

# Narrative Modes in Acousmatic Music

JAMES ANDEAN

Music, Technology and Innovation Research Centre, De Montfort University, Leicester LE1 9BH  
Email: james.andean@dmu.ac.uk

**Beginning with a brief overview of acousmatic narrative, this article proposes that in listening to acousmatic music we select and move between distinct narrative modes, according to the requirements and implications of a given work, or shifting between modes as the work progresses. Similarities and differences with existing theory are considered. Ten narrative modes are proposed as relevant for acousmatic music and discussed. Finally, the appearance of narrative archetypes across multiple modes is considered, as well as similarities across other musics and other fields.**

## 1. ACOUSMATIC NARRATIVE

Acousmatic music is an inherently narrative art form. To some extent this is due to the characteristics and genesis of the genre: on the one hand, acousmatic music's deployment of recorded real-world materials tends to carry with it a range of real-world references and associations that almost inevitably evoke a narrative experience of the work (Andean 2010); on the other hand, this narrative aspect results from much deeper features of the principles of the genre, due in no small part to the phenomenological emphasis of Pierre Schaeffer (1952, 1966) in the birth of the art form. Of course, many say the same of music in general – that musical experience is a fundamentally *narrative* experience (among others, Tarasti 1994; Almén 2008; Grabócz 2009). However, acousmatic music is more deeply – or at least more clearly – narrative than can be claimed for music in general, in part due to its prioritising of perceptual response over structural elements, but also of course due to some of the resources at its disposal. Real-world sound sources, though not a 'must' in acousmatic composition, are nevertheless commonly used and often present, carrying with them a strong degree of narrativity due to their associations with the sources, actions and surroundings that gave them form. However, as a result of the phenomenological roots and emphasis on perception that have guided the development of the acousmatic 'language', it could be argued that even those acousmatic works that include no real-world or otherwise clearly referential materials involve a substantially narrative discourse (works such as Åke Parmerud's *Renaissance* (1994), for instance).

### 1.1. Narrative

'Narrative', however, is a slippery term, ranging from narrower definitions – which, in their precision, tend to limit narrative to a literary and textual phenomenon – to the broadest definitions, which tend to paint narrative in such broad strokes of human experience that its usefulness as a theoretical tool is somewhat reduced. We will primarily be focusing on a 'middle ground' definitional area, which tends to emphasise time and change as marked by a succession of events (Brunson 2012): 'the representation of an event or a series of events' (Abbott 2008); 'the representation of a temporal development, which consists of a succession of events' (Meelberg 2006), although both the broader and the narrower definitions are also, at least occasionally, of relevance to certain areas of acousmatic narrative, as we shall see. An important distinction should be made here, however. Both of the definitions above, by speaking about 'representations', appear to be speaking about narrative as a function of the work itself, and to thereby be operating at Nattiez's 'neutral level' (1990); here, however, we will be emphasising narrative as a function of the act of reception, rather than as some autonomous quantity residing in a 'work' that is somehow independent of human construction or contact. Instead, let us combine these with David Herman's broader definition, which describes narrative as 'a basic human strategy for coming to terms with time, process, and change' (Herman 2007, quoted in Brunson 2012). Herman's emphasis is different, describing narrative not as a function of a work, but as a function of our *experience* of the work – in our case, as a function of the listening experience. We can therefore adjust the above definitions accordingly: 'our *experience* of an event or a series of events'; 'our *experience* of a temporal development, and of a succession of events'.

Brunson's proposal of a 'narrative stance' is useful here, positing narrative as a conscious attitude taken towards the work (Brunson 2012). By describing narrative as an active position taken by the listener, this position perhaps bears similarities to Harrison's 'expanded listening' (Emmerson 2007:15) and Leigh Landy's 'heightened listening' (Landy 2007: 105), all of which run counter to the deliberate anti-narrativity of Schaeffer's 'écoute réduite' (Chion 1983).

## 2. NARRATIVE MODES

If we look under the hood of this ‘narrative stance’, however, we find that beneath what might appear on the surface to be a single listening position is, in fact, a busy multiplicity: a number of angles and perspectives, a number of ‘narrative lenses’ through which to view the work, from which the listener can choose from work to work, or, more likely, between which they can flit back and forth according to the suggestions and implications of the evolving moment.

This is primarily due to the fact that the ‘narrative’ of an acousmatic work is not a single identity, but many; stems not from a single parameter, element, or layer, but, potentially at least, is situated simultaneously in many; results not from a single process, but from many, working together to collaboratively construct a sense of narrative. Emphasising once again that these are not ‘neutral’ elements of the work, but are active engagements by the listener, we can propose a number of narrative ‘modes’ in acousmatic listening, between which a listener might choose and shift, and that collaborate together to form an overall sense of the narrative of an acousmatic work.

The modes proposed here (Table 1) are:

- Material narrative
- Formal narrative
- Structural narrative
- Mimetic narrative
- Embodied narrative
- Parametric narrative
- Spatial narrative
- Studio narrative
- Textual narrative
- Extramusical narrative.

This is not intended as necessarily a complete or authoritative list, but rather as a starting point, containing some of the more obvious modes of narrative engagement in acousmatic music, as well as a few that may be somewhat more contentious. Also, these are not proposed as discrete identities, but rather as shifts in perspective, between which the listener is likely to move depending on the usefulness of a given mode for the evolving moment of a work; as a result, some of these modes are overlapping. A given piece may emphasise or prioritise a single mode; but, more likely, a work will engage or enact a number of modes, through a range of narrative cues and resources.

While the ‘narrative stance’ is very much an act of the listener, rather than the composer, a composer might nevertheless, through the discourse of a given work, seem to suggest or recommend that such a stance be taken; for example, Brunson (2012) describes Stockhausen as ‘embedding’ a narrative stance into *Kontakte*. Similarly, although these narrative modes

are entirely aesthetic, a composer might communicate to the listener the relevance or appropriateness of a particular mode via the particular affordances of that given work.

### 2.1. ‘Universal’ modes

Some of these modes are shared with tonal or other instrumental musics, while some are unique to acousmatic music, or at least are much more likely to appear in, or be engaged by, acousmatic music. More ‘universal’ modes may be enacted similarly across genres and musical forms; or, they may behave quite differently in acousmatic music than in other musics. Formal narrative is an example of a mode common to many (or most) musical genres; however, as we shall see, there are nevertheless some implications and affordances of formal narrative as it appears in acousmatic music that are unique to the genre.

## 3. EXISTING THEORY

Some of the ‘narrative modes’ proposed here come very close to earlier theoretical models, for example those of Smalley (1997) and Wishart (1996), among others, as well as touching on very similar territory to Leigh Landy’s thoughts on dramaturgy (2007: 36) and his ‘something to hold on to’ factor (1994) – for is narrative not the ultimate ‘something to hold on to’? However, with regard to Wishart and especially Smalley, there are some important distinctions here. Prime among these is the insistence on music as a temporal experience; another is a shift in emphasis from composer to listener. This latter can be reframed as a move away from poetic narrative, towards aesthetic narrative; away from composed narrative, and towards received narrative (Andean 2014a). Interestingly, the assertion that earlier theory was centred on the composer appears to directly contradict explicit claims by some of the theorists in question; for example, Smalley (1997: 107), who states that he is not proposing ‘a compositional theory or method, but a descriptive tool based on aural perception ... intended to aid listening’. However, it could be argued that the detailed analytical approach taken by Smalley is far removed from the ‘normal’ listening condition, and much nearer to the isolation and magnification of materials that is often involved in acousmatic composition.

This, in fact, brings together the two distinctions given above: an emphasis on the work as an experience ‘in time’, and an insistence on the listener’s experience. The experience of listening to the work is fundamentally about time; as a result, when considering works from a narrative perspective, it is pointless to isolate materials, removing them from the temporal flow, in order to examine them more closely,

as this immediately nullifies their meaning and their value – a statement familiar to us from Heisenberg, and as true of musical material as it is of the humble electron. This fundamentally temporal quality of narrative is a direct consequence of the fundamentally temporal quality of experience:

Finally, narrativity can be understood in the very common sense as a general category of the human mind, a competency that involves putting temporal events into a certain order, a syntagmatic continuum. This continuum has a beginning, development, and end; and the order created in this way is called, under given circumstances, a narration. (Tarasti 1994: 24)

In other words: human experience is fundamentally temporal; because narrative both informs and is informed by human experience, it, too, is fundamentally temporal; and, closing the circle, temporal experience is fundamentally narrative.<sup>1</sup> From this, we can further assert that our experience of music will be fundamentally narrative, since music is experienced ‘in time’.<sup>2</sup>

#### 4. NARRATIVE MODES IN ACOUSMATIC MUSIC

We will now describe ten narrative modes that are of relevance for acousmatic music. We will use a number of repertoire examples to demonstrate these modes, central among which will be Robert Normandeau’s *Rumeurs (Place de Ransbeck)* and Jonty Harrison’s *Undertow*.

##### 4.1. Material narrative

As has been argued above and elsewhere (Andean 2010, 2014a), one of the obvious elements of acousmatic music that sets it apart from other musical forms in its degree of narrativity is the potential use and presence of recorded real-world material. This ranges from short, discrete, isolated materials, to the use of dominating, full-bodied soundscape recordings offering a fully formed sonic environment containing any number of sonic agents, backgrounds and details. These are all notably different from the referential capabilities of instrumental music, which can only evoke real-world sources through metaphor and similar indirect devices. ‘Material narrative’ is closely related to Smalley’s ‘source bonding’ (Smalley 1994: 37) and ‘first-order surrogacy’ (Smalley 1997: 112).

<sup>1</sup>Crites equally asserts that ‘the formal quality of experience through time is inherently narrative’ – and, interestingly, continues on to propose that ‘the style of action through time is inherently musical’ (Crites 1971: 291).

<sup>2</sup>Interestingly, Smalley (2007: 38) appears to deny this fundamentally temporal quality of electroacoustic music; however, this is perhaps in fact less of a denial of time’s role, and instead a proposal that time is instead subservient in some ways to space (Marty 2016a).

Both *Rumeurs* and *Undertow* offer extremely strong material narratives, in that the vast majority of materials in both works are recorded real-world sounds, most of them recognisable to a significant degree, or at least sufficiently suggestive as to be directly evocative of an imagined source. The more closely linked to, or immediately evocative of, a sound source, the likelier it is that the material narrative mode will be invoked. As sounds become increasingly abstract, more distant from potential sources, the material narrative mode weakens, making shifts to other modes likely – for example, towards the mimetic narrative mode, and then, as materials become more abstract still, perhaps towards the structural or studio narrative modes, depending on the behaviour of the materials in question.

In *Rumeurs*, materials range from the recurring motif of slamming doors, through rattling chains, footsteps on creaking floorboards, a buzzing fly, a flushing toilet and an astonishing number of other sources. In *Undertow*, materials are focused on the waves of the opening and closing beach soundscapes, and the bubbling sounds that make up the bulk of the work. As is already clear from these brief descriptions, although each work offers an extremely strong material narrative – in that, throughout the majority of both pieces, very clear imagery is produced by the sounds heard – there is a significant difference in the clarity of the relationships between these sounds, and in the degree of a concrete sense of ‘storyline’ that results. However, this is not a product of the material narrative mode – since, as just described, the two works are roughly equal in this regard – but lies elsewhere, for example in the formal, mimetic and embodied narrative modes.

##### 4.2. Formal narrative

Of the narrative modes proposed here, the formal narrative mode is perhaps the most closely connected to existing theoretical discourse on musical narrative. It is the category of what is traditionally described as ‘musical form’, reaching across the full length of a work; traditional examples include binary form, rondo form, sonata form and so on (Berry 1966). Form at this level is too often treated as a largely technical architecture, or as simply ‘boxes to be filled in’; this misses its crucial role as an essential musical ‘storytelling’ device, for which it has received so much attention in musical narratology. For example, at its broadest level, ternary form is a narrative of ‘the return’, which, depending on the details of its development, can be further specified as, for example, ‘the triumphant return’, or ‘the nostalgic return’, etc. The broadest themes of musical narrative, such as ‘victory’ or ‘defeat’, ‘order’ or ‘transgression’ (Almén 2008), tend to play out, or at least to be emphasised, in this mode.

The formal narrative mode is one of acousmatic music’s most direct inheritances from music history,

tending to function in a very similar manner, and serving a very similar purpose, to its role in other musical forms. As a result, to some extent it is the mode that is best covered by existing musical narratological literature. However, the formal narrative mode is an excellent example of one of acousmatic music's unique strengths in narrative delivery: where instrumental music tends to be limited to metaphor in the delivery of narrative themes (Spitzer 2004; Zbikowski 2008), acousmatic music can be explicit and entirely literal. This was mentioned in our discussion of material narrative; it is true again of formal narrative. *Undertow* provides an excellent example of this. The work is a very clear example of ternary form, that is, ABA: materials are introduced in section A; new materials are introduced in section B; followed by the return of the section A materials. In instrumental music this can offer a metaphor of 'coming home', of travelling out and then coming back to where you started. In *Undertow*, however, explicit materials, coupled with an explicit formal narrative, make this entirely literal: the 'subject' of the work (with whom the listener is invited to identify by the extremely close spatial placement of key sound materials) begins on a beach; then walks into the water, until submerged; then finally returns back up onto the beach. What remains a metaphor in instrumental music is here made literal, thanks to the unique affordances of the acousmatic genre: the metaphorical 'return home' of the ternary form is now entirely explicit, as the listener returns back out of the water and back up the beach, to end where (s)he began.

### 4.3. Structural narrative

The structural narrative mode is a particular challenge for acousmatic music. It is an attempt to address those aspects of narrative that are communicated through 'language' or syntax (Emmerson 1986). In tonal music, for example, narrative elements that are communicated through the use of major or minor keys, perfect or deceptive cadences, delayed resolution and so on would all fall under this mode. Serialism offers another example of narrative meaning being communicated (potentially at least) through syntax and structure (see, e.g., Street 2013). This is more problematic with acousmatic music, however, because, although it does indeed access the structural narrative mode, the genre lacks the kind of clearly defined, unified syntax that makes this mode so effective in tonal music – that is, in which a shared structural signifier (e.g., 'minor key') is immediately associated with a given narrative signified ('sad'). While there are syntactical elements to Schaeffer's initial framework, the genre has evolved and branched out significantly since these early roots – a complex process that has resulted, in fact, not so much in a loss of syntax, but in

its multiplication. This has resulted in quite a number of available syntaxes, between which a composer can pick and choose from work to work, or even within the scope of a single work. This has led to a number of identifiable structural 'currents' within the broader acousmatic stream – a 'gestural school', a 'timbral school', a 'microsound school' – each of which tends to orient towards rather different structuring processes. These can be quite elaborate and sophisticated, but are sometimes shared only within that given 'school', losing relevance as one moves further out into the broader acousmatic field – for example, the detailed granular structuring mechanisms of the 'microsound school'. This is further complicated by acousmatic music's chameleon-esque ability to absorb or reference existing syntaxes, the most obvious being, of course, that of tonal music, whether it forms a central structuring principle, as for example in some of John Young's work, or is simply referenced in passing, via the occasional cadential ending for example. This lack of universalism in acousmatic structural strategies can be of enormous benefit to the genre, as it offers a great richness and flexibility; but it does significantly weaken the communicability of structural narrative. It could be argued, however, that acousmatic music more than compensates for this weakness through the strength and number of the other narrative modes available.

Some of the strongest proposals for acousmatic structure come from Trevor Wishart (1994, 1996), who has detailed his structural strategies in his own compositions in *Sound Composition* (Wishart 2012). While these are extremely strong, they pose a couple of challenges in proposing them as agents of structural narrative. One of these is that such strategies are not always readily discernible to the listener under 'normal' listening conditions, which runs contrary to our emphasis on narrative being linked directly to the listening experience. Some of Wishart's works – for example, *Encounters in the Republic of Heaven* (Wishart 2010) – incorporate quite a number of structuring mechanisms, some of which are readily perceptible to the concert listener – for example, some of the spatial structuring mechanisms – while others are not – for example, some of his structuring work at the microsound level (Wishart 2010).

In general, however, the acousmatic genre is to some extent predicated on the 'playing down' of these kinds of structures in favour of a more sculptural approach to sound. As a result, depending on the approach taken, the structural narrative mode at times comes close enough to other narrative modes – for example, the material or mimetic modes – as to arguably cease to be a distinct mode in its own right. Thus, while the structural narrative mode is of central importance in many – or possibly most – other musical genres, it is of seriously reduced significance in acousmatic music. As a result of this relative weakness, it often works in

tandem with other modes to produce narrative collaboratively. Consider, for example, the climactic ‘closing doors’ sequence towards the end of *Rumeurs* (approx. 11’00” to 12’00”), in which a series of opening and closing doors reveal brief ‘windows’ onto scenes and materials from earlier in the work. Can we claim this to be ‘structure’? To some extent, perhaps, in that it establishes a system and a pattern that is recognised as such and that can then be developed or contradicted. However, it could be argued that other narrative modes play a much stronger role here. For example, material narrative is clearly invoked through the easy recognition of the doors; formal narrative through the regular referencing of material from earlier in the work, whose return marks this passage as climactic and points towards the impending end of the piece; and also possibly embodied narrative (which will be discussed below), through the familiar and recognisable pacing of the very ‘natural’ open/close rhythms of the doors, the turning of knobs and latches, etc. In the resulting network of narrative modes, it could be argued that the role of structural narrative here is not among the strongest.

If we examine *Undertow* for structural narrative, we come up somewhat empty-handed. While it could be argued that there are structural qualities that allow for our recognition of the opening and closing ‘beach’ soundscapes (Bregman 1990), this is not relevant to the structuring of the work per se. This leaves us with the longer central ‘bubbling’ section of the work. Here, however, while there may very well be structuring mechanisms at work, they are not perceptible to the casual listener, and the composer has not chosen to reveal any such mechanisms in the work’s liner notes (Harrison 2007; see section 4.10 below). As a result, structural narrative plays no appreciable role in the experience of *Undertow*, a situation that is not uncommon in acousmatic music.

#### 4.4. Mimetic narrative

It can be argued, however, that acousmatic music has, in fact, developed a functional syntax that is drawn from our embodied understanding of movement and behaviour in the world around us (Basanta 2010). This allows the acousmatic composer to establish order, expectation and anticipation, and thereby also to thwart expectation and to surprise, delay, or deny resolution (Andean 2010). Consider, for example, the immediately recognised and understood pattern of the bouncing ball – a series of accelerating impacts; or, of a fall – a descending glissando, followed by an impact. These require no explanation; they are patterns – or, indeed, structures – that we immediately recognise, and which can therefore be employed by the composer to shape and deny expectation: delaying the impact after the fall, thereby creating tension and release; reversing

or otherwise transforming the ‘bouncing’ archetype; etc. These, it could be argued, offer what we might call a genuinely acousmatic syntax, and so it is here, perhaps, that we find the key to acousmatic structure.

However, while it would perhaps be fair to argue that these structures play a role in the development of the structural narrative mode in acousmatic music, this misses the point somewhat, in that this may not be the primary mode of reception for such materials and behaviours. Our recognition of ‘bouncing ball’ or ‘falling object’ behaviours may indeed be used by the composer to develop structure (Emmerson 1986; Wishart 1996), but the listener does not respond to these first and foremost as ‘structure’. Rather, it is the behavioural source-bond that dominates our reception of such materials, at least initially, while structural roles are perceived in a secondary fashion, if at all.

It is for this reason that this is here proposed as a distinct narrative mode: the mimetic narrative mode, in which the materials behave in a manner that we recognise from our experience of the world. As described above, this mode may be closely linked to the structural mode, if the composer has chosen to use this behaviour as a source of structural elaboration (through repetition, variation, extension, etc.). It is also closely related to the material narrative mode, in that both rely on recognition and familiarity based on real-world objects and behaviours; however, there is an important distinction to be made there – between ‘objects’ and their ‘behaviours’. Material narrative is based on object recognition – for example, ‘a ball’ – whereas mimetic narrative is based on behaviour recognition – for example, ‘bouncing’. While these may be closely linked – as, for example, in ‘a bouncing ball’ – acousmatic music also allows for them to be entirely distinct, as, for example, in ‘a bouncing cat’ or a ‘mewling ball’. This kind of play and tension between the material and the mimetic has been made a centrepiece of works such as Trevor Wishart’s *Red Bird* (1980) – see, for example, Wishart’s ‘imposed morphology’ (1996: 177–89). In other words, while the material and the mimetic may work together to collaboratively construct narrative, they may equally well work separately, providing two distinct or contrasting layers of narrative, and are therefore listed here as independent modes.

*Undertow* provides another example, although somewhat in contrast with *Red Bird*. As we learn from the liner notes, at least some of what appear to be ‘breaking waves’ in *Undertow* are, in fact, constructed from recordings of car motors (Harrison 2007). However, in this case, the break between Material and Mimetic is known only to the composer – the mimetic illusion is sufficiently strong that the listener is entirely unaware of ‘car’ as sound source, as a result of which it has no bearing on the material narrative. Instead, regardless of sound source, the material and

mimetic narrative modes of the work are entirely aligned, both speaking only of ‘breaking waves’.

By contrast, on the surface at least, the mimetic narrative mode is minimally engaged in *Rumeurs*. The closest, perhaps, might be the use of disparate materials to create compound objects and textures, for example at 0’24” to approximately 1’00”; the claim here would be that the compound texture displays a collective behaviour that, in its details, is distinct from the recorded behaviour of any of its single recorded materials taken individually.

#### 4.5. Embodied narrative

The real-world recognition that is exploited in mimetic narrative is not limited to the world ‘out there’, beyond and around us; instead, our experience of the world is firmly rooted in our own selves. The most defining factor of our perceptual experience of the world is the nature of the perceiver (Gibson 1966). Our concepts of action and gesture are not limited to the passive observation of balls bouncing and so forth, but are to a much greater extent determined by having arms that can swing, throw and sweep, and legs that can walk and run; by the rhythms of breath and heartbeat; and so on (Johnson 1987; Godøy 2010). Thus, when acousmatic music makes use of our understanding of the world to generate narrative, much of this ability lies specifically in our embodied experience of the world (Windsor 2000). This carries forward into the work, making acousmatic listening a fundamentally embodied experience (Andean 2012). When we listen to *Rumeurs*, we do not stop at an objective recognition of ‘closing doors’; we can imagine, or even *feel*, ourselves opening and closing those doors. When we hear pipes scraping along the ground, it is as though we ourselves were dragging those pipes. And so on. This is even stronger, though somewhat simpler, in *Undertow*: we have a clear sense that it is we ourselves who are descending from or ascending up the beach; that it is we ourselves who become submerged; that it is we ourselves who are underwater. This is not mere mental imagery; it is a very physical reaction that results.

This embodied sense not only of *observed* action, but also of the listener’s *own* action is inherently pleasurable and rather thrilling, and has always been a part of the charm of the acousmatic genre. Interestingly, in recent decades cognitive research has caught up with our intuitive awareness of this experience, primarily with the discovery of ‘mirror neurons’, which are activated not only when we engage in an activity ourselves, but also when we *observe* someone else engaging in that activity (Rizzolatti and Craighero 2004). This explains, for example, some of the visceral pleasure we take in watching sporting events, or action in films; it is also clearly at play in our experience of acousmatic music.

This is not unique to acousmatic music; there is a great deal of theory arguing that embodied narrative is a crucial aspect of the musical experience more generally (Clarke 2005; Lidov 1987; Leman 2010). However, by directly incorporating imagery from a much broader range of activity, it could be argued that acousmatic music expands, or at least relies more heavily upon, this narrative mode.

#### 4.6. Parametric narrative

There are cases in acousmatic music in which a work is largely, or entirely, focused on a single musical/sonic parameter – for example, rhythm or timbre – from which it develops the majority, or entirety, of its discourse (Landy 2007: 29). In some of these cases, the narrative of the work is generated largely from within the development of that single parameter; or, in other words, that parameter *becomes* the narrative of the work. This drifts close to structural narrative, but is sufficiently distinct – though arguably much less common – to deserve its own category here. In part this is because the resulting narrative is constructed or perceived rather differently: structural narrative constructs an argument, whereas parametric narrative is the argument itself – a distinction between the language used to communicate an idea, and the direct assertion of the idea itself, or between signifier and signified.

A primary example of parametric narrative in acousmatic music is Normandeu’s ‘timbre spatialisation’ works (Normandeu 2009) – for example, *StrinGDberg* and *Éden* (Normandeu 2005) – which present large chugging monoliths of timbral slices set into motion. This process is not used to build an argument; instead, this process is set in motion, and simply observed – or rather, experienced – and it is this experience that is the primary narrative of the work. Note that parametric narrative is arguably less collaborative than most of the narrative modes; material, structural, mimetic, and embodied narratives – sometimes even formal narrative – all fall away, leaving the parametric narrative mode dominant.

#### 4.7. Spatial narrative

One of the truly remarkable opportunities offered by acousmatic music is its capacity for spatial narrative. Sound and space share a symbiotic relationship: sound requires space in order to propagate and make itself heard; while it is from sound that we collect much of our information about space – in other words, space communicates with us through sound (Stocker 2013). Every recorded sound tells two stories simultaneously: one about source, and one about space – about a source object or action that might have caused the sound we hear, and, at the same time, about the space that surrounded that object or action. As a result, while an

acousmatic work can be thought of as a series of sound events, with space serving as simply one parameter among many, the reverse can also be true: the acousmatic work as a series of spaces, in which the sound serves only to illuminate or activate those spaces. ‘One piece of music could be a single space, or it could be developed as a succession of spaces, establishing virtual relations between spatial forms, movements, actual relations, potential relations and the interweaving of time and space’ (Marty 2016a). In other words, ‘[s]pace itself can “tell a story”’ (Emmerson 2007: 102).

For many listeners, conscious attention is drawn primarily to sonic actions and objects, while space is relegated to a more subconscious level of reception; this is not always the case, however – such listening priorities are very personal, and can vary significantly between individuals. For example, in describing his electroacoustic listening priorities, Nicolas Marty puts the foremost emphasis on space, with other qualities taking a back seat: ‘I prefer to listen to sound as a kind of anti-matter, with space surrounding it as matter ... The technique, sound materials ... well that’s not important to me, maybe we hear it, maybe not, but it’s not the point, in my opinion’ (Marty 2016b).

In the section on material narrative, *Rumeurs* was described as offering a steady stream of sound objects and events; but, as we have just seen, these could equally well be described as a stream of spaces. In fact, Normandeau here offers some useful examples of the material and spatial modes pulling apart. For example, in the climactic door sequence (described above in section 4.3), this string of doors, considered as material narrative, remains fairly static: a door, another door, and then another – multiple instances of a single identity. Spatially, however, this is quite a virtuoso passage; not static, but quite the opposite, as each of these doors portrays a unique space – some closer, some farther away; some more reverberant, some less; some larger, some smaller; some realistic, some fantastic; and so on. It could be argued that Normandeau’s doors provide a strong example of the case described above, in which sound is used simply in order to trigger space: once we have recognised the first couple of doors, the door no longer provides any new narrative input of its own, but instead serves as an impulse to activate a series of spaces. This plays a critical role in the narrative experience of this section, telling a story of imaginative, constantly shifting spaces.

Part of the importance of spatial narrative in acousmatic music lies in its potential usefulness to the broader field of narratology. ‘Narrative space’, or ‘narrative spatialisation’, has generated significant narratological interest in recent decades (Herman 2002; Ryan 2009); however, it is considered a challenging subject, in that, in literature – which, despite a recent push towards other narrative forms

and media (Ryan 2004), remains the primary focus for much of the field – space and spatialisation are somewhat ephemeral and abstract, difficult to pin down for closer study. With sound, on the other hand, due to its dominant role in our perception and experience of space, space and spatialisation are much clearer, more explicitly crafted and presented, and more explicitly received and understood. This provides yet another example of aspects of narrative that, while left to more distanced or mediated modes in other genres or art forms, become explicit and literal in acousmatic music, which, with its nearly endless capacity for the creative crafting and deployment of space, therefore offers an ideal playground for the study of narrative spatialisation.

#### 4.8. Studio narrative

All the narrative modes discussed to date deal only with ‘listening to the work’; the studio narrative mode, however, deals with ‘listening to the making of the work’ – or rather, ‘listening to the (perceived or imagined) making of the work’. This is the mode in which we listen to (or imagine that we listen to) ‘the hand of the composer’: rather than listening to the materials ‘as’ materials, we listen to their crafting and shaping; rather than engaging the mimetic mode, we listen to the tracks of the composer’s in-studio performance gestures; the embodied mode changes focus, from re-living the encoded ‘virtual’ gesture (‘a bouncing ball’) to re-living the composer’s performative gesture (e.g., hand on a controller, creating the ‘bouncing’ gesture). The description of Harrison’s ...*et ainsi de suite*... in Andean (2014b) is a strong example of the studio narrative mode, by which the composer becomes both the ‘implied author’ (Booth 1961) and ‘protagonist’ of the work. This mode is also closely linked with Smalley’s ‘technological listening’ (Smalley 1997) and Landy’s ‘5ième écoute’ (Landy 2007).

Smalley argues that, in fact, studio narrative should be ‘bracketed out’, in a variation on écoute réduite or Schaeffer’s ‘époque’ (Chion 1983: 31): ‘Technological listening occurs when a listener “perceives” the technology or technique behind the music rather than the music itself, perhaps to such an extent that true musical meaning is blocked.’ [W]e must try to ignore the electroacoustic and computer technology used in the music’s making. Surrendering the natural desire to uncover the mysteries of electroacoustic sound-making is a difficult but necessary and logical sacrifice’ (Smalley 1997: 108–9). While studio narrative does indeed draw attention away from other modes, there is no need to consider the studio narrative mode as somehow inferior; it is as able, and as rewarding, in its narrativity as any other mode. And, once again, it is often engaged simultaneously with other narrative

modes – in this case, more likely in parallel than working towards the creation of a ‘compound mode’, as there is some distance between narrative imagery of ‘the hand of the composer’ and the imagery of the sound sources embedded in the work. In fact, this distance is occasionally played with or manipulated, the distortion and confusion between ‘composer’ and ‘embedded sound’ becoming its own source of narrative, a technique regularly engaged by Ferrari, and more recently by Tullis Rennie in works like *Muscle Memory*.<sup>3</sup>

Returning to Smalley’s plea for a focus on ‘true musical meaning’, we might ask what, in acousmatic music, might actually qualify. For example, Smalley’s own ‘source bonding’, which is surely of great significance in the appreciation of much acousmatic music, presumably does not fall into the category of ‘true musical meaning’. Nor would the majority of the narrative modes we are describing here. Why, then, is ‘technological listening’ so easily dismissed? Is ‘technological source bonding’ a priori inferior to other forms of source bonding? One possible argument might be that ‘technological listening’ has limited audience reach, in that only those intimate, or at least familiar, with the studio tools and processes in question will recognise and respond to such materials. However, this is perhaps something of a phantom concern, since, like it or not, much of the acousmatic listening public consists of acousmatic practitioners themselves; so, while works or passages that are heavily dependent upon the studio narrative mode are perhaps not well suited to outreach towards new audiences, neither are they terribly likely to alienate the existing acousmatic audience.

Neither *Rumeurs* nor *Undertow* serve as particularly strong examples of the studio narrative mode: *Undertow* because it is entirely focused on establishing a very clear narrative that takes place outside the studio, and *Rumeurs* through a prioritising of the original recorded materials, rather than their in-studio manipulation or transformation. However, the latter case does include a number of instances in which our attention is drawn to the composer’s actions in front of the microphone; for example, the squeaking sounds from 1’55” to 2’20”, or what might be the unrolling of a taut stretch of duct tape from 9’50” to 9’57”. A more typical example might be, for example, the middle section of Luc Ferrari’s *Visages V* (1959), with its short, rapid gestures generated through hands-on manipulation of the tape reels.

#### 4.9. Textual narrative

Acousmatic works that include the human voice represent a very particular narrative situation. To

<sup>3</sup>See Waters 2015. Excerpt available at <https://soundcloud.com/tullisrennie/muscle-memory-a-conversation-about-jazz-with-graham-south-2014-excerpt> (accessed 24 June 2016).

begin with, the human voice tends to be one of the strongest source bonds available, immediately identifiable, often despite any degree of processing and transformation. Perhaps, more importantly, the use of the voice, even in a relatively abstract manner, tends to result in personification: the appearance of a voice immediately leads to the conjuring of a subject to whom the voice might belong. Finally, and strongest of all, is the narrative power of the word, which tends to immediately and completely dominate the narrative experience of any work in which it appears.

The textual narrative mode has much in common with literary forms, and, when used in a sonic context, dramatically changes the narrative landscape – bringing a number of new or expanded narrative possibilities to the table, while diminishing the strength and capacities of others (Andean 2014b). This mode has been memorably explored by composers including Luc Ferrari, Hildegard Westerkamp and Katharine Norman. Because textual narrative is such a unique case, it requires its own in-depth discussion, which is offered elsewhere in this collection (Amelidis 2016; Naylor 2016), as well as in a number of analyses by Norman (2000, 2004). For example, Norman’s analysis of Luc Ferrari’s *Presque rien avec filles* (2004) is particularly illustrative of some of the unique affordances of the textual narrative mode. For example, ‘Ferrari’s apparent presence within his own piece ... draws attention to boundaries we might otherwise not have noticed’. ‘[W]e are suddenly aware of the difference between the “first-person” fabricated “composer” and the apparently unmediated natural environment’, granting the capacity to delineate and exploit ‘the difference between fictional truth, fictionalized truth and the “real” truth of non-fiction’, through ‘unreliability in its transitions; between different narrative presences, and between where “fiction” ends and “truth” begins’ (Norman 2000: 231–3).

#### 4.10. Extramusical narrative

Not all narrative stems from within the work itself, however; some – in fact, some of the strongest contributors to the formation of narrative – come from outside. The clearest examples are, first, the title of the work, and second, any accompanying programme or liner notes. However, with the exception of Weale (2006) and Landy (1994), the role that these play in listener perception has been given limited theoretical consideration.

Listeners often assume that these materials offer direct windows into the ‘true’ nature of the work, or at least into the composer’s intentions; Batchelor (2014) draws attention to Emerson’s and Landy’s rather apt term for this, ‘poietic leakage’ (see Emerson and Landy 2016). As a result, the strength of title and



composer's notes in determining the perceived narrative of a work is almost alarmingly strong – alarming, in part, due to the discrepancy between this strength and the potential unimportance of these materials in the compositional process. Composers often either dread the task of assigning title and programme descriptions to their works, or treat this task with a certain degree of contempt, in part because it lies outside of the task of composition (Andean 2014a). These materials, however, inevitably serve as a powerful prism through which listeners will view the work – see for example Weale's statistics on listeners' use of titles in interpreting a work (Weale 2006: 194).

We will once again take *Rumeurs (Place de Ransbeck)* and *Undertow* as examples. The titles of these works are representative of common acousmatic titling strategies: they are brief, and they are simultaneously illustrative enough to be narratively evocative, but vague enough so as to avoid too narrowly restricting audience interpretations. 'All titles "set the scene", conveying the essence of the work through the most minimal of programmatic aids ... They may (and usually do) amount to only one or two words, which permit (through both brevity and strategic word choice...) a degree of ambiguity or "looseness" of interpretation (on the part of both composer and listener) that accommodates (or encourages) the ephemerality of any narrative contained therein' (Batchelor 2014). *Rumeurs*, however, presents an interesting case through its double title: *Rumeurs*, and *Place de Ransbeck*. The former fits Batchelor's description; the latter, however, puts a very particular spin on the work, by tying it to a particular place. The fanciful soundworld of the work, as well as the more dominant *Rumeurs* of the title, ensures that this connection to place is not entirely literal or completely dominant in the narrative experience of the work, but placing *Place de Ransbeck* in the title ensures that the listener is aware of this connection, and potentially changes the tone of the piece significantly, from what could be taken as an entirely fantastical and whimsical piece of worldmaking, to a more grounded and situated work.

The programme notes for these works are also relatively representative.<sup>4</sup> Both are relatively brief; Harrison's extremely so. Both make reference to and support the titles of the works; both again remain vague enough to be evocative without over-determining interpretation. Normandeau's notes are representatively contemplative, and while they may not entirely determine or dominate the narrative experience of the work, they certainly supply a hook on which to 'hang' the work's narrative: 'Elusive ...

Fleeting ... As soon as it materializes, it vanishes, leaving only traces in our memories. Here, nothing is certain ... sounds reach us like faint echoes of the world' (Normandeau 1998). Harrison's notes, however, are an interesting case: 'Plunging beneath the waves we discover a world teeming with life and pulsing with energy. But we cannot hold our breath forever. (And not only that, there seem to be cars down here, masquerading as breaking waves!)' (Harrison 2007). Only a few scant lines, the first two of which are again typically 'evocative but vague'. The last line, however, breaks from this, offering a single very specific fact from the composition of the work: that car sounds were used to generate some of the wave sounds. This may seem innocent enough, but in fact is likely to determine, perhaps not so much the precise listening actions of the listener (was that sound a car? or that one? or how about this one?), but certainly a listening strategy: it draws attention to the alchemical transformation of sound source into sound material, making it very likely that this will guide the listener in their approach to the work. This is perhaps not unwise, in that, as already described, other narrative aspects of the work are extremely strong, clear and communicative; providing this brief pointer in the programme notes helps strengthen an alternative narrative approach to the work.

Normandeau's notes, in fact, end on a similar note, offering a challenge to the listener: 'and if you listen carefully, you may find the key' – certainly very engaging, offering the work as a kind of game or puzzle, to which the listener can hope to find the 'solution'. Again, there is a line that is carefully walked here: trying to add to the listening experience, without thereby dominating or restricting possible interpretations too much; or, in other words, trying to ensure that these extra-musical materials add narrative levels, rather than taking them away.

## 5. COMPOSITE MODES AND 'SUPRAMODAL NARRATIVE'

As has already been described, in most cases, an acousmatic work will engage a number of these modes simultaneously, either collaborating towards a single narrative, or providing parallel narratives for the listener to shift between. We have considered a number of likely modal partnerships throughout the descriptions of the various modes. It would also be possible to propose a situation in which a single narrative is displayed across multiple modes – not collaboratively but simultaneously, in a manner somewhat reminiscent of the Schenkerian expression of fundamental structure across multiple levels (Schenker 1979). This would result in a new dimension of narrative, which might constitute a

<sup>4</sup>These are available online at [www.electrocd.com/en/oeuvres/select/?id=14382](http://www.electrocd.com/en/oeuvres/select/?id=14382) and <http://www.electrocd.com/en/oeuvres/select/?id=20811> (accessed 24 June 2016).

**Table 1.** Narrative modes in Robert Normandeau's 'Rumeurs' and Jonty Harrison's 'Undertow'.

Narrative mode	Normandeau: <i>Rumeurs</i>	Harrison: <i>Undertow</i>
Material	Numerous: doors; toilet; pipe; etc. but, no clear overall narrative	Beach; underwater sounds. Clear overall material narrative
Formal	Climax: return of the doors	ABA – The Return
Structural	Doors as 'windows' (or: formal; material; embodied)	Unknown (possibly in the 'bubbling' material?)
Mimetic	Minimally engaged; perhaps compound objects/textures	Car recordings as 'breaking waves' (minimal impact)
Embodied	Numerous; e.g. opening and closing of doors	'Being underwater', etc.
Parametric	N/A (see Normandeau <i>StrinGDberg</i> )	N/A (see Normandeau <i>StrinGDberg</i> )
Spatial	Numerous; succession of spaces, e.g. doors – spatial variation	'Outdoor' space vs. 'underwater' space
Studio	Performance with materials ('squeaking'; 'duct tape'; etc.)	Limited
Textual	N/A (see Ferrari <i>Presque rien avec filles</i> )	N/A (see Ferrari <i>Presque rien avec filles</i> )
Extramusical	Notes: the work as 'riddle' Title: tied to 'place'	Notes: Mimetic listening strategy

further narrative mode, or 'supermode' – a hypothetical 'supramodal narrative mode'.

A work such as Francis Dhomont's *Points de fuite* (1996) perhaps draws close to such a condition (Andean 2010), as demonstrated in Stéphane Roy's multi-level analysis (1996). All, or nearly all, of the narrative modes deliver the same theme, re-iterated again and again at every level: the broader themes of flight, movement, escape, expressed in the more precise theme of the 'vanishing point'. This can be found:

- at the material level, through the use of planes, trains, balls rolling into the distance, etc.;
- at the formal level, through an overarching formal metaphor that is brilliantly established by Roy, who points out for example that 'the conclusion of the work ... is the true vanishing point for all of the [work's] processes' (Roy 1996: 36);
- at the structural level, for example in the development of 'glides in tessitura, mutations of masses, of densities' (Dhomont 1996) as structural devices;
- at the mimetic level, through the shaping of both the referential and abstract materials such that they 'move away', on a number of levels – timbrally, spatially, etc.;
- at the embodied level, through the consistent insistence on embodied metaphor in the communication of the themes of the work at all levels ('movement away from', etc.);
- at the parametric level, if we can consider Dhomont's spectral drifts as an evocation of the parametric mode;
- at the spatial level, through the almost constant movement of materials from the foreground into the far distance, across the frame, 'upwards', etc;

- and finally, at the extramusical level, where the themes are carefully expressed through the title of the work and through the programme notes, which provide lists of the multilayered thematic presentation at 'technical', 'impressionistic' and 'symbolic' levels (Dhomont 1996).

What's more, Dhomont also invokes another potential mode that has not yet been discussed: an 'intertextual narrative mode', in which a work incorporates references to or quotes from other works, thereby absorbing or co-opting the narrative themes of those other works, or thematically interacting with them to create a new, expanded, or compounded theme. In *Points de fuite*, this is achieved through brief quotes and transformations of the opening piano theme from Schubert's *Der Erlkönig* – a theme specifically crafted to evoke a sense of 'fleeing on horseback', in support of Goethe's text, thereby providing obvious support for Dhomont's themes.

## 6. NARRATIVE UNIVERSALS

Interestingly, there are some narrative themes, or 'archetypes', that arise regularly, between works and across modes; some have been mentioned above – for example, Escape, and The Return; others include, for example, The Spiral, The Cloud, The Rebirth and many more. These can all be found in various acousmatic works, activated in most, if not all, of our Narrative Modes: as Material, Form, Structure, Mimesis, Embodied Experience, etc. Moving out, we then find this same archetype expressed in other areas of electroacoustic theory (e.g., Wishart 1996; Smalley 1997), for a broad range of parameters, from gesture, to pitch behaviour, to timbre, to space. In another direction, we find these same archetypes invoked in electroacoustic performance, most notably perhaps in

Vande Gorne's 'Spatial Figures' (Gorne 2002). Similar archetypes arise in musical theory more generally (e.g., Huron 2006, or Lerdahl and Jackendoff 1983), as well as in musical narratology (e.g., Grabócz 2011; Tarasti 1994; Almén 2008), and then in narratology more generally – for example, in the famous 'Seven Basic Plots', albeit in a somewhat more developed form (Booker 2004). Unsurprisingly, we find these same archetypes among the 'embodied gestalts' described for example by Johnson (1987); indeed, it is likely due to their presence as embodied gestalts that we recognise them in so many other contexts, across levels of human activity, culture, consciousness, biology and identity (Jung 1964; Campbell 1972; Mâche 1992).

In other words, these recurring narrative archetypes appear across narrative modes in acousmatic music, but also across genres, across art forms, and outwards into a full range of human thought and activity, and can thereby be proposed to be narrative universals. This brings us back full circle: if narrative is 'a basic human strategy', and a function of human experience, then this persistent reappearance of narrative universals should come as no surprise, for it is simply a reminder that narrative is not a function of the observed, but of the observer. The narrative modes proposed here are thus not a function of interpretation; they do not lie dormant in the acousmatic work, awaiting activation, but rather it is we who carry them with us, to serve as a collection of lenses to be snapped into place, one by one or together, so that we might better come to know these acousmatic objects of perception.

## REFERENCES

- Abbott, H. P. 2008. *The Cambridge Introduction to Narrative*. Cambridge: Cambridge University Press.
- Almén, B. 2008. *A Theory of Musical Narrative*. Bloomington: Indiana University Press.
- Amelidis, P. 2016. Acousmatic Storytelling. *Organised Sound* **21**(3): 00–00.
- Andean, J. 2010. The Musical–Narrative Dichotomy: Sweet Anticipation and Some Implications for Acousmatic Music. *Organised Sound* **15**(2): 107–15.
- Andean, J. 2012. An Embodied Approach to Acousmatic Music. *Proceedings of the 16th Annual Symposium for Music Scholars in Finland*. [https://jyx.jyu.fi/dspace/bitstream/handle/123456789/38068/andean\\_S2012.pdf](https://jyx.jyu.fi/dspace/bitstream/handle/123456789/38068/andean_S2012.pdf).
- Andean, J. 2014a. Sound and Narrative: Acousmatic Composition as Artistic Research. *Journal of Sonic Studies* **7** [www.researchcatalogue.net/view/86118/86119](http://www.researchcatalogue.net/view/86118/86119) (accessed 24 June 2016).
- Andean, J. 2014b. Towards an Acousmatic Narratology. *Proceedings of the EMS14 Conference – Electroacoustic Music Beyond Concert Performance – Berlin*. [www.ems-network.org/IMG/pdf\\_EMS14\\_andean.pdf](http://www.ems-network.org/IMG/pdf_EMS14_andean.pdf) (accessed 24 June 2016).
- Basanta, A. 2010. Syntax as Sign: The Use of Ecological Models within a Semiotic Approach to Electroacoustic Composition. *Organised Sound* **15**(2): 125–32.
- Batchelor, P. 2014. *Evaluating Acousmatic Compositional Strategies within Public Sound Art*. Paper presented at the 2014 Electronic Music Studies Network Conference, Berlin.
- Berry, W. 1966. *Form in Music*. Englewood Cliffs, NJ: Prentice-Hall.
- Booker, C. 2004. *The Seven Basic Plots: Why We Tell Stories*. New York: Continuum.
- Booth, W. C. 1961. *The Rhetoric of Fiction*. Chicago: University of Chicago Press.
- Bregman, A. 1990. *Auditory Scene Analysis*. Cambridge, MA: MIT Press.
- Brunson, B. 2012. A Narrative Stance: Making a Case for Narrativity in Electroacoustic Music. Paper presented at the 2012 Electronic Music Studies Network Conference, Stockholm.
- Campbell, J. 1972. *The Hero With a Thousand Faces*. Princeton: Princeton University Press.
- Chion, M. 1983. *Guide des objets sonores*. Paris: Buchet/Chastel.
- Clarke, E. F. 2005. *Ways of Listening*. New York: Oxford University Press.
- Crites, S. 1971. The Narrative Quality of Experience. *Journal of the American Academy of Religion* **39**(3): 291–311.
- Emmerson, S. 1986. The Relation of Language to Materials. In S. Emmerson (ed.) *The Language of Electroacoustic Music*. London: Macmillan Press.
- Emmerson, S. 2007. *Living Electronic Music*. Aldershot: Ashgate.
- Emmerson, S. and Landy, L. 2016. The Analysis of Electroacoustic Music: The Differing Needs of Its Genres and Categories. In S. Emmerson and L. Landy (eds.) *Expanding the Horizon of Electroacoustic Music Analysis*. Cambridge: Cambridge University Press.
- Gibson, J. J. 1966. *The Senses Considered as Perceptual Systems*. Boston: Houghton Mifflin.
- Godøy, R. I. 2010. Images of Sonic Objects. *Organised Sound* **15**(1): 54–62.
- Grabócz, M. 2009. *Musique, narrativité, signification*. Paris: L'Harmattan.
- Grabócz, M. 2011. Métamorphoses de l'intrigue musicale (XIXe–XXe siècles). *Cahiers de Narratologie* **21** <http://narratologie.revues.org/6503> (accessed 24 June 2016).
- Herman, D. 2002. *Story Logic: Problems and Possibilities of Narrative*. Lincoln, NE: University of Nebraska Press.
- Herman, D. 2007. Introduction. *The Cambridge Introduction to Narrative*. Cambridge: Cambridge University Press.
- Huron, D. 2006. *Sweet Anticipation: Music and the Psychology of Expectation*. Cambridge, MA: MIT Press.
- Johnson, M. 1987. *The Body in the Mind*. Chicago: University of Chicago Press.
- Jung, C. G. 1964. *Man and His Symbols*. London: Aldus.
- Landy, L. 1994. The 'Something to Hold on to Factor' in Timbral Composition. *Contemporary Music Review* **10**(2): 49–60.
- Landy, L. 2007. *Understanding the Art of Sound Organization*. Cambridge, MA: MIT Press.
- Leman, M. 2010. An Embodied Approach to Music Semantics. *Musicae Scientiae*. Discussion Forum. **5**: 43–67.
- Lerdahl, F. and Jackendoff, R. 1983. *A Generative Theory of Tonal Music*. Cambridge, MA: MIT Press.

- Lidov, D. 1987. Mind and Body in Music. *Semiotica* 1(3): 69–97.
- Mâche, F. -B. 1992. *Music, Myth and Nature or the Dolphins of Arion*. Chur, Switzerland: Harwood.
- Marty, N. 2016a. Deleuze, Cinema and Acousmatic Music. *Organised Sound* 21(2): 166–75.
- Marty, N. 2016b. *Thinking the Praxis of Electroacoustic Music Composition*. Facebook 19/06. www.facebook.com/groups/245357145837297/254495158256829/ (accessed 24 June 2016).
- Meelberg, V. 2006. *New Sounds, New Stories*. Amsterdam: Leiden University Press.
- Nattiez, J. -J. 1990. *Music and Discourse: Toward a Semiology of Music*. Princeton, NJ: Princeton University Press.
- Naylor, S. 2016. Voice: The Persistent Source. *Organised Sound* 21(3): 00–00.
- Norman, K. 2000. Stepping Outside for a Moment: Narrative Space in Two Works for Sound Alone. In S. Emmerson (ed.) *Music, Electronic Media and Culture*. Aldershot: Ashgate.
- Norman, K. 2004. *Sounding Art: Eight Literary Excursions through Electronic Music*. Aldershot: Ashgate.
- Normandeau, R. 2009. Timbre Spatialisation: The Medium is the Space. *Organised Sound* 14(3): 277–85.
- Rizzolatti, G. and Craighero, L. 2004. The Mirror-Neuron System. *Annual Review of Neuroscience* 27: 169–92.
- Roy, S. 1996. Form and Referential Citation in a Work by Francis Dhomont. *Organised Sound* 1(1): 29–41.
- Ryan, M. L. 2004. *Narrative Across Media: The Languages of Storytelling*. Lincoln, NE: University of Nebraska Press.
- Ryan, M. L. 2009. Space. In P. Hühn (ed.) *Handbook of Narratology*. Berlin: de Gruyter.
- Schaeffer, P. 1952. *À la recherche d'une musique concrète*. Paris: Éditions du Seuil.
- Schaeffer, P. 1966. *Traité des objets musicaux*. Paris: Éditions du Seuil.
- Schenker, H. 1979. *Free Composition*. New York: Longman.
- Smalley, D. 1994. Defining Timbre, Refining Timbre. *Contemporary Music Review* 10(2): 35–48.
- Smalley, D. 1997. Spectromorphology: Explaining Sound Shapes. *Organised Sound* 2(2): 107–26.
- Smalley, D. 2007. Space-form and the Acoustic Image. *Organised Sound* 12(1): 35–58.
- Spitzer, M. 2004. *Metaphor and Musical Thought*. Chicago: University of Chicago Press.
- Stocker, M. 2013. *Hear Where We Are: Sound, Ecology, and Sense of Place*. New York: Springer.
- Street, A. 2013. Identity Formation in Webern's Six Pieces for Large Orchestra, Op. 6. In M. L. Klein and N. Reyland (eds.) *Music and Narrative Since 1900*. Bloomington: Indiana University Press.
- Tarasti, E. 1994. *A Theory of Musical Semiotics*. Bloomington: Indiana University Press.
- Vande Gorne, A. 2002. L'interprétation spatiale: Essai de formalisation méthodologique. *Revue DEMéter*. www.univ-lille3.fr/revues/demeter/interpretation/vandegorne.pdf (accessed 24 June 2016).
- Waters, S. 2015. Tullis Rennie's Muscle Memory: Listening to the Act of Listening. *Contemporary Music Review* 34(1): 22–32.
- Weale, R. 2006. Discovering How Accessible Electroacoustic Music Can Be: The Intention/Reception Project. *Organised Sound* 11(2): 189–20.
- Windsor, L. 2000. Through and Around the Acousmatic: The Interpretation of Electroacoustic Sounds. In S. Emmerson (ed.) *Music, Electronic Media and Culture*. Aldershot: Ashgate.
- Wishart, T. 1994. *Audible Design*. York: Orpheus the Pantomime.
- Wishart, T. 1996. *On Sonic Art*. Amsterdam: Harwood Academic Publishers.
- Wishart, T. 2010. *Encounters in the Republic of Heaven*. York: Orpheus the Pantomime.
- Wishart, T. 2012. *Sound Composition*. York: Orpheus the Pantomime.
- Zbikowski, L. 2008. Metaphor and Music. In R. W. Gibbs, Jr. (ed.) *The Cambridge Handbook of Metaphor and Thought*. Cambridge: Cambridge University Press.

## DISCOGRAPHY

- Dhomont, F. 1996. *Points de fuite* (1982). On *Cycle de l'errance*. Montreal: Empreintes Digitales, IMED-9607.
- Ferrari, L. 2002. *Visages V* (1959). On *Tautologos and Other Early Electronic Works*. Albany: EMF.
- Ferrari, L. 2004. *Presque rien avec filles* (1977). On *Presque rien*. Paris: Ina-GRM, INA\_C 2008.
- Harrison, J. 2007. *Undertow* (2007). On *Environs*. Montreal: Empreintes Digitales, IMED-0788.
- Normandeau, R. 1998. *Rumeurs (Place de Ransbeck)* (1987). On *Lieux inouïs*. Montreal: Empreintes Digitales, IMED-9802.
- Normandeau, R. 2005. *StrinGDberg and Éden* (2003). On *Puzzles*. Montreal: Empreintes Digitales, IMED-0575\_NUM.
- Parmerud, Å. 1994. *Renaissance*. On *Jeu d'ombres* (2003). Montreal: Empreintes Digitales, IMED-0367.
- Wishart, T. 2000. *Red Bird* (1980). On *Red Bird/Anticredos*. Albany: EMF, CD-022.