

Investigating health information needs of community radio stations and applying the World Wide Web to disseminate audio products

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Abstract

The Web and Media Technologies Platform (WMTP) of the South African Medical Research Council (MRC) conducted a pilot project amongst community radio stations in South Africa. Based on previous research done in Africa WMTP investigated the following research question: How reliable is the content of health information broadcast by community radio stations? The main objectives of the project were to determine the 1) intervals of health slots on community radio stations, 2) sources used by community radio stations for health slots, 3) type of audio products needed for health slots, and 4) to develop a user friendly Web site in response to the stations' needs for easy access to audio material on health information.

Keywords:

Radio, Education, Internet, Consumer health informatics, Needs analysis, Health information, World Wide Web.

Introduction

The South African Medical Research Council's (MRC) vision is "Building a healthy nation through research". One of the nine strategic objectives implemented by the MRC to address this is research translation. As defined by the MRC "Research makes no difference to health and quality of life unless it is translated into interventions such as policy, practice and products, which can have an impact on the health and quality of life of the nation" [1]. The Web & Media Technologies Platform (WMTP) which forms part of the eHealth Research and Innovation Platform (eHRIP) of the MRC focuses on the implementation of eHealth¹ solutions for knowledge transfer to specific target audiences within the framework of the strategic health objectives of the MRC.

¹ eHealth

According to the World Health Organisation (2005), eHealth refers to the use of information and communication technologies locally and at a distance – presenting a unique opportunity for the development of public health. The strengthening of health systems through eHealth may contribute to the enjoyment of fundamental human rights by improving equity, solidarity, quality of life and quality of care.

Research studies in today's technological age have shown that when looking for health and medical information, frequently, before visiting their physician, the health consumer's first point of call is the Web [2]. In the case of rural communities where the Web is not easily accessible, more traditional eHealth solutions are sought, such as listening to health information broadcast by community radio stations [3].

In 2006, an analysis by the United Methodist Communication Foundation [4] found that the only effective form of communication, e.g. to deliver messages or communicate health information to the poorest people living in shantytowns and rural areas throughout Africa, was through community radio stations. The research question of this study is: "How reliable is the content of health information broadcast by community radio stations?"

Community radio is defined as a service that caters to the interests of a certain area, broadcasting content that is popular to a local audience, but which may often be overlooked by commercial or mass-media broadcasters [5]. Radio has long been the most accessed form of media in South Africa, reaching beyond urban centres deep into the poorest and most remote rural areas. South Africa has more than 200 community radio stations that broadcast in many different languages [6].

A case study, conducted in 2005 by Lloyd and Fordred on Radio Zibonele, a community radio station in Khayelitsha, Western Cape [7], brought forward the importance of transferring health information and health education to their listeners.

Radio Zibonele has a daily audience of 200 000 and states that their mission is to enhance the quality of life of their listeners by improving their health standards. This is done through regular broadcasts of health care information and health education in order for individuals to take better care of themselves and their families. Self-help is the underlying theme of the station with many programmes that deal with practical issues. An example is a programme on how to take care of a sick child and health information for children on how to take care of their sick mother. Radio Zibonele's success could also be attributed to the station's endeavours to broadcast health information where possible in isiXhosa, the mother tongue of the majority of the listeners.

WMTP's pilot study utilizes the combined approach of a Radio to Public Transfer Model (RPKTM) and a Web to Public Knowledge Transfer Model (WPKTM), based on the theories of informatics and knowledge management.

The RPKTM aims to develop audio products to inform, educate and communicate health related information to the South African population. A secondary aim of the model is to guide community radio stations to source health related information that is 1) accurate, 2) appropriate, and 3) relevant.

The WMTP of the MRC has access to reputable scientists when audio products are developed. These audio products such as audio documentaries, key messages and panel discussions also undergo a rigorous editorial process to ensure that a high quality is maintained. Audio documentaries are accompanied by articles that are placed on a Web site. The articles serve as aid for the person compiling the health slots and supply background information on aspects that are discussed in the audio documentaries.

The Web to Public Knowledge Transfer Model is an eHealth approach used to transfer scientific information to audiences via the World Wide Web. The WMTP has gained experience over many years on structuring health and medical information on the World Wide Web; guiding health consumers to recognize trustworthy health information, or learn how the MRC structures such content for its consumption on the Web. The process is based on a knowledge transfer (KT) model to simplify knowledge uptake by health consumers, while linking content to generic principles and a recognised code of conduct based on ethical standards.

According to Drucker (2001), "Knowledge is information that changes something or somebody, either by becoming grounds for actions or by making an individual (or an institution) capable of different or more effective action," [8]. Thus, the knowledge transfer model can be used to influence the health decisions people make.

Research question

Community radio stations serve an important role in communicating health information to rural communities. The research project aims to answer the following question:

How reliable is the content of health information broadcast by community radio stations?

Goals

The pilot project attempts to answer four research questions. The questions are:

1. How often do community radio station broadcast health slots;
2. What are the sources of information used for health slots;
3. When obtaining health information from a Web site, do they make sure the information is accurate; and
4. What are the preferred formats and methods to receive audio documentaries?

Method

This research project focused only on community radio stations in South Africa. Commercial and campus radio stations will be considered in follow-up studies.

A list of all the South African community radio stations was obtained from The Media Connection [9]. Contact via telephone was established with 60 community radio stations representing all nine provinces. The questionnaire was then administered to 60 community radio stations of which 12 responses were received back.

A questionnaire consisting of 13 questions was developed and sent via email or fax to the participating radio stations. The questionnaire consisted of four parts. The first part dealt with general information about the community radio station. These questions related to where the participating radio station is situated and the languages used by the station. The second part of the questionnaire aimed to answer questions with regards to the frequency of health slots and the sources consulted for health slot content. The third part of the questionnaire focused on the type and format of audio products needed by community radio stations. The last part of the questionnaire focused on preferred methods of communication between WMTP and the participating community radio station.

The pilot study results are based on the feedback of the community radio stations that was received.

Results

All the responding community radio stations indicated that they have regular health slots ranging from once a week to five times a week. One radio station broadcast health information "...when the hospital or clinic needs to bring something to the communities' attention".

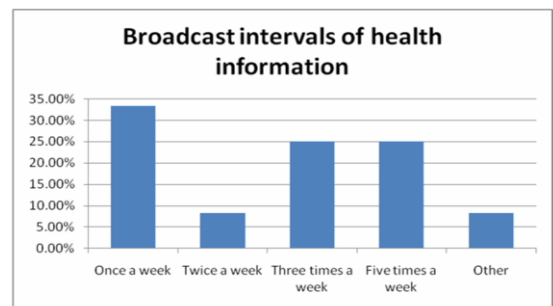


Figure 1 – Broadcast intervals of health information

Results indicated that 33.3% of the community radio stations who participated have a health slot once a week. Results have also shown that 25% of the stations have health slots three times a week and another 25% indicated that they have health slots five days a week. (Figure 1)

The respondents were asked to indicate the sources from which they obtain health information for their health bulletins. All the community radio stations indicated that they make use of multiple sources. The two most popular sources were Clinic Nurses and Community Health Workers with 75% each. (Figure 2)

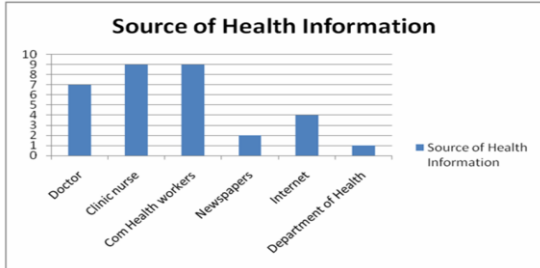


Figure 2 – Source of Health Information

Results from the questionnaire revealed that 100% of the respondents preferred audio documentaries and live interviews followed by panel discussions with 66%, and newsflashes with 58%. The radio stations were also allowed to choose more than one option.

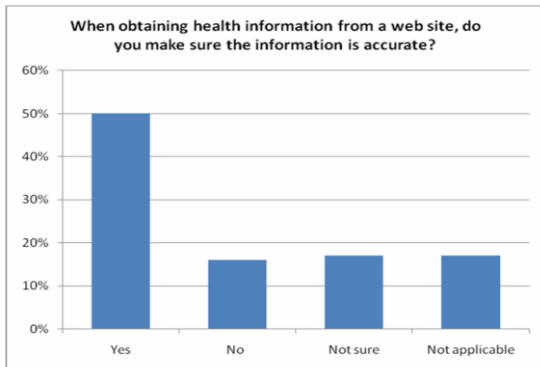


Figure 3 – Quality assurance in seeking health information?

In order to establish whether community radio stations could verify the accuracy of health information that they obtain the following question was asked; “when obtaining health information from a Web site, do you make sure the information is accurate”. As shown in Figure 3, 50% of the respondents answered “yes”, 16% answered “no”, 17% were not sure and 17% said it was not applicable to them. This question was further expanded. If they answered “yes”, by asking them how they verified the accuracy of the health information. The answers varied from; “they contact a specialist to verify the health information”; they “contact Department of Health and verify the health information with the relevant department”; and they “only use trustworthy sources”. This is a clear indication that 50% of community radio stations in this study were not aware of the fact that not all health information on the Internet is accurate or reliable.

Table 1 – Audio documentary format and method of downloading

Indicate your preferred format for audio documentaries	
mp3	91.67%
other format (unspecified)	8.33%
Indicate the preferred method to obtain audio documentaries	
Download from Web site	58.34%
File Transfer Protocol	33.33%
Compact Disk	8.33%

As shown in the cross tabulation of two questions of preferred format of audio documentaries and preferred method to obtain these audio documentaries, Table 1 indicates that 91.67% of the respondents prefer the audio documentaries to be in mp3 format, with 8.33% indicating that they prefer the audio documentaries to be in another format. 58.34 % of the respondents would download it from the Web site, with 33.33% accessing the audio documentaries via the File Transfer Protocol (FTP) and only 8.33% would obtain the audio on a Compact Disk.

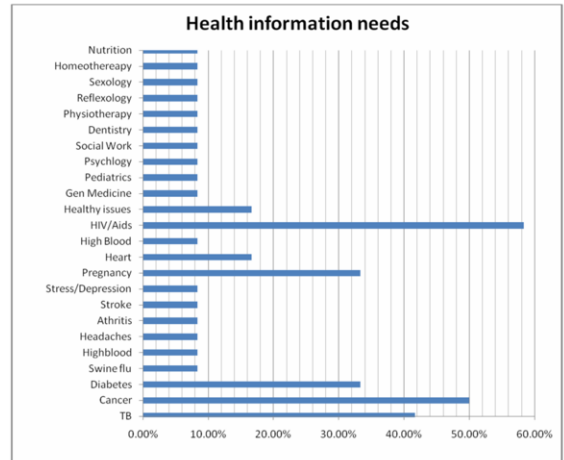


Figure 4 – Health information needs

As the MRC audio production studio develops audio health documentaries according to the health days identified by the Department of Health, which might not be the health information that community radio stations need, a question “Indicate the preferred topics for health information” was included in the questionnaire to establish which health topics the community radio stations were interested in. As shown in Figure 4 the health information needs of the community radio stations were as follows: 58.33% on HIV/AIDS, 50% on Cancer, 41.66% on Tuberculosis followed by 33.33% on Diabetes.

Discussion

As shown in the results of the pilot study, health slots amongst community radio stations are an important part of their broadcasting agenda ranging from once a day to five times a week.

The full study could explore whether there is any relation between the frequency of health slots, e.g. once, twice or five times a day and the amount of sources accessible to find information or audio products to fill these health slots. Thus, will community radio stations include more health slots or programmes dealing with health issues if there were more sources they could consult or audio products they could utilize to fill these programmes?

The majority of sources used by community radio stations for health slots are clinic nurses and community health workers. Although they have knowledge on certain health topics, such as diabetes and HIV/AIDS, they may not have the facts readily available to give advice on epidemic outbreaks such as H1N1 (swine flu). Therefore it is important to inform the community radio stations of the radio Web site that is available for them to expand their source of up to date, reliable and accurate health information.

As the results indicate, community radio stations prefer to receive audio documentaries of health information in mp3 format. The majority of respondents preferred to download these audio products from the Web site. These audio documentaries are already available on the radio Web site for radio stations to download as they have been developed on health topics, specified in the health calendar of the Department of Health. Based on the results of the health topics as specified by the radio stations, WMTP could further expand on the development of audio documentaries and play a role in supplying material for the health bulletins.

Results from the pilot study show that there is a definite need for accurate and reliable health information in audio format for community radio stations. In an era of increased Internet access and connectivity where more and more health consumers turn to the World Wide Web for guidance on health issues, the compliance to standards has become essential.

A full study could also determine if community radio stations would increase their health slots based on an increased amount of 'healthy' audio material.

Conclusion

The results also show that a Web site developed according to the WPKTM, incorporating the generic principles and a recognised code of conduct based on ethical standards and good practice guidelines, with the option to download audio in mp3 format, would be an effective tool for community radio stations that have access to the Internet.

The way forward would be to engage more community radio stations and to include campus radio stations and commercial radio stations in a full study.

WMTP aims to introduce the radio Web site as the preferred source of health information and a "one stop shop" for community and campus radio stations.

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