



Social media consumption in Kenya: Trends and influence on behavior change in the wake of the Coronavirus pandemic outbreak

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Abstract

Social media plays an important part in national discourse especially during periods of crises such as health pandemics. Consequently, as the coronavirus ravages the globe, Kenyans are increasingly patronizing social media outlets to retrieve information about the pandemic. This study had three objectives; i) to establish the Social media outlets patronized by Kenyans to solicit information about the pandemic; ii) to find out the kind of information Kenyans are seeking about the pandemic; iii) to establish if the consumption of such information is leading to a significant behavior change. The study employed an ad hoc survey methodology using a semi-structured questionnaire for data collection. 144 respondents were randomly drawn for the study from different Email databases and WhatsApp groups. Secondary and primary data were collected for the study. Results from the study show that Kenyans are overly patronizing various social media outlets to seek information about the pandemic. The results also showed that Kenyans are getting valuable information on the pandemic which has had a significant impact on behavior change.

Key Words: Social media; trends; consumption; Coronavirus; behavior change; Kenya.

Introduction

As the world grapples with the coronavirus pandemic, one clear thing that is abundantly clear is that the accessibility of reliable information among the Kenyan public is critical in reversing the negative consequences of the scourge. The world has been ravaged by health pandemics before the advent of the social media revolution such as the Spanish Influenza of 1918-19. During that period, transmission of medical information was limited to more conventional media technologies such as the radio, television, newspapers, telephone, or face to face interaction. Arkin, (1990), posits that mass media is a fundamental component of many health promotion strategies. Its greatest strength lies in its ability to reach and influence many people simultaneously. Moreover, mass media, can influence both personal behavior and the community values that provide the environmental and individual supports so necessary to maintain difficult changes in behavior. Since its advent, social media has gained considerable prominence in disseminating health information. From the 2002 SARs outbreak in China, the 2012 Middle East respiratory syndrome coronavirus, the 2014-2016 Ebola outbreak in West Africa, and more recently Covid-19, major world health institutions and governments have turned to social media to relay critical public health information on these outbreaks.

Different writers have attempted different definitions of social media. According to Saflo and Brake (2009), social media refers to activities among people gathered online who share information using conversational media that make it easy to create and share content in the form of words, pictures, videos, and audios. Miller et al (2016), refer to social media as the colonization of space between traditional broadcast and private and dyadic communication providing people with a scale of group size and degrees of privacy or scalable sociability. Boyd and Ellison (2007) considered to be the pioneers of social media studies have defined social media as “networked publics” characterized by the following key attributes; persistence, visibility, spreadability, and searchability. Kane (2017) social media as an evolving set of IT-enabled affordances that allows people to communicate and collaborate using

information technology, rather than a distinctive and independent class of technologies. Ward et al. (2016) have defined social media as a set of internet technologies that allow for interpersonal communication and collaboration, is made up of applications that interactively connect people and information, and allows for the creation of user-generated content. Borrowing from the various definitions of social media by different writers, there are certain underlying features of the concept which I need to bring out; one is the existence of virtual communities, second is the interaction of members of these communities through space and time using applications that entirely rely on the internet as the primary medium of sharing, and exchanging user-generated material. And, thirdly is the ability of individual members to actively generate their own content in the course of the interaction.

According to Sterne (2010), social media categories include; forums and messaging boards, review and opinion sites, social networks, blogging and microblogging, bookmarking, and media sharing. such Kaplan and Haenlein (2010) have identified six different types of social media; collaborative projects, blogs, and microblogs; content communities; social networking sites; virtual game worlds, and, virtual social worlds. Kietzmann et al. (2011) have classified social media according to its inherent attributes. Consequently, social media is conceived of as having the following characteristics; identity (conception of self and others); conversations (the power to dialogue); sharing (content spread); presence (user availability); relationships (user ties with other users); groups(membership to virtual communities) and reputation (users standing among members of virtual group/community)

Webb et al (2010), opines that while studies on social media as a channel for health promotion have been limited, the few which have been done have shown that social media can successfully encourage health improvement and behavior. There is an increasing consensus among health promotion professionals that social media offers tremendous opportunities for the transmission of medical information. Part of this observation rests on the fact that online communication offers easy and cost-effective access to a large number of people across geographic locations. Korda and Itani (2013) observes that the rapid and innovative advances in participative Internet communications, referred to as "social media," offer opportunities for modifying health behavior. People of all demographics are adopting these technologies whether on their computers or through mobile devices, and they are increasingly using these social media for health-related issues. For instance, a study done in the US showed that half of its adults across all age and ethnic/racial use the internet to search for health information (Fox, 2011). As such, social media are becoming preferred methods of health promotion as evidence builds showing their effectiveness in reaching public audiences. The CDC and Kruse (2010) have particularly emphasized on the potency of social media as a tool for public health promotion in five different ways; a) communicating to consumers for markets insights (CDC, 2010, Kruse 2010); b) establishing and promoting brand with consumers (Kruse, 2010); c) dissemination of critical information (CDC, 2010); d) expanding reach to include more diverse audiences (CDC 2010) and e) fostering public engagement and partnership with audiences (CDC, 2010). All these five elements whether taken singularly or in combination make social media a potent platform for public health promotion.

There are certain distinct advantages which make social media a very efficacious tool for health information dissemination; a) the proliferation of web-enabled devices in the last decade has expanded accessibility; b) it is fast and reliable; c) the content can be easily tailored for different audiences; and d) it offers a multi-pronged to content transmission simultaneously. Webb et al (2010) found out that tailored content is highly effective in the promotion of interaction with the intervention, in sending motivational messages (which have a positive health impact), challenging dysfunctional beliefs and values, and, to promote cue to action. Anderson and Gomez (2009), established that the multi-pronged capability of social media for content sharing has the net effect of expanding audience real-time and also in continuing the outreach after major health events.

Social Media Consumption; A Kenyan Perspective

There is little doubt that the ICT sector in Kenya has enjoyed tremendous growth in the last decade going by data released by the Communications Authority of Kenya (CAK). As of December 2018, the total Internet subscription in Kenya stood at 45.7 million (CAK, 2019). This phenomenal growth has been accompanied by a corresponding rise in social media patronage by the Kenyans. A 2018 study by SIMELab in partnership with USIU-Africa University on the "Consumption of Social media in Kenya"

found out that Kenyans were highly patronizing several social media outlets such as WhatsApp, Facebook, YouTube, Google+, LinkedIn and, Snapchat for various reasons such as entertainment, education, job-related, and social issues. (SIMElab, USIU-Africa, 2018).

Objectives of the Study

As the coronavirus sweeps across the globe with devastating consequences including death and a complete disorganization of peoples' social and economic arrangements, Kenyans have turned to Social media to seek critical information about the disease. The broad objective of the study was to investigate Social Media consumption trends in Kenya especially in the wake of the Corona Virus. The specific objectives of the study were;

- a) To find out the Social media outlets mostly used by Kenyans to seek information on the coronavirus pandemic
- b) To establish the kind of information Kenyans are seeking on these social media outlets regarding the pandemic
- c) To establish if the consumption of any such information is leading to a significant behavior change among Kenyans

Methodology

Research Design

The study employed an ad hoc survey method. Overall, it employed a descriptive study design, that is, it sought to give a clear description of the phenomenon of social media and its consumption in Kenya in the wake of the coronavirus more specifically looking at the trends and its influence on behavior change.

Sampling

The study employed a sample of 144 respondents who were drawn randomly from different Email databases and WhatsApp groups.

Data Collection Techniques and Tools

The study employed both secondary and primary sources of data. Intensive desk review was done to gather literature on Social Media; its various definitions; typologies; impact on society and the state of Social media consumption in Kenya. Primary data was collected using a semi-structured online questionnaire which was sent to different emails and WhatsApp groups. This was necessitated by the limitations imposed by the virus especially those related to physical movement.

Data Analysis and handling

Quantitative data collected from primary sources was input into SPSS to generate both descriptive and inferential statistics. Qualitative data was coded and subjected to thematic, content and discourse analysis.

Results

Respondents Bio-characteristics

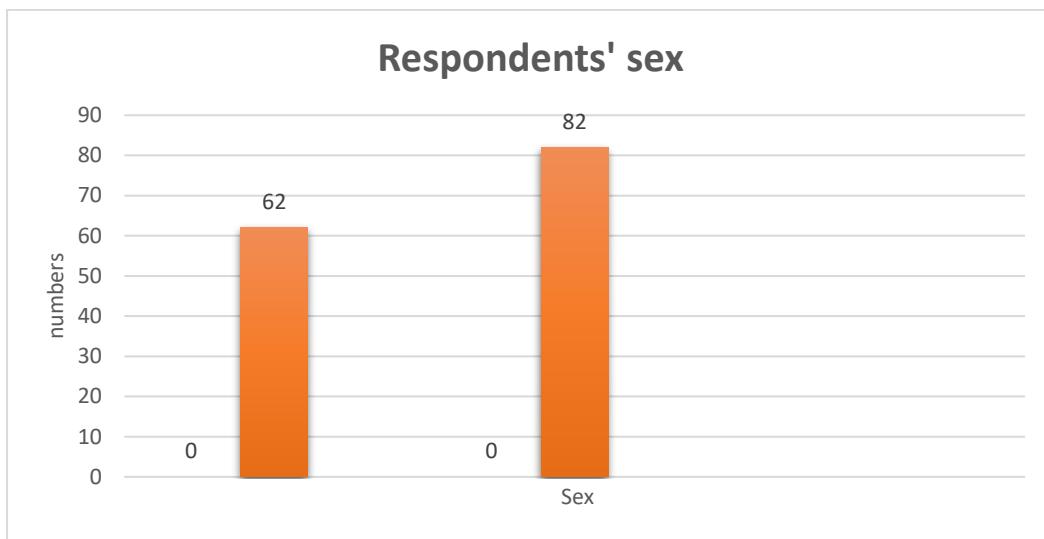
Respondents' Age

The 144 respondents who participated in this survey posted a mean age of 29.22 years, a median of 25 years, and a mode of 22 with a standard deviation. of 9.51. This implies that a significant majority of those who participated in this survey constitutes the youth. Going by Kenya's demographics, the youth form a substantial portion of the country's population with the latest data from the 2019 census showing that out of a population of 47.6 million, 35.7 million are below 35 years accounting for 75.1% of the total population (KNBS, 2019).

Respondents' Sex:

Out of the 144 respondents, 82 (56.94%) and 62 (43.06%) were women and men respectively as shown in the graph below.

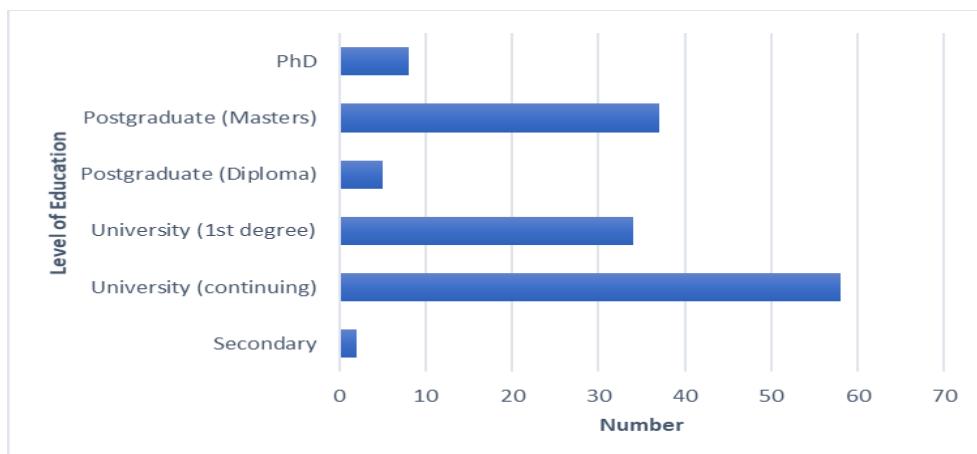
Graph 1: *Respondents' Sex*



Respondents Level of Education

Regarding respondents' level of education, 2 (1.39%) were secondary school students; 58 (40.28%) were continuing university students; 34 (23.61%) were university graduates with one degree; 5 (3.47) were Postgraduate Diploma; 37 (25.69%) were postgraduate (masters) while 8 (5.58%) were Ph.D. holders.

Graph 2: *Respondents' level of education*



Respondents' distribution by County of Residence

In terms of the distribution of respondents by counties, Nairobi had the highest number with 46 (31.94%); Tharaka Nithi 16 (11.11%); Kiambu 12 (8.33%); Machakos 8 (5.56%); Nakuru 7 (4.86%); Kajiado 6 (4.17%); Nyeri 5 (3.47%); Mombasa 5 (3.47%); Uasin Gishu 4 (2.78%); Kisii 3 (2.08%), Nandi 3 (2.08%); Busia 3 (2.08%), Homabay 2 (1.39%), Makueni 2 (1.39%), Elgeyo Marakwet 2 (1.39%), Embu 2 (1.39%), Kericho 2 (1.39%), Meru 2 (1.39%), Isiolo 1 (0.69); Nyandarua 1 (0.69%); Nyamira 1 (0.69%); Nyandarua 1 (0.69%); Narok 1 (0.69%); Muranga 1 (0.69%); Kilifi 1 (0.69%); Migori 1 (0.69%); Migori 1 (0.69%); Kisumu 1 (0.69%); Baringo 1 (0.69%); Kirinyaga 1 (0.69%); Kisumu 1 (0.69%); Trans Nzoia 1 (0.69%); Siaya 1 (0.69%); and Kitui 1 (0.69%).

Respondents' understanding of the term Social Media

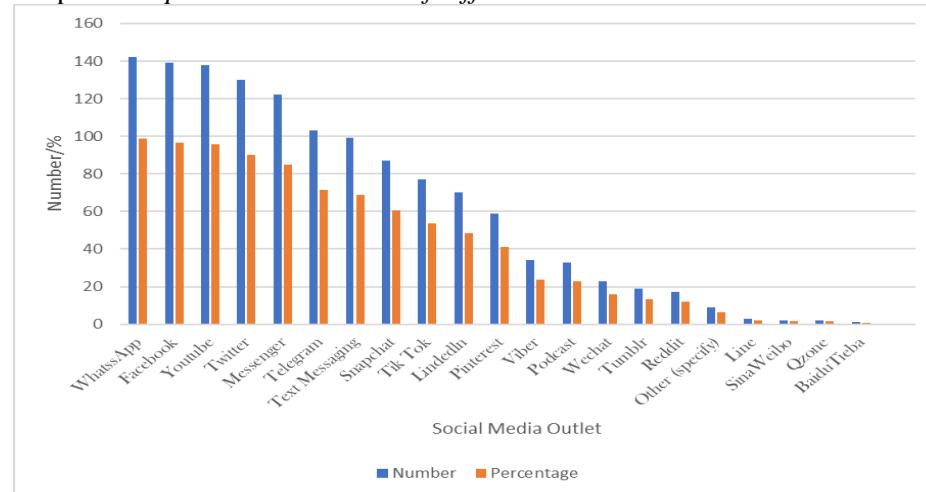
Before trying to find out whether the respondents were indeed patronizing social media in the wake of the coronavirus pandemic, it was imperative to gauge their understanding of the concept. Once all the responses were synthesized and coded the following themes came up; websites and applications that enable users to create

and share content or to participate in social networking; internet platforms for creating and sharing contents; platforms that provide virtual interaction through unseen space; applications for social interaction; online methods of social and formal interaction; platforms through which users can share information online; interactive online platforms; media through which users can share digital and non-digital contents through the internet; platforms that allow users to create, share and receive multimedia through the internet; digital platforms for sharing information; applications that enable the sharing of content through the use of technology. It is instructive to note that the definitions of social media by the respondents may not be as technical as the ones offered by scholars such as Kietzman et al, Kaplan and Haenlin, etc, however, one element captured aptly in their responses is that "Social media are platforms that enable the sharing of content between or among users".

Social media outlets awareness among Kenyans

One of the specific objectives of this study was to find out the different Social Media outlets patronized by Kenyans. However, before finding out about that, it was important to first establish the level of awareness of the various social media platforms among the respondents. To achieve this, a list of 21 Social Media outlets was provided to the respondents so that they could pick the platforms they aware of. Out of the 144 respondents, 142 representing (98.61%) of the total sample size were aware of WhatsApp; Facebook was second with 139 respondents (96.53%); YouTube 138 respondents (95.83%); Twitter 130 (90.28%); Messenger 122 (84.72%); Telegram 103 (71.53%); text messaging 99 (68.75%); Snapchat 87 (60.42%); Tik Tok 77 (53.47); LinkedIn 48 (48.61%); Pinterest 59 (40.97%); Viber 34 (23.61%); Podcast 33 (22.92%); Wechat 23 (15.97%); Tumblr 19 (13.19%); Reddit 17 (11.81%); Others (unspecified) 9 (6.25%); Line 3 (2.08%); Sina Weibo 2 (1.39%); Qzone 2 (1.39%) and Baidu Tieba 1 (0.69).

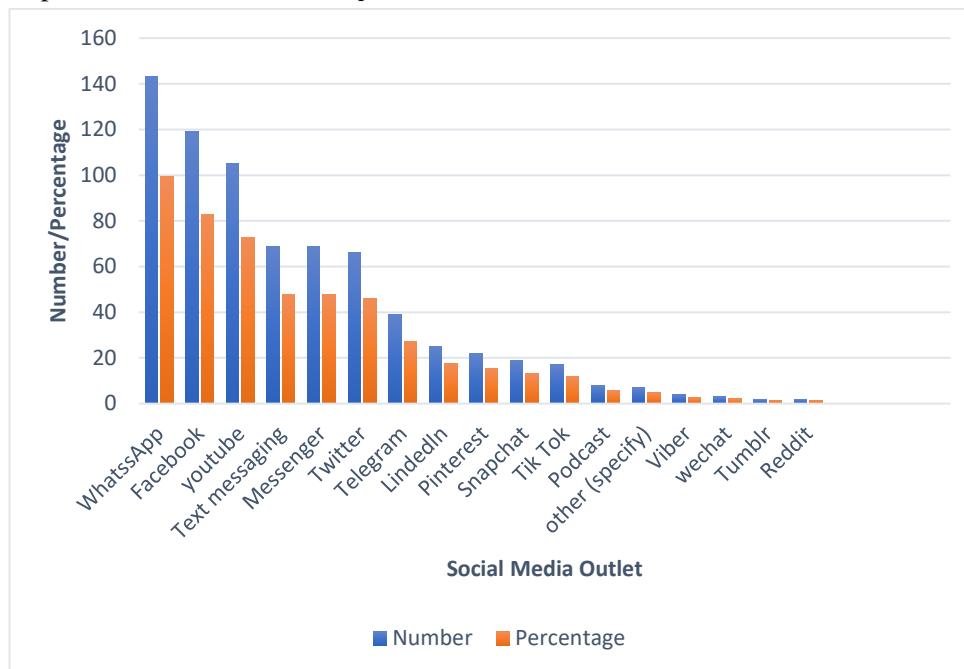
Graph 3: Respondents awareness of different Media Social Outlets



Social media Consumption Trends in Kenya

The broad objective of this study was to establish the Social Media consumption trends in Kenya. This particular objective was answered by asking the respondents to rank the social media outlets they mostly patronize in their day to day activities. WhatsApp was the most patronized social media platform with 143 out of the 144 respondents reporting that they frequently used it, accounting for 99.31%. Facebook was second with 119 respondents (82.64%); YouTube was third with 105 respondents (72.92%); Text messaging and Messenger both had 69 respondents (47.92%); followed by twitter with 66 respondents (45.83%); Telegram 39 respondents (27.08%); LinkedIn 25 (17.36%); Pinterest 22 (15.28%); Snapchat 19 (13.19%); Tik Tok 17 (11.81%); Podcast 8 (5.56%); Others (unspecified) 7 (4.86%); Viber 4 (2.78%); Wechat 3 (2.08%) and Tumblr and Reddit both with 2 respondents (1.39%). It is instructive to note that although some respondents reported being aware of social media outlets such as Line, Qzone, Baidu Teiba, and Sina Weibo, they didn't register any actual users. The above findings are not very far from the findings of the SIMELab/USIU study (2018) which found out that Kenyans mostly use nine social media platforms; WhatsApp (88.6%), Facebook (88.5%), YouTube (51.2%); Google+ (41.3%), LinkedIn (9.3%) and, Snapchat (9.0%) (SIMELab, USIU-Africa, 2018).

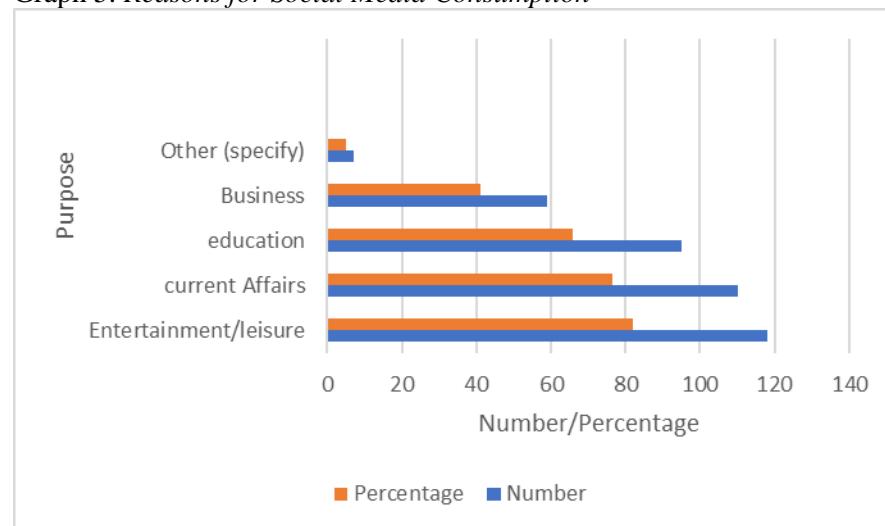
Graph 4: Social Media consumption Trends



Reasons for Social Media Consumption

There are different reasons why individuals patronize social media. It was therefore, vital to establish the main reasons why the respondents usually patronize various social media platforms. 118 out of the 144 respondents (81.94%) reported that they patronize social media outlets for entertainment; 110 (76.39%) for current affairs; 95 (65.97%) for educational purposes; 59 (40.97%) for business and 7 (4.86%) for other unspecified purposes. This seems to echo the findings of the SIMElab/USIU study which established that most Kenyans are using social media platforms for entertainment, education, job-related, and social issues (SIMElab, USIU-Africa, 2018).

Graph 5: Reasons for Social Media Consumption



Use of Social Media to seek information in the wake of the Corona Virus; media Outlets consulted and the type of information sourced

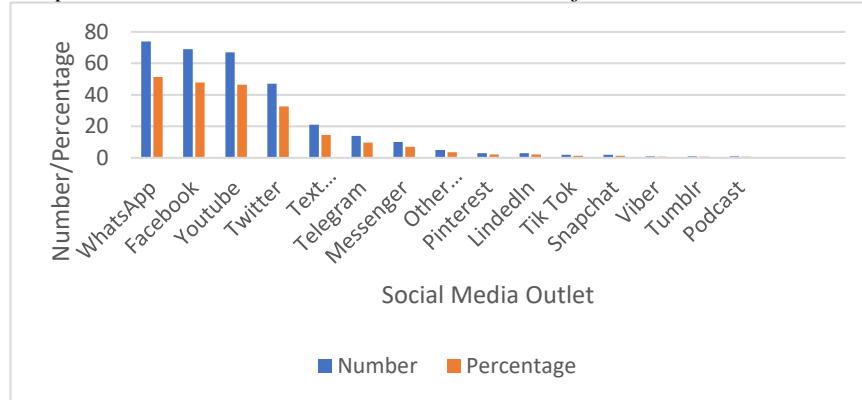
Regarding the usage of social media to seek information related to the coronavirus pandemic, data shows that 125 out of the 144 respondents accounting for (86.80%) stated that they were indeed sourcing such information while the rest 15 (10.41%) were not.

Table 1: *Respondents using social media to seek information on the Corona Virus pandemic*

Value	Frequency	Percentage
Yes	125	86.80
No	17	11.80

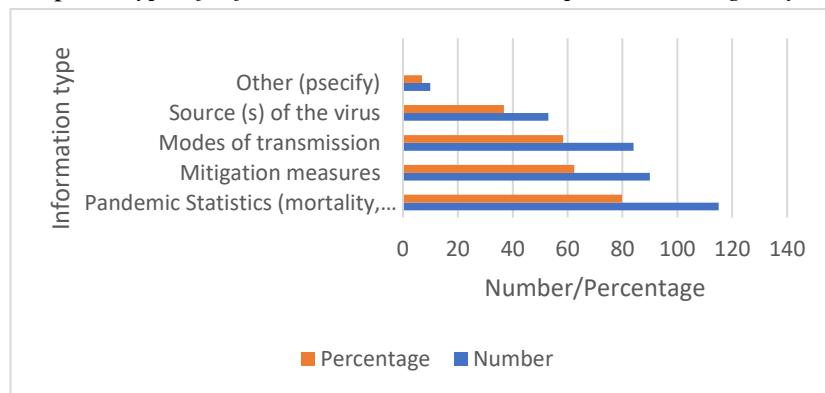
On what social media outlets Kenyans were seeking information on the pandemic from, again WhatsApp was the most patronized platform with 74 respondents (51.39%); Facebook 69 (47.92%); YouTube 67 (46.53%); Twitter 47 (32.64%); Text Messaging 21 (14.58%); Telegram 14 (9.72%); Messenger 10 (6.94%); Other (unspecified), 5 (3.47%); Pinterest and LinkedIn each with 3 respondents (2.08% for each); Tik Tok and Snapchat each with 2 (1.39%) and Viber, Podcast, Tumblr and WeChat each with 1 accounting for (0.69%).

Graph 6: *Social Media Outlets used to source information on the Coronavirus pandemic*



On the type of information they were seeking about the pandemic, 115 respondents (79.86%) reported that they sought information about pandemic statistics (infection, mortality rates, etc); 90 (62.5%) information about mitigation measures; 84 (58.33%) information about modes of transmission; 53 (36.81%) information on sources of the virus while 10 (6.94%) listed other unspecified information.

Graph 7: *Type of information on Corona Virus pandemic sought by the respondents*

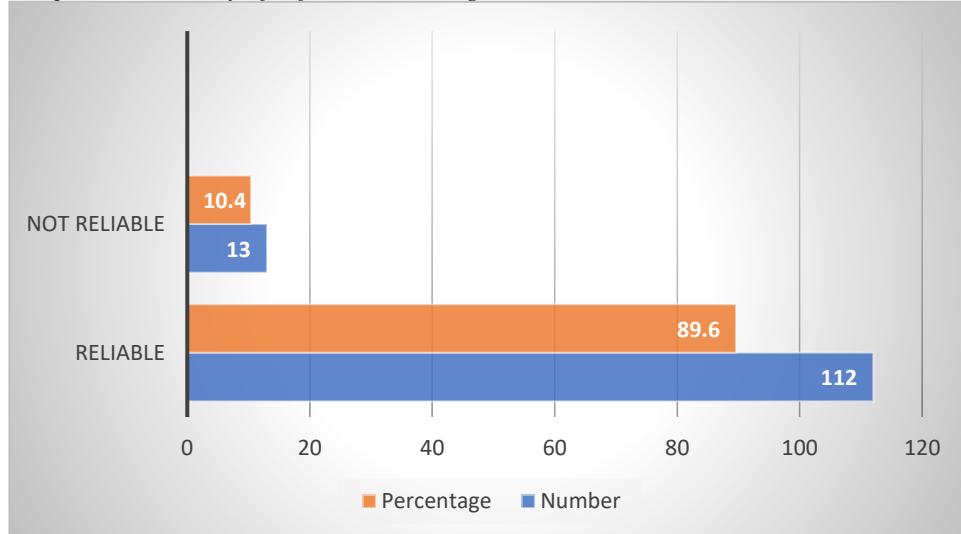


Reliability of Information sought on Social Media regarding the Coronavirus Pandemic

Reliability of information is very critical to effective mitigation of the pandemic. It was therefore important to gauge the respondents' perceptions on the reliability of the information they were

seeking. The respondents were asked if they believed whether the information they were seeking on social media outlets on the pandemic was reliable (in terms of authenticity) and a significant proportion 112 of the 125 (who had previously reported that they seek information about the pandemic from social media outlets), (89.6%) said yes while 13 (10.4%) said no. The reason that was given for believing the information was reliable was; that it emanated from reliable sources such as the government and international organizations like the World Health Organization. They were of the view that what was posted on social media outlets especially about the situation of the pandemic in Kenya is a replica of the daily updates from the Ministry of health. Those who had the opposite view said that such information was unreliable because social media is full of exaggeration and a lot of unauthenticated material. Some respondents were of the view that there are a lot of conspiracy theories on social media concerning the source of the virus.

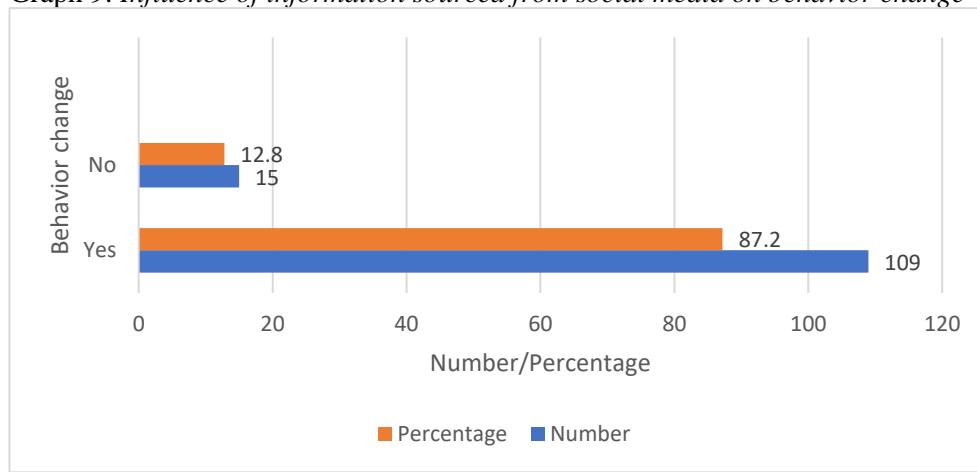
Graph 8: Reliability of information sought on social media about the coronavirus pandemic



Impact of information sourced from Social media in influencing behavior change

This study was primarily about establishing if the information the respondents were seeking on social media about the pandemic had a significant change in behavior. Therefore, respondents were asked to state whether the information they were sourcing from different social media outlets on the coronavirus pandemic had led to any significant behavior change. Out of the 125 respondents who had admitted to seeking information on the virus from social media, 109 (87.2%) reported that the information had influenced behavior change. 26 (12.8%) reported that the information didn't have any influence on their behavior at all.

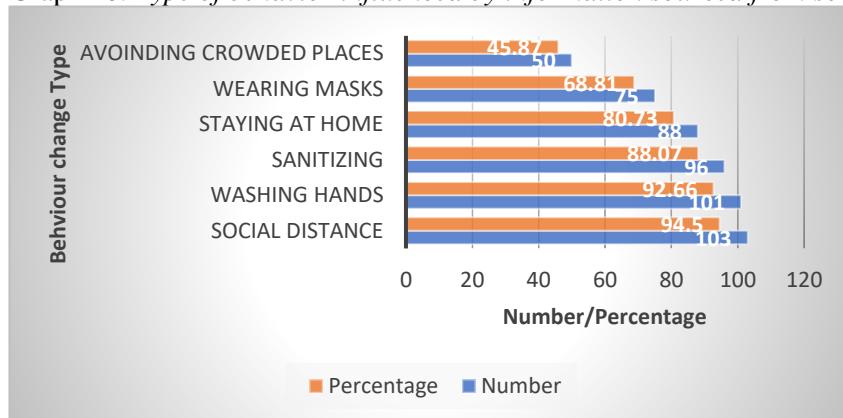
Graph 9: Influence of information sourced from social media on behavior change



On the type of behavior change which has been occasioned by the information sourced from social media on the coronavirus pandemic, 103 (94.50%) of the respondents identified social distancing; 101 (92.66%) washing hands frequently; 96 (88.07%) frequent sanitizing; 88 (80.73%) staying at home; 75 (68.81%) wearing masks and 50 (45.87%) avoiding crowded places. In one of the qualitative parts of the survey one respondent had this to say;

"I have been able to understand more about the potential impact of the virus basing on what is happening in China, Italy and Spain.... therefore, I have become more serious and followed the necessary directives or advise on how to prevent getting the virus"

Graph 10: Type of behavior influenced by information sourced from social media



What Social Media outlets can do to enhance the consumption of information during health crises

Lastly, respondents were asked their opinions on what social media outlets can do to enhance the consumption of information especially in periods of health crises like the coronavirus pandemic. Different suggestions were floated but the majority of the respondents opined that posting of authentic information was critical for the consumption of such information. The respondents thought that authorities should regulate information posted by different social media outlets to cut down on cases of misinformation which can be dangerous during health crises. The need for factual and scientifically proven information being posted on social media platforms was overly emphasized.

Discussion and Recommendations

From the above findings, it is apparent that a significant number of Kenyans are turning to social media to seek information about the coronavirus pandemic. Previous studies, for instance (SIMElab/USIU, 2018) have shown that the youth are the biggest users of social media. One notable finding of this study was that a significant portion of the sample that participated in this survey was youthful (with a mean of 29.92 years). This portends well for the country given the fact that the youth constitute a dominant percentage (over 70%) according to the latest census. A situation whereby such a critical segment of the population uses social media to seek vital information about a health crisis is a positive step. This is even more crucial if such information has a fundamentally positive impact on behavior change among the primary consumers. Findings from the study indicate that participants have been seeking relevant information on the pandemic such as its origin, vital statistics (number of infections, mortality rates, etc), mitigation measures and this has had a tremendous influence on behavior change in as far as embracing positive practices such as social distancing, wearing masks, frequent sanitizing and handwashing, self-quarantining as a way of stemming the spread of the virus.

One of the biggest advantages of social media information is that it is real-time and consumers can access it at a click of a button either on their cell phone or computer. This keeps large masses of the population abreast of what is happening around them. This is quite a departure from other channels like the conventional print and electronic media where dissemination of information is usually periodic. Social media, therefore, offers a very timely and undebatable opportunity for Kenyans to access information on the coronavirus pandemic.

There exists a tremendous opportunity for harnessing social media to disseminate health information in Kenya. One reason for this is that the country has experienced a phenomenal growth in

ICT. This information need not be restricted to health pandemics only, but rather on a wide range of health interventions. As the country endeavors to fulfill its obligations as mandated by national accords such as the Vision 2030 and international ones such as the Millennium Development Goals (MDGs) and the Sustainable Development Goals (SDGs), in the area of health, tapping into social media for dissemination of information will certainly offer endless opportunities.

However, caution should be made that not all information obtained on social media on a variety of issues including the coronavirus pandemic is true. Consumers of such information should be very vigilant and diligent when accessing information on the pandemic from various social media outlets. The government should play a regulatory role in ensuring that potentially harmful information is not posted on social media especially on issues such as therapy and treatment. But overall, social media offers a wide opportunity for accessing vital information during health emergencies.

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