Linux Audio Conference 2010

Utrecht

The LAC Times

Welcome to the first edition of the LAC Times. In this edition you will find a couple of articles that provide some background for the Linux Audio Conference 2010. We intend to keep you informed of the conference on a regular basis while at the same time welcoming your input.

Topics in this edition:

Introducing the LAC 2010

Since 2003 the Linux Audio Conference has become a yearly recurring international 4-day event where users and developers of open source music software and Linux Audio in particular get together.

This time, the LAC, as it is known by some, will take place in Utrecht, The Netherlands.
Why Utrecht ? Well, Utrecht is the capital of the Hogeschool voor de Kunsten Utrecht and this year we have the honour to host the LAC.

Our institute offers bachelor and master programmes for various disciplines such as Music, Theatre, Design, Media, Games, Interaction and Music & Technology. Students and alumni of the HKU participate in the organisation and contribute to the conference. By involving the generations that will shape the future we hope to enrich the Linux Audio community.

The Dutch name Hogeschool voor de Kunsten Utrecht is abbreviated to HKU, which we share with the University of Hong Kong. To prevent part of the LAC crowd to look for us in China, I'd like to stress that we have our base in Utrecht.

The English name for Hogeschool voor de Kunsten Utrecht is Utrecht School of the Arts. Though the LAC may be organised somewhere in the USA in the near future, I'd like to say again that we are in The Netherlands in May 2010.

Now, with all these opportunities for confusion out of the way, let me direct you to the LAC website http://lac.linuxaudio.org/2010 where you will find information about travelling to Utrecht, where to stay and how to register.

For those who haven't read this in time: the entire conference will be streamed in real time, so if you can't make it to Utrecht you can still participate in cybespace.

About the Linux Audio Conference 2010
The Linux Audio Conference 2010 is a three-in-one conference. Three closely related fields with a lot of overlap but at the same time enough diversity to attract people with different backgrounds and one common denominator: their devotion to open systems.

1. Linux Audio
2. Open Source Music Software
3. Open Content

Linux Audio
This is probably the most technical part of the conference with papers, discussions and workshops about the core of the Linux Audio system as well as music and sound research and applications specifically for Linux or developed using Linux.

Open Source Music Software
Open Source Software is generally not limited to Linux. The nature of Linux makes it an excellent platform to develop OSS, but Open Source applications are often developed for multiple platforms. This part of the conference focuses on the use of Open Source Software in every conceivable application of music and sound.

Open Content
The Open Content part of the Linux Audio Conference 2010 focuses on the creative works themselves. Backed by a licence like e.g. Creative Commons, creative works become available to everyone while preserving ownership and the possibility to re-use, improve and benefit. Although the LAC is very OSS-oriented, the Open Content part of the conference applies to all creative works, whether created using Open Source Software or not.

Rationale behind this approach
While musicians and composers may be drawn to one subject, programmers to another and hardware designers to yet another, they all share the belief in the power of collaboration. If there is one thing that Open Source Software, Open Content and Linux have in common, it is freedom: freedom of choice, freedom to share, modify, distribute and even make money.
During the conference we will facilitate the need to meet, deliberate, learn and work within each discipline as well as encourage interaction between the various groups.
My personal hope for the LAC 2010 is that it will continue to the acceptance and use of open systems for creating, producing, understanding and enjoying music.
Therefore I hope that musicians, programmers, composers, audio hardware manufacturers, researchers and students will come to the conference and join forces to create a momentum that will further advance the proliferation of Linux Audio and other open source music applications.

Fun
Last but not least: let's not forget to enjoy the experience. The LAC offers a day programme and an evening programme. During the day you'll meet nice and interesting people, learn about their point of view and their approach to that one issue you've been trying to solve for months. You can follow paper presentations, participate in or give a workshop, present your work or ideas by means of a poster presentation or an installation, go out and socialise during lunch or dinner and possibly join an excursion.
The evening programme consists of one or two concerts and a social event. You'll hear more about these in the next edition of the LAC Times.

Looking forward to seeing you in Utrecht !

Author
- Marc Groenewegen

Links:
http://www.hku.nl - Hogeschool voor de Kunsten Utrecht

http://lac.linuxaudio.org/2010 - The Linux Audio Conference 2010

http://creativecommons.org - Creative Commons

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In his life before organising the LAC he was playing the guitar and drums in his spare time and tries to learn how to dance Salsa and Zouk.

Finding a new business model for cyber music

Digital technology can fundamentally change the music industry. For the first time in history, musicians and music lovers can actually shape the music landscape. This article describes the influence of 'Cyber Indie' on the future of the music industry.

Digital technology for the first time enables a music medium that -due to the binary representation of information- does not depend on physical properties and can be copied, modified and distributed without loss of quality.

Thanks to digital technology, anyone with a computer, the right software and internet access can produce, remix and distribute high quality music. Amateurs have tools at their disposal that come closer and closer to those of professionals and contributing music has become easier. Together with the ever increasing availability of both legal and illegal music on the internet, this makes the digital music culture much more democratic.

Within the culture of digital music, musicians can enrich the music landscape with their own creations, while music lovers, thanks to the internet, have access to an almost endless and varied pool of music. This enables a future in which musicians as well as music lovers set the rules without having to cope with the whims of record companies, radio stations and opinion makers. But to realise this 'achievable Utopia', the will to innovate is necessary.

The conservative reaction of established record companies to sharing music over the internet -which has become common behavior among 'netizens'- proves that the music industry is anything but ready for the digital music culture. They single-sidedly reject and fight most, if not all new ways to deal with music and other creative content in the digital realm, rejecting them as infringing copyright and harmful to the cultural industry of music. And all in the name of the poor musicians.
That same copyright on music is -not entirely without coincidence- one the most valued goods in the traditional music industry.

> **"It's not the musicians but the established record companies that control most of the copyrights for music."**

Power is strongly centralised in the music industry: four record companies -Universal, Sony BMG, EMI and Warner- together have a market share of roughly 70 per cent of the total music sales. On top of that, these 'Big Four' own practically all music distribution channels.
Musicians who want to use these channels depend on these companies.
An interesting fact in this regard is that musicians dealing with one of these parties usually have to hand over the copyrights to their creative works as 'part of the deal'. This implies that it's not the musicians but the established record companies that control most of the copyrights for music.

The extensive copyright catalogues of the established record companies represent a very large monetary value. This explains the defensive attitude towards the digital sharing of music on the internet. Nevertheless the social desirability of this reaction can be questioned. The original purpose of copyrights was not just to reward authors for their creative work, but just as well to stimulate a lively and diverse cultural landscape.

The current focus to economic interests totally bypasses the social and cultural advantages of the digital music culture. This is a short-sighted approach of digital technology that obstructs major innovations in the music industry.

Seen from this perspective it's serious that politicians often let lobbies from the established music industry persuade them to extend copyright for music while it's unclear whether musicians, music lovers and society as a whole benefit from this. Both the established music industry and policy makers show lack of vision with respect to the opportunities offered by the digital music culture.

Fortunately, for musicians that do have vision there is a way to explore the the digital music culture's opportunities. These innovative musicians understand that digital exchange of music can not be stopped and embrace this reality by applying it to their advantage.

With the help of a Creative Commons licence, which is freely available on the Creative Commons website <http://creativecommons.org>, they can explicitly allow specific forms of use of their music, for example to entirely legally distribute it. The music lover is in this case not bound by strict copyright legislation, as the established music industry and policy makers try to enforce, but instead encouraged to exchange the music, legally. This creates clarity for all parties involved.

The music industry desperately needs a new business model. The internet took away the shortage of music that was available. Consumers therefore are less willing to pay for the music itself, which in turn implies that freely distributing music under a Creative Commons licence in many cases does not lead to loss of revenue.
Instead, the unlimited distribution of music, made possible by Creative Commons licences and digital distribution channels, leads to an increased exposure for the musician.
Thanks to this the free distribution of music can generate alternative ways of revenues, for example by realising yields from concerts, merchandising, sponsoring, commercial re-use of the music in e.g. advertisements and the sale of special editions.

Making money by free distribution of music is relatively unknown and therefore unpopular but when this innovative model will prove itself as an alternative to merely selling music recordings, it will grow to a fundamental part of digital music culture.

In 2008 Nine Inch Nails released their album Ghosts I-IV under a Creative Commons licence. Six different versions of the album came out simultaneously, from a free digital download up to an "Ultra-Deluxe Limited Edition" costing 300 dollars.

In just one week the band raised 1.6 million dollars, while at the same time the music was freely available. The ultra-deluxe version was sold out the day it was released.

This example proves it is possible to make a living as a musician in the digital era by making your music available to the general public, while at the same time finding ways for creating added value for which music lovers are willing to pay.

In some ways the digital revolution in the music culture resembles earlier cultural revolutions. In reaction to the dominance of over-produced pop music, in the 1970s the punk movement came into existence. Punk tried to change the music culture in a pragmatic way by introducing an alternative.
The punk movement created a surge of new bands and independently produced music. Punk music was released by independent labels and distributed by cooperation with like minded international punk labels and record stores.

Despite its good intentions and clear strategy, the punk movement didn't manage to change the dominant music culture. Likewise, the second emergence of the 'Do-It-Yourself' mentality inside the Indie sub culture of the 1990s also didn't deliver the promise.

In both cases the access to effective distribution channels proved necessary to reach a mass audience and musicians had to chose between surrendering to an established record company – to gain access to its monopoly of efficient distribution channels – or be independent and lead a marginal existence.
The digital revolution is different though and finally enables musicians to take control.

Thanks to the internet, for the first time in history musicians can reach a mass audience on their own and using commonly available means. The distribution and promotion channels of the established music industry are no longer indispensable, thus reducing the need for collaboration and forced artistic concessions. The digital music culture gives 'Cyber Indie' the opportunity to grow.

> **"The digital music culture can't be stopped. The reality of this has to be accepted."**

Musicians have to act now and take matters into their own hands, while the industry is clearly struggling in its quest for a new business model. Making use of the opportunities of the digital music culture requires an active attitude, the guts to innovate and the insight into the wants of the present-day music lover. Now is the time for musicians take control.

In a more democratic music landscape things will not necessarily become easier for musicians. They will have to set themselves apart, perhaps even more than they had to in the past. One important difference is that the power of the established music industry is declining, while the music lover gets more influence. The internet is becoming the music channel of the future and brings music lovers in touch with a bigger and more diverse market.
The digital music culture can't be stopped. The reality of this has to be accepted.

Musicians who support the distribution of their work increase the chances of being noticed within the abundance of music. Because in the digital music culture, attention is becoming the most valuable asset.

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Maarten Brinkerink holds a Master's degree in New Media and Digital Culture, and works at the Netherlands Institute for Sound and Vision R&D department. He studied at the University of Utrecht and specialises in digital music culture and the distribution of creative content using digital media. He is board member of the Dutch Open Media Foundation and community lead for its main project, the Dutch open music platform Sirnuse. At Sound and Vision Maarten Brinkerink is a project manager for Open Images (an open media platform) and Waisda? (a crowdsourcing game for collecting metadata for audiovisual content). Within COMMUNIA – the European thematic network on the Digital Public Domain – he leads the working group on Memory Institutions.

A short history of recording sound

This year, 2010, it is 150 years ago that the oldest sound we can listen back today, was recorded. This anniversary is a very good opportunity to review the history of the technologies available for the recording of sound.
For as Mark Katz states: "Far from being simply a tool for the preservation of music, the technology is a catalyst."

> **"Far from being simply a tool for the preservation of music, the technology is a catalyst."** *- Mark Katz*

This oldest sound fragment, of Édouard-Léon Scott de Martinville singing 'Au Claire de la Lune', was recorded in 1860 with his own invention, the so-called phonautograph and can be listened at: http://www.firstsounds.org/sounds/scott.php.

The phonautograph could transcribe sound to a visible medium, but had no means to play back the sound after it was recorded. The transcriptions, known as phonautograms, were first successfully played back in 2008 at Lawrence Berkeley National Laboratory.

The device consisted of a horn or barrel that focused sound waves onto a membrane to which a hog's bristle was attached, causing the bristle to move and enabling it to inscribe the sound onto a visual medium. The phonautograph was a laboratory curiosity for the study of acoustics. It was used to determine the frequency of a given musical pitch and to study sound and speech.

Edison
The first practical sound recording and reproduction device was the mechanical phonograph cylinder, invented by Thomas Edison in 1877. The invention soon spread across the globe and over the next two decades the commercial recording, distribution and sale of sound recordings became a growing new international industry, with the most popular titles selling millions of units by the early 1900s.
The development of mass-production techniques enabled cylinder recordings to become a major new consumer item in industrial countries and the cylinder was the main consumer format from the late 1880s until around 1910, when the Gramophone record overtook the cylinder.

Electrical recording
Sound recording began as a mechanical process and remained so until the early 1920s (with the exception of the 1898 Telegraphone) when a string of groundbreaking inventions in the field of electronics revolutionised sound recording and the young recording industry.
The advent of electrical recording in 1925 made it possible to use microphones to capture the sound of the performance, but notably also drastically improved the quality of the recording process of disc records, because before that time cylinders and discs were played on mechanical devices (most commonly hand wound with a clockwork motor).

It was by means of electrical recording that, so-called, overdubbing was made possible and this new technique was first used around 1920.

End of part 1...

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Colophon

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