



# Myths Around Stroke and Failures of Broadcasts Preventive Communication: Lived Experiences of Stroke Patients and Survivors in Nigeria

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#### **ABSTRACT**

Although stroke is regarded as the second leading cause of death in the world, it is less discussed in the media as such awareness. The study, which was anchored on the Health Belief Model, adopted a qualitative research design, while the interview was employed as the data gathering method from informants purposely selected from the Stroke Rehabilitation Center, Osogbo, Nigeria. Thematic Analysis, with the aid of NVivo 10 Software, was adopted to carry out the analysis. The findings of the study revealed that stroke patients and survivors expressed disappointment with the low attention given to the coverage of the incidence of stroke in Nigeria, despite many myths surrounding it. The challenges encountered by stroke patients and survivors include inadequate stroke information, especially from broadcast media, and lack of awareness. The study recommended that journalists should be more proactive in reporting and discussing stroke, especially regarding symptoms, causes, and management, as a large number of victims exist in developing countries where there is a high prevalence of stroke. It also recommends that the government equip public hospitals with tools and personnel to manage all forms of paralysis.

## **Keywords**

broadcast media; perceptions of stroke; preventive communication; stroke survivors

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### INTRODUCTION

## **Background to the Study**

Stroke, also known as cerebrovascular disease or brain attack, is a non-communicable ailment with significant global socioeconomic ramifications. According to the 2019 World Health Organization (WHO) report, strokes are responsible for 10.8% of the global mortality and contribute to 3.1% of the worldwide disease burden. It is projected that by 2030, approximately 80% of all stroke cases will occur in low- and middle-income countries, which are still grappling with communicable diseases, such as HIV/AIDS, malaria, and tuberculosis (Sanya et al., 2015).

The history of stroke dates back approximately 2,400 years when Hippocrates first identified it as a medical condition. Symptoms can include facial drooping, weakness on one side of the body (typically the leg and arm), speech difficulties, and vision problems (such as double vision). Primary risk factors include high blood pressure, smoking, heart disease, diabetes, obesity, old age, and a history of stroke (WebMD Editorial Contributors, 2023).

Globally, 15 million people suffer from stroke each year, with 5 million succumbing to the condition and another 5 million permanently disabled (Chen et al., 2020). Stroke is the fifth leading cause of death in the United States and ranks among the top killers worldwide, second only to heart diseases (Brusca & Albert, 2023; Li et al., 2023). In the United States, every 40 seconds, someone has a stroke. Every year, more than 795,000 people have a stroke. About 610,000 of these are first or new strokes and about 185,000 strokes—nearly 1 in 4—are in people who have had a previous stroke (Tsao et al., 2023). In China, more than 3 million stroke cases have been reported, with approximately 1.5 million resulting in deaths (Yi et al., 2020). India has 1.8 million stroke in India, leading to over 500,000 annual deaths (HT Correspondent, 2020).

Furthermore, Chen et al. (2020) highlighted that despite its significant impact on socio-economic development, strokes have received inadequate attention, especially in low-income countries. For instance, 34% of strokes in low- and middle-income countries (compared to 9% in high-income countries) are of the hemorrhagic subtype, and up to 84% of stroke patients in low- and middle-income countries (versus 16% in high-income countries) do not survive for three years after diagnosis.

However, in Nigeria, there is a low level of awareness about stroke, which has given rise to myths and misconceptions. Myths surrounding strokes in Nigeria, such as considering it a spiritual attack rather than a medical condition, have persisted for a long time, leading to misconceptions and inaccurate knowledge about the ailment (Nweke & Kanayo, 2019; Umoh, 2019). Another common misconception is that strokes only affect the elderly, whereas they can occur in both young and old individuals (Scott et al., 2022; Srikanth et al., 2022; Vrudhula et al., 2019).

Awareness plays a crucial role in dispelling these myths, and Hickey et al. (2018) suggested that media campaigns can effectively enhance knowledge about strokes, particularly through modern communication tools such as broadcast media. The media's ability to set the agenda means that the public pays attention to issues that the media considers important, while less attention is given to topics that receive minimal media coverage. Therefore, this study investigates the role of broadcast media in communicating stroke prevention and the experiences and perceptions of stroke patients and survivors in Osun State, Nigeria. Stroke is the second leading cause of global mortality after heart disease, but it has received less media attention, leaving people misinformed despite the increasing number of cases (Chen et al., 2020).

In developing countries such as Nigeria, where awareness is low, the public often has inadequate knowledge, believes in myths, encounters misinformation, and fabricates ideas about stroke. This is evident in the annual stroke case statistics (Owolabi et al., 2015). For instance, Adeloye et al. (2019) reported that in Nigeria, strokes affect 26 of every 100,000 people, while Sanya et al. (2015) estimated the figure to be as high as 130 victims per 100,000 individuals. These differences in statistics may be attributed to the belief that strokes are spiritual attacks and a low level of awareness about the condition in Nigeria (Kayode-Iyasere & Odiase, 2019).

Despite the significant impact of stroke in Nigeria, little attention has been paid to stroke awareness campaigns and the level of media coverage, discussions, campaigns, and public knowledge about the condition (Jenkins et al., 2018; Kayodelyasere & Odiase, 2019; Nwoha et al., 2021; Vincent-Onabajo & Moses, 2016).

Broadcast preventive communication, which includes public service announcements, news reports, and health programs, plays a crucial role in educating the public about stroke prevention (Sese & Guillermo, 2023; Tan et al., 2022). However, myths surrounding strokes can undermine the effectiveness of these efforts, leading to delays in seeking life-saving medical treatments. To address this, effective communication strategies are needed to dispel these myths, improve public awareness, and promote early recognition and intervention in stroke patients. Understanding the specific factors contributing to the failure of broadcast preventive communication campaigns in dispelling stroke-related myths is essential for designing more effective strategies. This study aims to fill this gap by exploring the underlying causes in the context of stroke survivors in Osun State, Nigeria.



## Myths and Misconceptions about Stroke in Nigeria

Stroke is plagued by numerous myths that often obscure the truth about this condition, leading people to believe in these misconceptions rather than understand the reality of strokes (Gallagher et al., 2019; Wainwright et al., 2017). Some of these myths include the belief that strokes are not treated in hospitals; in fact, all stroke patients should receive hospital treatment and evaluation to determine the underlying causes and prevent recurrence. Additionally, there is a misconception that strokes occur only once in a lifetime, whereas strokes can occur multiple times. Another myth suggests that stroke patients should never receive injections; however, in reality, some of the initial medications used in stroke treatment are administered through injections.

A prevalent myth also suggests that the problems caused by a stroke are limited to the weak hand and leg of the affected individual and that treatment should focus solely on these areas. However, strokes originate in the brain and can lead to weakness in both hands and legs (Barman & Mahapatra, 2017; Chakor, 2017).

Another widely held myth is that strokes are caused by some sort of malevolent force or "evil arrow," and there is nothing one can do to prevent them. Stroke is often linked to factors such as poorly controlled hypertension and a family history of stroke, among other risk factors. Similarly, there is a misconception that strokes only affect older individuals; in fact, strokes can occur in both the young and elderly (Elizondo et al., 2020; Naess et al., 2011; Vrudhula et al., 2019). Therefore, dispelling these myths and increasing public awareness about the true causes and treatment of stroke are essential for promoting early intervention and better outcomes for stroke patients.

## **Burden of Stroke in Developing Countries**

Stroke is a prominent contributor to both fatalities and disabilities globally (Chen et al., 2020). It is considered a leading cause of illness and death worldwide, and this situation is predicted to worsen, especially in developing countries over the next couple of decades, as projected by the World Health Organization (WHO). This challenge is compounded by the increasing prevalence of diseases such as HIV/AIDS and communicable diseases such as multidrug-resistant malaria and tuberculosis (Wahab, 2008). Nigeria is the most populous nation among black people globally and faces a significant risk of straining its resources due to the rising incidence of stroke and other cardiovascular diseases resulting from epidemiological transitions.

Avan et al. (2019) further emphasized that stroke ranks as the second leading cause of death globally among the 240 identified causes of death, and it is expected to maintain this position by 2030. However, it is worth noting that ranking may vary slightly among countries categorized by the World Bank as Low-Income Countries (LICs), Lower-Middle-Income Countries (LMICs), Upper-Middle-Income Countries (UMICs), and High-Income Countries (HICs).

Additionally, Avan et al. (2019) highlighted that stroke survivors often experience disabilities, some of which require long-term or permanent assistance, resulting in a substantial burden in terms of both human suffering and economic cost. Research also indicates that socioeconomic deprivation is not only linked to stroke and its risk factors but also exacerbates stroke severity, increases mortality, and contributes to strokes occurring at younger ages. Hypertension, among other factors, is recognized as the leading cause of almost 90% of cardiovascular diseases, including stroke and myocardial infarction.

McDonnell (2018) provided data showing that Africa has one of the highest stroke rates in the world, with approximately 316 new cases per 100,000 people each year. This issue is critical, and stroke can be a substantial and often overlooked burden. Hemorrhagic strokes are particularly concerning, as they are highly likely to be fatal, and they highlight the growing prevalence of other health issues in Africa. In light of this, comprehensive medical education about strokes and the importance of seeking prompt medical attention are vital steps in both the prevention and management of stroke (Alberts et al., 2005; Kerns et al., 2011; Winstein et al., 2016).

### **Health Communication and Stroke**

Health communication analysis encompasses several levels, including intrapersonal, interpersonal, group, organizational, and societal communication. Interpersonal health communication research focuses on the impact of relationships on health outcomes, therapeutic interactions, and exchange of essential health information during healthcare interviews (Ogundoyin & Soola, 2014).

In the context of health communication, stroke communication is a crucial area aimed at increasing the awareness and understanding of stroke among the general population. Through health communication initiatives focusing on stroke, the goal is not only to raise awareness, but also to enhance public knowledge and dispel myths associated with stroke. Torloni et al. (2020) categorized stroke media campaigns as interventions that utilize organized communication activities to achieve specific outcomes in a relatively large number of individuals, typically within a defined timeframe.

According to Torloni et al. (2020), common communication media used in health campaigns for stroke include, but are not limited to, television and radio. These media serve as effective channels for disseminating information and educating the public about stroke prevention, symptom recognition, and the importance of seeking timely medical attention (Suratun et al., 2023; Tan et al., 2022).

## Handling Stroke from the Prism of Health Belief Model

The Health Belief Model (HBM) is a valuable theoretical framework used to guide health promotion and disease prevention programs. It was developed by social psychologists Irwin M. Rosenstock, Godfrey M. Hochbaum, S. Stephen Kegeles, and Howard Leventhal (Taylor et al., 2007). This model is particularly useful for explaining and predicting health-related behaviors, including those related to stroke, and focuses on the uptake of health services.

The HBM highlights the key factors that influence health-related behaviors, addressing the prevalent issue of individuals failing to engage in disease prevention and the early detection of asymptomatic diseases. The model identifies two critical components that shape behavior: (1) the desire to avoid illness and (2) the belief that a specific health action will effectively prevent illness. The HBM comprises of four main dimensions.

- a. Perceived Susceptibility: This refers to an individual's subjective perception of their risk or vulnerability to a health threat such as stroke.
- b. Perceived Severity: This dimension pertains to an individual's perception of the seriousness of the threat involved, in this case, the severity of stroke.
- c. Perceived Benefits: This encompasses an individual's assessment of the efficacy of taking specific actions to prevent or reduce the threat of an illness, such as preventive measures for stroke.
- d. Perceived Barriers: This dimension involves an individual's evaluation of the negative consequences or obstacles associated with undertaking preventive action.

The relevance of the Health Belief Model to the study lies in the fact that despite the preventability of approximately 80% of strokes, people often fail to take preventive measures. Many wait until they are directly affected by their condition before seeking solutions. The HBM explains that people are less likely to seek information that could enhance their knowledge about health issues such as stroke, including warning signs, causes, and the importance of early treatment and general stroke management. This model underscores the principle that prevention is more effective than cure, urging individuals to adopt preventive measures to safeguard their health. This not only saves resources, but also reduces mortality rates.

The Health Belief Model is highly recognized and influential in the fields of health psychology and health behavior. It has been effectively used to understand post-stroke recovery and the management of risk factors for stroke survivors. This study has provided insights into how stroke survivors perceive their health risks, weigh the benefits and barriers to taking health-related actions, and assess their readiness to change their behaviors. Additionally, the HBM's construct of perceived susceptibility has been

valuable in exploring how stroke survivors perceive their vulnerability to recurrent strokes or complications, aiding the development of tailored interventions and support strategies for stroke survivors.

#### **METHOD**

This study applied a qualitative method using an in-depth interview approach to explore the experiences and perceptions of stroke survivors in Nigeria. A qualitative research can be used as a method to deeply explore a phenomenon. In-depth interviews allowed the researchers to engage with the participants on a one-on-one basis, creating a safe and open space for participants to share their experiences, emotions, and perceptions. Therefore, a phenomenological design was employed in this study to focus on the commonality of the informants' lived experiences (Groenewald, 2004; Murdoch & Franck, 2012; Pringle et al., 2011). This was achieved through a purposive sampling design to select 25 stroke patients and survivors. Due to the limited research population, comprising 25 patients and survivors who are currently receiving treatment, the entire population was adopted for the study, making it a census.

This qualitative research study focused on understanding the experiences and perceptions of stroke survivors in Osun State, Nigeria. Osun State is located in the southwestern region of Nigeria and is known for its rich cultural heritage, diverse population, and mix of urban and rural areas. This study aimed to gain deeper insights into the lives of stroke survivors in this specific geographical and cultural context. The participants were selected from various locations, including the state capital, Osogbo, and smaller towns and villages. The study included participants of different age groups and sexes to ensure a comprehensive understanding of the experiences of stroke survivors in Osun State.

The participants were recruited through various channels, including local healthcare facilities, community organizations, and stroke support groups in Osun State. Healthcare professionals and community leaders played a key role in identifying potential participants willing to share their experiences and perceptions of stroke. A series of in-depth interviews was conducted, and data were analyzed thematically using NVIVO 12 software. Transcripts from the in-depth interviews were carefully transcribed and subjected to thematic content analysis. Researchers identified recurring themes, patterns, and unique narratives in the participants' responses to construct a comprehensive picture of the experiences and perceptions of stroke survivors in Osun State.

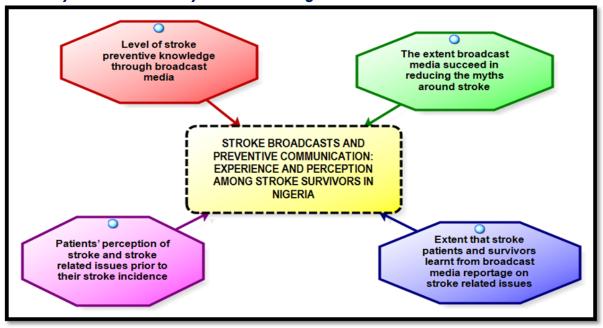
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The study adhered to ethical guidelines, obtaining informed consent from participants and ensuring their privacy and confidentiality. Limited resources may have constrained the sample size, potentially impacting the generalizability of the findings, and participants' recall of stroke-related experiences may be subject to bias, affecting the accuracy of their responses.

### **RESULTS AND DISCUSSION**

The interviews led to the creation of coding frames, which included themes that helped elucidate the viewpoints and real-life experiences of the interviewees. Subcategories were also developed to enhance the thoroughness and reliability of the analyses. Thematic analysis was chosen as the approach for the analysis to produce dependable and reliable data and results (Fereday & Muir-Cochrane, 2006; Nowell et al., 2017; Vaismoradi et al., 2013). The following findings, illustrated in Figure 1, address each research question through distinct themes that emerged from the analysis.

Figure 1 Summary of Thematic Analysis of the Findings



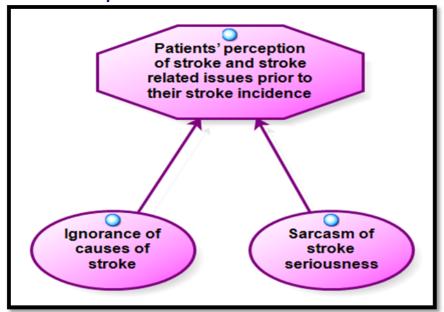
Source: Primary data. Authors' analysis.

## Theme 1: Patients' Perception of Stroke and Stroke-Related Issues Prior to Their Stroke Incidence

The findings of this study are consistent with studies which revealed that knowledge of stroke symptoms and self-perceived risk of stroke is generally low (Ren et al., 2023; Saengsuwan & Suangpho, 2019). Additionally, these findings align with the perspective put forth by Pancioli et al. (1998), emphasizing the need for substantial education to enhance public awareness of warning signs and risk factors associated with strokes. The study underscores that respondents who self-report risk factors for stroke often lack awareness of their heightened risk, highlighting the importance of raising awareness and education in this regard.

Figure 2

Patients' Perception of Stroke and Stroke-Related Issues



Source: Primary data. Authors' analysis.

### **Ignorance of Cause of Stroke**

One of the challenges in handling stroke cases among people is ignorance. This was confirmed by informant SPIF who claimed thus, "I don't have knowledge about stroke before my incident. I did not have knowledge about stroke at all before." Corroborating this line of view was SP2M, who disclosed that, "Before my incident, I did not have knowledge of Stroke but I know that I have high blood, so I use my drug regularly. Unfortunately, my drug finished and I was unable to buy another drug within a week; before I know, I already have a stroke." To SS5F, "I do not have knowledge of stroke before my incidence".

Other studies (Jones et al., 2010; Teuschl & Brainin, 2010; Wainwright et al., 2017) have also found that stroke survivors and the general public often lack knowledge about the causes of stroke, leading to misconceptions regarding its origins. It can be deduced from these responses that participants knew little or nothing about stroke before becoming victims.

## **Cynicism of Stroke Seriousness**

Due to lack of awareness, most stroke victims initially display an attitude of carelessness towards stroke. This was confirmed by informant SS16M who noted that, "initially I assumed that stroke is just nothing but tiredness which will go in days, until I

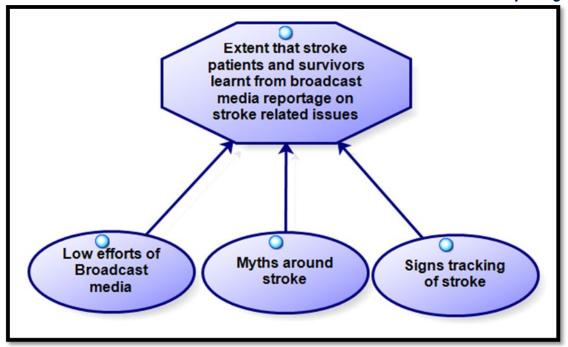
realized that it is a serious sickness which required seeing doctor." This is similar to the findings of Rachmawati et al. (2020), who discovered that most respondents were less equipped with necessary knowledge about stroke risks and symptoms. Corroborating this line of view, informant SP18M also stated that, "None of us take serious having concluded that nobody in my family has it so I cannot have it, but later the reality of stroke attack dawn on me". In contrast, a study by Lu et al. (2019) found that stroke survivors and their families in their research context took the seriousness of stroke very seriously and were proactive in seeking treatment and support.

# Theme 2: Extent that Stroke Patients and Survivors Learnt from Broadcast Media Reportage on Stroke-Related Issues

The evidence from this study's interviews showed varied perceptions of how many stroke patients and survivors learn about stroke from either radio or television news or programs. Based on the coding generated, the participants did not really learn about stroke from broadcast media, as many of them pointed out that broadcast media never educate and enlighten them regarding stroke.

Figure 3

The Extent that Stroke Patients and Survivors Learnt from Broadcast Media Reportage



Source: Primary data. Authors' analysis.

### **Low Efforts of Broadcast Media**

Media coverage of stroke is generally limited, as supported by previous findings of Kayode-Iyasere & Odiase (2019). They observed that, while awareness of stroke, its risk factors, and warning signs was relatively high in the urban community of Benin, Nigeria,

the primary sources of information for the community were faith-based settings. This underscores the need for more comprehensive and widespread media coverage and educational campaigns to ensure that accurate information about stroke, its risk factors, and its symptoms reaches a wider audience beyond faith-based settings. This is corroborated by the findings of the present study. For instance, SS7F confirmed this thus, "I can't see where radio or television stations educate public on stroke like other health issues like HIV/AIDS, Sickle Cell etc, even the recent Coronavirus gain media attention and people know much about it". Similarly, SS11M disclosed that, "No, I never got information from radio and TV on how I can prevent stroke", and No, I never got information from radio and TV on how I can prevent stroke". Succinctly SP3M said, "Radio and television did not carry information on stroke. Not to talk about reducing the myths". Corroborating this line of view are SP3M, SP9F, SS16M, and SP18M.

Previous studies have also noted the limited efforts of broadcast media to effectively disseminate information about stroke prevention and management (Alberts, 2012; Jeet et al., 2020; Lecouturier et al., 2010). The findings showed that broadcast media paid little attention to sustained awareness about stroke, despite little knowledge about stroke, which has resulted in speculations and myths around stroke.

### **Myths Around Stroke**

There are a series of myths around stroke due to the dearth of attention from broadcast media. This was revealed by patients and survivors of stroke in Nigeria. Substantiating this line view was an informant code named SS11M, who said, "What I know about stroke is that stroke is a spiritual attack." Putting it succinctly in the same vein, informant SP13F disclosed that "Popular thing we have always being told about stroke is that stroke is a spiritual attack and we believe it." Corroborating it also, was informant SS17M who noted that "The most popular myth about stroke that we know and which guide our handling stroke is the belief that stroke is not an ordinary sickness but spiritual attack." The other stroke patients and survivors interviewed also reported the same experiences of beliefs about stroke. Multiple studies have identified prevalent myths and misconceptions surrounding stroke, such as attributing it to supernatural causes or unusual remedies (Hachinski et al., 2010; Mshana, 2008; Nnanna, 2020).

### **Signs of Stroke**

Previous studies suggest that most patients only recognized one cause of stroke, which is hypertension (Dahlöf, 2007; Davis et al., 1998; Donkor, 2018; Pistoia et al., 2016). Although many of the participants did not know the symptoms of stroke until they had it, the sign that many of them experienced at the onset of their incidence includes but is not limited to the following, as attested to by many participants. Informant SPIF for instance stated thus, "What I know is that, the early sign is that the people will start

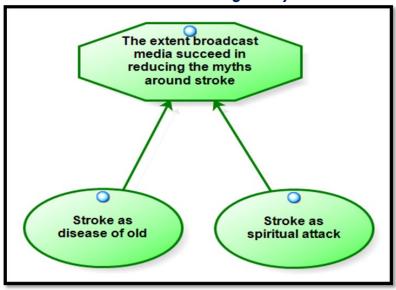
experience high blood pressure, later I started experiencing a slurring speech and so on." Echoing the same perception, about the signs of stroke was Informant SP2M who disclosed that, "I don't know about any sign except my case, I was inside commercial bus when I just discovered that both my hands and legs suddenly paralyzed, without prior and clear signs." However, for Participant SS11M, the situation was different, "Some symptoms of stroke I saw when my case first started, was that I was sleeping when I observed that part of my body could not be lifted, especially my left side".

Additionally, many of the participants attributed the cause of stroke to high blood pressure and hypertension, with little or no knowledge of other causes of stroke. This point was attested to informant SP2M thus, "There is no one that doesn't have tendency of having stroke, but people that keep lots of things in mind are prone to stroke more, people who are 50 years and above, people who didn't use their drug regularly (hypertensive people)." Putting clearly informant SP12M said, "High blood seems to be the major cause, because I was managing the blood pressure before I had stroke". Other informants also indicated that high blood pressure was a major reason.

Based on this finding, many of the participants did not know of any symptoms of stroke until they had it, although some of them were able to only identify high blood pressure and hypertension as the major cause of stroke.

Figure 4

Extent That Broadcast Media Succeed in Reducing the Myths Around Stroke



Source: Primary data. Authors' analysis.

# Theme 3 The Extent Broadcast Media Succeed in Reducing the Myths Around Stroke

To determine the extent to which broadcast media (radio or television) has been able to increase patients and public knowledge of stroke, many stroke patients and survivors

did not agree that broadcast media has been able to reduce myths about stroke, as they claimed that it paid little attention.

## Myth of Stroke as Disease of Old

Regarding the perception of stroke as an older sickness, most stroke patients and survivors are just realizing their wrong misconceptions, having experienced it themselves. Previous studies (Donkor, 2018; Nicol & Thrift, 2005; Parahoo et al., 2003) further emphasized that the substantial burden of stroke can be attributed in part to the limited community knowledge concerning the risk factors associated with strokes and their warning signs. This highlights the importance of enhancing public education and awareness programs aimed at improving the understanding of stroke, its risk factors, and early warning signs to reduce its prevalence and impact. According to the informant SP2M "No, stroke does not affect elderly people alone. I was surprised to see a young lady who is a secondary school student". Another Informant, SS3F, described it thus, "It is true that older people usually have stroke; nevertheless, stroke can happen in young individuals". In line with this, informant SP6M revealed that, "before I thought, but now, there is a new belief. Stroke can also happen to people that are not old." A similar perception was expressed by the informants SS7F and SS11M. In contrast, research conducted by Feigin et al. (2022) highlighted the growing awareness that stroke can also affect younger people, potentially challenging this myth.

## Myth of Stroke as Spiritual Attack

The perception of participants towards stroke is negative, as most of them stated that, prior to their stroke incidence, their perception of stroke is that stroke is a spiritual attack that is usually inflicted on individuals by the wicked, and younger people cannot have stroke. In fact, many people do not believe that stroke is a health problem; rather, they think of stroke as a spiritual attack rather than a brain attack, which influences the perception of most stroke victims. Many patients share the same perspective and attribute stroke to spiritual attacks. According to the informant SP3M "I agreed that stroke is an evil arrow and spiritual attack." Supporting this, Informant SP6M said, "Stroke is often regarded as an evil arrow".

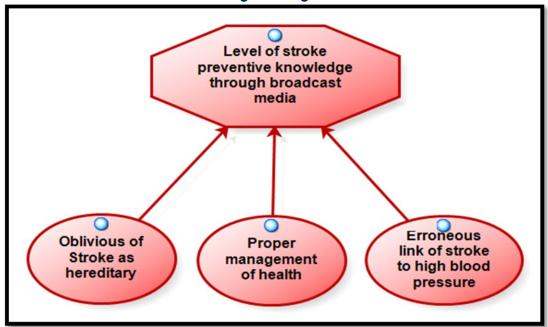
Several studies (Nweke & Kanayo, 2019; Umoh, 2019) have found that cultural and spiritual beliefs may lead individuals to view stroke as a result of spiritual attacks or curses. One of the sicknesses that has many myths surrounding is stroke, and the common myths about stroke as evidence from the informants are that stroke is a spiritual attack and evil arrow. This can only be dispelled when adequate attention is paid to the broadcast media.

## Theme 4 Level of Stroke Preventive Knowledge Through Broadcast Media

On the level of stroke preventive knowledge through broadcast media (radio or television), previous studies concluded that there is a poor level of awareness about ways to prevent stroke (Ling et al., 2021; Menon et al., 2014; Naguib et al., 2020; Saadatnia et al., 2021; Wahab, 2008), even among educated respondents, and that a lack of awareness of warning signs appears to be a significant factor contributing to delays in seeking medical attention following an acute stroke. According to the submission of the patients and survivors of stroke, they have not seen or heard about stroke preventive measures from both the radio and television, as they claimed that mass media, particularly broadcast media, paid little or no attention to issue, compared to other health issues like Coronavirus, HIV/AIDS, Sickle Cell, Cancer, and the host of others. Although they knew some preventive measures, they did not learn them from the broadcast media.

Figure 5

Level of Stroke Preventive Knowledge Through Broadcast Media



Source: Primary data. Authors' analysis.

### **Proper Management of Health**

In the management of stroke, previous studies noted that conventional risk factors such as hypertension do not account for all stroke risks (Boehme et al., 2017; Donkor, 2018; Madsen et al., 2018; Zhang et al., 2019), and there is a growing body of evidence indicating the potential pathophysiological role of genetics in stroke (Hassan, 2000; Humphries & Morgan, 2004; Kuriakose & Xiao, 2020). Therefore, proper management of

stroke is the best form of prevention. This was attested by some of the informants. For instance, informant SPIF disclosed the following.

How to prevent stroke is to regularly conduct a checkup, through which one can quickly spot into any health challenge that could have and, in such a way, many health problems can be treated on time before it degenerates to a more serious health problem. (Informant SPIF)

In relation to this perception, Informant SP2M also revealed that, "Stroke is preventable if people who are hypertensive use their drug regularly and people who are not hypertensive should sleep on time and avoid keeping pressure in mind." As for informant SP12M, the best of managing stroke is to, "use drug regularly for those who have high blood and for those who did not have high blood they should less stress themselves."

In summary, heightened awareness of stroke risk factors is associated with better adherence to stroke prevention measures, whereas a lack of recognition of stroke warning signs significantly contributes to delays in seeking medical attention. Raising the awareness of both risk factors and warning signs is vital for effective stroke prevention and management.

## Oblivious of Stroke as Hereditary

Previous studies disclosed that an increase in media campaigns about stroke will create more knowledge of the issue (Lecouturier et al., 2010; Miyamatsu et al., 2012; Silver et al., 2003), which can translate to more stroke knowledge and reduce incorrect perceptions of stroke. This observation was substantiated by a significant number of informants who were unaware that stroke can be hereditary, thereby limiting their understanding of the preventive measures. Understanding the hereditary aspects of stroke is essential for individuals to make informed decisions regarding their health and take appropriate preventive actions, especially if they have a family history of stroke. According to Informant SPIF, "I do not know at all. Is only doctor who knows but I don't know". Attesting to the poor knowledge was Informant SP2M who copiously revealed:

"I don't know that, it is only doctor that can say being their profession, if asked whether is hereditary, my forbearers did not have it, neither my father none my mother has it, in fact, no one in my family has it" (Informant SP2M).

### **Erroneous Link of Stroke to High Blood Pressure**

Another prevalent misconception about stroke and related issues is the mistaken belief that high blood pressure is the sole cause of stroke, and that individuals with high blood pressure are the only ones at risk of experiencing a stroke. The submissions of many informants buttressed the claim. According to Informant SSIIM, on his perception about the cause of stroke, "I think people who have high blood." Strengthening this point,

Informant SP13F erroneously stressed that "Stroke is common to people with high blood". Corroborating this line of view, Informant SP1F also stated that "People who have high blood do have stroke."

Previous studies (Lackland et al., 2016; Oke & Bandele, 2004; Tonkin, 2004) have pointed out the persistent misconception that high blood pressure is the sole cause of stroke. Based on these findings, it is obvious that inadequate information about stroke, unlike other illnesses and diseases such as malaria, Ebola, and coronavirus, specifically from broadcast media, is a common challenge for most stroke patients and survivors.

### **CONCLUSION**

It is safe to conclude that a substantial number of informants, both stroke patients and survivors, had little knowledge about stroke. Stroke issues are not given as much attention in the media as other health challenges such as the covid-19 pandemic, Ebola, and malaria. Therefore, the informants' attitude towards broadcast media reporting on stroke was negative. Moreover, the findings suggest that, because there is low awareness about stroke, there is room for fabrications, myths, and speculations on stroke management. It is also deduced that many stroke cases may not have deteriorated to serious problems if there was adequate communication of information about stroke warning signs, preventive measures, and the right place to go when stroke finally occurs. Based on this, it can be concluded that the impact of broadcast media on preventive communication of stroke is discouraging as there is little awareness and, as a result, there is little knowledge of stroke, especially regarding warning symptoms.

Based on these findings, the paper recommends that broadcast journalists be more proactive in reporting stroke challenges and management. In addition, broadcast media should employ targeted campaigns for stroke awareness and management in developing countries with a high stroke prevalence. The findings of this study can inform follow-up research focusing on the development and evaluation of healthcare interventions specifically tailored to the needs and preferences of stroke survivors in Osun State. These interventions may include rehabilitation programs, psychological support, and access to specialized care. Similarly, the World Health Organization and other health agencies should intensify action in creating more awareness and education on stroke disease like other diseases such as rollback malaria, Action against HIV/AIDS, and Covid-19 in developing countries.

The experiences of stroke survivors in Osun State may inform the development of psychosocial theories that consider cultural, social, and economic factors affecting post-stroke adjustment and well-being. In addition, the study's findings may have implications for communication theories related to healthcare messaging and support,

as the experiences of stroke survivors can shed light on the effectiveness of communication strategies and channels in this context.

### **Author Contributions**

Conceptualization: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Data curation: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Funding acquisition: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Funding acquisition: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Methodology: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Methodology: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Project administration: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Resources: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Software: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Software: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Validation: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Writing – original draft: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L.; Writing – review & editing: I.Y.A., O.S., R.M.A., P.U., S.A.Y., A.A.-S., & A.L. All the authors have read and agreed to the published version of the manuscript.

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### **Institutional Review Board Statement**

This study was approved by the Department of Mass Communication, University of Ilorin, Ilorin, Nigeria.

## **Informed Consent Statement**

Informed consent was obtained before the informants answered the interview for this study.

### **Data Availability Statement**

The data presented in this study are available upon request from the corresponding author. The data are not publicly available because of the institution's policies.

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### **Conflicts of Interest**

The authors declare that they have no conflicts of interest.

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