is all conscious construction; time and experience are so entangled, they need each other to exist.

Keywords: eternal present, simultaneity, eternal return, quantum vacuum, Akashic Field, dynamic chaos, Big Bang, time's arrow, singularity, construction, creation.

"The sun is new each day."
(Heracleitus, frag. 6, ca. 500 BCE, in Freeman, 1948)

We dare not question the reality of time, or, to be more specific, the seemingly inescapable reality of time's arrow — since our very conscious experience is built upon chronological sequence and a narrative of "think and do". *I think this then I do that.* I am the cause of such and such particular events (unless something bad happens and I want to blame someone else). All events, it appears, have discernible causes, and cause-and-effect is essentially our lives in linear time. Time *passes*. Our stories all have beginnings, middles, and endings (if they're worth listening to); that is, they incarnate time. Our self-knowledge is built upon the stories we tell ourselves, so our self-conceptions, too, incarnate time. In fact it may be that there are no selves but selves-in-time. Strange that we so fervently embrace that which will ultimately do us in, for time's linear course means we must ultimately meet the morbid *three Ds* — decline, death, and decay — as

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our time grinds to a halt. We were created, somehow, in time (so our story begins), we live our lives through time (remembering some of the accumulating past as it recedes into the distance), and we face the sudden, inevitable halt of time (and so our story ends). Time and causation seem to precede our brief existence and will continue once that existence flickers out. Is this not the way it is?

Our lived reality (i.e., our daily experience) gives no credence to the Einsteinian block universe in which time is just another mathematical dimension without past or future, or to the Nietzschean proposal of *eternal return* that suggests all time's arrows are but short flights that return to their timeless source once their course is spent. For Einstein and Nietzsche (strange pairing as they are) there is nothing new under the sun; it follows that in time's illusion or time's cycle there is no actual present in which the creative or the new may breakthrough and change the *course of time*. Is there an actual present in the path of time's arrow, in the cycle of eternal return, or in block spacetime?

Amidst our busy mental chatter — the regrets and reminiscences of the past along with the worries and hopes of the future — we may sometimes feel a disquieting sense that something is missing in this *motion picture* in which we act. We see life flying by as though watching it from the window of a speeding train, and sometimes we may pause to wonder, "How does time flow by when I am here in the present? When did the flow of time begin? Where is it leading?" And these frivolous questions may lead us to other more dangerous (because utterly *pointless*) questions, such as, "When did the present begin and when will it end? Is there a timeless present?" Timelessness is something conscious experience abhors in the same way the universe abhors a vacuum. (Have you ever tried silent meditation?) To experience is to experience time. Perhaps experience and time are quantum entangled (or just two faces of the same mystery). Without time, change, or motion, there is nothing to experience, and I'd like to suggest that without experience, perception, or consciousness, there is no time (change or motion).

Our lived experience just takes time as a given, and we believe time is the reality within which experience takes place. Could it be our particular form of internalized symbolic culture (self-consciousness) holds us prisoners — prisoners of time — so we dwell in the past while planning the future? We lay stretched across the abyss of the actual present, fearing its unknown depths, like some victim of the Inquisition. But in this case, the inquisitors are us (despite the many traditions that promise an ecstatic or heavenly end to time). In frustration at time's inexorable progress toward seeming personal oblivion, we may find ourselves crying out like Aldous Huxley (1944), "Time must have a stop!" But to speak of timelessness after time ends or before time began is a logical error, since *before* and *after* are terms that derive meaning by *being part of time*. Timelessness cannot be found before or after time, even in the case of the Big Bang. If there is eternity, it must forever be in a postulated actual present. The same applies to a human life — my life and your life — in reality, *a timeless moment* within which consciousness constructs and remembers a past, measures motion and calls it time, and watches for the future and its inevitable corollary, the end.

What we call the present has been definitively shown by physics, biology, and phenomenology to be little more than the pendulum swinging from the past into a future we expect to be as much like the past as possible. Instead of being awake and creatively attuned, we are merely caught in time, dragging our conditioning with us as we shamble into the unknown future to reduce it to the known. Heracleitus (frag. 27, in Freeman) again: "The proverb bears witness to them: 'Present yet absent'." We experience our lived reality in an instant-playback review; *we always already live in the past but confuse it with the present*.

A distinction is often made between psychological time and physical or *real* time (and some of the essays in this issue focus on it). Phenomenology, now backed by significant research in cognitive psychology, has revealed that our conscious sense of the present is an illusion or, better, a construction. Our "present" really consists of memories (the past) being projected forward to predict and thus control the present as it gives form and sequence to an unknown future. This disjuncture between our experienced present and the possibly *real* present has been noted at least as far back as Kant, who noted we are unable to go beyond our own experience and know *the things in themselves*. William James with his specious present and others have noted this delusion brought about by *timely processing necessary for human conscious experience*, that is, self-consciousness. Only rarely can we escape the context of self through which our life experience is filtered, and it must be noted that remembering and (self) consciousness may be the same thing. It may be possible to somewhat escape the self-constructed prison of time-past through creative inspiration or spontaneous action in a crisis situation, but more on this later. At this point, I'd like to note that our various psychological *nows* need not be in sync; that is to say, there may be no simultaneity among our senses of the present (and this is also true from the perspectives of biology and physics). Though we pass each other on the street, we may be experiencing two different psychological present moments because the point where memory leads into action in "the present" will vary with individuals. Still, we would not recognize ourselves or each other without this "present" contextualized by the past. Can it be said that, psychologically speaking, the present as we experience it is nothing but reenactments on the stage of memory?

How is this possible? It seems we symbol-dependent humans have a need to re-cognize things, to identify events and objects according to the schemata of memory before we can *consciously perceive* them. It takes time for this recognition to take place, and the same processes of recognition apply to bringing to consciousness our own unconscious or semi-conscious thoughts and feelings. It does not seem likely that other animals, unencumbered by formal language, would have the same need to go through symbolic recognition to function in the world, and, so, without the baggage of symbolic memory, they may be conscious — or, more precisely, experiencing — in a different, more direct manner.

Are nonhuman animals, then, living in the present, free as they are from the human necessity of symbolically re-cognizing the events and entities we encounter before we enter the field of action? It has been suggested by many that our difference from the

other animals is that they dwell in a stimulus-response present without the need or ability to call upon memories at will or to mentally rehearse various alternatives before taking action. Oh, they may experience a kind of neural Darwinism when their instinctual responses compete for primacy, but the choice finally made is said to be determined by the wisdom inherent to their species or, possibly, learned behavioural adaptations made in response to past experience — but conscious (symbolically abstract) choice is not involved. They do not need to engage the past or imagine into the future, so they remain either switched on or switched off in the present.

However, this won't do either. Basic biology added to what we have learned from physics tells us that perceiving a stimulus and determining a response (even via instinctual competition) also takes time. Even if we assume the existence of an objective, or material mind-independent reality *out there* that is at least a close parallel to the way we perceive it (which, by the way, we have no reason to do), perceiving that world would still take time. Perceptions are still limited by such things as the speed of light or sound received by the appropriate organs or the time it takes for impulses to travel along nerves, not to mention the necessary brain processing of received data before perception is achieved. Even microscopic prehension through cellular membranes takes time. What is finally perceived, even among microbes, is already from the past.

But there is more to perception than reception of data from an external world. In the visual cycle, for example: If the retina of the eye sends its "visual data" to the thalamus (that has been likened to a relay station for sensory data), which then sends this signal to the primary visual cortex for the first stages in the experiencing of visual information, why should the primary visual cortex send a nerve pathway directly back to the same area of the thalamus from which it has just received the data? The backprojection is not insignificant: Neuroscientific findings indicate in the case of vision that there are *ten times* as many nerve fibers in the "backwards" direction as in the direction in which information is supposed to flow (Rose, 1992). This indicates the possibility that *the world seen or experienced is as much a product of whole brain projecting as it is from purely outside-in receiving*. The body itself is seen here as the primary context of experience and — through the body — the world we are "thrown into" (and create) becomes the secondary context, a construction of the culturally-framed sensorium, if you will.

As indicated above, the place of time in recent physics is tenuous indeed. Not only do Einstein's STR and GTR argue against its reality, but there is no such thing as universal simultaneity either. The present is itself relational and experienced differently by different perceivers in different locations or travelling at different velocities. There is no arrow of time and there is no present in Einstein's widely accepted relativistic physics.[1] There is a host of books out recently that discuss the true nature of physical time — including a recent article in *Scientific American* called "Is Time an Illusion?" (Callender, 2010). These books and articles based in quantum physics, string theory, multiverse speculations, etc. almost universally fail to bring in variations in perspective, that is, the

[1] See Stephen Robbins, "Special Relativity and Perception", in this issue for an opposing viewpoint.

affect on time of the perceiver and the even bigger question whether time has any reality beyond its being perceived. The point has been made often enough that we can know nothing about a presumed reality that is not experienced (i.e., that is mind-independent). As I wrote in an earlier paper, "All objective researches must deal with the epistemological problem that they are themselves products of conscious experience. To objectify a mind independent reality, then to look for mind in that mind-independent reality, is a bizarre sort of logic to say the least" (Nixon, 1997, pp. 17-18).

Today, repeated experiments at the subtle level of the quantum have shown that perception (measurement, experience, consciousness, will, or *what have you*) is a necessary player in the construction of the reality we know that consists of energy-bound particles and objects, as well as events within the arrow of time. As back-up, I will only quote one of the more conservative founders of quantum theory, Max Planck (1931): "I regard consciousness as fundamental. I regard matter as derivative from consciousness. We cannot get behind consciousness. Everything that we talk about, everything that we regard as existing, postulates consciousness." Planck refers to reality, both as we know it and at the cosmic and quantum levels. Is there consciousness in the postulated timeless present? Needless to say, an eternal present whose physical existence is in question will not be detectable by the empirical methods of science (even at the quantum level), yet it is there — or, rather here (and now).

I'm no expert in quantum physics (few really are), but it's my understanding that observation, or measurement (which must itself be observed to have any meaning), is said to collapse the (pilot) wave of all possibilities, i.e., the quantum wave superposition, into a specific time and form, so momentum and position can be simultaneously measured. What exists before this collapse of the superposition (and continues to exist, unseen, after it)? I suggest it is the eternal present, which can be said to *actually exist* only as potential. The actual or eternal present is formless and timeless. Like the quantum wave superposition or the quantum field state vector, the dynamic present is a chaos of possibilities, none of which will be *realized* (literally) until experience (observation, measurement, perception, expectation, conjuration!) draws the field of near infinite possibilities into a form (space) and motion (time) that we can live with.

What is this *now* field of chaotic potential energy like? Well, it makes no more sense to ask that than to ask *where is it?* or *when is it?* Any such description defeats language, for language is a construction that depends on time, even creates time. All we can use are spatial metaphors, which are, by their very nature, misleading. This field may not exist in any usual sense since, as noted, it has none of the qualities of existence, including location, duration, or experience (which in the strict sense is always relational). It is everywhere and everywhen and, most of all, active right here and now (and right here and now is forever). I have suggested it is awareness-in-itself, that is, awareness without any sort of object of awareness and without any sort of *other* to reflect its awareness back upon itself. Irvin Laszlo (2004) has called this actual present the Akashic Field (or A-Field), but he prefers to see it as an information field that contains the memory of everything that has ever happened and thus strongly influences all that will happen.

However, he sees his A-Field as emerging from the quantum vacuum — as close to nothing as we can get in this universe. Yet it may well be that *there is no nothing*, or not exactly, since this quantum vacuum is precisely what I am calling the eternal or actual present that pre-exists any and all Big Bangs and continues to be the secret background within every moment of time. Language contorts, but how can this absolute vacuum be the creative source of all that we know as something or even as everything?

Negative conceptions provide a way to indicate potential existence by pointing to what is not. In created spacetime (and likely well "before" it), where indeed can the true void — absolute nothingness or vacuum — be found? Peat (2000) reveals that our conceptual "nothing" is not quite what it linguistically implies, explaining recently discovered dark or *vacuum energy*: "The vacuum state is the void. It is pure silence. But it is also a bubbling sea in which elementary particles are constantly dancing in and out of existence" (p. 94). Even more unsettling, the potential energy in this void is as unlimited as creativity itself: "It turns out that the energy within one cubic centimeter of the vacuum state would vastly exceed the energy content of our entire universe. … So this void, this nothingness, this cosmic silence, is pure potential" (p. 96). Could it be the ultimate "source" of the creative principle within everything is *nothing* — that is, the infinite potential energy of the void?

Beyond the limitations of science, we may turn to philosophy and literature for metaphoric conceptions of the unknowable eternal now. Nature at its core is, as physics teaches us, ceaseless dynamism, even if it takes an experiencer to give this dynamism form and process. I'm with Heracleitus that such timeless/formless dynamism is the first and fundamental principle of all that is: "The ordered universe (*kosmos*), which is the same for all, was not created by any one of the gods or of mankind, but was ever and is and shall be ever-living Fire, kindled in measure and quenched in measure" (Frag. 30, in Freeman, p. 26). This living fire was sometimes called by Heracleitus "change" and at other times "strife," but as that which brings the new, it is always creative. Even Parmenides, the contemporary of Heracleitus whose ideas are often put in opposition to his philosophy of change, may be interpreted as referring to the eternal present as Being (even though I suggest it is only potential being):

> Being has no coming-into-being and no destruction. … And it never Was, nor Will BE, because it Is now, a Whole all together, One continuous. … Nor shall I allow you to speak or think of it as springing from Not-Being; for it is neither expressible nor thinkable what What-Is-Not Is." (in Freeman, p. 43)

I think it's likely that we have an irrational intuition of an actual present that we can never quite reach. It is this intuition of dynamic stillness that may be sought by dedicated meditators, but methinks we come closest to it in moments when we are seized by the "divine frenzy" of creative inspiration or perhaps when we act before becoming conscious of our acting during intense moments of crisis. It may be that the divine fire of dynamic creativity is the very nature of the actual present, and the creative decisions we

make as individuals or as cultures or as global participants bring us close to the divine fire and determine what reality will be, at least *for the time being*.

T. S. Eliot captured both the stillness and the dynamism within it in these famous lines:

> *At the still point of the turning world. Neither flesh nor fleshless;*
> *Neither from nor towards; at the still point, there the dance is,*
> *But neither arrest nor movement. And do not call it fixity,*
> *Where past and future are gathered. Neither movement from nor towards,*
> *Neither ascent nor decline. Except for the point, the still point,*
> *There would be no dance, and there is only the dance.*
> (1944, pp. 15-16)

And who could say it better?

The only question left for this little editorial excursus is how could time, space, and experience emerge from the seeming nothingness of the everpresent quantum vacuum? I do not have the hubris to presume to know the answer, but I can suggest that, in the same way the quantum superposition is observed (or experienced) causing the "wave collapse" into classical space, time, and motion, it may be that the eternal field of the creative actual present had to be observed or experienced for its energies to focus into form, motion, and time (which, again, it is doing right this second). I'm not going to suggest some sort of deity acting as an outside observer, but I might go so far as to compare the beginnings of language and selfhood with this primal emergence.

Human language structures (or indeed nonhuman signaling) would serve no purpose if only one creature invented and employed them. Language and communicative signaling are group phenomena that can only be active when members of a group comprehend the signals. Within that group, at some point in time, at least two of its members needed to work out meanings of words and phrases in a way that could be understood by both, yet different identities had to be recognized for interlocution to take place. The same applies to self-identity. We somehow objectify our own embodied experience in the context of cultural intersubjectivity and subsequently conceive of ourselves as inner entities we each call "I" (like other selves). It seems the creative chaos of the eternal present needed to conceive a being — perhaps a form, perhaps a motion — from within itself that could then relationally reflect its own quasi-existence back upon itself.

In the case of the eternal awareness-without-experience of the absolute present giving birth to form, time, and experience — that is, the universe as we know it (perhaps new each second) — I might suggest that some sort of desire or yearning to become aware of itself arose in the dynamic eternal present. Don't ask me why or how. Systems have been demonstrated to be creatively autopoietic (e.g., Maturana & Varela, 1987), and, though the creative chaos of the quantum vacuum may not be a system, systems have been shown to emerge from chaos (cf. Prigogine & Stengers, 1984). Like in many myths of creation (see Long, 1963), the primal unity calls forth an *other* who, though forged

from its own uncertain dynamics, could perceive and relate to its source, even as the eternally present source could also become aware of itself through the perspective of its *other*. With this, One has become two. The two relate and experience in its most rudimentary form begins, and since "begins" is only possible in time, we can see that time enters reality the very moment that relational experience does — so, in a sense, they are two faces of one mystery, and that mystery is creation.

All the articles and essays in this issue delve into many of these same issues. Does time flow or is it sliced into disconnected moments? Is time real or is it a phenomenological fabrication in a timeless universe? Instead of me outlining the contents of each, I suggest you read the abstracts of the articles to choose which ones you would most like to read. The style and content of each epaper vary significantly, but I can promise that each one is worth *making time for*. I invite readers to email in their comments on anything they've read to the editor-in-chief of JCER, Huping Hu, at editor@jcer.com.

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