



Ecomusicology, Music Studies, and IASPM: Beyond “Epistemic Inertia”

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Abstract

Ecomusicologists have answered Philip Tagg’s call to develop a more interdisciplinary and interprofessional “music studies.” Ecomusicologists are demonstrating an exceptional openness to theories and methodologies generated from outside their home disciplines. Of course, no single transdisciplinary conversation will solve all of the problems Philip Tagg outlines in “Caught on the Back Foot: epistemic inertia and visible music” (2011). However, ecomusicology provides evidence that a more holistic, integral, and relational music studies is possible. This article will outline four ecomusicological literatures as evidence: ecocritical musicology, soundscape studies, ecohistorical scholarship, and ecosystems communication approaches. Pastoral ideologies have inhibited ecological research in the past, but recent advances have helped the environmental study of music become more relational and relevant.

Keywords: ecomusicology, ecology, environment, interdisciplinary, pastoral, music studies

Introduction

Tell me if you’ve heard this one before: musicology is too narrow. Musicologists fetishize a single genre, classical music, assume its culture-bound criteria to be universal, and thus misrepresent or ignore the overwhelming majority of the world’s musics. Musicology’s “followers still often believe in universal values of aesthetic excellence based on a canonic repertoire of work used by a minority of the population over a very limited number of years in the world’s smallest continent” (Tagg 2011: 7). Musicology eschews comparison, synthesis, and context for sake of internal analysis, emphasizing the analysis of European musical notation over other modes of investigation and representation. In sum, rather than music’s “ology,” musicology is the study of canonical Western classical music, with jazz and a few ancient Eastern musics thrown in for good measure.

That critique has been made many times over, with relatively little effect. However, every once in a while the critique, and musicology itself, advance. Philip Tagg’s “Caught on the Back Foot: epistemic inertia and visible music,” presents a more productively nuanced analysis of musicology, and points towards repair (2011). As will be argued here, ecomusicology presents another sign of hope. For example, the musicologists in the American Musicological Society’s Ecocriticism Study Group (ESG) are anything but narrow in their approach to the study of music.

Tagg is equally critical of popular music studies. Although more diverse in terms of genres studied, popular music studies has had at times a tendency to incorporate a fairly narrow set of theories derived from poststructural cultural studies. Therefore, Tagg is renewing his call for the development of a more interdisciplinary, international, and interprofessional music studies, a laudable and greatly preferable alternative to the

tripartite present. Meta-genre divisions between classical (musicology), folk (ethnomusicology), and popular music (popular music studies) continue to overdetermine and impede musical research. Ecomusicology provides evidence that productive integration and synthesis is possible across traditional divisions.

For that reason alone, the ecological study of music should play a more prominent role in IASPM's future. However, there are additional reasons. IASPM has been at the center of critical musical research, emphasizing scholarship concerned with public relevance and human stakes, including feminist, critical race, and political economic inquiry. In that light, there is a relative lack of ecological perspectives in popular music studies.

Popular music studies' ecological lacuna may be the outcome of pastoral ideology. Pastoral ideology disarticulates rural-environmental (folk, classical) from urban-dystopic (popular music) contexts, rendering the latter "non-environmental" and beyond ecological hope, redemption, or interest. However, this does not diminish the importance of the ecological study of urbanity, including urban musics (Rosenthal 2006) and soundscapes (Tagg 1994). This work examines such obstacles to ecological inquiry (e.g., pastoralism), the relatively recent development of ecomusicology, and the contributions ecomusicology might make to IASPM's future.

The Problem with Musicology

Before building an argument for ecomusicology, it is necessary to briefly attend to Tagg's criticisms. In the past, the ecological study of music has been stunted for many of the same reasons Tagg cites as shortcomings in musicology. While a full review is beyond the scope and purpose of this work, it is important to briefly identify Tagg's points as they relate to ecomusicology.

At the center of Tagg's critique is the argument that musicology maintains an ethnocentric focus on the Western classical music tradition, a fetish that blinds musicologists to polysemy, diversity, and acoustic dimensions important to other musics. First, however, it is important to establish that musicology favors classical music to the degree Tagg claims. The recent American Musicological Society (AMS) joint conference with the Society for Ethnomusicology (SEM) and Society for Music Theory (SMT) in New Orleans (November 2012) provides a useful measuring stick. Classical music comprised 80% of the papers, posters, and films at sessions sponsored by the AMS.¹ Largely thanks to SEM, however, 27% of the genre-identifiable contributions in New Orleans could be classified as works about popular music, although the borderline between folk and popular is more than a little blurry. Nevertheless, only a small percentage of folk and popular music contributions focused on the top selling global genres. For example, as of June 2011, pop music comprised a third of global sales, rock made-up a quarter of world music purchases, while hip-hop and country music each represented about one twentieth of recorded music sales.² Yet, there was relatively little representation of those four genres in New Orleans. There are 44 mentions of "jazz" in the AMS/SEM/SMT program and only 10 uses of the word "rock." Jazz represents 2% of global music sales and classical 5%.

Of course, accounting is an extremely crude measure for genre popularity. Nor should the popularity of music be of primary importance when it comes to music research, although leaving out truly popular music does limit the sociological relevance of musicological research. In sum, Tagg's central premise stands; the AMS, SEM, and SMT tend to ignore a large swath of the world's musical experience. Given that, IASPM continues to fill an extremely important niche in music studies.

On the other hand, Robert Fink might have been correct in 1998 when arguing that "Much work on popular music within cultural studies, communications, and sociology proceeds largely unaware of the recent and intense ferment of ideological self-critique within musicology" (135). Musicologists have demonstrated growing interest in popular

music in recent years, and it is increasingly common, for example, for faculty in US music departments to list both canonical fields of expertise and popular music interests on their homepages. That is particularly common among younger faculty. Yet, as demonstrated by New Orleans' numbers, Fink was premature in heralding the "Twilight of the Canon." The Western classical canon is alive and well in musicology.

More recently, in the *Journal of the Royal Music Association*, Georgina Born argued for "relational musicology" to replace genre-based divisions among the musical research disciplines (2010). Born's critique demonstrates that traditional genre divisions continue to influence who does what type of research and in what associational context. Yet, Born's and Tagg's criticisms indicate mutual recognition of the problem across divisional boundaries.

The New Orleans data indicates that a status hierarchy remains in music studies, paralleling the high-low cultural schema Pierre Bourdieu outlines in *Distinction* (1984: 340). Much of the important work done by IASPM scholars remains marginal to the world of the AMS, SMT, and even SEM. Popular music is making inroads, but scholars interested in rock, hip-hop, dangdut, reggae, pop, country, or other broadly circulated musics struggle to insert and legitimate their work in musicological circles. In other words, Tagg is not setting up a straw man. An overwhelming bias toward Western classical music remains in musicology, at least in American musicology. The situation is different in other countries to some extent however, for example, German musicologists have been somewhat more welcoming of cultural studies approaches and popular music research than their American counterparts (Calella 2009).

Tagg does an admirable job of explaining how genre emphases have narrowed the study of music. Rather than recapitulate Tagg's claims, I will focus on his arguments that are most directly relevant to ecomusicology. Foremost among these is the tendency to downplay multisensory contexts for music, including non-Western visual sign systems. For example, Tagg argues that music scholars ignore "invisible" music (2011: 12). Musicologists and popular music researchers alike have demonstrated a "scopocentric need for visual concretion of what we hear in order to consciously register its existence" (12). For example, musicologists focus on musics represented in Western textual notation to the exclusion of virtually all others. If it isn't written, it doesn't exist.

As Tagg notes, musicologists tend to study the schematics of a very specific genre, rather than music writ large. This is one of the reasons ecological research has been inhibited in musicology. Scopocentric studies of abstracted sound hardly lend themselves to thinking about music and musics in their fuller interconnectivity to environments.

On the other hand, there is no such thing as invisible music. All cultures transform sound into visual representations, be they in the form of dance, art, or text. Visual imagery helps us to express and understand sound, just as sound helps form meaning for sight (Leppert 1993). Sight and sound are interdependent, as are all of the senses.

Therefore, the problem goes well beyond musicology's sublimation of invisible musics. The bigger problem is that musicologists show overwhelming preference for their own sign system, Western notation. In addition to being scopocentric, musicology has been logocentric. Other visual sign systems—West African drum markings, Mesoamerican ritual liturgies, and recording engineers' spectrographs—are viewed as something other than "music." However, each of these visual sign systems tell us a great deal about the musical cultures that practice them, and often provide key information concerning wider ecosystems in which musical sound matters.

In addition to a textual fetish, musicologists have tended to treat musics as abstract and isolated phenomena, as if musical reception were only a matter of listening. For example, in much of musicology, sound is wrenched from visual and kinesthetic contexts. As Tagg points out, musical sound is integrally connected to movement,

image, taste, and place (2011: 9). In order to achieve a more relational understanding of music, a hallmark of ecological research, the full range of senses must be brought to bear.

Tagg notes that many cultures don't have "a word distinguishing what we call 'music' from other modes of expression" (2011: 9). For example, the Mesoamerican náhuatl language has no word for music as isolated sound, but several that refer to combinations of poetry, visual arts, sound, and movement, including the term *cuicatlamatiliztli*, "the art of the song." There are náhuatl words for the specific sound of flutes (*tlapitzaliztli*) and drums (*tlatzotzonaliztli*) (León-Portilla 2007: 129). However, no náhuatl term specifically refers to organized sound in isolation from other forms of expression. Miguel León-Portilla asks the question well: "How did the Nahua conceive of what today, using a vocabulary of Greek origin, we call their music?" (2007: 129). Clearly, the Nahua did not, and do not, think of music as isolated sound, abstracted from the other arts and senses. Similarly, Ezra Pound argued that "music begins to atrophy when it departs too far from the dance; poetry begins to atrophy when it gets too far from music" (1934: 14). That sentiment would have resonated well with the perspectives of Mesoamerican musician-poets like the Texcocan King and patron of the arts, Nezahualcoyotl.

Furthermore, musicology's canonical orientation has left important musical elements, performances, and practices understudied. Tagg cites timbre, vocal persona, and acoustic staging as examples. I would add lyricism and percussion. Various subtle preferences and even outright proscriptions have molded the classical repertoire and, in turn, musicological research. For example, the Council of Trent's musical edicts (1545-1563) valorized certain instruments and techniques while writing off others as vulgar and unsuitable. Elements associated with subaltern musics, including indigenous musical practices in the New World, were literally banished from Church grounds. On the positive side, this allowed new, hybrid popular musics to thrive in public squares and homes. Much of the dynamism of Mexican music, for example, derives from popular music's radical detachment from official Church sanction during the colonial era (Pedelty 2004: 52-55).

The Council of Trent is just one example of how genre policing helped form Western classical music. In turn, these same forces helped shape modern musicology. Therefore, just as classical music has de-emphasized rhythmic complexity, so to have classical musicologists. From Charles Keil and Steven Feld's "groovology" (2005) to neuroscientists' theories of entrainment (Phillips-Silver et al. 2010), most advances in understanding percussion have developed outside musicology. This is yet another example of how musicology's lacunae have effected ecomusicological development, or the lack thereof. Concepts like entrainment, "spatiotemporal coordination resulting from rhythmic responsiveness to a perceived rhythmic signal" (Phillips-Silver et al. 2010: 3), are intrinsically ecological in that they link sounds and bodies to time and space (thus creating "place"). Downplaying such dimensions has had important ramifications for music studies as a whole, and ecomusicology in particular. While the "cultural study of nature has become a burgeoning industry in other humanistic disciplines," lamented Alexander Rehding, it had "hardly hit musicology" as of 2002 (305). Fortunately, ten years later that can no longer be said. Ecomusicology has "hit" musicology in a big way.

The Problem with Popular Music Studies

Unfortunately, ecomusicology has had less impact in popular music research. From conundrums of scale (e.g., stadium rock tours) to digital de-territorialization, the ecological dimensions of popular music are more pressing than ever, yet surprisingly under-represented within popular music studies literature. However, ecomusicologists are addressing some of the concerns raised by Tagg, creating an opening for a more interprofessional and interdisciplinary music studies to develop.

Of course, ecomusicology’s relatively small conversation is not *the* answer to music studies’ broader challenges. However, it does illustrate the potential for genuine interdisciplinarity to develop and provides some answers as to how we might foster interprofessional collaboration on a larger scale.

Within ecomusicology, pressing environmental questions have caused musicologists, ethnomusicologists, popular music researchers, musicians, producers, anthropologists, sociologists, and scientists to focus on shared areas of interest. Without waiting for institutional or professional-level rapprochement, ecomusicologists have been quietly integrating the tripartite field on their own. The vision Tagg laid out for IASPM and music studies in 1981 is still alive and kicking in ecomusicology.

Unfortunately, popular music studies has erected barriers to ecological research. The “epistemic inertia” Tagg identifies as having held back the development of a more robust music studies also inhibits ecological inquiry (Tagg 2011: 4). One form of epistemic inertia identified by Tagg is popular music studies’ overreliance on methods derived from literary criticism and theories borrowed from “scholastic ‘poststructuralism’” (9). The basic premises of poststructural thought have moved from the margins to the center. Unfortunately, as with many revolutions, the poststructural movement has produced its own epistemic inertia.

In some ways, poststructuralism represents the triumph of cultural relativism, the mainstay of anthropological thought. Postmodern suspicions of totalizing theory and extreme reductionism, combined with concerns for human agency, diversity, and complexity, brought welcome changes to the social sciences, humanities, and arts. Unfortunately, the radical new critique quickly became orthodoxy. There is much more to be done with and in the world than break it down into semiotic bits and pieces. Tearing apart larger symbolic constructs into signifiers, significations, signs, codes, texts, and intertextual articulations is good for pointing out the constructed nature of social phenomena and human consciousness. However, poststructuralists largely failed to turn the critique on themselves, failing to recognize that semiotic epistemology is just one of many ways to go about understanding the world, as fragmentary and partial as any other. As Tagg points out, authentic interdisciplinarity requires that we do more than turn every conversation into a theoretical bully pulpit. We need to listen to other perspectives as well. That includes political economic theory, contributions from the material sciences, and so on.

Tagg hopes to “see music studies institutionalized in a thoroughly sane and democratic fashion” (Tagg 2011: 15). It is unusual to see “democracy” invoked in an academic discussion, but quite in line with the call for interdisciplinarity. Interdisciplinarity requires a democratic mindset. Instead of solely assessing others’ work in the terms of one’s own theory and methodology, the interdisciplinary researcher must also learn to evaluate research on its own terms, within the criteria of the research genre, field, theoretical framework, and methodology that generated it. Otherwise, meaningful conversation, assessment, and integration of knowledge become impossible.

As Tagg implies throughout “Caught on the Back Foot,” open-mindedness is essential for interdisciplinarity. It requires recognition that all knowledge is partial, our own as well as others’. All perspectives are incomplete, whether in isolation or synthetic combination. Once scholars accept each perspective as partial, not to mention political, they can begin a more earnest discussion concerning the accuracy, meaning, and truth of a given piece of research, and less time dismissing it for sake of its representation of a given academic genre (positivism, poststructuralism, etc.). For example, such open-mindedness reduces the poststructuralists’ fear that scientific inquiry will overwhelm critical understandings of the constructed nature of human knowledge and reality, while allaying scientists’ concerns that the results of empirical inquiry will simply be dismissed as social constructs on an equal plane with all other

ways of knowing, regardless of topic. When the goal is determining if climates are changing or species are in decline, for example, material science has more to offer than the interpretive humanities (although both have much to say in regard to what those trends mean and even how they came about). Positivism and postmodernism both fail when taken to acritical extremes.

For example, when looking at musical text, it makes perfect sense to emphasize semiotic theory and methodologies. Conversely, when attempting to understand how people make, interpret, perform, and “use” music, we might emphasize anthropological, historiographic, and sociological theory as well as reflexively rendered forms of empirical research, such as ethnography, focus groups, and surveys. All of these epistemologies and much more are needed, including sufficient open mindedness and trans-disciplinary literacy to critically synthesize disparate ways of exploring, interpreting, and making music. In sum, the best future for popular music studies and IASPM is, as Tagg suggests, interdisciplinary. Ecomusicology provides some clues as to how popular music studies might adapt a more interdisciplinary mindset.

The Interdisciplinary Promise of Ecomusicology

Ecomusicology will not solve the problems Tagg raises. However, the growing interdisciplinary discussion around environmental matters in musicology provides some hope that Tagg’s vision could come to pass for music studies as a whole. As Tagg points out, IASPM was designed to be “interdisciplinary, international, and interprofessional” (2011: 3). Regarding, the first, Tagg argues that “It’s impossible to understand much about music without considering it from the viewpoints of areas such as music making, musicology, ethnomusicology, anthropology, psychology, sociology, acoustics and bioacoustics, neurology, technology, electronics, economics and politics” (3-4). It is a matter of mindset as much as communication. The “Great Epistemic Divide in European culture” between “notions of art and science, subjective and objective, poïesis and aesthesis” hinders meaningful exchange and collaboration between disciplines (5).

The meanings people make of ecosystems can be just as important and systemically determinant as more directly measurable, material factors. For example, how people think about their front lawns greatly impacts the amount of phosphorous flowing through a watershed. Entire dead zones in the world’s oceans are caused by deleterious cultural orientations, including the ways in which people think about their lawns, food, animals, and watersheds (Pedelty 2011).

Ecomusicologists have been learning to speak mutually intelligible languages in order to increase their understanding of how music works, what it means, and what “it” is within wider ecosystems. Scientists, humanists, artists, and social researchers interested in music-and-environment seem to be particularly interested in collaboration, and are not inclined to critique each other for “driving disciplinary vehicles for which” they “have no valid license” (Tagg 2011: 7). There is widespread recognition that no one will ever corner the market of ecological truth, leading to genuine curiosity regarding what distant others might have to say on the matter.

Naturally, the term “ecomusicology” raises concerns. For one thing, it demonstrates etymological allegiance to musicology. An authentic musicology would be the study of music, in general, rather than a field dedicated to one genre tradition. As stated at the outset, ecomusicologists have shown interest in musical phenomena, more generally, rather than letting genre overdetermine which musics are studied. However, creating a specific title and niche for ecological research could result in epistemic inertia, the state of affairs Tagg seeks to overcome. In recognition of that danger, a preconference at the joint AMS/SEM/SMT was entitled “Ecomusicologies.” Ecomusicologists have forestalled naming a singular field out of fear that doing so will inhibit creative inquiry.

Ecomusicology has thus far avoided division into rigidly opposed camps and overly prescriptive rhetoric. William Echard explains:

There are two perspectives that are commonly met in discussions of music and environment. One, which treats music as an environment, emphasizes the utility of music to create spaces and movements, and to elaborate these into a wide range of experiential environments. The other, which addresses music *and* the environment, treats music as one nexus through which human cultures are bound up with a single world understood in naturalistic terms. The choice between these two kinds of perspective is often treated as an either-or alternative—given the current political and environmental situation, is it wise to side with abstraction? Is it better to risk oversimplification? (2011: 61)

As Echard's research demonstrates, ecomusicologists are making admirable attempts to get beyond simple binaries of science vs. the humanities, real vs. constructed, objective vs. subjective, and so on.

Echard suggests using an "energetic and spatial icons and indices" model, or ESII, in order to develop critical synthesis, a position that is "open to science but also non-reductive" (62), "expands the meaning of 'environment'," (62), "suggests a conceptual and literal continuum between human and non-human," (63) and "is ontologically flexible" (63). These seem like admirable goals for ecomusicology.

In that same interdisciplinary spirit, biologists interested in the effects of anthropogenic sound on non-human animals (Luther and Derryberry 2012) have been talking to musical experts in interspecies performance (Rothenberg 2005, 2008). Paleoanthropologists studying the evolutionary development of musicality (Cross 2001; McDermott 2008) have been learning from political scientists who study music as a community-bonding agent (Mattern 1998). Ecomusicology has allowed a diverse group of scholars to bring these and other, seemingly disparate literatures into conversation with each other. Rather than rush to establish authority or chase the chimera of ecological consilience (Wilson 1998), ecomusicologists have been raising good questions while exploring promising new lines of inquiry. Within ecomusicology biologists, neuroscientists, literary critics, music theorists, historians, anthropologists, and several other strains of musicologist find themselves in the same room, discussing overlapping areas of interest.

Ecosystems Communication Approaches to Music

Having characterized how ecomusicology responds to Tagg's critique, it will be useful to provide to provide a better sense of what ecomusicology is. Thus far, there have been four main avenues of investigation in ecomusicology: ecosystems communication approaches, soundscape studies, ecocritical analysis, and historical research. A full retelling of the field is impossible here, but brief synopses of ecomusicology's main conversations are in order.

Some of the most interesting ecomusicological research to date has involved scientific study of music as communication. Scientists have studied sounds made by other species, including birds (Roper 2007), whales (Tougaard and Eriksen 2006), and even beetles (Cummings 2006). Some argue that animals make music, while others draw distinctions between human music and animal sounds. How we define music in relation to the rest of the living world matters. The answer might influence how we listen to the life around us and manage ecosystems. It will certainly influence what we do as ecomusicologists.

"Nature produces noises, not musical sounds," argued Claude Levi-Strauss (quoted in J. L. Adams 2009: 114). Levi-Strauss was weighing in on a debate "over the presence and extent of music-making in the wider animal kingdom" (Roper 2007: 59). That debate continues. Levi-Strauss joined ranks with researchers who draw a strict line between human musicality and the relatively limited, naturally selected vocalizations of animals. Ian Cross argues the point: "Musics are those temporally

patterned human activities, individual and social, that involve the production and perception of sound and have no evident and immediate efficacy or fixed consensual reference" (2001: 98).

The ability to produce and interpret music is part of humanity's bio-cultural endowment. We are just beginning to understand the connections between music, human evolution, and culture (Cross 2001; Levitin 2006; McDermott 2008; Sacks 2007). Birds and whales are among the many creatures that emit organized sound patterns, and perhaps are, therefore, also music makers.

Among those arguing for animal musicality is Emma Rose Roper, whose study of the Australian magpie presents compelling evidence of sonic improvisation, invention, and melodic imitation (2007: 72). David Rothenberg agrees, finding music in birdsong (2005) as well as whale communication (2008). A clarinetist and electronic musician, Rothenberg works with natural soundscapes and animal sounds to produce musical pieces, letting whalesong and birdsong create the structures around which his music takes form. Such scholars vehemently disagree with those who draw a strict distinction between human musicality and other animals' use of sound.

It is unclear which is more anthropocentric: to appreciate other species for how closely they represent human-like characteristics or to appreciate them for their own distinct qualities. Does thinking of birdsong as music advance or inhibit our understanding of the human phenomenon of music? Does it advance or inhibit our understanding of birdsong? Does it increase our ability to effectively steward biodiverse environments, or lessen it? Perhaps the most important question is not "Do birds and whales make music?" but, rather, how does our music relate to theirs? John Luther Adams's compositions artfully explore that question, as do Rothenberg's (2005; 2008).

Grappling with these conundrums can generate important new lines of research. Closing them off to simple polemics has the opposite effect. These are not easily resolvable questions, but they make for highly productive discussion and propel interesting research. Such a discussion took place at the 2012 Ecomusicology Listening Room (ELR), an event jointly sponsored by the American Musicological Society and Society for Ethnomusicology (www.ecosong.org).

Soundscape studies

Canadian scholar R. Murray Schafer (1977, 1993) pioneered the most influential musicological approach to environment in the Twentieth Century: soundscape studies. Ethnographic methods have played a central role. The ethnographic emphasis on participant observation in lived contexts and listening to informants allows soundscape researchers to explore sonic environments in depth.

However, soundscape studies have incorporated other methods as well. For example, Katherine Irvine and her colleagues (2009) used experimental design and interviews to explore human soundscape preferences. They discovered that the variables of green space, biodiversity, and sound levels co-vary in urban spaces. Residents evidenced a strong preference for sounds associated with biodiversity along with a strong negative reaction to anthropogenic or "mechanical noise" (167).

Schafer and other researchers have identified fundamental problems in the human production of soundscapes, including the tendency to undo naturalistic, biodiverse, and healthy soundscapes without conscious consideration of social or psychological consequences. Soundscape research in the late 1970s and early 1980s led to the development of new listening environments and increased attention to sound in design, architecture, engineering, and art. Architects, landscapers, and urban planners influenced by the soundscape design studies movement have created structures and landscapes to help combat noise pollution and inspire more sustainable orientations.

Ecocritical Musicology

Literary ecocriticism has influenced the most recent wave of ecomusicological research. Ecocritical musicologists have tended to focus on musical texts rather than listening contexts, using ecocritical theory to build philosophical taxonomies for musical meanings. They borrow the literary critics' toolkit—semiotic, narrative, genre, and discourse analyses—supplementing those methods with music-specific theories and concepts.

The *Grove Dictionary of American Music* (forthcoming in 2013 from Oxford University Press) defines "ecomusicology" as "the study of music, culture, and nature in all the complexities of those terms. Ecomusicology considers musical and sonic issues, both textual and performative, related to ecology and the natural environment." The summer, 2011, issue of the *Journal of the American Musicological Society* (JAMS) effectively introduces ecomusicology and this promises to become a foundational publication for the emerging field. From Aaron Allen's overview in the Colloquy, "Ecomusicology: Ecocriticism and Musicology" (391-394) to Holly Watkins' recasting of "musical space as a virtualization of social and natural spaces" (407), the JAMS issue defines the field. Another central text for ecocritical music studies is the 2011 *Green Letters* issue dedicated to ecomusicology. It includes the work of several authors featured in this chapter.

Historical Ecomusicology

Thus far, historical perspectives have overlapped a great deal with ecocritical perspectives. Ecocritical historians have drawn critical connections between musics, musicians, and environmental ideologies. David Ingram has set the standard in popular music research with his ecocritical histories of Anglophone folk and rock (2008, 2010).

However, the bulk of historical ecomusicology has focused on classical composers and compositions. Denise Von Glahn's *The Sounds of Place: Music and the American Cultural Landscape* (2003) provides insight into the changing nature of Euro-American orientations to place, nation, and environment. Brooks Toliver examines Ferde Grofé's *Grand Canyon Suite* (2004) as an archetypal example of American pastoralism. Like Von Glahn, Toliver's work has been read widely outside of classical musicology, and deservedly so. Both works are historically situated and genre-specific, but both also draw in wider cultural, economic, and ideological contexts in such a way that they can be applied much more broadly.

It would be hard to situate any single work squarely in one of these four categories. There is a great deal of overlap and exchange throughout ecomusicology. For example, my ecomusicological research (Pedelty 2012) employs ethnographic methods, showing some affinity to soundscape studies. However, rather than thick description of soundscapes, I am more interested in the relationship between music and environmental movements. Yet, as evidence of ecomusicology's interdisciplinary breadth and exploratory spirit, not once has a musicologist cited me for driving without a license (Tagg 2011: 7). Instead, I have had the good fortune of learning from and alongside musicologists interested in environmental questions.

Years ago, as I started to emerge from ethnographic fieldwork, I looked around for fellow scholars interested in the ecological study of music. Where did I find it? The American Musicological Association (AMS). The Ecocriticism Study Group (ESG), chaired by Aaron Allen, was clearly the center of ecomusicological discussion, and remains so. What's more, these scholars were interested in what I had to say as a scholar of popular music, an ethnographer, and anthropologist. By no means was I the first non "muso" (Tagg 2011) to join their conversation. Representatives from each of the above perspectives were involved long before I showed up with hat in hand. In fact, even outside the ESG, I have found musicologists incredibly welcoming and interested in ecomusicology.

Ecological research seems to invite interdisciplinarity, no matter where the discussion is centered. The interdisciplinary world of music studies Tagg seeks to build is represented well in the microcosm of ecomusicology, especially within the ESG. Ecomusicology presents a small ray of hope that Tagg's vision might eventually be realized on a larger scale, across broad musical themes, genres, and geographies.

Ecomusicology, Materiality, and Place

Ecomusicology requires us to go beyond composition, classroom, and concert hall to explore the musical resonance of entire ecosystems (Guy 2009). That means going beyond musical affects to consider material *effects* as well. I hesitate to use the term "materiality," a post-structural placeholder for more serious consideration of ecological contexts and relationships. Granted, neither significations nor even signifiers are ever truly material. To be human is to think the world rather than experience it directly. On the other hand, I find great utility in physics, and share the scientists' belief that matter does indeed exist outside of our solipsistic selves, no matter how complicated "it" is in terms of physical composition or symbolic perception. In other words, from an ecomusicological perspective, neither material nor cultural reductionism will suffice.

Material analysis is not only important for producing more complete ecologies of sound, but also for discovering new musical meanings. What makes for good music is, in part, related to what makes music good, in an ethical sense. And what makes music ethically sound, from an ecological perspective, is partly a matter of material contexts, effects, and relationships. For example, visual and sonic cues are increasingly evaluated in terms of their meaning in regard to sustainability. Debates are raging among musicians, producers, audiences, and journalists concerning the sustainability of rock concerts, tours, recording, and distribution (Pedelty 2012). Ecosystems analyses are playing a role in informing those debates.

Musicians, producers, and audiences are starting to become more conscious of environmental contexts and crises when making musical choices and evaluating sound. In one of the most insightful studies of genre, Simon Frith concludes, "It is through genres that we experience music and musical relations, that we bring together the aesthetic and the ethical" (1996: 95). Environmental considerations are starting to enter into interpretive regimes, bringing an additional set of ethics to musical aesthetics.

Allen addresses material connectivity particularly well in his groundbreaking study of violin production (2012). Allen argues, "if we want to protect the environment, we need to make both cultural and ecological arguments; and if we want to preserve cultural traditions, we need to recognize and address their environmental impacts as well" (2010: 13). Biologist Aranda Aldana makes a similar connection. She notes that use of the Queen Conch as a musical instrument has aided in the species' decline (2007).

Space and place have been central to the ecomusicological conversation. As John Parnham explains (2011: 76):

The ecological emphasis on 'belonging in place' as an important, constituent component of human being, has been marginal until recently when some of the more interesting work has sought to reconcile perspectives on place and space by examining how a felt, embodied sense of place is articulated via music, interacting with, and competing against, external political or economic forces.

Similarly, Lawrence Grossberg describes music as a "territorializing machine" (1993: 206). People, places, and technologies generate songs. In return, music mediates our imagination of place. Everything from ethnographic research to scientific sound sampling can be employed to help us better understand complex relationships between music, place, and more encompassing ecosystems.

Beyond Pastoralism: Finding Hope in "Motorbikes and Music"

So what's stopping popular music studies from integrating ecological and ecomusicological research more fully into its fold? The problem might lie in ideology. Environmental sustainability and preservation have been articulated with pastoralism, especially in the Anglophone world, a tendency that has blinded researchers to the environmental dimensions of urban popular music. However, as several scholars have recently argued (De Simone 2008; Ingram 2010; Parnham 2011; Rosenthal, 2006), popular music has everything to do with its surrounding environment, including urban spaces.

Tagg provided one of the most cogent explanations of rock music's relationship to the city. Tagg equated rock vocals and guitar riffs to crying babies and motorbikes, sounds that "make themselves heard above" the noisy urban soundscape (1994: 11):

The heroes of heavy metal have tended to be guitarists or vocalists. It is they who make the most noticeable din and who make themselves heard above it, cutting through all the other noise and movement by using loud and frequently garish gestures of sound and vision. When fans in a heavy metal concert stretch their arms into a huge 'V', it is their victory too.

Without shutting off other possibilities, Tagg creatively explores the relationship between sound and place.

The essay resonates with what I have observed as an ethnographer in comparative urban vs. rural contexts (Pedelty 2012: 3-4; 163-164). It may or may not resonate with other's experiences, but that is the beauty of Tagg's open ended, narrative technique. The story is an idiosyncratic telling of a partial fragment in a complex web of ecological relations. Like most good narratives, it is very specific in terms of character, setting, and plot, containing the possibility for broader generalization, but laying no claim to it.

In explaining heavy metal's relationship to urban environments, Tagg demonstrates the advantages of examining music in wider spatial, cultural, ideological, and material contexts, providing a more holistic understanding of a musical genre and subculture. The result is writing with a profound sense of resonance. Tagg offers a provocative possibility: rock is loud because its generative environment is loud. The city Tagg describes is fully recognizable, yet in the anthropological tradition, productively defamiliarized. The reader emerges having learned something new about taken-for-granted contexts, noticing new sounds and reimagining familiar musics.

"Subjectivity and soundscape" also provides clues as to why so little attention has been paid to environmental questions in contemporary popular music and popular music studies. One might conceive of popular music as urban and "environment" as rural. That mindset is often manifested in environmental activism, environmental music, and even ecological research. Environmental arguments have been, and continue to be, articulated through pastoralist points of view. Urbanity is ignored, despite the fact that cities are among the most sustainable forms of human organization (Dodman 2009) and the majority of the world's people live in them. Just as the most popular forms of music are ignored in musicology, so are the places where most people live and listen.

Given the pastoral mindset, it is little wonder that rock, pop, and hip-hop artists have tended to ignore environmental questions as well. In the pastoral mindset, ecology and environment have nothing to do with bars, clubs, malls, cars, sex, drugs, and nightlife. Perhaps for the same reason, relatively few popular artists have taken on explicitly environmental themes.

The exceptions are notable. For example, Debra Rosenthal's (2006) work demonstrates deep connections between hip-hop and environmental concerns. John Parnham's has demonstrated that "even something as seemingly far removed from 'nature' as punk" has ecological relevance (2011: 76), as has David Ingram in *The Jukebox in the Garden: Ecocriticism and American popular music since 1960* (2010).

Unfortunately, because so few popular artists have referenced environmental issues in their music, relatively few popular music scholars have taken up the topic. That will change as artists increasingly incorporate ecological issues, exigencies, and opportunities into their songs and performances.

Conclusion

Ecomusicology's rapidly growing conversation cuts across disciplines and professions. Just as questions of race, gender, and political economy have been thoroughly infused throughout music studies, so too, environmental inquiry might be best served if widely dispersed. With that in mind, ecomusicologists are working to build an interdisciplinary conversation rather than a separate subdiscipline.

In addition to opening our theoretical apertures and collaborating across disciplines, ecomusicology is about researching environmental questions of direct public relevance. Problem-oriented research with tangible human (and nonhuman) stakes is particularly good for breaking down genre-bound obstacles to interdisciplinary inquiry. Ecomusicology is not "music studies," as Tagg envisions it. However, ecomusicology provides evidence that classical musicology, ethnomusicology, and popular music studies could be more productively integrated.

Regardless of what ecomusicology entails for music studies writ large, it should play a role in IASPM's future. Ecological matters have clear relevance to the world of popular music (Ingram 2010; Pedelty 2012), yet environmental matters have not been widely discussed in popular music studies. Hopefully, scholars will see that gap as a new opportunity.

Endnotes

¹ Coding was completed using the AMS/SEM/SMT program, available online at <http://www.ams-net.org/neworleans/program.pdf>. Coding was completed solely by the author. Only paper, poster, and film titles were counted, a total of 633 titles. However, in some cases it was not clear whether or not a title represented a paper or more general discussion. Only titles indicating genre were counted. 60 titles were indeterminate in terms of genre and it was not always clear how to categorize a given musical type (e.g., as classical, folk, or popular). Note: the author is a member of the AMS, IASPM, and SEM.

² These percentages were derived from data presented on the industry blog Music and Copyright: <http://musicandcopyright.wordpress.com/2012/06/13/pop-to-the-rescue-of-the-music-industry/>.

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