

On Pleasing Every Palate

On Maxwell Wells' Review of ISMIR 2002

by Michael Fingerhut

MIR, or music information retrieval, has recently emerged as a common domain of inquiry in the collective consciousness of actors in arts and humanities (music and other performing arts), behavioral and social sciences (cultural resources, broadcast media, economics, cognitive processes...), engineering (acoustics, signal processing, ergonomics...), law (communication law, international law, intellectual property), management and commerce, science and technology, library sciences...

This is not to say that research, development and uses of what is being now labelled as MIR had not existed previously. As Max Wells points out, industry had been tackling, from its point of view, with MIR technology, with mixed returns, to say the least.

What is curiously absent from his historical review – other than his reference to the 1977 Tversky paper – is the fact that research and development had been going on in academia too for at least as long, with the publication of papers (as Downie's 1999 call and Foote's 1999 review paper show) in various conferences, periodicals and books (from psychology to computer music) and the invention of successful and usable systems (such as the Indiana University and IRCAM digital music libraries in the mid-90s or the Stanford *Themefinder* project later). Such topics as metadata have been in use in libraries much earlier than its relatively recent massive adoption by industry (actually, the first metadata records must have been written on sumerian and akkadian clay tablets - there are two primitive catalog tablets dating from around 2000 BCE at the temple of Enlil at Nippur).

It is thus incorrect to state that – then as now – the publicized research “duplicated the work done by some of these companies.” On the other hand, it is probably true that they had been led in parallel and with the added factor that, as Max Wells indicates, “few of the companies published, making it difficult to know what they did, or how they did it.”

The establishment of ISMIR (see Byrd & Fingerhut (2002)) aimed at remedying to the lack of exchange which existed between the various earlier actors in MIR and create a multidisciplinary forum bringing together the full spectrum of the MIR actors. This is a gradual process: the increase in attendance numbers is a good measure (ca. 20 people at the early SIGIR'99 Exploratory Workshop on MIR to the close to 200 attendees at ISMIR 2002) as well as an increase in the number of delegates from industry sectors (ca. 30% at ISMIR 2002): France Telecom, Nokia, NTT, Oracle, Philips, Sony, to name but a few, as well as many smaller commercial participants.

So the industry is here too – already the telcos and audiovisual companies. Not *all* the relevant industry, as Max Wells points out: the recording industry isn't here yet. As a preliminary remark on the absence of a sector of the industry, one should say that it would be unmanageable for ISMIR to “grow too fast” – and the gradual reachout reflects a reasoned expansion, also reflected by the significant increase in the number of submissions and a widening of its areas of pursuit.

But then not all the other relevant actors are here either, such as law and intellectual property. The ISMIR committee recognized this lack by inviting speakers to address those issues specifically in the invited guest speakers session on metadata: Chris Barlas of Rightscom, Ltd., in his talk “Beating Babel – Identification, Metadata and Rights”, spoke of the development of rights trading for music over networks and of the <indec> analysis and MPEG 21 Rights Dictionary, following a talk by Leonardo Chiariglione of Telecom Italia and MPEG on the technologies of Content Representation, Digital Item Declaration, Interoperable Intellectual Property Management and Protection, and Metadata.

As to the other, specific reasons for the absence of the recording industry, the factors which Wells mentions may soon disappear, as recent significant announcements indicate:

- “Vivendi takes music sales online: Vivendi said it would make available for internet download about 43,000 tracks from the songs owned by its Universal Music Group unit, with plans to take its entire catalogue online.” (BBC News, 11/20/2002).
- “EMI offers online music sales: EMI Recorded Music has announced one of the most liberal digital distribution deals of any of the five major recording labels. Nine online music services will sell digital singles to consumers as soon as they debut on radio. Services including Pressplay, FullAudio and Listen.com's Rhapsody will allow subscribers to burn tracks onto a CD or transfer them as many times as they like to portable music players.” (vnunet.com, 11/14/2002).
- “Sony Pictures Entertainment Forms Digital Policy Group, a new corporate level organization designed to address the challenges and opportunities arising with the digital distribution of entertainment product” (PRNewswire, 11/26/2002).

It so appears that this industry is ripe for the “economic incentive,” and that it will take an active interest in MIR research and in its ISMIR forum.

It is however also important to remember that not *all* of the research that is being performed in this area is done for economic reasons, but for smaller communities and learned purposes (such as music theory and analysis). ISMIR is the meeting ground of many communities interested in MIR, with their common as well as diverging agendas.

REFERENCES

- Byrd, D. & Fingerhut, M. 2002. “The History of ISMIR – A Short Happy Tale.” *D-Lib Magazine*. 9(11): <<http://www.dlib.org/dlib/november02/11inbrief.html#BYRD>>.
- Downie, S.J. 1999. “The Exploratory Workshop on Music Information Retrieval.” [*Online call for participation*]: <<http://www.lis.uiuc.edu/~jdownie/cfp99.html>>
- Foote, J. 1999. “An overview of audio information retrieval.” *Multimedia Systems*. 7: 2-10.