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Transcendental Unification of Temporal Consciousness

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I. INTRODUCTION

In this paper I will investigate the constitution of temporality as it is apprehended by one's mind. The way in which everyday experience is had appears inherently embedded within time. Within our conscious reality, we have a multitude of temporally distinct experiences of which time seemingly flows between. How is it though that temporality is constituted in such a way that we have this sensation of time flowing between experiences?

It must first be established that we have temporally distinct experiences if we are to understand how it is that time can seem to flow from an experience of A to an experience of B. If the experiences are not temporally distinct, then the passage of time has nothing to flow between. The same way a river cannot flow without a source point and a mouth to mark its end. That there is in fact an experience of A and a distinct experience of B for which time can flow between must then be established. How, then, are experiences distinct from one another? Could it be said that the experience you are having now reading this paper and the experience of your fifth birthday are wholly distinct experiences? Simply from the sensory impressions illuminating the paper in front of you and the room around you, it can be seen that this current moment in time is not your fifth birthday. The years that have passed between these two moments can also provide us an objective mental framework to establish that these moments are distinct and separated by an interval of time.

Is it just the fact that years lie between these instances that allows them to be identified as distinct moments in time? Will other objective temporal identifiers separate moments in a way that can also be labeled temporally distinct? What if we shorten the interval of time between them from years to days, minutes or even seconds? What about waking up this morning and then

drinking a cup of coffee? There was a moment you woke up this morning and a moment you drank your coffee that appear to be two distinct experiences. These experiences were separated by a shorter interval of time than years, be it hours, or minutes, yet the experiences were still distinct moments in time. What if we shorten the interval even further because too much time passed between waking up and drinking the coffee as there were a number of momentary experiences in between the two? What about looking at the ceiling when you woke up to then looking at your phone? An array of visual sensory impressions flooded your brain as you moved between the two even though only fractional seconds passed. At which moment are the two experiences then distinct? It seems that no matter how small an objective interval of time we try to identify, there is always the passing of one momentary state of sense impressions to the next, which constitute the temporally distinct moments of our experience.

Lived experience does not, however, occur to us in fragments of moment to moment, but rather has the sense of flowing through our objective framework of time from second to second, and year to year. The moments of our experience are unified in a way that experienced reality appears embedded with temporal flow between these moments. Similar to the flowing river, whose concept is rendered intelligible by the unification of its parts. The source, the mouth, and the flow between them only form the concept of a river upon their unification into a single mental construct of river. Our construct of time is rendered intelligible in this same way, upon the unification of the moments of lived experience into our stream of consciousness.

This stream of consciousness is composed of the individual moments of our lived experience that are unified in a way that brings about a sense of flow through our objective framework of time. How then is it that our individual moments of experience are temporally unified in this way to form our stream of consciousness?

The history of philosophy has left us with a number of probable theses for just how this unification is possible. Of these theses, we will explore four that we believe to be the most probable in reconciling the problem at hand. The first of these four theses is the *Cinematic Thesis*, which states that individual moments flow one after the other in a succession . The second, is the *Extensional Thesis*, which posits that our experience itself is temporally extended. The third, is the *Retentional Thesis*, that states retentions of the recent past play a key role in temporal flow. Finally, the fourth is the thesis *Temporality Is a Performance of the Transcendental Ego*. Which will ultimately lead to the conclusion that the transcendental ego is the most probable of the theses for temporally unifying momentary states in forming our stream of consciousness.

II. CINEMATIC THESIS

We turn now to the first proposed thesis, that individual moments of experience flow one after another in a succession in order to form our stream of consciousness. This thesis posits that the present moment is not composed of a duration to account for our temporal flow but is confined to instantaneous sense impressions. These duration-less present states flow one after the other in a continuous succession to form the temporal flow of our stream of consciousness. This is known as the Cinematic Model of time consciousness and is first attributed to St. Augustine. To illustrate the way in which our experience of time's flow is created in this model, think of an old-time film projector. Static images are fed through the projector one at a time and the slight change in position from image to image creates, in our mind, the illusion of movement. Although the images themselves are static snapshots, when they are played one after the other at a fast enough rate they appear as if they are moving.

Experienced time is theorized to flow in the same way as the film playing through the projector in the cinematic model. It flows from static snapshot of sense impressions to static snapshot, one after the other in a continuous succession. These static snapshots of sense impressions, according to Augustine, are the present moment. “If an instant of time be conceived, which cannot be divided into the smallest particles of moments, that alone is it, which may be called present.... The present hath no space.” (Confessions, Book XI). The instantaneous reality given to us through our senses is the present moment and each moment conceived is a new present, such that all we ever perceive is a continuous stream of present moments.

There are a number of objections that must be handled before this thesis can be labeled as our unifier of momentary temporal states into a stream of consciousness. The first of these objections is that in this conception of time consciousness, reality is confined to the present moment. How is it said that anything can be experienced other than what is present to your senses? Does temporal depth not require some sort of extension beyond the present moment? By temporal depth we mean the three conceptions of time of which temporality is constituted: the past, the present, and the future. If reality is confined to the present moment, what happens to the past and the future? It is Augustine who raises this issue. “What now is clear, and plain is, that neither things to come nor past are. Nor is it properly said, there be three times, past, present and to come.” (Confessions, Book XI). According to him, the past cannot exist except in memory, as we measure time as it passes, and once it has happened, it is no more. “But time present how do we measure, seeing it hath no space? It is measured while passing, but when it shall have passed it is not measured; for there will be nothing to be measured.” (Confessions, Book XI). He is essentially stating that once it is no longer present to your senses, it is no longer experienced, and if it is not experienced, it cannot be measured. If it cannot be experienced or measured, then how

can the past exist? Surely, we can say that the moment just passed was as real as the one to come, though not a part of present experience. Though, if time is measured when it is passing, that is, when it is present, then how is the past identified? Without the temporal depth of what is past and what is to come, reality is trapped in the present moment. If reality does not extend beyond the instantaneous present, then it is lacking the temporal depth which is inherent in our experience. Thus, to temporally unify a stream of present moments into experience reality must extend beyond the instantaneous present.

A second objection can be made to this cinematic conception of time consciousness around the concept that an occurrence of a succession of present moments does not account for how we would have an experience of this succession. Even if we can identify that reality is constituted of a string of present moments, how is it these moments are connected to one another in order for us to have an experience of them? For there must be something connecting these individual moments with one another. If there is not, then there would be a gap of empty time in our conscious between one moment and the next, and there can be no such thing as empty time. There can be moments where it seems like time is not passing due to a lack of stimulus, but even in the dullest moments staring at one's wall, time is not empty. There are still the impressions illuminating your experience of doing nothing, and thus time is not empty. According to William James, change is necessary to apprehend time, and so for time to pass it cannot be empty.

“Awareness of change is thus the condition on which our perception of times flow depends, but there exists no reason to suppose the empty time's own changes are sufficient for the awareness of change to be aroused.” (Principles of Psychology, Pg. 584). In other words, if time were empty, the awareness of change would not come to be and thus time would stand still. Time then

cannot be empty, and so there must be something connecting our individual momentary presents in order for us to have a gap free experience of the succession of these moments.

Bertrand Russell proposes a solution to this problem in his formulation of what is now known as the Overlap Model. “It may happen that A and B form part of one sensation, and likewise B and C, but when C is an object of sensation, A is an object of memory. Thus, the relation belonging to the same present is not transitive and two presents may overlap without coinciding.” (On The Experience of Time, Pg. 214). In this model the experiential connection we have between present moments are themselves individual experiences which overlap by sharing common parts. Your experiences are tied together by containing bits and pieces of the prior experience just had. Look to your right and scan the room moving your eyes to the left. The right corner of the room and the left appeared to your consciousness in different moments as your eyes moved across the room, but your experience of each was connected by the bits of the room that appeared as your eyes moved from right to left. Each new impression contained a bit of the previous as more of the room became revealed to you until your visual field occupied the entire room. At first glance this appears to work, it eliminates the gaps between experiences and explains how the succession of experiences creates the experience of succession. It does this by collapsing the gaps between momentary states of experience into each other by overlapping common parts so that there is no empty time between them. However, this can only be a plausible explanation if the present moment occupies a duration. If the present is instantaneous, as is posed in the cinematic conception, then in order for two impressions to be experienced as a succession, part of one impression has to be experienced as part of the other. Part of it would have to occupy two moments in time, the moment of now and the moment just passed. If the present had duration, then the extended experiences could share miniscule parts which connect

them without having to have an impression occupy two moments in time. As discussed above, we know the extensional present has inherent problems of its own, so as it pertains to the cinematic model, it cannot be said that two impressions overlap and thus occupy two moments in time. We are then still left with the problem of how instantaneous impressions can be connected in a gap free way to create our stream of consciousness. We have thus arrived back at the original problem of how momentary states can be temporally unified to form our stream of consciousness.

III. EXTENSIONAL THESIS

We turn next to the thesis that experience itself is temporally extended. What is meant here is that the momentary states we experience are not confined to the immediate sensory impressions at the smallest identifiable interval of time, but rather our experiences extend over a temporal interval. On this view, the present is not a duration-less intermediary between the past and the future but has, in itself, a duration. That is to say that the present moment encompasses the multitude of sensory impressions across an objective interval of time and these impressions are apprehended as one experience. According to this theory, drinking your coffee is not an experience of moving your hand, then an experience of grasping the cup, then an experience of taking a sip. These are apprehended together as a singular present moment. Momentary experiences are thus constituted by the duration of the present. This extension of present experience is known as the Extensional Model of time consciousness and is attributed to L.W. Stern.

According to Stern, “Mental events that play themselves out within a stretch of time can under circumstances form a unified and complex act of consciousness regardless of the non-

simultaneity of individual parts.” (Stern, Pg. 215). What Stern is saying here is that while the individual components that make up experience don’t all appear to us simultaneously, they are unified into an intelligible experience through a mental act of apprehension. For Stern, this act of apprehension is extended over a duration of time in order to unify the perceived phenomena that appear to us successively into an experience of the present moment. This present moment is not just the instantaneous sense impressions presented to you but occupies a duration of time in which the successive impressions are apprehended into one experience. This act of apprehension gives rise to temporally extended experience. An experience of a melody serves as a good example for this. A melody is composed of individual notes that are played in succession of one another. According to the extensional model, you have an experience of the melody as a whole and not individual experiences of each individual note. The mental act of apprehension is temporally extended to compose the notes into an experience of the melody, even though the notes did not occur simultaneously. The notes are unified through a mental act of apprehension to form our experience of the melody. A key distinction of the extensional model is that contents presented to your consciousness do not have to occur simultaneously to be apprehended as an individual experience. The individual experiences you have are, quite literally, temporally extended. The duration of the “present moment” is thus composed of the succession of phenomena that are apprehended into a unified experience.

How then are we to account for change within experience? If the duration of the present moment is composed of the succession of phenomena, then change and succession must be a direct element of this experience. According to Barry Dainton, “change, succession and persistence can feature in our experience with the same vivid immediacy as colour or sound or any other phenomenal feature.” (Dainton, *Temporal Consciousness*, Sec. 3). This is known as the

Immediacy Thesis and is a helpful corollary in understanding the extensional model. Although the apprehension of the succession of phenomena is what creates the temporal extension, the contents of experience are rarely static repetitions of the same sense impressions. The phenomena of an extended experience are not only successive, but changing and persistent through an experience. Think here of motion. You watch a sprinter in a race, their spatial location has moved from A to B over the course of just seconds. You are no longer perceiving a runner at the starting line but the spatial dislocation of the person throughout the temporal extension of your experience of the race. The phenomena of the sprinter persisted through the experience, even though the spatial location changed. What you perceived was a succession of motions of a persistent object of experience throughout the temporal duration of your experience of the race. If change, succession, and persistence were not as immediate as the phenomena themselves, then you would not have a temporally extended experience but a string of individual sense impressions with impossibly small temporal intervals. If individual momentary states are to be unified in a temporally extended way to form our streams of consciousness, then change, succession, and persistence must be as immediately perceptible as the objects of experience themselves.

In order for this thesis to serve as our unifier of momentary states into a stream of consciousness, it must first overcome a few rather lofty objections. The first is, how is it possible for the contents of an experience to be said to be occurring successively and not simultaneously? Barry Dainton refers to this as the Extensional Simultaneity Problem. “How is it possible for contents which are (i) experienced together and (ii) experienced as present, to be experienced as anything other than simultaneous?” (Dainton, *Temporal Consciousness*, Sec. 3). If our temporal extension is the duration of the present moment, then how can the present moment be anything

other than what is simultaneously present to one's sensory modalities? A string of successive phenomena cannot constitute the present moment because they are appearing to one's mind successively and thus, seem to constitute a new instantaneous present at each sequential succession. If the present is truly to occupy only one momentary experience, then it must be that what is present is only what is simultaneously presented to the senses. If that is the case, then the experience of the melody discussed above is not temporally extended but a string of continuous successive present moments. If we allow for the apprehension of the contents of experience to extend over a duration and thus unify successive sense impressions into one experience, the impressions would be said to be occurring simultaneously in one moment, but it was just established that they are not. If we allow this apprehension of contents to extend over a string of impressions where then is the line drawn between what is one experience and what is the next? Is waking up and drinking coffee one experience? There was seemingly no interruption of consciousness between the two so, where does the experience of the coffee end and the next experience begin? Is then the line between distinct experiences the conscious awareness of them?. So, sleep is what separates moments of experience? That would mean that an entire day constituted one experience; your coffee in the morning and tv at night were one experience? Surely this is not the case, as those are clearly different experiences. If there is no identifier of when one experience becomes the next, are then all contents of experience occurring simultaneously? It is evident that this moment reading this paper and your fifth birthday are not occurring simultaneously. That is contrary to the way one experiences the world, so it cannot be said that the contents of experience are said to be occurring simultaneously together. Reality then appears trapped, confined to the present instantaneous moment of sense impressions. Leaving us with the problem that our momentary experiences are not occurring simultaneously but in

successive strings. We then arrive back at the problem of how these successive present moments become unified to form our conscious stream of experience.

A second objection can be made around the concept of change occurring in the present moment. The extensional theorist posits that change is immediately perceptible in a temporally experienced moment. Yet, is it not an inherent characteristic of change that it is not temporally static, but requires the sequentiality of moments bearing their perceptual differences? Think back to the runner in the race. Is it possible for the spatial dislocation of the runner to occur within one individual moment? If it were the same moment of experience, would the runner not be standing still or statically frozen in the present moment of time? The movement between spatial locations inherently requires the being at one spatial location at one moment and at another in the next. Which requires a duration of time to have elapsed. This seems clear as if no duration of time elapsed and movement occurred, the object would be said to be occupying two separate spatial locations at once, which we know is not possible. “If change and persistence are directly experienced, the phenomenal present cannot be strictly instantaneous, it must in some manner have duration.” (Dainton, P1). Change thus requires duration, yet as we established above, duration of the present moment runs us into the problems of extensional simultaneity and of succession. These objections leave the extensional theorist with more questions than answers when it comes to temporally unifying momentary states in the formation of our streams of consciousness.

IV. RETENTIONAL THESIS

We turn now to our third thesis, which postulates that retentions of the recent past are what unify momentary states of experience to form our stream of consciousness. This means that the experiential connections between individual sense impressions are retentions of the most recent primal sense impressions. Consciousness is thus composed of the primal now, a retention of the recent now, and an anticipation of the future now. This is known as the retentional model of time consciousness, of which Edmund Husserl offers us a conception. For purposes of this paper, we will focus on the conception of retentional time consciousness proposed by Husserl.

Husserl's conception of time's flow has the tripartite composition of primal impressions, retentions and protentions. Primal impressions being the source points of experience. Husserl refers to them as "the actual now, constantly changing into something that has been." (PITC, Pg. 109). Once something has passed from now, into something that has been it is what Husserl refers to as a retention. This is not to be confused with memory. Memory is an experience stored in the mind that can be brought forth into one's attention after having passed. A retention, however, has the immediate duration of a primal impression and is what follows the most recent primary impression. An impression is taken into the mind and immediately passes into a retention. It is this fading away in a continual transition of impression, into retention and the continuum of retention to retention which creates the flow of our stream of consciousness. The third component, protentions are the anticipation of the future, the pushing forward of the present now into a new now. For Husserl, "every new now is the content of a new primal impression," (PITC, Pg. 92). Now is thus constituted of an immediate primary impression which is in a constant state of pushing forward to from a new primary impression at every instant. Once the

impression is taken in, it immediately fades into retention, and from retention to retention on and on as our conscious stream flows.

Think back to the example of the visual field experienced when scanning a room from one corner to the next from the previous section. As your eyes scan the room from right to left, the initial impression of one corner does not just fade away into blackness as you move into the next impression. Instead, what happens is the initial impression hangs around as the next impression is taken in and now what you see is not one section of the room and total blackness but the entire room that occupies your visual field. The melody we learned about earlier can serve as a good example as well. It is actually the example Husserl uses to illustrate this model. The initial sensation of a note is heard, and then fades to the back as the next sensation of a different note is heard, this continues on until the notes cease and no more impressions are taken in. The tones heard do not cease between each note but are heard alongside one another as a melody.

This retentive conception can help us solve one of the problems we ran into with the extensional model. That problem is the problem of simultaneity. This was the problem that arose when the present is taken to have a duration, and the impressions which constitute that duration that occurred successively are experienced simultaneously. Since the present in this retentive conception is constituted only of an initial sense impression, which immediately fades back into retention and pushes forward to the next immediate impression, it does not occupy a duration, it is instantaneous. Thus, the impressions which constitute experience in this model are not experienced simultaneously, but in a succession of duration-less present moments.

Although the issue of simultaneity is behind us with this conception, there are a number of other objections that must be worked through before this thesis can be labeled as our temporal

unifier of momentary states of experience into our stream of consciousness. The first being that if our primal impressions fade immediately into a retention, would we then be having a direct experience of the past? Think back to the melody, which was experienced note by note as a melody through the pressing forward of primary impressions and the hanging on of retentions of those impressions of the notes, which formed the experience of the melody. According to Husserl, the melody is experienced as present as long as the tones are sounding. "Thus, the whole melody appears as present, so long as it still sounds. So long as the notes belonging to it, intended in the one nexus of apprehensions still sound." (PITC, Pg. 115). The persistence of the tone from one impression to the next gives it duration. The initial impression is then experienced along with the next one. In that way we are perceiving an impression that just passed out of the present. Husserl acknowledges this objection and states that "temporal objects are constituted only in acts which constitute temporal distinctness." (PITC, Pg. 115). What he means here is that the apprehension of the impression and retention of the object which persists through time constitute its temporal distinctness. Inherent in the act of apprehension of perceiving the object is the temporal distinctness of the object. By temporal distinctness here we mean different identifiable intervals of time. We are thus not perceiving the object as past through retentions but apprehend that the object is persistent through a multiplicity of distinct temporal intervals and occupies a temporal duration. Essentially saying that because the object is persistent through time, we do not experience it as past. If, however, the present fades immediately into retention, then our construction of temporal flow from impression to the continuity of retentions necessarily requires us to have an experience of impressions that are just past. Experience is constituted of the now along with past impression and so we are perceiving the past along with

the present. Thus, if we are to accept this tripartite construction of temporal flow, we must accept that we directly perceive the past.

A second objection to this thesis is made around the concept of the distinctness of experiences. It is that a continuum of primal impression to retention to further retention does not allow for the temporal distinctness of individual experiences. When time flows this way, it does seem to flow in a gapless succession from impression to impression, but the retention of each primary impression accompanying the present connects the moments of experience in a way that does not allow for distinct experiences. It does this as it collapses multiple experiences into one by connecting them through shared parts. Where is the line drawn between one experience and the next? Think back to the prior example of waking up and looking at your phone, to drinking your coffee, to watching tv at night. These are all distinct experiences that can be clearly said to not be occurring at the same time. As the prior impression always accompanies the coming one and so on ad infinitum, experience is connected in a way that seemingly makes one moment indistinguishable from the prior as the recent now is intractably connected to the now before that and the now before that. In other words, the succession of instantaneous presents, accompanied by the most recently present retention, ties together impressions so that experience is connected and gapless but leaves us without a distinguishable line between experiences. If it is to be said that our experiences can be temporally distinct, then blending them together does not seem a plausible unifier of the momentary states of our experience. We are then still left with the question of how momentary states of experience can be temporally unified.

V. METHODOLOGICAL PROBLEM

The theories discussed thus far all appear to fall short of answering the question at hand. Within each theory, we ran into either the problem of succession or the problem of simultaneity. This seems to be due to an inherent methodological issue within each of these theoretical approaches to temporal consciousness. This issue being that each theory attempts to temporally unify momentary states of experience from within the experience itself. This is an *a posteriori* approach. The *a posteriori* is that which is known to us through experience. That is to say, each theory is looking to find the unity of experience through an experience of this unity and thus runs into this endless chase of succession on one hand and simultaneity on the other. It seems improbable that we can explain the constitution of experience from within that experience.

It seems that the human experience has a temporal constitution, and that time is a necessary component of conscious experience. If this is the case, and time is necessary for experience, then we cannot possibly understand the constitution of time's unity from an awareness constructed of that very unity. To illustrate this, think of an animal such as a bear. The bear is certainly not aware that time is passing, but does that mean that the bear's experience in this world is timeless? No, the bear experiences time's flow even though it is not aware of it. Awareness of time's flow is then not necessary to have an experience of temporality. If our experience of time is not known through an awareness of our experience, that is *a posteriori*, then we must look to the constitution of what makes this experience possible. We must look to a theory of something *a priori* if we are to find an answer to the problem at hand. To say that something is *a priori*, is to say that it is not known to us through experience, but rather through the understanding. We will then turn our investigation into the unity of temporal states to an *a priori* theory of temporal consciousness.

VI. TEMPORALITY AS A PERFORMANCE OF THE TRANSCENDENTAL EGO

It is here that we will turn to our fourth theory of temporal consciousness. This theory postulates that temporality is a performance of the transcendental ego. It is this transcendental ego which temporally unifies momentary states to form our stream of consciousness. This theory relies heavily on the works of Immanuel Kant and Edmund Husserl.

To fully digest what is meant by this, we must first attend to a number of things: we must know what is meant by transcendental, and what is meant by the “ego.” We can then look to how it is that temporality is a performance of this transcendental ego, and how the transcendental ego temporally unifies momentary states across our stream of consciousness. Once this is established, we will see how this theory holds up against the issues which arose from the previous theories of temporal consciousness.

We look first to what is meant by transcendental. The transcendental is postulated by Immanuel Kant and is a conception of the pre-conditions of our experience which make our conscious reality possible. Thus, for an object to be said to be transcendental, is for it to not be an object of our experience but that which renders experience possible. A relative understanding of what is empirical is helpful in the understanding of the transcendental of Kant. For something to be empirical, it must be known through any of the sensory modalities, it must be experienced. Therefore, as the receiver of sensory stimuli the perceptual faculty is a necessary pre-condition for empirical knowledge. The transcendental, however, is concerned, with how this empirical knowledge is possible. “All knowledge which is occupied not so much with objects as with the mode of our knowledge of objects in so far as this mode of knowledge is to be possible a priori” (Critique of Pure Reason, B25). For Kant, the transcendental is that which is a pre-condition of

experience and is not known to us empirically but rather what makes our empirical knowledge possible. This delineation between transcendental and empirical is integral in Kant's project and will be key in our understanding of temporal consciousness.

With an understanding of the transcendental, we now look towards what is meant by the "ego". The ego is the common subject of your experiences, it is the you that experience is happening to and for. The experience of your fifth birthday and your experience of reading this paper, while temporally distinct, share the commonality of a persistent subject appearing in both experiences. The ego is the referent of the "I" in these experiences. The persistent self-consciousness that is subject across the multitude of experiences which encompass your lifetime. There is a self-conscious you, which is attributing your fifth birthday and now to the same self-consciousness as subject. This act of attributing experiences to a single consciousness is what Kant calls Apperception. It is through this apperceptive act that we attribute mental states to a self that is distinct from any representation. Representation being the product of the synthesis of sensory impressions. The impressions are synthesized into a representation of the object of experience from which the impression was derived. Thus, for all possible representation to be unified into an experience, there must be a persisting self-consciousness self to synthesize the sensory impressions into an experience.

There is an important distinction to make between the transcendental and the empirical in this concept of an ego. The transcendental ego is the substratum of all experience. It is the origin of all synthesis which renders what would otherwise be an indeterminate array of empirical impressions into intelligible concepts of the objects of experience. As the necessary precondition to all subjective experience, it is the objective grounding of all knowledge. However, the transcendental ego is not something that you can have direct knowledge of as it is the pre-

condition to all of your knowledge. The you that you know, the persistent self-consciousness which you identify as yourself, is the empirical ego. According to Kant, “consciousness in inner sense is only of how one appears to oneself, not as one is.” (Critique of Pure Reason, B153). This sense of you-ness, that when asked to tell another who you are, you describe who you are with characteristics derived outside of yourself. That is to say, you are tall, someone who likes books, honest, etc. All of these things which we commonly identify ourselves with lie outside of ourselves and are thus purely subjective constructs. This is the object of you that you experience as the observer of your own reality, arisen out of the subjective constructs of reality. The empirical ego is thus only a subjectively valid construct. It is the mental representation of you that you have derived from the world around you. This is how you appear to yourself as an object of your own self-consciousness, not how you really are. This is contrary to the transcendental ego which is the you that underlies your reality generated through an a priori synthesis, not the contents of experience. Both of these conceptions of the ego will be integral in our understanding of temporality.

How is it then that temporality is said to be a performance of this transcendental ego? In order to see this clearly, we must understand that the way in which we experience the world is not how the world really is. Our experience of the world is created entirely in the mind. As Kant says, “The mind independent world isn’t in a spatial or temporal matrix, these are creations of the mind.” (Critique of Pure Reason, B54). What we know through the modern empirical sciences is that the objects of our experience are composed of atoms, which are made of protons and neutrons, which are made of quarks and the reduction continues all the way to the fields underlying quantum mechanics. Yet when we view the world, we do not see trillions of atoms, or oscillating quantum fields. We see a computer in front of us, a coffee cup next to that, and the

sky above us. The trillions of atoms that make these up are taken into the mind as sense impressions of them, and then synthesized and unified in the concept of the object in front of us. The world you see in front of you is quite literally a product of your mind and not how the world really is. The spatiality and temporality through which experience was thought to be grounded are actually creations of the mind. Thus, the ubiquitous architecture that time and space are empty substrates with an external locus through which reality unfolds is dissolved as the spatial and temporal matrix find their orientation within the mind. Temporality, as a creation of the mind, is an abstraction of the apprehension of change extended into the spatial nexus of reality. They are distinct in thought alone and are creations of the mind from the representation of the external world. It is the transcendental ego which stands alone as the substratum of self-consciousness and the origin of the spatial and temporal nexus through which experienced reality is made manifest.

Time itself is not perceived but is a product of perception. As impressions are received through the sensory faculties, they are given different temporal locations in order for us to distinguish one from the other. New sensory impressions flood our visual field as we survey the room around us from one end to the other. In order to apprehend the changing visual field, the mind assigns the new impressions a temporal order so that our scan appears to occur over a duration and is not just an overwhelming flood of sense impressions happening all at once, which could not possibly be rendered intelligible. This act of apprehension, which is constantly happening as new contents appear to you, creates the sense of temporal flow in our experience so that we may process our changing environment in an intelligible way. Thus, the temporal matrix of reality is abstracted out of the apprehension of change between objects perceived. Temporal flow is an inherently subjective sensation and as such is arisen from the empirical ego. It is a

sensation created by the mind but derived from the contents of experience. Because the sensation has its roots in experience, it is empirical. This is why time is said to be relative, because the experience you have of temporal flow is entirely subjective, it flows relative to your experience. This is why while staring at a wall time seems to move slow, but when attention is heavily stimulated time flies by. It's sense of flow is completely contingent on the amount of flux of sense impressions occupying your attention.

If we were to just leave it there, that temporal flow is a subjective sensation of the empirical ego, we would encounter a similar problem that we ran into with the cinematic model of temporal consciousness. The problem of how these successive momentary impressions can be unified to form our stream of consciousness. This problem is solved by transcendental ego. We connect the moments as an observer in the same way our observation of the film in the projector creates the illusion of the movie playing in front of us. The slides playing through the projector are just a succession of static images without an observer there to render the flux of images into an intelligible sensation of movement. The transcendental ego underlies all experience, and the sensations are appearing to it and rendered intelligible through mental processes that are attributed to the transcendental ego. Thus, there is no gap between impressions as they are all happening to a persistent self-consciousness which is present for all the impressions that are then unified into experience. The transcendental ego unifies temporal states into what is our stream of consciousness and makes the synthesis of this unity possible by being the very substratum of its possibility. According to Husserl, "The actual temporalization that is presupposed and achieved in the actual temporal givenness of the stream of experiences is the temporalization of the transcendental phenomenologizing ego. Temporality is just an egoic performance." (Phenomenology of time, C17). Without the observer, there is no experience to be had at all.

Were there no impressions to be synthesized, there would be no sensation of temporality. The very flux of experience gives rise to our experience of temporality. Temporality is thus a vivid elucidation of the synthesis of primal impressions played out in the theater of one's mind. A mind that is attributed to a persistent self-consciousness which is the transcendental ego. Temporal flow is thus a performance of the transcendental ego.

Is all sense of time then purely subjective? If temporality is simply a performance of the transcendental ego then it must mean that it is entirely subjective. Yet, other self-consciousnesses seem to be experiencing time as well. So, how can it be said that time is purely subjective if it is experienced by a multiplicity of consciousnesses? When I tell another consciousness that time has passed, they know what is meant by this, but how can they know this? They don't have access to my subjective experience. That is to say they don't have direct perception of my consciousness, so how can they know what I mean when I say that an interval of time has passed for me? This is because we are all experiencing temporality subjectively, through our own transcendental self-consciousness, but we objectively ground it intersubjectively. We have agreed upon identifiers of temporal intervals which lie outside of us. Second, minute, day, year, these are all constructs whose truth value lies in the condition that it is experienced by another self-consciousness. Objective time is presented to self-consciousness insofar as it is present as an object of experience for another. Objective time is thus arisen from the betweenness of multiple subjectivities. It occupies no space; it is in fact an abstracted construct which is self-given in the form of an object of experience for the introspective self-consciousness. We know a minute has passed because we have intersubjectively agreed what that amount of temporal flux feels like and attached an external, objective identifier to it. Its flow is completely subjective to you but the temporal identifier attached to times flow is an intersubjective construct. This is why time is said

to be a construct and not “real.” Your sensation of temporal flow is real in your experience, but our sense of objective time is not something that can be perceived. It is an agreed upon construct, an objective identifier for certain intervals of time, which bear their grounding outside of your experience and are of an intersubjective constitution.

We must now see how this theory holds up against the objections we encountered from our previous theories of temporal consciousness. We saw earlier how the transcendental ego can rectify the problem of the succession of momentary states, but what about the problem of simultaneity? The problem of impressions being perceived together in a moment of experience across a duration were said to be occurring simultaneously. The temporal ordering of impressions to form our experience eliminates the possibility that the experience of impressions is occurring simultaneously, as each impression is assigned its own temporal instant. The succession of these temporal instants, unified through the transcendental ego, is what creates the illusion of temporal flow. Impressions are then not occurring simultaneously but successively to an objective self-consciousness. Simultaneity is thus not a problem with the transcendental ego temporally unifying our momentary states of experience.

VII. CONCLUSION

From the outset of this project, we set out to explore four theses which could possibly answer the question of how our individual states of experience are temporally unified to form our stream of The cinematic thesis was that individual experiences occurred one after another in a succession, but this ran into the problems of how we experience this succession, and that reality is left confined to the present moment. The extensional thesis posited that experiences are temporally extended but ran into the problems, of succession, simultaneity and how change

could be possible within these moments of experiencing. The retentional thesis told us that retentions of the recent passed accompanied the present moment to give us the wholeness of temporal experience. This ran into the problems of how experiences can be distinct, and that in this conception we would be having a direct experience of the past. The final thesis which was explored posited that temporality was a performance of the transcendental ego, which rectified a number of the problems of the prior theses. We are thus to conclude that the temporal performance of the transcendental ego is a superior thesis to extensional, retentional and cinematic conceptions of time consciousness in temporally unifying momentary states into our stream of consciousness.

Bibliography

- Andersen, H. and Grush, R. (2009), "A Brief History of Time-Consciousness: Historical Precursors to James and Husserl", *Journal of the History of Philosophy*, 47: 277–307.
- Augustine, Saint. *The Confessions of Saint Augustine*. Trans. E.B. Pusey. Project Gutenberg, 2002.
- Bergson, Henri. *Time and Free Will: An Essay on the Immediate Data of Consciousness*. Trans. F.L. Pogson. Mineola: Dover Publications, 2001.
- Benovsky, Jiri. "The Present vs. The Specious Present." *Review of Philosophy and Psychology* (2012): 193-203.
- Brook, Andrew and Julian Wuerth, "Kant's View of the Mind and Consciousness of Self", *The Stanford Encyclopedia of Philosophy* (Winter 2020 Edition), Edward N. Zalta (ed.), URL = <<https://plato.stanford.edu/archives/win2020/entries/kant-mind/>>.
- Dainton, Barry, "Temporal Consciousness", *The Stanford Encyclopedia of Philosophy* (Winter 2018 Edition), Edward N. Zalta (ed.), URL = <<https://plato.stanford.edu/archives/win2018/entries/consciousness-temporal/>>.
- Dainton, Barry, "Temporal Consciousness – Empirical Findings", *The Stanford Encyclopedia of Philosophy* (Winter 2018 Edition), Edward N. Zalta (ed.), URL = <<https://plato.stanford.edu/archives/win2018/entries/consciousness-temporal/empirical-findings/>>.
- Dainton, Barry, "Temporal Consciousness – Specious Present", *The Stanford Encyclopedia of Philosophy* (Winter 2018 Edition), Edward N. Zalta (ed.), URL = <<https://plato.stanford.edu/archives/win2018/entries/consciousness-temporal/specious-present/>>.
- Dainton, Barry F. (2003). *Time in experience: Reply to Gallagher*. *_PSYCHE: An Interdisciplinary Journal of Research On Consciousness_* 9.
- Hoffe, Otfried. *Immanuel Kant*. Albany, NY: State of New York Press, 1994.
- Husserl, Edmund. *The Phenomenology of Internal Time Consciousness*. Trans. James S. Churchill. Bloomington: Indiana University Press, 1964.
- James, William (1890), *The Principles of Psychology*, New York: Dover.
- Kant, Immanuel. *Critique of Pure Reason*. Trans. Werner S. Pluhar. Indianapolis: Hackett Publishing Co, 1996.
- Kortooms, T. (2002), *Phenomenology of Time: Edmund Husserl's Analysis of Time-Consciousness*, Dordrecht: Kluwer.
- Pereboom, Derk, "Kant's Transcendental Arguments", *The Stanford Encyclopedia of Philosophy* (Spring 2019 Edition), Edward N. Zalta (ed.), URL = <<https://plato.stanford.edu/archives/spr2019/entries/kant-transcendental/>>.

Power, S.E. (2012), "The Metaphysics of the Specious Present", *Erkenntnis* 77(1): 121-132.

Rashbrook, O. (2013c), "Diachronic and synchronic unity", *Philosophical Studies* 164(2): 465–484

Russell, Bertrand. "On the Experience of Time." *The Monist* (1915): 212-233.
<https://www.jstor.org/stable/27900529>.

Sarte, Jean-Paul. *Being and Nothingness*. Trans. Hazel Barnes. New York: Philosophical Library Inc. , 1956.

Stern L. (1897/2005), "Mental Presence-Time", tr. N. De Warren, in *The New Yearbook for Phenomenology and Phenomenological Research*, ed. C. Wolfe. London: College Publications, 205–216.