https://dx.doi.org/10.4314/ijcrh.v29i1.19

International Journal of Current Research in the Humanities (IJCRH)
No. 29 2025 (P-ISSN: 0855-9740) (E-ISSN: 2773-837X)

Use of Artificial Intelligence for Reporting and Editing Functions in the Newsroom

Ibituru Iwowari Pepple
Department of Journalism and Media Studies,
Faculty of Humanities, Federal University Otuoke, Bayelsa State
Email: peppleibituru@gmail.com
ORCID: https://orcid.org/0000-0002-3580-053X

Abstract

News gathering and reporting which is seen as a very herculean task by reporters and news editors has taken a new dimension with the application of AI tools. Thus, this work x-rays how Radio Rivers FM, 99.1 is using AI tools to support its news gathering initiatives and editing functions in the news room. Three objectives and three research questions were used to guide the study. The in-depth-interview technique was most suitable for the study, the population of the study are 50 reporters in the news room, while The diffusion of innovations theory is the main theoretical framework that guided and directed this work. Findings shows that AI is effective, efficient and much more productive and satisfying in terms of job performance and result oriented but the constant use of AI tools would hamper practice as laziness will ensue in terms of job performance and delivery. Thus, the study recommended that reporters and editors must be trained on the effective use of AI tools for reporting and editing functions in the news rooms. It also recommended that news rooms need to be equipped with the latest technology, such as AI compliant tools for effective, efficient and satisfying work performance. Management of Radio Rivers should train and retrain reporters and editors on the effective use of AI tools for reporting and editing in the news room.

Keywords: Artificial intelligence, Editing, Gathering, News room, Reporting.

Introduction

Artificial Intelligence (AI) has transformed nearly every industry, including the journalism profession. From automating mundane tasks to enhancing investigative reporting, AI is streamlining newsroom operations by automating routine duties such as content tagging, social media scheduling, and audience analysis. AI-powered insights help media organizations improve and optimize their operations, maximize audience engagements, and improve content distribution strategies. As technologies evolve, the way information is created, disseminated, and consumed is also changing dramatically the communication landscape, (Shadrach & Adikuru, 2023). Also, Ezeali, Nwodu &Udoh, (2023) further state that Communication networks have also experienced tremendous change with the aid of AI.

Artificial intelligence (AI) refers to the simulation of human intelligence in machines programmed to think and learn like humans. This encompasses various

technologies, including machine learning, natural language processing, computer vision, and robotics (Russell & Norvig, 2016). Indora and Singh(2024) defined AI as the ability of machine to perform complex tasks that humans can do such as reasoning, learning and problem solving. To be more precise, it is the stimulation of human intelligence in machine that are programmed to think and learn like humans.

According to Prato (2024), artificial intelligence is revolutionizing industries worldwide, and journalism is no exception. News organizations are integrating AI tools like KlaraIndernach (Express.de) and AI-powered transcription services to combine technology's efficiency with human creativity. These innovations streamline workflows, enhance personalization, and open new avenues for reader engagement, fact-checking, and interactive content." Buttressing this, Indernash opines that the capabilities include; structuring texts, conducting extensive research, and summarizing vast information swiftly. This significantly improves the efficiency of content creation, especially for predictable topics like sports reports. By integrating specialized AI models for topics requiring in-depth expertise,

Over the last decade, AI has been so prevalent in mass media and news agency newsroom that it has now transformed Journalism and mass media into a business model with tiring work routines and unleashing flood of information which can be evenly managed by the development of AI. It assists the collection, production and distribution of news (Nandini, Ind) ora & Singh, 2024, p.1). Thus, Biswal, and Gouda, (2020) state that the feature of automated reporting in journalism assists the newsroom by creating news articles based on certain details which frees up the journalists from their regular work and also freeing them up from their jobs. Buttressing this, Prato (2024) posits that news organizations are integrating AI tools and AI-powered transcription services to combine technology's efficiency with human creativity. According to Crespo and Pinto-Martinho, (2021), with the advancement of Information and Communication Technology (ICTs), news media industries have evolved beyond measures.

Thus, newsrooms are gradually adopting the AI technology for its production and distributions which makes for ease of practicing journalism, and makes the duties of the journalist in the newsroom less cumbersome. In broadcasting, AI can be utilized to automate processes, analyse audience data, and enhance content creation and delivery. The integration of artificial intelligence (AI) into various sectors has prompted transformative changes in how information is disseminated, analysed, and utilized (Ezeaka & Umennebuaku, 2024). Hence, the thrust of the study, which is the use of AI mediated tools for Reporting and Editing Functions in the News Room.

Statement of the Problem

The introduction of AI assisted work tools is gradually removing originality and the use of initiatives for job performances. This trap fascinates everyone and may provide journalists with great ideas but will not enable them think diversely or make their perspectives broad, but will limit their ability to think constructively and imaginatively. Though, AI can also make journalists work more efficiently, freeing them up from some repetitive or routine tasks, it can at the same time, give rise to a lot of questions and debates about the quality of the outputs created by AI. Therefore, despite the many advantages AI provides for journalism practice, the question now

is, are journalists in Radio Rivers utilizing AI mediated tools for their reporting and editing functions in the news room?

Objectives of the Study

The study sought to;

1. Find out if reporters in Radio Rivers are exposed to the use of AI mediated tools in the newsroom.
2. Investigate whether reporters in Radio Rivers use AI mediated tools for their reporting and editing functions in the newsroom
3. Ascertain the perception of reporters of Radio Rivers on the use of AI mediated tools for their reporting and editing functions in the newsroom

Literature Review

The adoption of Artificial Intelligence provides a wide range of benefits to mass media organizations and news agencies, whilst at the same time introducing changes on the function of journalists in the production of contents in the newsroom. The feature of automated reporting in journalism assists the newsroom by creating news articles based on certain details which frees up the journalists from their regular work and also freeing them up from their jobs. The algorithm of machine learning makes the AI aware about the audience's preferences and then shows the content on their feed according to their personalized choices. Another algorithm of Generative AI makes Artificial Intelligence produce and create its own photos, videos and audios based on the large datasets it has collected or it has been trained on. [Jones, Luger, & Jones, 2023] Their substitution in carrying out certain activities, and interaction with the audience (Gomez-Diago, 2022). Artificial Intelligence provides tools for the codification of tasks and routines in algorithms, creating outputs similar to those produced by humans (Túñez- López, Toural-Bran & Cacheiro-Requeijo, 2018). One of the most promising fields refers to the automatic production of content.

This is already possible in areas based on structured data, such as sports results, and financial earnings. AI technologies can generate real-time captions for broadcasts, making content more accessible to individuals with hearing impairments (Baker & O'Connor, 2020). Additionally, AI tools can assist journalists in producing content more efficiently. Natural language processing (NLP) technologies enable automated writing, allowing news organizations to generate reports quickly based on data inputs. For example, sports results and financial updates can be automatically written and published, freeing journalists to focus on in depth reporting and storytelling (Lau & Tham, 2020).

Although the notion of AI is attributed directly to Alan Turing (Salazar, 2018), the term was coined by John McCarthy, Marvin Minsky, Claude Shannon and Nathan Rochester in the 50's. At that time, AI was defined as the science of making a machine behave "in ways that would be called intelligent if a human were so behaving" (Russell &Norvig 2019). According to Beckett, AI encompasses a collection of ideas, technologies, and techniques related to the ability of computer systems or software to perform tasks that normally require human intelligence (2019). To fulfil those tasks, these cognitive technologies make use of two basic attributes: a) autonomy, and b) the capacity to learn from experience. Since it appears to mimic human "intelligence," the adoption of AI provokes distrust and hostility. And as a consequence of the openness and ambiguity of the term, its introduction gives rise to more doubts than certainties.

Furthermore, the umbrella of AI covers such subfields as machine learning, supervised learning, unsupervised learning, natural language generation (NLG) or natural language processing (NLP). All of them, though referred to as "AI," draw on different attributes and show different capacities. The complexity associated with the conceptual definition of AI is reflected in the variety of terms used to address the phenomenon in journalism. For instance, when it comes to content generation, where content is produced automatically by an algorithm, it is usually referred as "automated journalism" (Caswell & Dörr, 2018; Graefe, 2016; Lindén, 2017; Napoli, 2012) or "algorithm journalism" (Dörr, 2016; Diakopoulos, 2014). This is defined as:

"the (semi)- automated process of natural language generation by the selection of electronic data from private or public databases (input), the assignment of relevance of pre-selected or non- selected data characteristics, the processing and structuring of the relevant data sets to a semantic structure (throughput), and the publishing of the final text on an online or offline platform with a certain reach (output)" (Dörr, 2016, p. 412).

However, we also find other terms (Manfredi-Sánchez &Ufarte-Ruiz, 2020), and the likelihood of these tools eroding ethical principles and the core values of journalism (Ufarte-Ruiz, Calvo-Rubio & Murcia-Verdú, 2021). Therefore, despite the many advantages AI provides to journalism, the phenomenon should be approached "through the balance between the business perspective (profitability) and the human perspective (social and perceptive)" (Segarra-Saavedra, Cristòfol & Martínez-Sala, 2019). Given this framework, the article has contributed to the discussions around the adoption of AI mediated tools in mass media newsrooms, identifying different points of view, attitudes towards the technology and perspectives regarding its application.

Creation of Radio Rivers 99.1.FM

Following the entry of the military into the country's political arena on 15 January 1966, and on 27 May 1967, the then government of General Yakubu Gowon abolished the regional structure of the administration of the country in favour of states, Sika (2010). As noted earlier, in 1973 the ownership and management of the NBC stations located in the states were transferred to the state governments. One of such stations, which was located in Port Harcourt, was ceded to the Rivers State Government. It was this station that became known as the Rivers State Broadcasting Corporation (RSBC), the parent body of *Radio Rivers*. In order to formalise its complete take-over by the state, the Rivers State Government promulgated Edict No. 8 of 1973 on 24 May 1973 establishing the Rivers State Broadcasting Corporation (RSBC Edict, No. 8, 1973).

Radio Rivers began transmission on 630 kilohertz and 476 meters on the amplitude modulation (A.M) band in 1973 at the premises of the defunct NBC in the city of Port Harcourt, and in 1981 opened a second station transmitting on 99.12 megahertz on the frequency modulation (F.M.) band. The A.M studios of the station, were dedicated to grassroots broadcasting, while the F.M studios were more of an entertainment station (*Radio Rivers* Dairy, 1982). Today, *Radio Rivers* operates only as an F.M station, as the A.M station has since closed down with the FM station inheriting some of the AM programmes which includes the "news in languages".

Empirical Review

Al-Zoubi, Ahmad and Norsiah (2024), conducted a study on Artificial Intelligence in Newsrooms: Ethical Challenges Facing Journalists. The study states that the development of new and updated technology has invented new terms in Journalism referred as Automated Journalism and Robot Reporters. These terms are now emerging as an integral part of new Journalism and also transforming the form of Journalism. The research paper expansion and spread of its adoption among journalists. The ethical challenges of AI systems have become a concern among journalists. Therefore, this research is guided by the relationship between

technological development and media ethics as the philosophical study of morality, specifically the Social Responsibility Theory. This study adopts a qualitative approach to explore the ethical challenges of AI faced by journalists. In-depth interviews were conducted with 14 journalists working in the newsroom of a government-affiliated channel, Al Mamlaka TV in Jordan. Data obtained from interviews conducted were analysed thematically. The results concluded that the main ethical challenges faced by journalists in the newsroom in adopting AI are data bias; privacy violations; and the absence of legislation and international regulations regarding the use of AI in journalism. The study concludes that journalists at Al Mamlaka TV adhere to the basics of Social Responsibility Theory through their critical adoption of AI in the newsroom.

Theoretical Orientation

The theory relevant for this study is the diffusion of innovation theory.

Diffusion of Innovation Theory

The Diffusion of innovations theory is the main theoretical framework that guided and directed this work. The theory as propounded by Everett Rogers in 1945 has its basic concept as "innovation". Rogers (2003, p.5) defined diffusion as "the process in which an innovation is communicated through certain channels over time among the members of a social system. It is a special type of communication, in that the messages are concerned with new ideas." An innovation is an idea, practice or object perceived as new by an individual. It matters little, so far as human behaviour is concerned, whether or not an idea is objectively new as measured by the lapse of time since its first use or discovery. It is the perceived or objective newness of the idea for the individual that determines his reaction to it. If the idea seems new to the individual, it is an innovation, (Defleur 2010). According to Richante (2009), the diffusion of innovations has remained the primary reference point in diffusion research (since the 40s) particularly in the fields of rural sociology and communication for the purposes of understanding the nature of adoption or rejection of innovations in rural settings. He further stated that diffusion is simply the process in which information about new ideas or inventions is communicated to members of a social system using the most effective channels, with a view to affecting behavioural change

Daramola (2003), opined that the media have a crucial role to play in the process of diffusion of innovation because they create awareness among a large number of people at the same time. Daramola, opined further that the diffusion of innovation theory is a theory that seeks to disseminate information about new discoveries to the masses of a social set-up, certain factors like; lack of mass media, lack of access to the media systems, the code (language) of the mass media that hinders the effectiveness of the role of the media in the diffusion of innovation process. Therefore, the rationale for using Rogers' Diffusion of Innovations as the theoretical framework for this study is to focus on Reporters in Radio Rivers newsroom as the adopters of AI mediated tools and their adoption decisions. This research work examined if the diffusion of AI tools among reporters in the Radio Rivers newsroom have been influenced by the perceived attributes of innovation as described by Rogers

(2003) with an attempt to evaluate the suitability of these attributes and how the reporters described them. Both the reporters and AI are two important factors and perspectives that are combined with diffusion theory and use of AI for reporting and editing functions in the newsroom to provide understandings of how the reporters in Radio Rivers use AI for their information needs and work.

Methodology

The in-Depth-Interview (IDI) technique was thought to be most suitable for this study. There are numerous advantages associated with using this technique, one of which is that it allows participants to participate fully in the process of facts finding (Seidu et.al(2015) as cited in Anyadike, Olemadi & Odoemelam, 2015, P. 20). 50 Reporters in the News Department of Radio Rivers constituted the population of the study, according to the Head of Administration. Thus, Ohaja (2003, p.75), opined that" the population for a study refers to all those persons or things that fall under the umbrella of the topic or that can be examined to address the research problem or meet the research objectives" Hence, the purposive sampling technique was considered as appropriate and a qualitative data analysis approach was adopted for the study due to its nature.

Data Presentation and Analysis

This section presents an analysis of the qualitative information collected during the interview sessions with the reporters in the News Department of Radio Rivers. In the analyses, the researcher tried to make sense out of the responses of the participants. This entailed searching for similar patterns of thinking that is within the bounds of the questions asked in the qualitative analysis of the various answers given by respondents at the interview sessions as the researcher used a constant comparison method which involved the probing for common words, phrases and concepts in the responses of the interviewees. Secondly, the respondent's responses were then contrasted and categorized carefully in line with the various themes identified and highlighted in the research objectives. The researcher, evolved three groups of 15, 15, and 20 reporters respectively in the Newsroom, the same questions were asked for easy interview sessions. The respondents were simply identified by random letters, as codes, to ensure that the anonymity of the interviewees is maintained, which is an ethical principle in social science research.

Are Reporters in Radio Rivers Exposed to the Use of AI-Mediated Tools in the Newsroom?

The interviewees in the three groups evaluated the exposure of reporters to AI mediated tools in the news room. The focus was to assess reporters' exposure to AI mediated tools in the news room. The participants sought to affirm the exposure of various reporters to AI mediated tools in the newsroom, especially in their reporting activities. In responding to the exposure of reporters to AI, IDI AI contends that reporters are exposed to AI mediated tools in the news room. He stressed as follows: "the newsroom is internet friendly and certified as we do more of our work with computer system with AI software installed for us in the system" IDI A1. The other

interviewees echoed his thoughts above on the exposure of reporters to AI. An interviewee in IDI A2 particularly made reference to the fact that the newsroom is up to date on ICT and always internet ready and with recent software upgrade. According to interviewees: "We get real time on the spot messages as the events happen or breaking news" IDIB2 "Editing is now much easier as our staff are now trained to be able to use AI-mediated tools due to software upgrade in the newsroom" IDI C1 "Weather reports, sports and routine topics are easily generated for commentaries and other newsroom functions" IDI A1

Use of AI-Mediated Tools in Reporting and Editing Function

The interviewees in the interview sessions generally agreed that the AI tools are used by reporters in reporting and editing functions. They further contend that lesser time is spent on production of news bulletin unlike some years back when they spend countless time trying to produce bulletins. Some respondents contend as follows: "without AI tools in the newsroom, work would have been difficult as the system is now much better than it was, AI is a great relief" IDI A5 "In recent time, we have been using AI tools for our news reporting and editing functions – now we can even edit with our phones" IDI B6

How Reporters Perceive the use of AI-Mediated Tools in Reporting and Editing Function in the Newsroom

Respondents in the various groups answered on how they perceive the use of AI in reporting and editing in the newsroom. The consensus of opinions from the interviewees weighed heavily on the side of poor perception by reporters. The participants contend that reporters perceive the use of AI in reporting and editing as less effective. This is because issues relating to the use of AI is not effectively managed as most reporters are not trained. Most of the reporters who use AI tools were self-trained. The various views and positions of the participants in the three groups are summarized as follows: "It appears to me that, our management even though they know the importance of AI in the newsroom, have paid deaf ears to trainings" IDI C7 "Programmes bordering on AI and its usage in the newsroom as far as Radio Rivers is concerned is not that effective because most reporters and editors are not compliant and yet to be trained" IDI B8 "the call by management of Radio Rivers for all reporters to be compliant has not changed positively how reporters and editors perceive AI tools because of lack of training" IDI A10 A good number of interviewees emphasized that there should be a general training for all reporters and editors on the use of the AI. Their views are as follows: "in the journalism profession, trainings and re-training is key, because we need to be tuned to current realities" IDI A4 "we have been telling management that we need training, particularly on AI, but they have not listened to us, it is important that they do so" IDI C10

Discussion of Findings

The findings of this study are discussed under the following broad headings:

1) Reporters exposure to AI mediated tools in the newsroom.

The responses to the above question shows that reporters are exposed to the use of Artificial Intelligence tools in the newsroom for reporting and editing functions. They alluded to the fact that AI has made work easier and more interesting than before. The finding is in line with the study of Turez-Lopez, Toural-Brian and Cacharo-Reghijo (2018) that Artificial Intelligence provides tools for the codification of tasks and routines in algorithms, creating outputs similar to those produced by humans to the ability of computer systems or software to perform tasks that normally require human intelligence

2) Reporters in Radio Rivers use of AI mediated tools in their reporting and editing functions in the Newsroom

The staff of the newsroom all said yes, but they make use of heavy data in surfing for materials for sports reports, weather reports and topic generation for commentary writing which is now much more easier and their job made simple as working is much better with the use of AI tools for reporting and editing rather than manual work checks with dictionary. This corroborates Beckett (2019) who states that AI encompasses a collection of ideas, technologies and techniques related.

3) Perception of Reporters of Radio Rivers on the use of AI mediated tools for reporting and editing in the newsroom

The general perception of the reporters and desk editors is a call to Management of the media organisation for training on AI use, as reporters are not trained. This perception is in line with the thought of Tejedor et al (2020) that the emergence of AI technologies has opened the door to journalistic work for a new technological revolution globally, news rooms are adopting the AI technology for the production and distribution process which makes significant impact on the jobs in the journalism and media sector, hence the need for training on the use of AI for Radio Rivers reporters and editors. They agree that the AI tools are effective, efficient and much more productive and satisfying in terms of job performance and results but insisted that reporters and editors must be trained on the effective use of AI tools.

Conclusion and Recommendations

The use of AI mediated tools have facilitated the ease with which news gathering, reporting and editing is carried out in the news room. So much is achieved within a short while and man hour is saved rather than wasted with the use of AI mediated tools This innovation, now demands for news managers to train and retrain their reporters and editors for optimal performance to meet up with global best practices. Based on the findings of this study, it is recommended that:

1. Since technology has evolved with the use of Artificial Intelligence, broadcast station managers should train and retrain their staff to be in tune with current realities on ground.
2. News rooms need to be equipped with the latest technology, such as AI mediated tools for effective, efficient and satisfying work performance in the news room.
3. Managers of broadcast stations should ensure that their reporters and news editors are information technology compliant to meet up with the realities of the use of AI for news gathering, reporting and editing functions in the news room.

References

Al-Zoubi, O, Ahmad, N. & Norsiah, A. H. (2024) conducted a study on Artificial Intelligence in Newsrooms: Ethical Challenges Facing Journalists. Studies in Media and Communication, *12*(1) doi:10.11114/smc.v12i1.6587

Anyadike, D., Olemadi, C. & Odoemelam, C. (2015) *Local Dialect Radio Programmes, Rural Development and Social Integration:* The Case of *Nsukka Alua*, Radio Nigeria, Enugu Programme. *Mediterranean Journal of Social Sciences, vol. 6, Rome-Italy: MCSER Publishing,*

Baker, S., & O'Connor, P. (2020). AI for accessibility: Enhancing media for the hearing impaired. Media, Culture & Society, 42(4), 593-605.

Crespo, M., & Pinto-Martinho, A. (2021). AI and Journalism, Robot Journalism and Algorithms. About the project, 105.

Ezeaka, N. B. & Umennebuaku, V. A. (2024). Development Communication in the Artificial Intelligence (AI) Era: Navigating Cultural Complexity and Technological advancements. African Journal of Culture, History, Religion and Traditions. 7(3), 98-107. DOI: 10.52589/AJCHRTHQCS2XJ7

Ezeaka, N.B. (2019). Information Diffusion and Utilization of Undergraduates 'Drug Free Clubs' against drug trafficking in Anambra State. Higher Education of Social Science 17(1) 26

Ezeali, C. T., Nwodu, G. E. & Udoh, W. A. (2023). Effectiveness of mobile telecommunication networks (MTN), corporate social responsibility in the development of education in Enugu state, Nigeria. imsujcs.com/Journals

Indora, P and Singh, R.K. (2024) Artificial Intelligence in Journalism: An Overview of its Applications and Uses. Journal of Communication and Management;3(3):237-242 DOI: 10.58966/JCM2024337

Lau, R., & Tham, J. (2020). The automation of news: How AI is transforming journalism. Journalism Studies, 21(2), 218-235.

Mefalopulous, P. (2008). *Development communication sourcebook: Broadening the boundaries of communication*. Washington, D.C: The World Bank.

Noain-Sánchez, A. (2022). Addressing the Impact of Artificial Intelligence on Journalism: the perception of experts, journalists and academics. *Communication & Society*, 35(3), 105-12

Ohaja E. (2003). *Mass communication research and project report writing*. Lagos: John Letterman Ltd.

Owuamalam, E.O. (2012), *Data Analysis and Research Project Writing,* Owerri: Top Class Agencies Ltd and Image and Slogans Consultants Ltd.

Prato, C. (2024) 12 Ways Journalists Use AI Tools in the Newsroom https://www.twipemobile.com/12-ways-journalists-use-ai-tools-in-the-newsroom/

Rishante, J. (2011) *Analysis of Knowledge, Attitudes and Practices (KAP) in Relation to Diffusion of Innovations in Rural Nigerian Communities (Part 1)* in Wilson D. (ed) Communication for Social Change and Development. Uyo, BSM Resources Nig Ltd.

Russell, S., & Norvig, P. (2016). Artificial Intelligence: A Modern Approach (3rd ed.). Pearson

Shadrach, Idi & Adikuru C. C. (2023). Assessment of Adoption and Practice of Citizen Journalism Among Women in North-East Nigeria. Gender and Society, Journal of Centre for Gender and Women Studies, Alex Ekwueme Federal University NdufuAlike (AE-FUNAI). Vol. 1 Pp 28-41. (Online)

Sika, B. (2010). History of Radio Rivers. Gabis Press Limited.

Tejedor, S., & Vila, P. (2021). Exo journalism: A conceptual approach to a hybrid formula between journalism and Artificial Intelligence. *Journalism and Media*, 2(4), 830-840. https://doi.org/10.3390/journalmedia2040048

Túñez-López, J. M., Fieiras-Ceide, C., & Vaz-Álvarez, M. (2021). Impact of Artificial Intelligence on Journalism: transformations in the company, products, contents and professional profile. *Communication & society*, 34(1), 177-193.

Ufarte Ruiz, M. J.; Calvo Rubio, L. M. & Murcia Verdú, F. J. (2021). Los desafíos éticos del periodismo en la era de la inteligencia artificial. *Estudios sobre el Mensaje Periodístico, 27* (2), 673-684. https://www.doi.org/10.5209/esmp.