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‘Einstein on the Beach: A Study in Temporality’

Robert Wilson and Philip Glass – Lucie Jansch

The way we actually started was talking about time … we share a sense of time.
(Wilson quoted in interview 2012)

Time in music is duration.
Philip Glass (quoted by Safir, 2012, 16)

_Einstein on the Beach_, premiered in 1976, attained legendary status amongst contemporary operatic work. Subsequent revivals, though all sell-outs, have been sparse (1984 and 1992). In 2012-13 Pomegranate Arts, a New York based
production agency, is touring the fourth revival internationally.

Having seen the 1992 and now the present production, I remain fascinated by this work's capacity to shape our sense of its duration (it lasts just under five hours) and also to induce a temporal response which has few precedents. It defies prosaic analysis, incorporating disparate elements which seem to have no narrative, or biographical relevance. The title merely refers to a photograph of Einstein standing by the shore, seen by the work's auteur Robert Wilson, who, working with the composer Philip Glass, decided on Einstein as a subject because 'Einstein embodied ... [the] mythic gods of our time' (Wyndham 1992: 12). This celebrity, earned by revolutionary yet recondite physical research, offered Glass and Wilson the freedom to create a 'portrait of Einstein' that dispensed with 'plot, narrative, development, all the paraphernalia of conventional theater', and instead to suggest 'a poetic vision' (Glass 1995: 32) able to receive whatever interpretation the audience might bring. The work merges vocals, visuals, dance and instrumentation to create a heterogeneous, surreal entertainment, involving sophisticated sound and lighting technology, sets of austere power, and (presently) requiring twelve singers, eleven dancers, eight instrumentalists, five performers and a production crew of twenty-six.

Its musical idiom had its beginnings in the mid-sixties, when Glass worked with the Indian sitar player Ravi Shankar. In contrast to post-Renaissance Western musical tradition, he recalls, 'I discovered that a piece of music could be organized around the idea of rhythm rather than harmony and melody as I had been taught' (Shyer 1989: 120), a changed prioritization which enabled the inception of what was later termed musical minimalism. Glass's discovery did not entail superficially 'orientalising' features or purposes; he intended 'a self-referential musical language ... in essence, abstract' (Tricycle 1999: 321) and avoided the notion of 'meditation (inducing) music' (Tricycle 1999: 319), which he consigned to 'new-age' styles.

Glass has been equally responsive to other, specifically Western, cultural sources, which have attempted to introduce new modes of temporality in aesthetic encounter, namely visual artists such as Stella, LeWitt, Judd and Morris (to whom collectively the term 'minimalist' was originally applied), and dramatists such as Beckett, Brecht and Genet (Tricycle 1999: 319-321). If one can generalize across media, all of these figures conceived their work not as 'drawing in' spectators to identify with some feature or character, where the structure of the work would determine an affective response, but rather to offer intentionally puzzling, non-
directive and inconclusive phenomena which allow the spectator to bring whatever interpretation completes them as works. Glass’s Parisian experience of writing music for Beckett’s *Play* (1965) seems to have crystallized his rejection of what could be called ‘hegemonic’ determinants of what and when an audience should emote (Glass 1995: 35). In contrast to a temporal alignment, close to being simultaneous, of dramatic stimulus and planned-for response, he envisaged a *hermeneutic convergence*, where the time taken to construe some meaning for what happened on stage, was, in itself, part of that happening.

Clearly such a stance explains why Glass and Wilson liked the ‘open-endedness’ of the subject of Einstein. Glass’s distaste for authorial hegemonism extended into the process of creation, where his relationship with Wilson was far more reciprocal than might be normal between composer and librettist or dramaturge. Their fundamental ‘assumption that the audience itself completed the work’ (Glass 1988: 34-35) led both to work in a way which avoided narrative pressure; even before composition, structure and timings were exactly determined, but the emotional content of scenes was never discussed.

Wilson, author, architect, artist and educationalist, recruited collaborators, notably Lucinda Childs, a founder of the Judson Church Dance Theatre, who created the choreography and also some repeated text. He also included material by Christopher Knowles, a gifted autistic youth with whom Wilson had worked for some time (Simmer 1976: 106), whose fragmented but hauntingly poetic style seems almost a direct literary counterpart to minimalist technique. Additional texts were by Samuel Johnson, an elderly man who presented himself for audition off the streets. Wilson himself supplied vocal texts used throughout the opera, based on numbers and solfège (‘do, re, mi …’) syllables. When numbers are used, they represent the rhythmic structure of the music. When solfège is used, the pitch structure of the music is presented, ‘in either case the text is not secondary or supplementary, but is a description of the music itself’ (Glass, 1978: 67-68).

Rather than explaining content to collaborators, Wilson would provide sketches. Even the published performance edition is predominantly nonverbal, comprising 113 of these arranged serially, combined with score, texts, and choreographic diagrams, instantiating Wilson’s ambition to present a spectacle which cannot be contained in language alone (Owens 1977: 24-25). Dance was conceived by him as the most ‘separate’ element in this ‘theatre of images’. The choreography
embraces fluid and rigid extremes in a style he explicitly calls ‘mechanical’ (Obenhaus 1985), from a ‘modern dance’ idiom reminiscent of Cunningham or even Graham, to a robotic attitudinising to which Artaud’s term ‘hieroglyphic choreography’ could be applied. Often there are simultaneous different speeds of movement on stage, some slower and some as rapid as the musical pulse.

Despite diverse and eclectic materials, Wilson’s theatrical sensibility did not integrate them into a monovalent whole, as one dramatic ‘metalanguage’. Instead, by creating seemingly autonomous but hermetic theatrical Bilden, or multi-media tableaux, the audience is left free to imaginatively combine separate meanings polyvalently, emancipated from the directorially specified interpretations of what Wilson has called the ‘fascist directing and acting’ of Western theatre today (Dyer 1985: A4).

Glass’s thoughts on received notions of temporality in music similarly reject quasi-narrative devices. He sees the rise of Romantic programme music and concerti as having encouraged identification with the soloist as ‘the alter ego of the composer’ and of the listener too (Roddy 1999: 171), making musical development a ‘narrative mechanism’, a ‘model’ of the ‘real world’, where ‘musical time is an allegory of real world time. I call that colloquial time ... the world you and I live in when we have our love affairs and our horses win at the races’ (171 my stress). Glass acknowledges that audiences sense in his work ‘extended time, or loss of time, or no sense of time whatever’ (172), attributing this to the aforementioned ‘focus on structure rather than theme ... the way some music has now of drawing people into a different world without time. And without boredom’ (175). Whilst eschewing characterizations of such ‘timelessness’ as ‘metaphysical ’ or ‘mystical’, he concludes merely, ‘music structures itself in time as to create independent coordinates of its own ... one has an authentic experience of time that is different from the time that we normally live in’ (Cunningham 1999: 163-4).

It is not difficult to see in this attitude a precise musical counterpart to the effect on us of Wilson’s collage-like dramatic procedures, one of sustained ‘defamiliarization’ and Glass himself has cited Brecht as a ‘big influence’ (Tricycle 1999: 320). Glass’s and Wilson’s oeuvre implicitly invites non-verbal, non-rational modes of interpretation. Hallucinations and daydreams, forms of non-linear, non-narrative mental activity, are admissible to and even suggested by his work.
Interpretations of these are at least intersemiotic (see Broadhurst 1999, 2007) but may also be (to appropriate a theological term) apophatic, resistant to verbalisation.

A common reaction to Einstein (which I felt again recently), is that it does not feel like almost five hours of performance; by contrast to the real Einstein’s conjecture of what would be experienced when travelling at near light-speed, our subjective sense of duration has apparently accelerated whilst ‘objective’ time has continued normally. This overall effect embraces various strata of other sensations, which I propose to analyse in detail. In conformity to the hermeneutic position sketched above, what I offer is an analysis of my experience of the staging, which does not pretend to examine music, movement or text in a way removed from their performance.

As Glass says, the structure of this work creates its own temporal coordinates. I compare the effect on me of Einstein in performance with that of a vastly different, narrative-based work of comparable length, Wagner’s Parsifal, which really does seem to occupy four hours of experienced time, setting a libretto text of sixty-five pages. Einstein, with no narrative, and experientially so much shorter, is barely fourteen pages, but seems devoid of any musical padding. I think the experiential difference lies in what I call internal discreteness. Parsifal is a ‘through-composed’ work, not divided into separate recitatives or arias, unrolling in continuous slow-moving exchanges and set-pieces. Einstein unfolds in a tautly organised scheme of four acts, each of two and lastly three scenes’ length, each act preceded and followed by transitional passages which Glass, alluding to the anatomical joint, calls ‘knee plays’. So there are in all fourteen sections of differing modes of performance. When interviewed at the recent London opening, Wilson informed us that he envisioned the meticulously-timed prior ‘megastructure’ of the work like the plan of an apartment development, each plot to be ‘filled in’ with diverse residents. He also saw in it an implicit re-endorsement of classical aria-recitative construction. If a European precedent could be found for this form (which possibly Glass would deny), it would be the opera-ballet in French theatre from the late baroque to the nineteenth century, which interpolated musical dance and vocal numbers in a rather casual narrative.

In performance Einstein presents three dominant visual motifs on stage: a nineteenth century steam train, a courtroom trial which contains a vast bed, and a spaceship over a field, all of which mutate in the staging. It is natural to try to
allegorise them thematically: the train might be the triumphalist certainties into which Einstein was born but which the theory of relativity overthrew; the trial with its *lit de justice*, (French idiom for ‘seat of justice’) could be the verdict of history on his discoveries, which permitted immense sources of both energy and destructive power; the spaceship could be that era of exploration for which his physical theories enabled reliable mapping of deep space. Wilson merely comments on the spatiality of scenes and their motifs, comparing the knee-plays to close-up portraiture, the train and trial scenes to middle-distance still-life, and the spaceship ones to distant landscape. Just as Einstein abolished the separation of Newton’s absolute ‘space’ and ‘time’ to make them into one physical fabric, so Wilson’s different distances might entail different time-based experiences.

Whilst certain motifs may pertain to Einsteinian theory, this work remains hermetic (even an interpreter like Cunningham is hesitant in his readings of any decipherable ‘code’). They are embedded in a texture which has its own morphology. I shall attempt a drastic synopsis, based on my notes of the 2012 London staging, which has minor changes from the 1992 version. I should add that virtually all performers are dressed in ‘Einsteinian’ baggy trousers and braces.

*Knee Play 1*: Two women stenographers count and mime. Chorus chants numbers.

*Act 1, Scene 1*: The Train’s entry. Various dance numbers. Man scribbles equations; boy throws paper planes.

*Act 1, Scene 2*: Trial scene with bed. Beneath hand-less clockface,\(^1\) two judges and jury (Chorus) try a defendant. An Einstein lookalike plays his violin.

*Knee Play 2*: Stenographers reciting again. Einstein plays on, with back-projected images of him.

*Act 2, 1*: In field distant abstract Spaceship hovers above dancers.\(^2\)

*Act 2, 2*: Train reappears, rear carriage facing.\(^3\) Victorian couple mime a love duet on its balcony. Woman pulls gun on man.

*Knee Play 3*: Stenographers at a flashing control panel. Chanting Chorus brushes teeth and stick out their tongues.\(^4\)

*Act 3, 1*: Trial and Prison combined. Two uniformed prisoners perform dejected dance. Defendant turns into Patty Hearst, pointing machine-gun.

*Act 3, 2*: Field again. Dancers with Spaceship above.
Knee Play 4: Stenographers write on spotlit glass tables.


Act 4, 2: Organ cadenza, while light box rises like giant clock hand.

Act 4, 3: Scaffold/spaceship with lit compartments. Two glass cubicles containing figures move vertically and across stage. Music intensifies. Two plastic bubbles disgorge smoke, and then the stenographers. Front-drop descends, inscribed with illustration of A-bomb.

Knee Play 5: Stenographers sit on park bench. Bus, resembling Train, enters; driver recites romantic speech. Words and music cease.

From this sketch of the staging it is evident that these visual motifs have the bizarre, intertwined, mutational consistency of a dream, a dream of someone who in waking life has been thinking a lot about Einstein. Their combinations through the acts have a certain additive development, implying meaning whilst remaining inscrutable. I consider that this staging realizes Artaud’s use of fragmented and disconnected images in a particularly daring form. The pattern of expectation thereby set up creates what I call ‘antiphonal time’: an awaiting of mutually answering, mutating items within a hieratic order. Appositely, comparisons with Bach’s church music have been made (Cunningham 1999: 156; n. 4: 166), and Glass has cited Monteverdi and Palestrina as composers with ‘a different sense of time’ (164); these three produced much liturgical music where daily calendrical variations were inserted into fixed, expansively treated orders of service.

Such moulding of expectation suggests another comparison with Wagner, with his system of musical signifiers, or Leitmotiven, which in the Ring Cycle refer forwards and backwards to certain leading themes. Obviously, Glass and Wilson evade such codification, but their visual motifs have the presence of potential significance and obscure reference. We are presented with a puzzle, an aporia, and so are induced to suspend any definite conclusions, to ‘dwell in uncertainties’.

Descending to a more detailed level, music and staging, sound and vision, are interrelated to the point of exhibiting common features which create a complex temporal landscape. I would select these:
Iteration and Mutation. Seventeenth-century Western music developed bar lines to facilitate dancing, dividing the musical pulse into equal cells of beats, almost always divisible into four, three or two. Glass reacted against this, claiming ‘In the West ... we think of music in terms of dividing’. Though minimalist technique might seem even more repetitive, he says of Einstein, ‘the difficulty isn’t that it keeps repeating, but that it almost never repeats’ (Obenhaus 1985). From Indian music he derived (possibly invalidly, as he admits (Tricycle 1999: 318)) what he calls additive process, in which a repeated phrase may grow gradually from five, to six, seven, eight notes, and then shrink again (Glass, 1995: 58). This subtle fluidity of rhythmic structure resists our ingrained expectations of discrete blocks of musical tempi connected by modulations; instead, our ‘speed of musical travel’ accelerates and decelerates more smoothly, and our sense of duration is moulded in a way comparable to how increasingly frequent road stripes before junctions persuade us we are driving faster than we are. This technique is reflected in most of the libretto, as written by Knowles, where a repeated sentence beginning is progressively added to, or completed differently. Similarly, sequences of choreographed gestures grow more and then less prolix against a ‘background’ of iterated ones.

Alignment and Difference. Glass also developed what he calls cyclic structure: superimposing two different rhythmic patterns which progressively diverge and then gradually converge again (Glass 1995: 59). The temporal effect could be described as ‘planetary’; we are in a system where different sound worlds briefly align and then seamlessly move out of phase again.

There are also spectacular simultaneous differences of speed between torrential musical passages, accompanying stage action and spoken text. This for me is the central temporal presentation of the work. Whilst the music rushes by in what seem to be phrases of twenty to twenty-eight rapid notes, some dancers will gyrate ‘in time’, whilst others’ formalistic slow motion takes each of these phrases as a single beat, with recited text syncopating between them. We are familiar with cinematic ‘slo-mo’, making fast actions super-slow to heighten scenes like gunfights and deaths, but this is more complex; we have two extremes of time, mediated by, to use Glass’s words, the ‘colloquial time’ of repeated text. The effect of this is analogous to action replays in sports broadcasting; the corner stopwatch flickers by, counting hundredths of a second, while the foul or disputed finish is repeated frame by frame for discussion by the panel. Perhaps this can be seen as a further
defamiliarization device, making the stage action not present to us, but as if it is already recollected by us, an item of memory or dream. The visual array of the staging reflects this too: figures wearing ‘retro’ braces move like marionettes in some giant glockenspiel clock, like some animated version of paintings by the Scottish artists James Pryde or Stephen Conroy.

Irresolution and Kicking. Glass wished to develop a way of using harmony that fitted with his rhythmic methods. In Einstein he used varieties of what could be called ‘unsatisfied cadences’ where the resolution in a phrase is lower than Western ears would expect, changing its key structure and creating an expectation of resolution ‘next time round’. This is exploited in repeated phrases that in sequence can last up to eight minutes (Glass 1995: 60); the phrase, so to speak, ‘kicks on’ into its repetition. Similarly, he subverts our conditioned expectations, mentioned above, of even-numbered time signatures, by using five or seven beat phrases which leave us waiting for the ‘closing’ beat, and so surprise us with the next phrase. Appropriating a classical rhetorical term, both these devices instantiate anacoluthon, a piling of one incomplete clause on another, making the musical texture seem to race to catch-up with the time it occupies.

These devices permit a subtle, constant pattern of mutation within the musical and dramatic texture of the work, thereby, as Wilson said recently, ‘stretching’ or ‘compressing’ time. The New York critic Andrew Porter observes of Einstein that our initial ‘rebellion at the-needle-stuck-in-the-groove quality’ dissolves when realizing that ‘the needle has not stuck’ and, citing repetitively structured works by Satie or Stockhausen, discerns an appetite for ‘slow-shifting, chronic experiences – hypnotized by repetition, stimulated by ... tiny changes’ (Roddy, 1999: 172-173). We could consider our experience of time-based media as being like mentally riding a wave of ‘present’ stimulation, which carries with it an integral but progressively fading ‘tail’ of memory of its immediate past, and which also projects an array of expectations for its immediate future (upon this latter, of course, Derrida’s notion of differance is derived). Applying Porter’s ‘chronic experiences’ to such a model, we can say that our ‘tail of memory’ here is initially of ‘straight’ iterative sequences, resisting attentiveness, but that we then intuit a contour of development ‘curving away’ into the past, and when we encounter an awaited ‘same’ element, we are, so
to speak, in a different place ourselves and therefore respond differently to it. I would call this experience one of spiral or even helical time; in both music and staging, we are going round and round, but travelling somewhere new.

I have previously paraphrased Glass’s and Wilson’s vision of the relation between work and audience as being one of hermeneutic convergence, where the time taken to interpret is integral to its duration. The above-mentioned ‘tail of memory’ becomes necessary condition for a further process of ruminating content, which, searching for meanings, ‘spreads out’ such a time-based work as one ‘simultaneous’ landscape. In Western tradition, this landscape, as mentioned, punctuated by climaxes, crises and resolutions, attracts conclusive (not necessarily narrative) interpretations rapidly. In Einstein the dune-like shifts of visual and aural near-similarities do not; whatever conjectures we apply are unproven, and cannot serve as convenient, portable maps. In this way ‘interpreting time’ is indeed fused with ‘performed’ time. And there is a pleasing analogical association to be made between the two. In seeking to capture the effect of interpreting artefacts in all media, Heidegger enunciates the notion of the ‘hermeneutic circle’ (1978: 195), or ‘interpretive spiral’ (Broadhurst, 1999: 38) by which at each turn of rumination on content, fresh insights are produced, without any fresh matter emerging, nor any conclusion to end future and further turns. I suggest that, in a conspicuous way, Einstein serves as a trap for such helical exegesis; it is a ‘happening’ in process which elicits new insights at every stage of its duration (see Broadhurst, 1999: 172-3). I think it does so by manipulating what Heidegger called the ‘hermeneutical situation’ of an audience: we approach the work ‘fore-having’ (in his lexicon of terms, see Heidegger, 1978:190-1) a range of traditional meanings for operatic work, but our ‘fore-sight’, our choice between any one of these genre-based interpretive routes, is continually thwarted by its aporetic character, and so our ‘fore-conception’, our resolved pursuit of a particular route, is always blocked. We are forced to improvise and (taking this word in its strict meaning) to ex-temporise, to find a solution ‘out of time’.

Of course Heidegger’s spiral analogizes the discontinuous but repeated revisiting of the ‘same’ work, each encounter yielding more inferences. But, for example, though we may see King Lear numerous times, each occasion disclosing new facets, the change of fortunes of the characters remains the same. The narrative marks an indefeasible course; the mechanism of tragedy is, to that extent,
irrevocable. A work like Einstein, however, has no such one-directional transitivity. Its end could as well signify a new beginning; nothing has changed for its ‘protagonists’ (if one can call them such). Rather like those progressive rock tracks which fade in and then fade out, Einstein seems to hint that the whole work is just part of a huge perpetuum mobile (‘forever in motion’) extending beyond itself.

From this, my final thoughts on temporal effect invoke that loose bundle of notions expounded by Nietzsche and subsequently called his ‘theory’ of Eternal Recurrence. Even Nietzsche scholars struggle to defend its coherence, but at its core lies a rejection of an ‘end of time’, both in simple duration but also in terms of telos, transcendent purpose. Modern ‘Big-Bang’ astrophysics finds finite duration not so inconceivable, Einstein’s conception of space-time making such a position tenable. But the absence of teleology is something that harmonizes with both the form and content of this work. In form Einstein’s lack of narrative development makes its duration (unlike that of King Lear), eminently reversible; there is no graspable end-state to be reached. Nietzsche extended his speculation to postulating that each of us would effectively re-live our lives forever, and that the only affirmative response was that of amor fati: to assent to, to love this fate (Nietzsche 1979: 67-68). Beneath the strange clumps of images that inhabit Einstein there is a sense-in-nonsense that it symbolically portrays a life, in which the historical Einstein knew he had discovered such morally ambivalent sources of power, but nevertheless one which he himself would have willed to repeat.

Notes
1. Wilson uses here a variety of instruments for time measurement (See Brecht 1978: 330).
2. Allusion to solar eclipse of 1919, where appearance of two adjacent stars demonstrated curvature of space, supporting Einsteinian Relativity.
3. Probably allusion to Einstein’s thought-experiment regarding the slowing of time relative to speed (Cunningham 1999:158).
4. Reference to a famous press photograph of Einstein sticking his tongue out.
5. Initially expressed in The Gay Science and developed in Thus Spoke Zarathustra and Ecce Homo).

Reference List


*Writings on Glass: Essays, Interviews, Criticism*, CA: University of California Press,
pp. 316-27.
Wilson, Robert and Glass, Philip (2012) Interview during ‘Screen talk with Philip
May.
Wilson, Robert and Glass, Philip (2012) *Einstein on the Beach: An Opera in Four
Wyndham, Susan (1992) ‘Opera's nuclear reaction’, *The Australian* (Weekend
Review), p. 12, 29-30 August.