

Chapter Six

INDUSTRIAL AND THE COMMUNICATION OF MEANING PART ONE

6.0 Introduction: What does industrial communicate?

We now have more insight into what industrial is, where it came from, how it is disseminated, and who listens to it. But what does the *music mean*? We saw in Chapter One that lyrics and samples help to situate the music in a distinctly dystopian setting, and we have seen that this dystopia is reinforced by the paramusical elements of fan culture, its imagery, its fashion styles, etc. But how much of this dystopia can be communicated by the *music*, and *how* is that dystopia communicated? This chapter mainly documents *how much* of *which kinds* of dystopia are communicated by industrial music, while Chapter Seven concentrates more on *how* the music mediates those dystopian elements. To answer these questions, it will be necessary to draw on theories concerned with communication, more specifically with the semiotics of music.

There are numerous theoretical accounts of music semiotics as a subdiscipline. For example, Nattiez (1976, 1989), Tarasti (1978, 1987) and Martínez (1997) have attempted to explain the nature of musical signification in terms of either Saussurean, Peircean or Greimasian categories. Although it would be well beyond the remit of this thesis to discuss the value of these overriding theories to the matter in hand, some semiotic approaches are, however, of particular relevance to the study of popular

music (e.g. Middleton 1990: 172-246, Tagg 2000b: 45-120). Middleton (1990: 172) starts by underlining that ‘the concept of *code* is central in the sense of... the mode of relationship coupling a syntactic to a semantic system, a *signifiant* to a *signifié*’, identifying two such modes which he calls ‘primary’ and ‘secondary’ signification (1990: 220-239). It is ‘secondary’ signification, which Middleton (2000: 116) has subsequently termed ‘connotative signification’,²⁷⁹ that is of greater relevance to this genre study because the rather ontological qualities of ‘unconscious iconicity’ and ‘inner gesture’ which seem to characterise ‘primary’ signification (Middleton 1990: 226) are of little help in establishing verifiable links between, on the one hand, the musical-structural and, on the other, the visual, verbal and other paramusical aspects of genre.²⁸⁰ These links of connotative signification have been studied in detail by Tagg (2000a, 2000b) whose approach is described by Middleton (1990: 233) as ‘easily the most fruitful method... for the analysis of secondary signification in popular music’.

There are, however, drawbacks to Tagg’s methods, as Tagg himself has indicated.²⁸¹ The most significant of these drawbacks is the fact that music is not conducive to verbal descriptions; this alogogenic nature means any discussion of musical sound in verbal terms will be cumbersome, time consuming and unwieldy. After all, Tagg

279 I will use connotative, since there are significant problems with the use of primary and secondary (Tagg & Clarida 2002, at the end of the analysis of Tune 1 – *The Dream of Olwen*).

280 Shepherd and Wicke (1997) focus largely on primary signification. See Tagg (1997) for a lengthy criticism of Shepherd and Wicke’s approach.

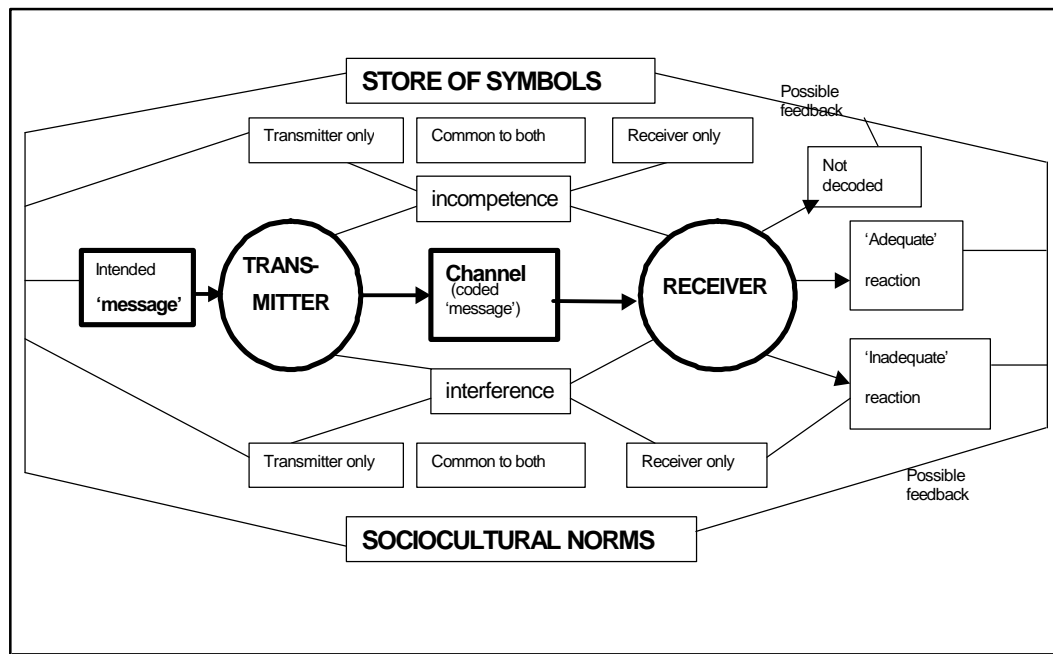
281 Personal communication, April 12, 2001.

(2000b) has shown that fifty seconds of music can be written about to an almost unending length. Nevertheless, despite such encumbrances, as more semiotic analyses are carried out by scholars, it will be possible for future analyses to draw on this bank of information.

Middleton also argues that Tagg's method, by relying on film music, is 'heavily dependent on orientations provided by accompanying extramusical aspects of the message—on 'reconstitutions' of intentions discovered in lyrics, programmatic elements (such as titles) and visual images' (1990: 233 *cf.* Shepherd and Wicke 1997:106-107), and that 'a great many popular songs do not possess associated visual images and have lyrics with much less specific, less concrete content' (*ibid.*). While a comparison with film's accompanying visuals undoubtedly makes the semiotic decoding process *easier*, such visuals are certainly not *necessary*, as we will see by the reception tests carried out below. Middleton offers us no empirical evidence that other musical styles do not have accompanying visual imagery—either in a literal or figurative sense. In fact, as most popular music styles have had some form of visual representation in terms of cover art, music video, associations with musicals, performers, venues, lifestyle associations, etc. it seems unlikely that there could be no visual dimensions found in any music.

Tagg's model of communication expands on a basic premise that music communicates a message (or number of messages) from a transmitter (or transmitters) to a receiver (or receivers):

Figure 6.1. Basic Communication Model (Tagg 1999)



This is obviously a simplified model, which does not include the various types of filter associated with what Tagg calls ‘incompetence’ and ‘interference’. For instance, a record label may decide to advertise a message (musical recording, etc.) differently from the wishes of the transmitter. The implementation of such a decision may well alter the listener’s expectations of the message and radically influence its reception. Of course, other filters exist, especially within the ‘sociocultural norms’ box, which influence the relationship between signifier and signified in the sense that the ‘musical message’ might be altered by the listener’s evaluation and knowledge of the genre with all its paratextual elements. For example, fans of industrial might interpret the genre’s machine sounds as expressive of disempowerment and alienation while non-fans might hear the same sounds as just aggressive or even fascist. In general terms then, the message may become ‘scrambled’ at any stage in the communication

process if receiver and transmitter do not share the same socio-cultural norms, or the same basic store of symbols. As Eco puts the matter:

To make his text communicative, the author has to assume that the ensemble of codes he relies upon is the same as that shared by his possible reader. The author has thus to foresee a model of the possible reader... supposedly able to deal interpretatively with the expressions in the same way as the author deals generatively with them (1979: 7).

It is possible, as Nattiez (1976: 157-189, in Middleton 1990: 220) has shown, to study the communication of meaning from any or all of the three main stages of the communication process, i.e. from 'reconstitution of the intentions of the producer', from hermeneutic analysis of the text, or from experimental testing of listener responses. Although this thesis includes some discussion of the 'transmitter' or creator of the song (in the case of Example Five, 'Dead by Dawn'), I have chosen to focus on the *musical text and its reception* because reception presupposes the existence of a text and because receivers are the final arbiters of signification (Hodge and Kress 1988: 1). In neither case is knowledge of 'transmitter' intentions a prerequisite for establishing viable general observations about the mediation of musical meaning. It is for these reasons that I have conducted reception tests on a selection of industrial recordings, the idea being to document, where possible, intersubjective patterns of response to the music and, consequently, to establish its range of possible meanings.

Obviously, the five songs selected for analysis in this chapter cannot definitively establish what industrial music communicates to all audiences. In other words, the limited number of respondents and musical texts chosen do not constitute a reliable statistical sample of all industrial music and all its potential listeners.

Nevertheless, if we can establish reasonable criteria for the selection of test songs and respondents (see below), then an analysis of musical structures and interpretations might at least be able to establish viable hypotheses about what industrial *can* communicate.

6.1 Reception Test Methods

6.1.1 *Selection Criteria for the Choice of Songs*

The selected songs were Einstürzende Neubauten's 'Haus der Lüge' (1984/1989), Skinny Puppy's 'Harsh Stone White' (1989), Covenant's 'Hardware Requiem' (1992), Converter's 'Itami (Two)' (2000), and Project-X's 'Dead By Dawn' (2001).

The criteria for the selection of these particular songs was that they:

- covered both well-known and less well-known artists. Examples One, Two and Three were by artists in the fans' top ten list, compiled from the questionnaire results. Converter were chosen because they were the only Noise artist repeatedly mentioned by fans. Project-X were chosen because they were a case study in the research and could discuss the composition of the song in detail with me;
- kept to the criteria of 'industrial' as I have defined in Chapter One;
- spanned a variety of dates, from 1984 to 2001;
- represented a variety of styles in vocalisation, lyrics, instrumentation and sound;
- represented artists from a variety of geographic areas: United States (Converter), Canada (Skinny Puppy), Sweden (Covenant and Project-X) and Germany (Einstürzende Neubauten);
- were not more than five minutes in length, so as to make them manageable for listener response tests, transcriptions and analysis;

- included both instrumental and non-English language choices, in order that any lyrics would have minimal impact on the mostly Anglo audience selected;
- did not contain any readily identifiable verbal samples. Although these would have no doubt strengthened the connotative power of the songs, it was the primary intent to discover how much the *non-verbal* aspects of the music can connote.

6.1.2. Test Participants

Several criteria influenced the choice of test participants.

- Practical considerations of availability meant that many test respondents were participants in seminar classes run at the Institute of Popular Music
- Participants should represent a reasonable range of different ages and nationalities, as well as represent both genders evenly (see Appendix Five).
- In order to compare responses between fans and non-fans (see below), it was necessary to ensure the participation of both fans and non-fans (see Table 6.1 and Appendix Five).

Table 6.1 Participant Numbers in Reception Tests of Five Industrial Songs

Song	# of Fans Tested on	# of Non-Fans Tested on
'Haus der Lüge'	seven	twelve
'Harsh Stone White'	eight	eleven
'Hardware Requiem'	eight	thirteen
'Itami (Two)'	six	seventeen
'Dead By Dawn'	four	ten

Of course, as Table 6.1 shows and as I have already mentioned, the number of participants is too low to constitute statistically reliable samples of populations. However, it is not unreasonable to assume that the responses presented below are

reproducible since similar industrial songs elicited similar responses on several other occasions.²⁸²

6.1.3 *The Reception Test*

Although it may be much easier to collect information about responses to music using multiple choice methods, I chose to use free induction because, as Tagg and Clarida point out:²⁸³

Using multiple choice methods would imply a large degree of scientific certainty... as to what alternatives ought and ought not to be included in connection with each piece of music. Since no-one can lay claim to such scientific certainty, it seemed not so much inadvisable as impossible to use multiple choice methods.

This observation is particularly applicable to industrial music which, as we saw in the Introduction, has not previously been the object of any significant investigation. Moreover, the use of free induction clearly minimises risks of undue verbal interference with direct links between musical structure and connotation.

Reception tests were conducted in person and through the mail (see below), with those familiar to industrial (discussed here as ‘fans’) and those less familiar with the genre (‘non-fans’). Reception tests with non-fans were conducted in a classroom

282 The informal test situations corroborating my findings were as follows: [1] Nine Inch Nails’ ‘At the Heart of it All’ was played to twenty undergraduates at the Institute of Popular Music, Liverpool in March 2002; [2] Front Line Assembly’s ‘Prophecy’ was played to fifteen postgraduates at City University, London in May 2002; [3] the same song was played again to eight faculty and postgraduates at McGill University, Montréal, June 2002.

283 Tagg and Clarida (2002: Chapter 3, subheading ‘Free induction v. multiple choice’).

where participants had been taught a few classes in semiotic theory and had been participating in other reception tests with music of different genres. Of these non-fans, all were studying or lecturing at the Institute of Popular Music, of whom a minority had academic qualifications in music. The classroom tests involved responding to only one or two songs during each session. Some of the participants heard Einstürzende Neubauten and Covenant. A different group of participants heard Skinny Puppy and Project-X, and a third group heard Converter.

Four fan tests were conducted 'live' in the fans' homes where they would normally listen to the music, and five were conducted through the mail. There were several reasons for the choice to conduct a test through the mail:

- those who knew me might have been influenced by what they knew of the thesis;
- fans could listen to the music in places or situations familiar to their listening practices. One of Tagg's previous criticisms of his own methods concerns the difficulty in conducting tests without destroying the frame of mind generally enjoyed when listening to the music (Tagg 2000b: 76-77). Although fans would still have to distance themselves from their experience somewhat by thinking about their response to the music, this method is closer to an ideal situation than a classroom test;
- a wider range of fans could be included. Although it was not my aim to discover if there were differences between these different cultural backgrounds, I wanted to reflect the international approach to the thesis in general (see p.*). These fans came from Canada, the United States, Sweden, Finland, the UK, and Germany.²⁸⁴

284 This is not to say that I have sought out any form of 'universality' amongst industrial's signifiers. For issues relating to musical 'universality', see for instance Tagg (1993) or Hood (1990).

Participants were not given any other information about this thesis. Participants were told:

the reception test's purpose is to gather what connotations a song might have, that is, what the song might mean to different people. The lyrics are not important, this is an attempt to determine musical meanings. There is no right or wrong answer; this is about personal relationships and responses to songs.

Mail participants were given approximately the same instructions as classroom participants:²⁸⁵

Please first write down how familiar you are with the song:

-Never heard it before

-Heard it once or twice, not that familiar

-Quite familiar: I've got it home and listen to it sometimes

-Very familiar: I know it all by heart.

While you listen to the song, write down the "scenario" that might be occurring if this were music to a film, tv show, play or video. What is happening in the scenario-what does the setting look like, what characters are present, what is the plot? Play the song again. What other songs or music does it remind you of? If there are any specific parts (if you are familiar with music terminology be as detailed as you can), try to indicate what parts remind you of these other songs.

Participants were not given any feedback until all results had been gathered, nor were they encouraged at any point towards any particular descriptions, meanings, etc.

285 These were the instructions for the reception tests conducted through the mail; for verbally instructed participants, the explanation was very similar. Non-fans only heard the song once.

6.2 Treatment of the Test Results

Written responses took the form of freely written comments on and associations to each song (see Appendix Five). Some were in point form while others were of a more narrative character, for example:

Militant and futuristic like the future scenes of *The Terminator* in that AI run the world except clean like a shiny factory assembly line. These are machines making machines. In this version the AIs have already won against mankind and rule the future but are still constantly at war. It is the rhythm they live by. They are servants to themselves now. This is analogous of what they disliked in humans. They have pursued their vision so far they cannot stop, they emulate humans even though that is what they sought to destroy. It is all they know. They cannot change [TG Mondalf on 'Hardware Requiem'].

The operative concepts in this response are 'militant', 'futuristic', 'future' '*Terminator*', 'AI', 'run the world', 'clean', 'shiny', 'factory', 'assembly line', 'machine', 'against mankind', 'rule the future', 'war', 'rhythm', 'servants', 'disliked in humans', 'pursue', 'vision', 'cannot stop', 'emulate humans', 'sought to destroy', 'all they know', 'cannot change'. Clearly, some of the concepts within this one response to one tune are virtually identical ('future', 'futuristic'; 'cannot stop', 'cannot change', etc.).

There were also frequent overlaps of actual associations or of specific semantic fields between entire responses, so that, for example, TG Mondalf's 'AI' turned up as 'robot' in another response, as 'computer' in yet another, etc. Such recurrent concepts and specific semantic fields were tabulated in a spread sheet according to taxonomic

procedure similar to that applied by Tagg & Clarida (2002).²⁸⁶ I then collated these concepts and semantic fields to ascertain to what extent which associations were elicited in response to which song. The most common responses for each song are set out in Table 6.2.

286 See Tagg & Clarida (2002): Chapter 3 under 'Discretising VVAs', 'VVA classification', and in their Appendix 4 ('Taxonomy of VVAs'), <http://www.tagg.org/bookxtrax/titcats.pdf> (20/08/2002).

Table 6.2 Most Common Responses to Five Industrial Songs

	Haus der Lüge	Harsh Stone	Hardware	Itani (two)	Dead By Dawn
Aliens, Monsters		X			X
Attack, Violence, Chase	X	X		X	
Anguish, Desperation		X			X
Cars				X	
Cold					X
Covert Operation	X				
Dark	X	X	X	X	X
Destruction	X			X	
Dirty		X		X	
Disorientation, Confusion		X		X	
Electric				X	
Escape	X	X		X	
Expansiveness/desolate			X		X
Factory, Industrial	X	X	X	X	X
Fear		X			
Future	X		X	X	X
Machines/Mechanical	X	X	X	X	X
Oppression, Trap	X	X	X		
Ship					X
Underground		X		X	
Urban	X	X	X	X	

Most of these recurrent responses are either dystopian (dark future), or relate to those sentiments, moods and ‘tones’ that are associated with dystopian narratives.²⁸⁷ As illustrated by the TG Mandalf response cited above (p. 000), fans described dystopian scenarios in detail, but they were not the only ones to do so: several non-fans also came up with distinctly dystopian scenarios, for example:

²⁸⁷ At least, according to allmovie.com’s classification of those ‘tones’ and ‘moods’ that it associates with films.

A rebel force, underground gathering forces/equipment before an overland revolt. Machinery with cogs turning in a dark, dirty factory. An explosion to signify the beginning of the revolt, then a pause, quiet as they embark from the sewers. There is fighting, looting and ransacking as we see shocked 'normal' citizens [response to 'Itami (Two)'].

The connection to dystopia is indisputable when the cinematic inter-objective comparison material, or IOCMs, are tabulated as follows:²⁸⁸

Table 6.3 Cinematic IOCMs in Five Industrial Songs

Film IOCM	# of Mentions	Genre
<i>Terminator</i>	9	Dystopian sci-fi
<i>Metropolis</i>	3	Dystopian sci-fi
<i>Blade Runner</i>	2	Dystopian sci-fi
<i>Flash Gordon</i>	2	Sci-Fi
<i>Blade</i>	2	Dystopian sci-fi/horror
<i>Demolition Man</i>	2	Dystopian sci-fi
<i>Lord of the Rings</i>	2	Sci-fi/Fantasy
<i>James Bond 007</i>	1	Spy/action
<i>12 Monkeys</i>	1	Dystopian sci-fi
<i>Mad Max</i>	1	Dystopian sci-fi
<i>Evil Dead</i>	1	Horror
<i>Dawn of the Dead</i>	1	Horror
<i>Pleasantville</i>	1	US American Satire
<i>Frankenstein</i>	1	Sci-fi/horror
<i>Event Horizon</i>	1	Sci-fi
<i>Fight Club</i>	1	US American Satire
<i>Dickens-Hard Times</i>	1	Victorian Factory Drama
<i>Pi</i>	1	Surreal Psychological thriller

It is in other words clear that dark, violent, futuristic, mechanistic, desperate, and threatening scenarios dominate participant responses. The reasons behind such

288 Tagg (1982a: 45, ff.), who introduced the use of interobjective comparison to music analysis, only seems to count 'other music' as IOCM. I have extended the concept here to include works for film and TV even though respondents may be referring to either music or visual narrative through such IOCM.

overwhelmingly consistent patterns of connotation to the music are, as mentioned earlier, examined in Chapter Seven. This does not mean to say, however, that there were no differences of response from song to song. For example, 'Hardware Requiem' was heard as 'new', 'mint condition', 'shiny', 'clean', etc. while 'Itami 2' came across as 'dirty', 'scrapyard', 'dingy' and 'smelly'. Nevertheless, both had a dystopian common denominator even though the former was clinical and antiseptic, the latter dark and decaying (see §2.1.4).

Here we start to enter the realms of interpreting relations between musical text and response. However, before presenting that part of the discussion in the next chapter it is necessary to account for methods I have used in approaching the musical text.

6.3 The Five Songs

In this chapter I have so far accounted for listener responses to the five industrial pieces selected for the reception test. Before interpreting those results in terms of 'signifieds' it will of course be necessary to examine the 'signifiers' with which they are linked, i.e. to discuss the five songs in terms of musical structure. In order to orientate the reader in this discussion, I have provided both a CD recording and a transcription of each song. While the provision of the CD accompanying this thesis raises problems of copyright, the matter of transcription raises methodological issues of some importance.

6.3.1 Issues of Musical Notation

6.3.1.1 Transcription: The General Problem

Transcribing recordings and performances of popular music into staff notation form is fraught with problems, as has been outlined previously by Berger (1999: 8-10), Brackett (1995: 24-25), Tagg (1999) and Middleton (2000), among others. For musical styles such as industrial, where elements like timbre, texture and ‘non-musical’ sound frequently take precedence over melody or harmony and other parameters of pitch, traditional notation methods fail not only to capture these elements, but also to provide any form of system for graphical representation of the songs. Nevertheless, the intent here is not to present a score for the purposes of *re-performance* (the usual function of staff notation), but rather, as just mentioned, to orientate the reader in the musical materials under discussion. In addition to the usual difficulties of transcribing popular music,¹¹ the transcription of industrial involves four particular problems which need explanation if the transcriptions presented below are to have any validity.

1. Industrial instrumentation bears little or no resemblance to that generally catered for in Western notation. Except for the use of sounds resembling those of a rock drum kit and, occasionally, of a rock guitar,¹² very few industrial sound

11 That is, unnatural visual complexity of rhythmic patterns, pitch inflection, etc., see Tagg (2000b: 43-44),

12 Sometimes an acoustic drum kit or an electric guitar may be used in the ‘live’ performance of industrial music.

sources are ‘musical’ in the conventional sense. No accepted terminology exists for naming these sounds. It is sometimes impossible to provide constructional descriptors of the sounds because those producing the music are either inaccessible or unable to recall how the sounds in question were created.¹³ Therefore, the transcriptions contain much more by way of receptional descriptors, even though these are based mainly on my own understanding of the type of sound being produced. Nevertheless, the reception test results (Appendix Five) substantiate most of the names I have given to particular sounds in the transcriptions (e.g. *drill* in ‘Harsh Stone White’, *pong* in ‘Itami (Two)’).¹⁴

2. Industrial music has a predilection for unpitched sounds and for sound processing, both of which obscure the sort of pitch precision that Western staff notation was developed to record. Not only do vocal lines often feature *Sprechgesang* (see Examples One and Two); they are also frequently subjected to various forms of signal processing, such as vocoding or saturation (Examples Two and Three), both of which interfere with pitch parameters. Moreover, many of the sounds alluded to in the previous paragraph exhibit no definite fundamental, even though general rises and falls in pitch may be discernible, e.g. the metal strikes notated on the third stave of ‘Haus der Lüge’ (Example One).

13 For explanation of ‘constructional’ and ‘receptional’ descriptors, see Tagg (2001).

14 In addition, the lack of conventional nomenclature for sound has absurd consequences when deciding which order the staves should be presented in—for example, does “barking monkey” come above or below “pong” in ‘Itami (Two)’?

3. It is often difficult, sometimes even impossible, to determine the exact rhythmic-temporal placement of certain events, due to industrial's frequent and copious use of digital delay, offsetting, ADT, reverb, etc. This problem is particularly evident in bars 35-40 of the vocal line in Skinny Puppy's 'Harsh Stone White' (Example Two).

4. Chordal notation conventions, such as lead sheet symbols, which are common in many other kinds of popular music are of virtually no use in the transcription of industrial since the music, while including a clear sense of the tonic,¹⁵ rarely contains tertial chords and almost nothing by way of tertial ('functional') chord progressions.

6.3.1.2 Transcription process

The first and most important aspect of transcription was to establish the position of downbeats. This aspect posed no problems in three of the five songs, but it was necessary to work backwards to the start of the track in the case of 'Harsh Stone White' and 'Itami (Two)' after locating a definite downbeat in bar 9 for each of those songs. Having established meter and the position of downbeats, I then proceeded to transcribe rhythm and pitch for each sound in each song. There were no problems of establishing tonal centre, tempo, or other basic parameters of any of the recordings.

¹⁵ See megadrone (tonic) discussion, §7.8.

The four transcription problems described above did, however, lead to some particular difficulties, one of which was distinguishing and grouping similar sounds, usually samples or synth sounds. It is for example unclear whether the *squeak* ('Harsh Stone White', stave 1) is a separate sample or intrinsic to the *feedback* sound notated in the same stave. Another difficulty was deciding whether or not to notate audible delay signals or merely to notate the original events subjected to such delay. To avoid overloading the transcription with every single occurrence of audible delay, I decided to notate such effects only if they were highlighted. For example, the ongoing delay applied to the vocal track in Skinny Puppy's 'Harsh Stone White' has not been transcribed, except at those points where the original signal stops and the delay can be heard distinctly, for example at 'vomiting, vomiting, vomiting' (bars 35-40).

When facing transcription problems—of pitch, rhythm, timbre, etc.—I was able to resort to the following strategies:

- playing the relevant passage through either different equipment, at different equalisation or pan settings, different volumes, etc.
- making comparisons with other versions of the same song (only applicable in the case of 'Haus der Lüge' and its 'live' version), where certain elements were more audible;¹⁶
- consulting the musicians who produced the song (only applicable in the case of 'Dead by Dawn');

¹⁶ A live version from 1984 can be found on *Strategies Against Architecture II* (1991).

- using my computer's sound card and music software, I recreated my own version of each song. This strategy was particularly useful because it allowed me to identify what was missing from my initial transcription attempts.
- submitting my transcriptions for inspection to two colleagues with considerable experience of music-making and musical notation.¹⁷ Most of their suggestions for improvement have been incorporated.

Some of the suggestions offered under the last point, above, included advice on how to notate various problematic elements of unpitched and unconventional sounds.

6.3.1.3 Transcription conventions

I have, where possible, followed standard European notation procedures of pitch, rhythm, dynamics, etc. However, I have had to create a few conventions specifically for the purposes of transcription in this thesis.

The start and end points for the application of signal processing effects (distortion, reverb, delay, vocoding, etc.) are inserted into the score as text, except when the effect is applied to the whole song, in which case text denoting the relevant effect is included only at the start of the score. The wavy trill line (~~~~~) is used to denote the presence of particular ongoing primary-signal events, such as the oscillating *squeak* and *background chatter* in 'Harsh Stone White', as well as the

¹⁷ Marie-Eve Bouchard and Philip Tagg provided assistance on this count.

smashed glass in ‘Haus der Lüge’. In each instance text is inserted to specify the relevant type of primary-signal event.

A range of unconventional note-heads are used to designate different individual sound events of non-specific pitch and ‘non-musical’ timbre. In general, most metallic sounds have triangular note heads, while others, such as robot voices or ratchets, are given unconventional variants of round note heads. Each transcription is preceded by a chart setting out which symbols represent which sound.

6.3.2 Transcriptions and Notes about the Songs