Unsound Phenomenologies: Harrison, Schaeffer and the sound object

MITCHELL HERRMANN

Oberlin Conservatory, OCMR 1335, 135 W. Lorain St, Oberlin, OH 44074, USA
Email: mitchell.herrmann.composer@gmail.com

As Jonty Harrison himself acknowledges, a significant body of acousmatic music exists which has, directly or indirectly, challenged aspects of the Schaefferian theory from which acousmatic music first developed (Harrison 1995). Few pieces, however, have so clearly and deliberately confronted Schaeffer's notion of the 'sound object' as Harrison's *Unsound Objects*. Harrison does more than merely reject Schaeffer's definition of the sound object through the use of expanded compositional strategies. Rather, he both employs Schaeffer's methodology and subverts it, systematically demonstrating the potential and the limitations of Schaeffer's epoché and its product, the sound object. The result is what might be aptly termed the 'unsound object': a sonic entity which both demonstrates and defies Schaeffer's ideals, and exemplifies the rich ambiguities which can arise from the compositional exploitation of referentiality and association, in addition to the intrinsic, morphological characteristics emphasised within Schaeffer's reduced listening. Throughout his engagement with Schaefferian theory, however, Harrison never abandons the fundamental musical radicalism at the heart of Schaeffer's project: positing 'concrete sound material', rather than 'abstract concept', as the basis for the language of electroacoustic music (Chion 1983: 37).

1. INTRODUCTION

Key to understanding Schaeffer's ideology, and in particular its faults, is an investigation into the field of phenomenology, from which Schaeffer borrowed liberally. This article will first outline the key features of the sound object and epoché as defined by Schaeffer, as well as their relation to Husserlian phenomenology. Harrison's methods for subverting these features are then explored, in particular the recontextualisation of sound objects. The article also examines Harrison's use of metaphor and narrative, devices not possible within a strictly Schaefferian musical language. In the concluding section, Schaeffer's aesthetic radicalism is considered, as well as Harrison's adoption of this radicalism.

2. SCHAEFFER AND PHENOMENOLOGY

2.1. Transcendence of the sound object

Fundamental to Edmund Husserl's practice of phenomenology is the epoché: the process by which our everyday, 'natural' attitude towards the world is suspended or 'bracketed' off, along with all of our normal assumptions and inherited beliefs about our experiences (Moran 2000: 147). The epoché, and the process of 'reducing' our experience in order to focus our attention on the true, inner nature of that experience, is the first step in the phenomenological investigation. Schaeffer adopted much of Husserl's terminology wholesale when performing his own phenomenological investigation into the 'perceptual structures' of our aural experience (Chion 1983: 60). In building the experimental 'music theory' upon which musique concrète was to be based, Schaeffer explicitly employs Husserl's methodology. 'I must free myself from the indoctrination of my former ways', says Schaeffer, 'and run the gauntlet of the epoché' (Chion 1983: 30).

For Husserl, the reduction is the method by which we can begin to investigate the structure of our experiences (Moran 2000: 148). For Schaeffer, however, the reduction is not merely a means of access to the sound object: it is the means by which the sound object is constituted. 'The sound object', says Chion, 'is defined as the correlate of *reduced listening*: it does not exist "in itself" but by means of a specific foundational intention' (Chion 1983: 32). Schaeffer's sound object relies heavily on Husserl's notion of the 'intentional object': that entity towards which an act of consciousness is directed (Kane 2007: 15–16) Indeed, Schaeffer viewed the sound object as a particular type of intentional object, and ascribed to it many of the same qualities which Husserl himself emphasised (Kane 2007: 17). Chief among these is a transcendence which allows the same object to be perceived in an infinite diversity of contexts and variations, via different acts of consciousness (such as hearing, remembering, imagining) (Kane 2007: 17). Of key importance is that through our different ways of perceiving the object, within different contexts, the *object remains exactly the same*; nothing is added, nothing is lost, and the fundamental nature of the object does not change. Although through repeated listening we may be able to 'successively perceive different aspects of [the sound object]', according to Schaeffer the listener will 'always identify it as *this*

Organised Sound **20**(3): 300–307 © Cambridge University Press, 2015. doi:10.1017/S1355771815000229

https://doi.org/10.1017/S1355771815000229 Published online by Cambridge University Press

quite securely determined object' (Nattiez 1990: 93). Quoting Schaeffer, Chion writes that the 'sound object is not a state of mind: It remains the same across different listening modes, "transcending individual experiences"' (Chion 1983: 33). Schaeffer's example of the transcendental nature of the sound object is that of a recorded gong sound, altered in various ways by filters and envelope shaping, yet always recognisable as the very same sound object (Kane 2014: 32). Chion sums this up in a pseudo-ecclesiastical maxim: 'That which varies, is that which is constant' (Chion 1983: 5)

2.2. Schaeffer's epoché

The second key feature of the sound object is that which it is not, or rather that which it excludes. 'The sound object is not the sound body', says Chion, by which he means 'the material source of the sound which can be identified from it' (Chion 1983: 32). 'The sound object as a notion arises precisely from the radical distinction between the sound and its real or imagined causality' (33). Yet Schaeffer's reduction goes far beyond excluding only the physical source of the sound object; its 'bracketing' extends to all the cultural, scientific and other assumed and inherited attitudes about experience, in order to focus solely on the object's 'material, its particular texture, its own qualities and perceptual dimensions … independently of its origin or its meaning' (32). An exploration of Schaeffer's listening modes demonstrates the range of potential meaning which must be 'reduced' before the sound object can be constituted. *Comprendre*, the form of aural perception in which sounds are heard as signs or messages (as in language), must be excluded from the perception of the sound object. Likewise, *écouter* must also be excluded, in which sounds act as a carrier for information about the existence of another entity, the physical source of the sound (Kane 2014: 27–8). The mode of listening that *is* allowed within reduced listening is *entendre*, which attends solely to the sound itself and its intrinsic characteristics.

It is a peculiar feature of the ontology of Schaeffer's sound object that it must first be constituted through a process of systematically excluding all those features not intrinsic to the 'essence' of the sound, yet once constituted it ostensibly can be perceived as such even via different listening modes and within other contexts. The sound object, says Chion, 'is a perception of a totality which remains *identical through different hearings*' (Chion 1983: 32; emphasis added). Viewed within the wider context of Husserl's phenomenology, Schaeffer appears simply to be reiterating the phenomenological insight that an intentional object may be perceived as the same object by different acts of consciousness. A particular fruit, for example, may be seen or imagined or remembered as enticing or disgusting or with an infinite variety of other attributes, via a variety of other mental acts (Russell 2006: 85). Yet in every case, the piece of fruit can be perceived as being the *same* piece of fruit. So too, argues Schaeffer, does the sound object remain the same.

3. RECONTEXTUALISATION IN UNSOUND OBJECTS

3.1. Use of Schaefferian techniques

In *Unsound Objects*, Harrison challenges Schaefferian orthodoxy not by rejecting his methods outright, but rather through a process of both employing and subverting these methods. The first clearly referential material within *Unsound Objects* occurs at 2:00: the sound of gently running water, as from a brook or stream (Figure 1). Yet, the minutes leading up to this

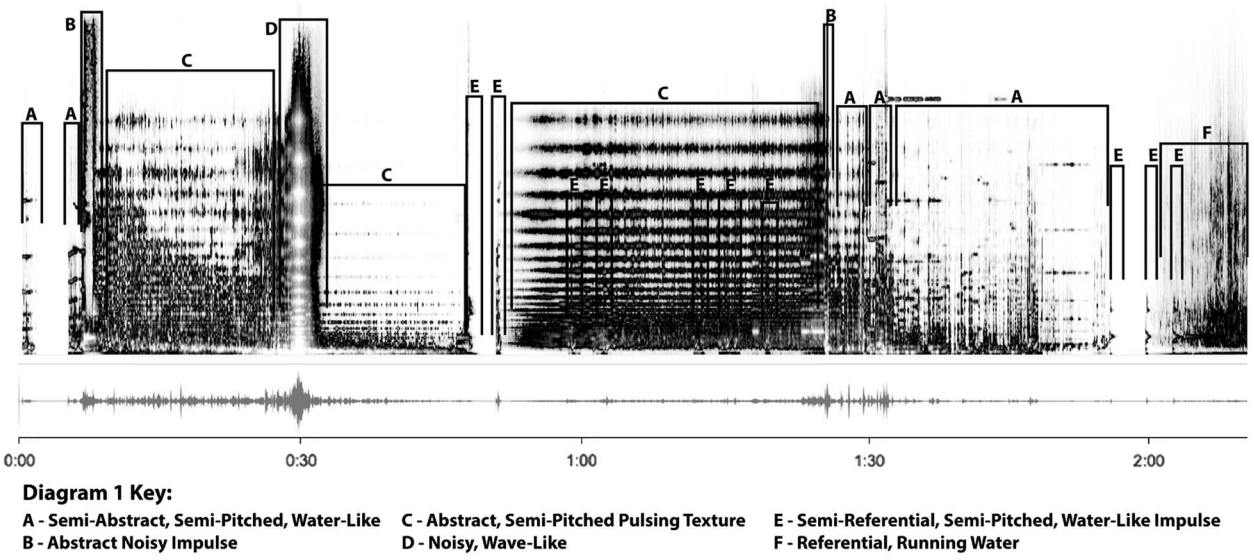


Figure 1. Opening of *Unsound Objects*.

https://doi.org/10.1017/S1355771815000229 Published online by Cambridge University Press

event are composed in such a way that the listener does not necessarily perceive the sound immediately in terms of its referentiality. Rather, the listener is more likely to focus on the morphological characteristics of the sound, in the context of the more abstract material which has preceded it.[1] The opening gesture of the piece presents a relatively abstract sound, characterised by two prominent traits: pitched-ness, and a water-like texture. Neither of these traits, however, is strong enough to cause the listener to identify the sound as being produced by a particular physical object (such as a resonating metal object or a bowl full of water). These two traits are explored and developed over the two minutes leading up to the introduction of the clearly referential water recording. Many of the sound objects presented in the first two minutes may be viewed as developments or variations of these characteristics. At 0:08, 0:32, 0:51 and 1:25, sound objects occur which exhibit varying levels of pitched-ness and water-like behaviour. Thus, when the apparently unprocessed recording of running water appears at 2:00, the listener has been conditioned by the preceding material to hear it primarily with the listening mode *entendre*, rather than with *ecouter* as might otherwise be expected.

This is a classic demonstration of Schaeffer's phenomenological ideals. According to the Schaefferian viewpoint, 'a sound object is only possible when a sound no longer functions for-another as a *medium* (as in the case of indicative and communicative signs), but rather is perceived *immediately* in-itself' (Kane 2007: 18). At 2:00 in *Unsound Objects*, the listener is able to focus their attention upon the morphological characteristics of the sound, rather than the sound's presumed source, due to the compositional exploration of these morphological characteristics which preceded the sound's appearance. In this case, the sound rests on the far side of the spectrum of 'pitched-ness' and 'watery-ness' which Harrison has thus far explored within the piece.[2]

3.2. Recontextualisation

Through recontextualisation, Harrison demonstrates the problematic nature of Schaeffer's assertion of the universal transcendence of the sound object. Throughout the majority of *Unsound Objects*, Harrison presents only a few sonic entities at any given moment, each of which is readily distinguishable to the ear of the listener. This allows the listener to more easily compare the characteristics of objects, as in the first two minutes of the piece. It also serves to aid in the recognition of objects within different contexts. In his programme notes for the piece, Harrison writes: 'The known becomes strange and the unknown familiar in a continuum of reality, unreality and surreality, where boundaries shift and *continually renewed definitions are the only constant*' (Harrison 1995; emphasis added). This last phrase is a vital indication of the methods by which Harrison subverts the sound object. 'The sound object', says Schaeffer, 'is not modified … by the variations in listening from one individual to another, nor with the incessant variations in our attention and our sensibility' (Kane 2014: 31). According to Brian Kane, Schaeffer emphasises the 'ideal' and transcendent nature of the sound object: '[the sound object] inhabits an order of essences (in the phenomenological sense) that *guarantees repetition without difference*' (Kane 2014: 33; emphasis added).

By re-contextualising particular sound objects in such a way as to redefine their fundamental identity in the mind of the listener, Harrison challenges the supposedly transcendent nature of the sound object. At 0:29 in *Unsound Objects*, well before any strongly referential sound has appeared, Harrison presents an object with a broad-band, noisy texture, whose morphology might be likened to that of a breaking wave. It is immediately followed by a sustained, pitched sound object. Upon first listening, the listener is not likely to associate the noisy sound object with any particular real-world source or causality. It is heard under the epoché, with particular regard paid to its morphological and timbral characteristics. Harrison establishes this sound as a sound object in the Schaefferian sense: it is recognised and remembered for its intrinsic properties, using the listening mode *entendre*.

This sound object appears at the end of the first phrase of the piece. It reappears at the end of the last phrase of the piece, at 12:39. The second instance is also immediately followed by a sustained, pitched sound. Upon closer listening, one may discern that these two instances of the noisy sound are not literal repetitions, but are close enough to easily be considered variants of the same sound object. The primary difference between the sound objects is the context in which they appear. In the 40 seconds prior to the appearance of the second noisy object, starting from 11:58, Harrison creates an easily recognisable, highly referential sonic environment: a beach on a windy day. Human activity and voices, bird calls and ocean roar are heard. Thus, when the noisy sound object reappears within this beach soundscape, it is inevitably heard with the listening mode *écouter*, as an indicator of the presence of a physical entity causing the sound to be produced. Indeed, it could be argued

[1]In this instance, 'abstract' is used to refer to sounds which, due to digital processing or other reasons, are difficult to connect to a particular physical source. The term should not be conflated with either Schaeffer's or Emmerson's usage (Emmerson 1986).

[2]It is important to note that, in certain cases, reference to causality may be made within Schaeffer's epoché, so long as it is in service of exploring the intrinsic morphological characteristics of the sound object, rather than treating the sound object as a vehicle for that physical cause (Chion 1983: 32). Thus, the water-like texture of the sound may be referenced without leaving the epoché.

https://doi.org/10.1017/S1355771815000229 Published online by Cambridge University Press

that, in a phenomenological sense, the intentional object itself has changed: no longer are we listening to the 'sound' and its intrinsic qualities, but rather the 'ocean wave', attached to all our personal, cultural and bodily associations and memories of such entities.

Yet, these two instances of the noisy sound object are clearly and easily recognisable as being timbrally and morphologically related. According to Schaeffer, our perception of the object in both instances, and indeed in any instance, will be identical, in the sense that what we are perceiving is the same object that we perceived previously. Having constituted the sound object through an act of reduced listening, as Harrison leads the listener to do within the opening minute of the piece, the listener should be able to experience that same object under either *écouter* or *entendre*. According to Kane, 'Schaeffer thinks that the additional signification added to a sound when treated as an indicative or communicative sign can be reduced away without essentially changing the ontology of the sound' (Kane 2014: 37). In effect, Harrison has forced the listener to step outside of the epoché, and not merely by emphasising the sound's referential nature. Rather, by presenting a 'reduced' sound object, and then re-presenting it such that the listener will hear it via a different listening mode, Harrison shows the degree to which an ostensibly transcendent sound object can alter its fundamental identity in differing contexts. By Schaeffer's principles, when a sound is perceived immediately as a vehicle for another entity, rather than for its intrinsic qualities, 'there is no sound object: there is a perception, an auditory experience, through which I aim at another object' (Kane 2007: 18).

3.3. Simultaneous listening modes

At other times in the piece, Harrison uses a similar process of recontextualisation to highlight the potential for using simultaneous modes of listening with respect towards a particular sound object. In his programme notes for *Unsound Objects*, Harrison mentions the musical potential inherent in situations in which 'recognition and contextualisation of sound material rub shoulders with more abstracted (and abstract) musical structures' (Harrison 1995). Harrison also adds a further level of complication to this situation: 'But as these structures should themselves be organically related to the peculiarities of individual sound objects within them, the ambiguity is compounded: interconnections and multiple levels of meaning proliferate.' The situation Harrison refers to does not entail a complete rejection of the epoché. Rather, the listener may be drawn to either *écouter* or *entendre*, without fully forsaking one for the other. In such a situation, the very nature of the intentional (sound) object becomes ambiguous, shifting freely depending on the musical context and the ear of the listener.

At 3:07 in *Unsound Objects*, the soundscape of a forest environment is briefly presented (Figure 2). Chirping crickets appear in the background, while in the foreground crunching wood is heard. The sonic environment is not entirely 'natural'; some processed material is perceptible, and the 'hand of the composer' is not entirely hidden. Yet it is enough to evoke a sense of referential place and space, more or less familiar and recognisable to the listener's ears and memory. What follows next, at 3:19, is a series of small wooden impacts, behind which footsteps and other human movement may be discerned. Like the noisy, ocean-wave sound object appearing at the beginning and end of the piece, the context within which these wooden impacts appear strongly affects the intentional object synthesised in the mind of the listener. Having been drawn towards using *écouter* by the referentiality of the forest soundscape, as well as by the sound of distinctly human movement, the somewhat more ambiguous identity of the wooden impacts is resolved by positing the existence of a particular physical source, existing within the forest environment. For example, it is easy to formulate a mental picture of a person chopping wood.

At 3:33, these wooden impacts abruptly transition to a series of far less referential sounds. Pitched pulsations coincide with noisy scrapings and impacts, none of which are readily identifiable as a particular real-world object. At 3:53, the wooden impacts return just as abruptly as they disappeared 20 seconds previously. Now, however, their appearance is influenced by the preceding series of abstract sounds, which are by

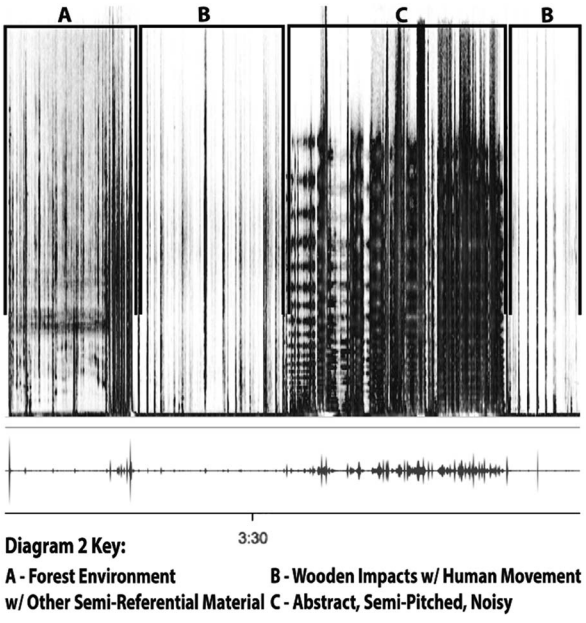


Figure 2. 3:07–4:00 of *Unsound Objects*.

https://doi.org/10.1017/S1355771815000229 Published online by Cambridge University Press

their nature difficult to perceive purely through the use of *écouter*. Instead, the listener may tend towards using *entendre*, hearing the sound for its intrinsic morphological characteristics, in comparison with those of the abstract sounds which preceded it. Unlike the recontextualisation of the ocean-wave sound object, the wooden impacts reappear within 20 seconds of their initial presentation. Thus, the initial mode of perception is not forgotten or entirely replaced. Rather, the listener may hear the wooden impacts and primarily focus on their intrinsic sonic characteristics, while continuing to be cognisant of those aspects which remain outside of Schaeffer's epoché: the physical causality and referential potential of the sounds. Thus, a situation is created in which, in Harrison's words, 'interconnections and multiple levels of meaning proliferate' (Harrison 1995). As in the case of the ocean wave object, Harrison demonstrates the way in which the nature of the intentional object itself can be shifted according to context. Again, Harrison's composition belies the supposed transcendence of the sound object by showing just how easily its identity can change in the mind of the listener.

3.4. Recontextualisation, phenomenology and Schaeffer

The problems in Schaeffer's conception of the sound object, as demonstrated by Harrison, have as much to do with Schaeffer's misuse of phenomenological concepts as they do with larger failings of his theory of acousmatic music. In recent years, there has been increasing criticism of Schaeffer's implementation of phenomenological ideas (Kane 2007, 2014; Kim 2010), and it is clear that his translation of Husserlian methodology to the realm of electroacoustic music involved a significant break from phenomenological orthodoxy. In Schaeffer's writing, the reduction ceases to become a tool through which the listener's perception of the intentional object may be made explicitly clear, but is rather a mechanism by which this intentional object is actually constructed. According to Merleau-Ponty, phenomenology 'places in abeyance the assertions arising out of the natural attitude, the better to understand them; but it is also a philosophy for which the world is always "already there" before reflection begins' (Merleau-Ponty 2005: vii). For Schaeffer, however, the object of investigation is not 'already there', but rather arises out of the processes of the investigation itself. As such, Schaeffer's theoretical basis for electroacoustic music fails to live up to its stated goal: to be rooted in a phenomenological investigation of the 'natural perceptual field of the ear' (Chion 1983: 102)

Schaeffer uses the epoché first in order to investigate aural experience, upon which a theory of electroacoustic music may then be based. In the studio, the composer can focus upon the timbral and morphological attributes of the sound material, and arrange this material so as to create a musical language based upon the relationship of these attributes. 'Every musical structure', writes Chion of Schaeffer's theory, 'functions through the *variation* of certain aspects of the sound from one object to another' (Chion 1983: 79). Such a process, broadly speaking, may be found in *Unsound Objects* in the first two minutes of the piece, leading up to the introduction of the first clearly referential material (the running water sound). Yet, for Schaeffer, the epoché is not a purely poietic device. In order for the composition to be comprehended by the listener, they too must engage in reduced listening. 'If [the listener] moves outside, directs his or her attention to sound qualities other than those the composer has dealt with as values', warns Schaeffer, 'the structure will escape; only chaos will be perceived' (Nattiez 1990: 98). Thus, the listener must reduce their listening of the piece, bracketing off all those aspects of the sound not pertinent to Schaeffer's conception of musical value.

As Harrison demonstrates, however, the primary danger of Schaeffer's theory is not that 'chaos' will be perceived instead of music, but rather that such a theory asserts a fundamentally flawed ontology of the sound object, the basic building block of Schaeffer's concept of electroacoustic music. As a result, the identity of Schaeffer's sound object in the mind of the listener can shift radically depending upon a number of factors, including the context in which it appears. As Suk-Jun Kim points out, Schaeffer's definition of the sound object is essentially incomplete from a phenomenological perspective: 'With Schaefferian phenomenology', Kim writes, 'it is not the totality of the phenomenon given to our experience that is our investigative object; we are led to only part of it, and our investigation seems crippled' (Kim 2010: 7). Thus, if the listener's attention strays away from this particular part of the sound, towards other aspects of the 'totality of the phenomenon given to our experience', any semblance of the sound object's 'transcendence' is lost.

Certainly, Schaeffer's system has the potential to produce music which is perceived as chaos by a listener untrained in methods of reduced listening. But more fundamentally, it limits the usefulness of the system to particular musical situations. Harrison demonstrates one of these situations in the first two minutes of *Unsound Objects*, in which abstract or non-referential material is used. By its nature, such material lessens the listener's perception of elements outside Schaeffer's epoché. This situation uses what Emmerson would term 'aural discourse' (Emmerson 1986), a concept which Landy explicitly identifies with Schaefferian theory (Landy 2007: 32). Another situation in which Schaeffer's theory might prove valid is one involving repetition, as in Steve Reich's tape music

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(Nattiez 1990: 101). According to Schaeffer, such repetition helps to 'discourage our curiosity about causes … By exhausting this curiosity, [repetition] gradually brings the sonorous object to the fore as a perception worthy of being observed for itself' (Schaeffer 2004: 78).

In addition to his flawed used of phenomenological concepts, these problems in Schaeffer's theory also stem from a broader failure to address the sound object as it might exist in larger musical structures, rather than just as an isolated entity. '[Schaeffer's] *Traité des objets musicaux*', argues Nattiez, 'deals only with isolated sound-objects contemplated for their own sake, and not with sound-objects integrated into a musical work … Ordinary perception of a sound-object within a work, of course, never operates independently of what precedes and follows that element' (Nattiez 1990: 94)

4. METAPHOR, NARRATIVE AND MIMETIC SPACE

4.1. Metaphor and narrative

In *Unsound Objects*, Harrison is able to transition freely from a strictly Schaefferian compositional methodology to a more expanded musical language. He does so primarily by utilising sound objects whose identity falls outside the epoché, due to the context in which they are presented in the piece. It is worth examining, however, the kinds of musical language Harrison uses in these instances. Freed from the narrow strictures of reduced listening, electroacoustic music may utilise the vast range of extra-musical meaning inherent in recorded sound. Fischman's discussion of mimetic space is relevant to this analysis, in particular his notion of 'narrative-signifier space' (Fischman 2008). According to Fischman, this concept may be used to explain musical situations in which 'sonic materials with the capacity to instigate meaning through processes of source-bonding and surrogacy become mimetic interpretants in the construction of narrative meaning' (Fischman 2008: 118).

First, we shall examine the manner by which Harrison creates a context within which a sound object may be perceived metaphorically. In his analysis of *Unsound Objects*, David Hirst divides the piece into two halves at 6 minutes and 54 seconds (Hirst 2013). The first half of the piece is concluded by the sound of a door closing shut. At this moment in the piece, the door sound may be perceived quite clearly as a metaphor, signifying the 'closing off' or ending of the preceding musical material. The potential for this signification is contained in the sound of the shutting door, but is not inevitable; Harrison again uses context to shape the identity and meaning of the sound object in the mind of the listener.

At 5:06, sounds of a person shuffling through plant undergrowth are heard, against an increasingly faint background of abstract pitched sound. At 5:27, this pitched material is concluded with the sound of a latch being manipulated, as might be found on a wooden door. The shuffling movement continues until 5:35, at which point another door sound ushers in a return of abstract pitched material. By correlating their appearance with the entrance and exit of other sound material, Harrison begins to assign to the door sounds a modicum of causality. Additionally, the outlines of a simplistic narrative may be discerned, a device that Harrison further develops in subsequent sections. A listener may easily infer a connection between the causality of the door sounds and the presence of a human, suggested by the shuffling sounds. Thus, some amount of intention and action on the part of a human agent may be assumed. The strength of this narrative, however, is weakened by the surrealistic sound environment in which it occurs, which makes it somewhat more difficult for the listener to envision a particular narrative scenario. Later in the piece, beginning at 9:36, narrative is again briefly evoked. As before, sounds of clearly identifiable human action (taking out keys, manipulating a latch) lead to the sound of a door opening at 9:48. This sound 'causes' a drastic shift in the sonic environment, and the introduction of new sound material; thus, a human agent seems to intentionally cause the beginning of a new section in the piece.

4.2. Mimetic space and Schaeffer

Harrison's use of mimetic space in *Unsound Objects* is significant with regards to the piece's larger engagement with Schaefferian theory, and not merely because it represents a clear break from the requirements of reduced listening. Rather, Harrison's use of mimetic space demonstrates the way in which a given sound object may be used effectively within a variety of musical languages, as well as some of the methods by which acousmatic composers can move freely between these languages without creating a sense of compositional 'chaos' for the listener.

The end of the first half of the piece, in which the door sound is used as a signifier at 6:51, is preceded and followed by sections in which a Schaefferian musical language dominates, and extra-musical meaning is minimised. Thus, Harrison variously leads the listener towards the epoché and then away from it, belying Schaeffer's insistence on the necessity of constant reduced listening. Again, the use of context is shown to be a critical tool for shaping the identity of the sound object, and its function within a musical language. The movement of a person through plant growth reappears later in the piece, at 10:43. In this instance, however, the footsteps have no narrative function, and indeed

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are more likely to be heard with reference to their morphological characteristics than to their presumed source. Because they are preceded and followed by a series of abstract sound objects which exhibit a similarly noisy timbre and active morphology, the sound of human movement may be perceived in Schaefferian terms, without regard to its extra-musical associations.

5. CONCLUSION

Schaeffer's attempt to create a musical theory which, in his view, inverted the usual order of musical creation was undoubtedly a radical endeavour. Schaeffer's theory of musique concrète stands in explicit opposition to the tradition of Western art music, which according to Schaeffer proceeded from 'abstract' ideas to their 'concrete' realisations in performance. Musique concrète, however, would do the opposite, beginning with the sound itself. This self-conscious rejection of musical tradition, and the attempt to forge an entirely new experimental music theory, is the fundamental radicalism which lies at the heart of Schaeffer's project. This project was, in Schaeffer's words, 'a u-turn in the practice of music' (Chion 1983: 38).

In contrast to Schaeffer's ambitious attempt at musical revolution, then, Harrison's engagement with Schaefferian theory seems to approach a kind of anti-radicalism: a refusal to accept any single musical system as absolute and all-encompassing. While Schaeffer rejected many aspects of the tradition of Western music, as well as the new theoretical frameworks of his contemporaries (*elektronische music*, for example), Harrison does not even entirely reject Schaeffer's theories. Rather, Harrison seeks to widen the range of compositional tools available in acousmatic music, while recognising the continued worth of Schaefferian techniques. Somewhat like Merleau-Ponty's engagement with Husserl's work, Harrison refuses any excessively dogmatic practice of Schaeffer's theories.

Yet, Harrison remains dedicated to the essential radicalism which is at the heart of Schaeffer's project. 'At its simplest', Harrison says, 'acousmatic music starts, continues and finishes with sound. It is based on *per*cept, not *con*cept' (Palmer 2002: 2). This idea is inherited directly from the very origins of musique concrète, which according to Chion was meant by Schaeffer to be in opposition to music based on 'an abstract concept' (Chion 1983: 37). Though their conceptions of this idea, and the conclusions they draw from it, are not identical, both Harrison and Schaeffer are committed to a framework for electroacoustic music which has as its starting point the concrète, rather than the abstract. This notion, 'sound as the raw material of music' (Harrison 2014), is as much a radical idea now as it was in Schaeffer's day. In view of its essential opposition to a wide variety of twentieth- and twenty-first-century compositional techniques, it seems likely that this Schaefferian concept will remain radical well into the future.

In her article entitled 'Trends in Electroacoustic Music', Natasha Barrett sums up the attitude of many contemporary composers towards Schaeffer's methodology: 'Our perceptual mechanism has been biologically conditioned to explain causation and find meaning. Developing an entire musical language based on mode 3 [*entendre*] is therefore unrealistic. But there are some exceptions' (Barrett 2007: 235). *Unsound Objects* encapsulates this mindset; Harrison shows the ultimate futility of attempting to continuously adhere to the epoché Schaeffer requires, by exhibiting the ease with which the identity of the sound object can shift in the ear of the listener. Yet he also aptly demonstrates the value Schaeffer's compositional methods have in crafting an acousmatic musical language, through the use of structures which emphasise the intrinsic, morphological characteristics of the sound. 'The most important lesson which the reduction teaches us', said Maurice Merleau-Ponty of Husserl's phenomenological discovery, 'is the impossibility of a complete reduction' (Merleau-Ponty 2005: xiv). So too does Harrison acknowledge the impossibility of Schaeffer's absolutist vision of the epoché. Like Merleau-Ponty, Harrison recognises the epoché as a powerful and indeed invaluable tool, albeit one which must be used selectively, and whose limitations must be recognised.

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