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Communicating the HIV/AIDS message: a rural perspective

Abstract

South Africa has one of the highest HIV/AIDS infection rates in the world with the majority of infections occurring in the age category of 15 to 24. This trend can be reversed if young people are informed and empowered to change their sexual behavior. Furthermore, clear and ongoing communication is an essential tool in addressing this pandemic. This paper aims to assess communication tools used to educate high school learners about HIV/AIDS. The context of the study is the Mthatha district, situated in rural South Africa. The research constituted a quantitative, cross-sectional and descriptive study. The key variables were demographics (gender, age, grade and residence) and perceptions regarding HIV/AIDS communication tools. The research used judgemental sampling to select the high schools and convenience sampling to select individual respondents. The vast majority of learners are aware of HIV/AIDS education. It was found that entertainment-education plays a vital role in creating awareness about HIV/AIDS. The study also found peer education to be an effective communications tool with a view to combating the pandemic. It emerged that the school curriculum was an effective medium in communicating the HIV/AIDS message as the vast majority of learners were knowledgeable about how HIV/AIDS was transmitted. However, in addition to information about HIV/AIDS learners are requesting additional information relating to the developmental challenge of HIV/AIDS on the economy and to unemployment. It is therefore suggested that developmental challenges associated with HIV/AIDS is integrated into the school curriculum. Some policy recommendations are made.

Introduction

One in every ten South Africans is infected with HIV (Eye Witness News, 2013). The number of people living with the virus increased from four million in 2002 to more than five million in 2013. Furthermore, around 17% of those infected with the virus are women and around 80% are between the ages of 15 and 24. The South African Institute of Race Relations (2012) estimates that there were 5.58 million people living with HIV in South Africa in 2012 of which the age group of 15 to 24 years accounted for 13% of those living with HIV. With the rising number of HIV infected people, particularly young people, the question arises as to whether this sector of the community is being engaged in helping to curb the spread of the disease.

The high HIV/AIDS infection rate calls for interventions to help curb the spread of the HIV/AIDS pandemic in South Africa. South Africa's national response to HIV is located within the National Strategic Plan (NSP) on HIV, Sexually Transmitted Infections (STIs) and Tuberculosis (TB) (2012-2016). According to the National Department of Health (2011) the NSP has four strategic objectives:

♦ Strategic Objective 1: Address social and structural barriers to HIV, STI and TB prevention, care and impact. This objective is focused specifically on addressing the structural, social, economic and behavioral factors that drive the HIV and TB epidemics.

♦ Strategic Objective 2: Prevent new HIV, STI and TB infections. This objective is focused on primary strategies to prevent sexual and vertical transmission of HIV and STIs, and to prevent TB infection and disease, using a combination of prevention approaches.

♦ Strategic Objective 3: Sustain health and wellness. The primary focus of this objective to achieve significant reduction in deaths and disability as a result of HIV and TB.

♦ Strategic Objective 4: Increase the protection of human rights and improving access to justice. This objective aims to ensure that rights are not violated when interventions are implemented, and that discrimination on the basis of HIV and TB is not only reduced, but ultimately eliminated.

In addition, the National Department of Health (2011) identifies communication as a strategic enabler driver of the NSP and maintains that effective communication is critical to the successful implementation of the NSP. Social and behavioral change communication is also critical to changing risk behavior and the social conditions that drive the HIV and TB epidemics, while at the same time supporting a demand for prevention, care and support, and treatment services.

The importance of communication clearly suggests that the trend of the HIV epidemic can be reversed if young people are informed and empowered to change their behavior and reduce their risk. Furthermore, clear and ongoing communication is an essential tool. With there being no cure for this disease, communication has been identified as a method of

helping to curb the spread of this disease. Baldwin, Perry and Moffit (2004) believe that communication is the mechanism by which culture is constructed, shaped, and sustained over time and across generations. This means that a culture of responsibility on sexual activities can be formed and sustained through proper communication. According to the World Press (2006), communication is, by definition, participatory. It is a two-way process. Furthermore, it refers to the full involvement of participants in communication processes and includes giving those individuals access to communication channels, thus enabling them to participate freely and equally in dialogue and debate as a way to impact on their behavior. Their involvement will, therefore, ensure that the appropriate messages and channels are identified.

According to Hartell (2005), the scale of the AIDS epidemic among youth in South Africa is enormous and HIV/AIDS continues its deadly course. When one considers that 40% of the South African population is less than 15 years of age and that 15.64% of the South African youth between the ages of 15 and 24 are infected with HIV, one recognizes that HIV/AIDS represents a devastating pandemic among the youth of South Africa. Each year, there are more and more new HIV infections, which show that people are either not learning the message about the dangers of HIV, or are unable or unwilling to act on it. Many people are ignorant about the virus, with surveys around the world showing alarmingly low levels of awareness and understanding about HIV amongst many groups (Averting HIV/AIDS, 2009). Educating young people about the HIV/AIDS pandemic through schools' curricula forms part of efforts to combat the pandemic. This idea is further emphasized by the National Department of Health (2011) that maintains that comprehensive education on sexuality, reproductive health and reproductive rights, inclusive of life skills education, should be provided in all schools through the curriculum and co-curricular activities, to build skills, increase knowledge and shift attitudes, change harmful social norms and risky behavior, and promote human rights values.

The Mthatha district, situated in the centre of the old Transkei region of the Eastern Cape, forms the context of this study. Teenage pregnancy is a major challenge in this area, which indicates that most teenagers do not choose to use protection during sexual intercourse. The Daily Dispatch (2011) indicates that the Eastern Cape has the highest rate of teenage pregnancy in the country. In 2010, 8427 school girls fell pregnant in the Eastern Cape, with 728 pregnancies recorded in the Mthatha District with a high rate of HIV infection. Therefore, interventions, one of which is communication, to help

curb the spread of HIV are essential. This paper, therefore, aims to assess communication tools used to educate high school learners about HIV/AIDS. The objectives are to identify communication tools used to educate high school learners about HIV/AIDS, to assess school learners' perceptions on the effectiveness of the communication tools and to assess the relevance of the information being sent through these communication tools.

In some cultural groups in South Africa, it is morally correct for a man to have more than one partner. Based on this custom, it can be rather challenging, if not confusing, to communicate the "Abstain, be faithful to one partner, Condomise (ABC)" message to learners who are from this culture. Therefore, the question arises: does HIV/AIDS education have the intended impact on learners? According to Card, Amarillas, Conner, Akers, Solomon and DiClemente (2007), the ABC message is sometimes difficult to implement. Communication about sex is needed for people to judge their own risks of getting and giving HIV, and to make responsible decisions about condom use and other risk-reduction strategies.

Singhal and Rogers (2003) argue that, in the absence of a vaccine for therapeutic cure, communication strategies represent a key "social vaccine" against HIV/AIDS. For the communication professional, combating HIV/AIDS presents challenges on four fronts, viz.: transmission challenges, behavioral challenges, response challenges and targeting challenges. Health communication encompasses the study and use of communication strategies to inform and influence individual and community decisions that enhance health. Furthermore, health communication can help raise awareness of health risks and solutions (Healthy People, 2010; Information Access Project, 2009). According to the International Conference on AIDS (2004), HIV/AIDS communication needs to evolve as the HIV and AIDS epidemic evolve.

The National Cancer Institute (2002) argues that, for a communication program to be successful, it must be based on an understanding of the needs and perceptions of the intended audience. It is important to remember that these needs and perceptions may change as the project progresses, so as to be prepared to make changes to the communication program as one proceeds. The Nelson Mandela Foundation (2005) indicates that HIV/AIDS knowledge and awareness is often represented as occurring mainly as a product of HIV/AIDS campaigns. Such campaigns typically focus on key knowledge areas and include informing diverse audiences about behaviors and practices necessary to prevent HIV infection, encouraging the uptake of services and providing information on other aspects of HIV/AIDS.

Mishra (2005) believes that the school is a particularly appropriate site for HIV/AIDS education. Students are a captive audience. Due to the fact that children enroll in school at an early age, the inclusion of HIV/AIDS education in the curriculum would seem to be an efficient and effective use of their time. Ensuring that the necessary knowledge, skills and attitudes are inculcated in a manner that will lead to safe sexual behavior calls for a range of learning objectives and related instructional strategies. Gow and Desmond (2002) argue that HIV/AIDS represents the largest single threat to the education process. One-third of all HIV-infected persons become infected during their school years, while a further third become infected within two years of leaving school. This confirms schools as a high-risk environment and also suggests that it is the key strategic ground on which the battle to mitigate the impact will be won or lost. Young people also need life skills such as decision-making, communication and negotiation skills. They need to understand the concepts of risk behavior, such as unprotected sex and the use of drugs, the possible consequences of such behavior and how to avoid them (The joint United Nations Program against HIV/AIDS, 2008).

Brand South Africa (2010) believes that the many AIDS awareness campaigns run by government and NGO partners through mass media are bearing fruit. There is now a high level of awareness among youth on HIV/AIDS.

1. HIV/AIDS communication tools used to educate high school learners in South Africa

There are various methods used to educate high school learners about HIV/AIDS. The most commonly used are discussed.

1.1. Sex education via the school curriculum. According to a research conducted by Averting HIV/AIDS (2010), sex education helps to prepare the youth for a healthy adult relationship by increasing their knowledge and helping them to explore attitudes, feelings and values about human development, relationships, dating and healthy sexual decision making. The Department of Education has included HIV/AIDS education in the Life Orientation curriculum since 2002. Life Orientation covers social aspects of life such as values, attitudes, abstinence, protection and encourages the youth to take a stand and say "no" to sex. According to a research conducted by Averting HIV/AIDS (2010), many young people lack basic information about HIV and AIDS, and are unaware of the ways in which HIV infection can be prevented. Schools are excellent points of contact

for young people as almost all young people attend school for some part of their childhood, and while they are there, they expect to learn new information, and are more receptive to education than they might be in another environment. The World Health Organization (2008) believes that the purposes of school health education about AIDS/STDs are to prevent and control the spread of HIV/STDs and raise the level of understanding about associated problems. Mishra (2005) is of the opinion that students are a captive audience and therefore the inclusion of HIV/AIDS education in the curriculum would be an effective platform to ensure that the necessary knowledge, skills, and attitudes are inculcated about HIV/AIDS.

Peer Education is a less formal method of educating, which can be more accessible to people who are not used to or dislike a formal classroom environment. At the same time, peer educators are trained on the subject, ensuring that the information they provide is accurate and reliable. This makes peer education a very effective way of reaching marginalized groups. McKee et al. (2004) believe that peer education is an effective approach in disseminating important HIV and AIDS messages because learners of the same age easily communicate with their peers about sensitive issues around the pandemic.

In addition to schools' curricula and peer education other communication tools about HIV/AIDS are available, such as television, radio and entertainment education. Television has a number of programs dedicated to HIV/AIDS education. These are primarily in the form of short stories and comercials. Schools make use of these stories and commercials as examples in putting more emphasis on HIV/AIDS education. Kundra (2005) indicates that television has a profound impact on our society. Furthermore, television has changed the life styles of the people and has become a major influence in our culture.

1.2. Radio. Radio has a number of programs that specifically focus on HIV/AIDS education. According to loveLife (2009), radio is South Africa's most important source of public information, reaching 97% of the country's households. To this end, loveLife produces weekly programs that are presented by young people on national as well as community radio stations. A large variety of interesting topics are discussed during radio programs. These programs are specifically designed to give opportunity to the public to participate in the dialogues or debates. Adam and Harford (1999) indicate that, for radio to work, partnerships need to be created with interested groups that can support the

media campaign with fun events on the ground and mobilize school children.

1.3. The loveLife campaign. The loveLife Campaign is South Africa's national HIV prevention youth program (Kay, 2005). It was launched in late 1999 by a consortium of leading South African public health organizations and is now a key part of South Africa's national response to the HIV/AIDS epidemic. Governed by the independent loveLife Trust, loveLife has established a comprehensive, national-scale program which includes a national youth corps of 1 500 "groundbreakers" (18-25 year old youth peer educators) who provide community-level outreach and support to young people; the participation of 3 500 schools in loveLife programs; sixteen regional youth centres operating in all nine provinces and a sustained high intensity media campaign designed to raise awareness throughout the country about HIV prevention and help drive youth to information and services. The media campaign is constantly being revised and adapted so that it will retain the attention of young people. Large billboards are displayed in rural and urban areas.

1.4. The Khomanani campaign. The Khomanani campaign is a South African government mass media and communication initiative that aims to reduce new HIV infections and increase treatment, care and support for those infected and affected by HIV/AIDS Campaign (Health Insite, 2007). The establishment of the Khomanani (caring together) campaign has resulted in a number of advertisements on television, radio, billboards, leaflets and flyers. HIV/AIDS materials are also available through the Red Ribbon Resource Centre run by Khomanani, which delivers material at no or low cost. The campaign also provides support through a national toll-free helpline. An annual "pledge-day, Khomanani-day" includes live broadcasts and focuses on South Africans making a commitment to the HIV/AIDS response.

1.5. Soul City and Soul Buddyz. Soul City and Soul Buddyz take a multimedia approach anchored by a television and radio series (Parker et al., 2007, p. 53). Programs cover a range of themes including a regular focus on HIV/AIDS, and the series have been broadcast for a number of years (Soul City since the mid-1990s, and Soul Buddyz over the past six years). The series is backed by booklets and posters with various themes; these include HIV-related topics. According to Soul City (2005), Soul Buddyz is a 26-minute, 26-episode drama series set in any urban centre in South Africa. It closely reflects the lives, struggles and joys of 8-12 year

olds in our changing society. Interwoven into the drama are serious issues which children deal with on a daily basis, including HIV/AIDS, relationships, and sexuality.

2. Research methodology

The research design was quantitative, cross-sectional and descriptive. Sekaran (2003) defines research design as a blueprint for conducting a study that maximizes control over factors that could interfere with the study's desired outcome. Quantitative research was selected due to the fact that it is used when large quantities of data need to be collected. It is more objective due to the fact that results are considered quantifiable and can usually be generalized to a larger population (Sekaran and Bougie, 2010). The study was conducted at a point in time, hence being cross-sectional, as opposed to a longitudinal study. The study attempted to sketch the current state of a phenomenon (Blumberg, Cooper and Schindler, 2008), hence being descriptive.

The key variables were demographics (gender, age, grade and residence) and perceptions regarding HIV communication tools. The target population was high school learners in the Mthatha district, a rural area in the Eastern Cape province of South Africa. The three largest schools out of eight were chosen as the sample. Respondents comprised learners from grade 8 to grade 12. The learner population at the three schools was 3000. Quota sampling was used to select the number of respondents per school. A sample size of 341 was chosen based on the guideline of Sekaran (2003) for this population size. Convenience sampling was used to select individual learners at each school. The questionnaire was developed based on the literature review. Face validity was addressed by having the questionnaire critiqued by an academic in the field, a health educator and a statistician. A pilot test was conducted prior to the administration of the final questionnaire. Necessary alterations were done to the questionnaires before conducting the research. The reliability of the measuring instrument was assessed using Cronbach Alpha.

3. Results and discussion

In total, 341 questionnaires were dispatched and 243 were returned which gave a 70% response rate. The response was considered sufficient in order to proceed with the analysis.

3.1. Reliability. The Cronbach coefficient alpha in respect of the items was computed at 0.701. This suggests a high degree of internal consistency.

3.2. Biographical details

Table 1. The biographical variables

		N	%
Gender	Male	98	40.3
	Female	140	57.6
	Did not respond	5	2.1
	Total	243	100.0
Age	14	6	2.5
	15	17	7.0
	16	34	14.0
	17	61	25.1
	18	62	25.5
	19	37	15.2
	Over 19	26	10.7
	Total	243	100.0
Grade	8	2	0.8
	9	36	15.0
	10	35	14.3
	11	82	33.7
	12	88	36.2
	Total	243	100.0
Residence	In the area	223	91.8
	Outside the area	20	8.2
	Total	243	100.0

Table 1 reflects the biographical details of respondents. The proportion of female respondents was larger than male respondents (57.6% compared to 40.3%). A negligible number of respondents chose not to indicate their gender classification. The 17 and 18 year age category was the most dominant, followed by the 19 year age group. The identified group for this study is within the targeted group for HIV infections. Tshabala-Msimang (2000) indicates that young people aged 15-24 are a priority group for HIV prevention.

The largest proportion of respondents was in grades 11 and 12, being the penultimate and final year learners. The majority of learners reside in the Mthatha area, with only 8.2% residing outside Mthatha. NewsRx (2004) reports of a study conducted in China that found that knowledge on AIDS was the lowest among people who resided in the rural areas.
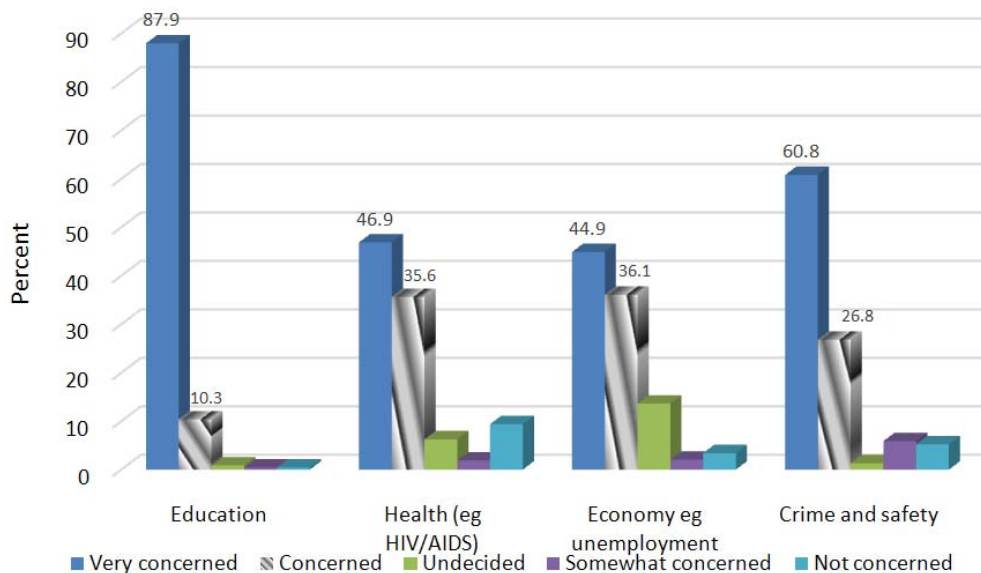
3.3. Issues of concern among learners

Fig. 1. Issues of concern among learners

As indicated in Figure 1, it emerged that the majority of learners (98%) are concerned about education. This fault suggests that learners are likely to take the issue of sex education seriously, which augurs well, as this is in line with the view of Gow and Desmond (2002) that schools are a key strategic ground on which the battle to mitigate HIV/AIDS will be won or lost.

The results also indicate that 81% of respondents are concerned about health-related issues, particularly HIV/AIDS. This suggests that learners are the willing and relevant recipients of health communication. The National Cancer Institute (2002) indicates that for a health communication program to be successful, it must be based on an understanding of the needs and perceptions of the intended audience.

Furthermore, 80% of the respondents are concerned about the economy such as the unemployment rate. Lack of skills contributes to unemployment, meaning that when learners drop out of school, there is an increase in number of the unskilled population. The Daily Dispatch (2011) recorded Eastern Cape (the province within which the study population is located) as the highest province for school girl pregnancies. This is related to HIV/AIDS infection as pregnancy is indicative of unprotected sex. 87% of learners are concerned about crime and safety.

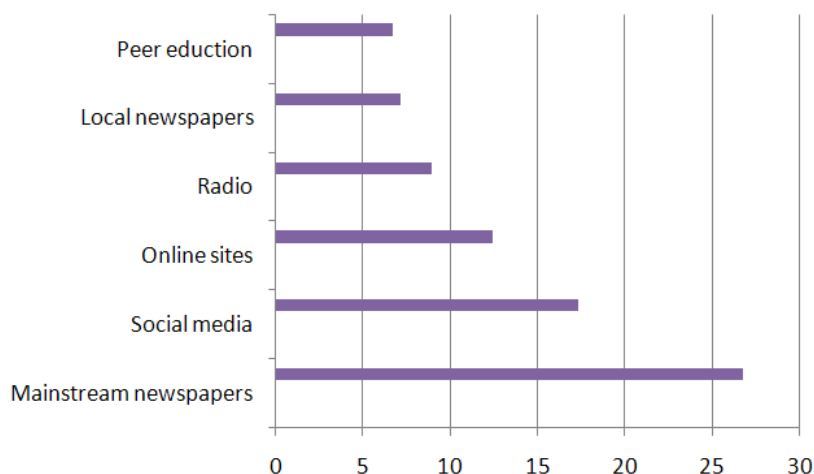### 3.4. Sources of information relevant to the youth

Fig. 2. Sources of information in ranking order

The results, as depicted in Figure 2, indicate that respondents ranked mainstream newspapers as the most popular medium in reaching the youth (26.2%), followed by social media (16.9%), online sites (12.1%) and radio (8.2%). This suggests that mass communication is a relevant source through which relevant information can be conveyed to the youth. These findings can be attributed to the literacy levels of the learners as well as their active participation in social networks.

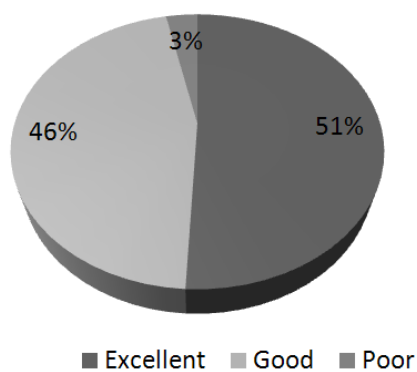### 3.5. Respondents' knowledge of HIV/AIDS

Fig. 3. Respondents' knowledge of HIV/AIDS

As reflected in Figure 3, a very small proportion (3%) of the respondents indicated that their HIV/AIDS knowledge was poor. The remainder of respondents believed that they were knowledgeable about HIV/AIDS. This means that HIV/AIDS education appears to be well communicated to, and received by learners. This finding is contrary to the American experience, where HIV education initiatives in Black communities have been greeted with suspicion and distrust (Thomas and Quinn, 1991).

3.6. Sources of HIV/AIDS information. The results, as indicated in Table 2, indicate that respondents rely on a number of sources to get information related to HIV/AIDS. However, only 2.1% of the learners agree to receiving this information through school curriculum and 7.04% get their information through peer education. This signals the fact that over 90% of the learners rely on sources that are not within the school curriculum. Karl and Promtussananon (2003), in their study, found that while most secondary school teachers were knowledgeable about AIDS and felt moderately comfortable about teaching AIDS-related topics, they lacked material and community support.

These sources play a crucial role in creating awareness of the pandemic amongst the youth. Gamble and Gamble (2005) believe that the media affects one's awareness, knowledge, attitudes and behavior. Mass media (particularly online sites) appear to be more popular than the curriculum. This could be based on the informal manner in which online sites are structured. Online sites are, therefore, one of the key elements that drive HIV/AIDS education. In this regard, Singh (2000) found that HIV/AIDS-related health communication materials were written in such a manner that they were not fully understood by the target audience.

Table 2. Sources of HIV/AIDS information

	Frequency	Percent
Online sites	45	18.5
Newspapers	44	18.1
Radio	29	11.9
TV News	24	9.9
TV entertainment	22	9.1
Peer education	17	7.0
Local community newspapers	16	6.6
Social media	16	6.6
Magazines	10	4.1
Tabloid newspapers	7	2.9

Table 2 (cont.). Sources of HIV/AIDS information

	Frequency	Percent
School curriculum	5	2.1
AIDS Day	4	1.6
Missing responses	4	1.6
Total	243	100.0

3.7. Media learners enjoy the most. The findings, as depicted in Figure 4, indicate that the majority (22.7%) of the learners prefer obtaining information on HIV/AIDS through mainstream newspapers, 19% through social media and 15.3% through websites. This indicates that learners enjoy mass media the most. This could be based on its informal and entertainment nature that consists of simplified themes. Parker, Row and Peppa (2007) believe that the mass media is best suited to simplified and discrete messages or themes, which would be appropriate in conveying information on HIV/AIDS.
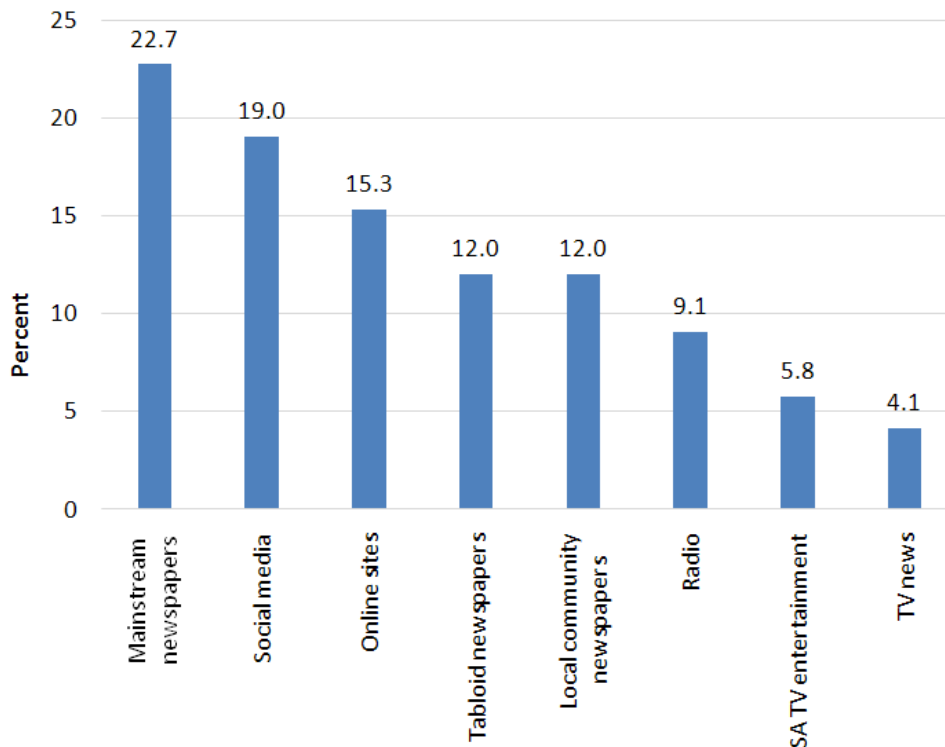

Fig. 4. Media learners enjoy the most

3.8. Views about HIV/AIDS information being communicated effectively

Table 3. The effectiveness of HIV/AIDS communication

	S Agree	Agree	Neutral	Disagree	S Disagree
Community media	35.0	35.0	19.8	7.2	3.0
School curriculum	54.8	30.3	8.7	4.3	1.9
Billboards	38.9	32.4	22.2	2.7	3.8
Peer education	58.3	21.8	12.0	2.3	5.6
Radio	52.3	28.0	14.0	2.6	3.1
Soul City	64.2	23.8	7.5	3.5	1.0

As illustrated in Table 3, the majority of the respondents (64.2%) considered Soul City to be effective in sending out HIV/AIDS information to learners. This could be based on the fact that Soul City, an educational entertainment series in South Africa, focuses on a number of challenges that young people encounter, including HIV/AIDS. Entertainment, therefore, becomes a selling point in educating the learners about the pandemic. Singhal and Rogers (2003) believe that entertainment education is an effective means of communication.

It also emerged that information received through peer education is considered to be effective, with 58.3% strongly agreeing and 21.8% agreeing that peer education is an effective medium in HIV/AIDS communication. This concurs with the findings of McKee, Betrand and Berker-Benton (2004) that peer education is an effective approach in disseminating important HIV and AIDS messages.

85.1% of the respondents (54.8% strongly agreeing and 30.3% agreeing) view the school curriculum as an effective source for reporting of HIV/AIDS

information. This is consistent with the findings of Mahat and Scoloveno (2010) which demonstrated that HIV knowledge and self-efficacy improved significantly through peer education. This places schools as one of the key sources of HIV/AIDS communication for learners. Averting HIV/AIDS (2009) attest to this, considering that almost all young people attend school for some part of their childhood.

3.9. The understandability of the various media. The results, as presented in Table 4, indicate that messages conveyed via peer education, as a medium, was considered to be most easily understood (65.2%). This suggests that peer education is a preferred method of communication due to the nature of the campaign, i.e., being an informal method of education. Averting HIV/AIDS (2010) concurs, and states further that learners are most likely to trust what their peers say and feel

more comfortable to discuss matters related to sexual activities than they would with adults.

This was followed by 62% of respondents who considered television entertainment-education as being easily understood. To this end, Singhal and Rogers (2003) state that entertainment-education programs constitute a strategic tool in the world-wide war against HIV/AIDS. 60.9% of respondents were of the opinion that Soul City (a South African-based HIV/AIDS communication campaign) conveyed a message that was easily understood. This means that entertainment-education is considered to be effective in communicating HIV/AIDS messages. This concurs with Baden (2005), that Soul City is one of the most effective communication campaigns through which HIV/AIDS messages are sent. The three most highly ranked media that were considered to be too complex to understand were billboards (17.8%), tabloid newspapers (17.9%) and local community newspapers (24.1%).

Table 4. The understandability of the various media

	Messages are easily understood	Messages are understandable to an extent	Difficult to understand message	Messages are too complex
Billboards	46.0	34.4	1.8	17.8
Community media	46.3	34.1	3.9	14.7
Local community newspapers	23.2	37.4	15.3	24.1
Magazines	50.7	31.9	6.4	11.0
Mainstream newspapers	37.5	26.0	4.0	16.5
Online sites	44.3	33.0	6.5	16.2
Peer education	65.2	21.4	4.3	9.1
Radio	46.7	35.3	5.3	12.7
School curriculum	59.6	29.1	3.5	7.9
Television entertainment	62.0	25.4	2.8	9.8
Social media (Facebook/twitter)	39.1	32.7	11.4	11.8
Soul city	60.9	24.3	3.1	11.7
Tabloid newspapers	28.6	35.9	17.6	17.9
TV news	49.0	36.2	1.9	12.9

3.10. The influence of media on sexual behavior. As depicted in Table 5, respondents believed that peer education (62.5%) was the

greatest influence in responsible sexual behavior followed by Soul City (60.5%) and the school curriculum (55.7%).

Table 5. The influence of media on sexual behavior

	Being more responsible when engaging in sexual activities	Being responsible to an extent	Being responsible temporarily	Having no effect	Being more reckless when it comes to sexual behavior
Billboards	41.5	29.8	15.8	8.8	4.1
Local community newspapers	23.5	34.6	19.6	15.1	7.3
Magazines	43.9	28.9	13.4	10.2	3.7
Mainstream newspapers	35.2	21.9	18.4	15.8	8.7
Online sites	40.6	28.9	18.7	9.1	2.7
Peer education	62.5	14.1	10.3	7.1	6.0
Radio	48.4	30.1	10.2	7.0	4.3
SA TV entertainment	53.5	25.9	11.4	7.0	2.2
School curriculum	55.7	25.6	8.5	5.1	5.1

Table 5 (cont.). The influence of media on sexual behavior

	Being more responsible when engaging in sexual activities	Being responsible to an extent	Being responsible temporarily	Having no effect	Being more reckless when it comes to sexual behavior
Social media	39.3	32.8	11.5	9.3	7.1
Soul city	60.5	26.0	6.2	4.0	3.4
Tabloid newspapers	25.8	32.4	19.8	16.5	5.5
TV news	50.0	26.9	10.8	7.0	5.4

Interestingly, this is somewhat consistent with the previous finding, that the messages from peer education and Soul City were considered to be most easily understood. Peer education is one of the most effective sources that reach out to a number of learners and has the ability to influence behavior change amongst learners. Averting HIV/AIDS (2010) agrees, by stating that peer education is a very effective way of reaching marginalized communities. The United Nations Children Fund (2005) affirms this on the basis that peer education is based on the reality that many people make changes not only based on what they know, but on the opinions and actions of their close, trusted peers. The results are consistent with the findings of a study conducted in another province in South Africa which showed a significant increase in student knowledge about HIV/AIDS in an intervention group compared to a control group. A follow-up showed that students in the intervention group reported more responsible sexual behavior after the intervention (NewsRx, 2006). In a study in Uganda, Naik (2002) found that the overall rate of HIV prevalence dropped significantly after a mass government-led education campaign.

The three most highly ranked media that were considered the least influential when it comes to responsible sexual behavior were mainstream newspapers (8.7%), local community newspapers (7.3%) and social media (7.1%).

Conclusion and recommendations

The aim of this study was to assess high school learners' perceptions of the communication tools used to educate them about the HIV/AIDS pandemic. The main focus of HIV/AIDS education is to inform young people about the pandemic and with a view to preventing the spread of the virus. Communication is key in behavioral change with the ultimate aim of preventing the spread of the pandemic. Effective communication can be attained when the target population understands what is being communicated to them. The study revealed that the majority of learners find HIV/AIDS communication informative.

The research revealed that HIV/AIDS education is the main source of information relating to the pandemic. The majority of learners are, in fact, aware of HIV/AIDS education. It emerged that entertainment-education plays a vital role in designing and implementing media messages that entertain and educate at the same time, increasing the audience's knowledge about an issue, creating favorable attitudes, shifting social norms, and changing the overt behavior of individuals and communities. The study also found peer education to be an effective tool in combating the pandemic.

This study therefore makes a contribution by assessing initiatives in HIV/AIDS communication in high schools, specifically student perceptions of the various communication media in this regard. Countries across the world, more especially under-developed and developing economies are grappling with the HIV/AIDS pandemic and are seeking effective mechanisms to curb the spread of the disease. The recommendations made could hold applicable to similar communities. The findings may find relevance to stakeholders such as school educators, health educators, education policy makers, health policy makers, religious institutions, and the media.

Based on the findings, the following recommendations are made. Communication has been identified as one of the key methods that are used to curb the spread of HIV/AIDS. Therefore clear messages must be developed in order for the youth to understand what is being communicated to them. Mass media, such as online sites, newspapers and radio should be used as communication media. The content of messages communicated through community media must constantly be evaluated to ensure its relevance to the target population. Health education, as shown in this study, is a key method through which students learn about HIV/AIDS. Adjustments and improvements must be made to the school curriculum to maintain its effectiveness with the objective of getting more learners being informed of the pandemic at the most crucial time in their lives, that of being teenagers. Considering that children spend a lot of time at school, more school-based programs should be introduced to promote information on risk behavior. Television entertainment is considered as one of the most powerful tools to effectively communicate HIV/AIDS

education. The youth relate to entertainment education due to its relevance. This tool must, therefore, be strengthened and maintained as it attempts to reach marginalized groups. The efforts of Soul City, a South African-based HIV/AIDS communication campaign, need to be strengthened so that more learners can be reached. Some key policy recommendations are also proposed. Government needs to commit financial resources towards HIV/AIDS communications with a view to ensuring that awareness is communicated so as to discourage high-risk behavior. There must be compulsory teaching training on HIV/AIDS education with a monitoring mechanism in place to ensure that existing educators are sufficiently trained. Furthermore, education departments must reinforce HIV/AIDS education which must include mandatory formal assessment as part of the curriculum. Stakeholder collaboration needs to be reinforced so that all parties are part of the HIV/AIDS communications campaign. This would include, *inter alia*, school educators, health educators, Community-Based Organizations, Non-Governmental Agencies, religious institutions, the media, and opinion leaders/celebrities.

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