Audio as medium for content distribution (providing access to knowledge)

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Abstract
Reaching and educating the masses to the benefit of all of mankind is the ultimate goal and through the use of this technology facility/tool many can be reached in their own language, in their own community, in their own time and at their own pace.
Making this content available to those who will benefit from the information, is vital. These people who want to consume the content are not necessarily that interested in the qualification, they need the information. Making the content available in an auditory format may also help those who may not be as literate as others.
The uses of audio/ recorded lessons have a number of uses and should not just be seen as a medium for content distribution to distant communities. Recording lectures makes it possible for a lecturer to present lectures to a vast number of students, while just presenting the lecture once.

Keywords
audio, content distribution, open content, community

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Reaching and educating the masses to the benefit of all of mankind is the ultimate goal and through the use of this technology many can be reached in their own language, in their own community, in their own time and at their own pace.

One of the main problems as I see it in Open Education resources, is the ability to distribute the subject content easily and at a low cost. When we look at the way children are taught from a very young age, you will find that these lessons are usually conveyed in an auditory form in stories being told by their parents.

We are therefore quite used to and susceptible to information being conveyed in auditory form. One of the easiest ways of capturing lectures would be to use a recorder and then making the recorded lecture available in a variety of ways. These may include online distribution as mp3 files, or writing these files to a disc to distribute to areas where no access to the Internet is available. In some remote areas these recorded lectures can be distributed to clinics or libraries where learners can come together and work.

Making this content available to those who will benefit from the information, is vital. Making the content available in an auditory format may also help those who may not be as literate as others. Having the ability to consume content, should not be determined by how well you can use a pen or a computer.

The uses of audio/ recorded lessons have a number of uses and should not just be seen as a medium for content distribution to distant communities. Recording lectures makes it possible for a lecturer to present lectures to a vast number of students while just presenting the lecture once. These lectures are then converted to audio files that can be accessed in various formats and listened to on various devices.

This extension of the lecture can reduce cost and makes these resources more sustainable in the long term.

But let us firstly mention some of the advantages and possibilities of using audio files and why we should make more use of this technology.

The past several years have seen little change in education and the methods used to educate. One of the most natural and acceptable methods of education – audio conveyance – has been with us always, and although we tend to take it for granted and forget about it all too easily, all that is set to change. Throughout history children have been taught by means of stories told by their parents, and for many centuries this was the primary method of transferring knowledge and information. As time progressed, we started spending less and less time listening to these stories, although to this day storytelling is used as an educational tool.

People have always been educated by means of information received in an audio format. It is natural for us to absorb information through an auditory medium, and since such information transfer takes place on a personal level, we often tend to form a personal relationship with radio presenters. They become like family members who visit when one turns on the radio.

The value of audio recordings in education has been known for years, yet for some reason it has not been utilised as we have become more computer literate.

With the expansion of and wider accessibility to the internet, students are exposed to a vast amount of information on a daily basis. This has been the case for a number of years now, and students have adapted to be more computer literate or "tech savvy" than we tend to think. Lecturers are often still trapped in the notion that the classroom is the only place where students gain access to knowledge. The whole "sage on stage" mentality has unfortunately not yet disappeared. Through

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the use of audio recordings, lectures can be made available to students, prior to the classroom phase of the learning experience. The student can listen to the lecture before the class and is therefore prepared for class. The class now transforms into a student-centred discussion session and the lecturer into a guide or facilitator helping the students work through all the knowledge that has been gained and, in some cases, not quite understood as yet. The work is discussed and if at the end of the lecture the student has not yet made the new knowledge his/her own, the lecture can always be re-listened or reviewed again after class. In other words, the "sage on stage" becomes a "guide on the side".

Because audio devices or audio players have become part of our daily lives, whether in the form of mp3 players, iPods, or in many cases cellphones with these features built in, we are moving towards a mobile learning (m-learning) setup. In the m-learning world students can access education anywhere. It is pure learning on the go or learning on demand. Whenever a student has time to gain knowledge, the source is always at hand – be it at the gym while busy with a workout, or while lounging by the pool. Students can now study and acquire knowledge on their terms and may therefore tend to devote more time to their studies.

In the period leading up to tests and examinations, lecturers are often overwhelmed by students who, for one reason or another, are still experiencing problems with certain parts of their courses. This is extremely time-consuming and often the result is that the lecturer has to explain the same work to several students, one student at a time. One solution is to divide the class into groups of about eight or ten students and to ask each of these groups to compile a list of questions they would like the lecturer to answer or explain. One person from each group then presents these questions to the lecturer and, through a process of elimination; students can start answering one another's questions, thereby stimulating truly effective group discussion. The students will probably discuss most of the problems and solve them in the group. After this discussion the nominated student makes an appointment with the lecturer and asks all the questions as formulated by the group. This conversation is recorded and at the end of the session placed online for all members of the class to listen to. As with all other recorded lectures, this file would also be downloaded to the students' computers automatically. Each student would receive all the sessions from all the participating groups, and it is quite possible that problems not discussed in group context, would also be effectively addressed.

After a year or two of preparing a audio-enhanced education model, all lectures could be provided to the students at the beginning of the year. As it is such a convenient medium and students enjoy the empowerment they gain by taking control of their studies, it is quite possible that students will be motivated to prepare for lectures weeks before the scheduled class session. Students will therefore have more time to think about the work and also to make the new knowledge that was gained, their own.

In almost all study fields, one will find that every year there are quite a number of conferences taking place around the world. Conferences are valuable resources, as papers relevant to the study field are presented, and usually there are many new resources and information to be gained by attending such events. Unfortunately students and lecturers do not have enough time – and definitely not enough money – to attend all these conferences. Again this problem is solved by audio. Many conferences have already begun recording the papers presented there, thus giving listeners and exposure to all the knowledge and experience conveyed by the presenters. Some

conferences make these resources available within a week of the conference, but quite often the presentation is available within hours of the time the paper was delivered.

Inviting guest speakers to institutions has become a very costly exercise. It cannot be denied that the advantages of having such a speaker or subject specialist visit the institution and share his/her knowledge, far outweighs the cost, but what if such a subject specialist could be interviewed telephonically and the discussion distributed to everybody automatically? Not only that, but any conference attendee could use an mp3 recorder to record a conversation with the subject specialist on any relevant topic and subsequently distribute it to students or any other interested parties. It may not be easy to gain access to such subject specialists, but anybody who manages to do so, will now have the ability to share the knowledge effectively with everybody in the field. Imagine a class where the students decide on questions that should be asked of the subject specialist, and the lecturer then has an interview with this individual telephonically, or maybe even over a cup of coffee! This discussion / interview can then be distributed to all the students, and valuable knowledge can be shared. Again, this has the purpose of stimulating group discussion in that the group has to work together to decide on the questions to be asked.

One can only imagine the value of such technology, if it had been available in years past when Einstein was still alive, for instance. The value of recordings of his responses to students' questions would be immense.

Often students are so busy taking notes of what the lecturer is saying in class, that they may as well read through the work and make notes from the book. However, if the lecture is available before class, the students can make notes at their own pace and in their own time and then concentrate on the content and the information shared by the lecturer in class, rather than trying to keep up with note-taking. The same is true if the lecture is made available after class, when note-taking can serve as a form of revision.

As the end of the year approaches, it is time for students to start reviewing their work and begin studying for examinations. Going through notes written in haste, is not always the most effective way of reviewing course content, but if all the lectures from the whole year is accessible, the student actually has the option of "attending" each and every class again. This not only renews the knowledge gained in class, but if there are still areas that the student finds unclear, he/she now has the option of reviewing the lecture a number of times, or even discussing the problem with the lecturer.

These are just a few applications and advantages of using audio as a delivery and support mechanism for educators and students.

Because the recording of lectures can be done once and distributed internationally to thousands of students, the possibility of changing the lives of millions are easy to see.
The advantages are clear, but giving communities access to current information is still seen as a challenge.

Audio has huge advantages due to its incredible flexibility and portability. Most of the developed world, and also the developing world, is connected through the Internet, but some of the communities who need these educational resources can either not afford to get connected, or live in areas where they are not yet able to gain access to the Internet.

Even though it is easy and quite affordable to distribute audio online, the benefit lies in the large number of other formats in which audio can be distributed. The use of CD's, DVD's, Memory

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Cards, MP3 Players are also widely used for the distribution of audio content. It should there for not be thought that audio content can only be distributed through the Internet.

A large number of files can be distributed by various means to community centres, libraries or clinics where these files can be copied and distributed. If the members of the community do not have access to the necessary technology to listen to these recordings, these centres could be equipped with a single player which can be used by members of the community to gain access to this knowledge. These recorded lectures can be played over and over until the necessary skills and information has been transferred.

The whole group dynamics of a group at a community centre or any other gathering place, could also help in the learning experience. We should realize that in these communities it is not only about the gaining of a qualification but it is all about the gaining of the information and a new skill. The new knowledge which is brought into these communities, quickly impacts on the way these communities function and in the long term may cause a vast upliftment of the members of such a community.

Communities that are spread over vast distances could also make use of radio services to convey knowledge. Specific life skills can be taught through the use of timeslots on radio stations. The whole concept of a "Learning Hour" could be used to give members of a community access to specific skills and knowledge.

Audio is a personal medium, we consume it easily and we express ourselves in auditory form. It is natural for us to explain a concept to someone using our voices to convey our thoughts. You do not even need to be able to read, to gain new knowledge and you do not need to write, to be able to share knowledge.

The applications of audio to uplift communities and to share knowledge is only limited by our imagination and creativity.

Reaching and educating the masses to the benefit of all of mankind is the ultimate goal and through the use of this technological facility/tool many can be reached in their own language, in their own community, in their own time and at their own pace.

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