

RESEARCH ARTICLE

Graffiti and new media: Leveraging technology to advance creativity and learning in Nigeria

Patrick Edem Okon^{1*} Okon Effiong Udoyo¹ Leonard Odum Ojorgu¹

¹ Department of Mass Communication, Faculty of Arts, University of Calabar, Calabar, Nigeria



Correspondence to: Patrick Edem Okon, Department of Mass Communication, Faculty of Arts, University of Calabar, Calabar, Nigeria; E-mail: patrick.okon@unical.edu.ng

Received: July 10, 2023; Accepted: October 1, 2023; Published: October 6, 2023.

Citation: Okon, P. E., Udoyo, O. E., & Ojorgu, L. O. (2023). Graffiti and new media: Leveraging technology to advance creativity and learning in Nigeria. *International Journal of Arts and Humanities*, 4(1), 166-180. https://doi.org/10.25082/IJAH.2023.01.005

Copyright: © 2023 Patrick Edem Okon *et al.* This is an open access article distributed under the terms of the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited.



Abstract: The paper explored the relationship between graffiti and new media, with specific focus on the effect of new media appropriation on the growth of graffiti writing in Nigeria. Qualitative research design and methodologies were used. The theory of technological determinism provided the conceptual directions. Findings showed that graffiti artists were increasingly active on social media; and, used social media for different purposes, including graffiti-based artistic activities. While a wide range of social media were used, only Instagram was the most preferred, because of its unique technical qualities. The engagements of graffiti artists with new media were, in varying ways, bearing innovative and socio-cultural benefits. Apart from providing opportunities for the showcasing of talents or the digital documentation of graffiti, the interface had also allowed for improved artistic creativity, through the placements of graffiti arts unto virtual spaces as Non-Fundable Token Arts (NFTs), as well as the education of young adults online/offline on graffiti arts. Also, in order to mitigate the low status of public awareness on graffiti in Nigeria, graffiti artists should heighten their engagements with social media to popularize the practice in its contextual form; and, the placements of graffiti arts on NFT panels should be seen as a step in the right direction, towards the preservation of graffiti arts for posterity.

Keywords: graffiti, civil learning, new media, Nigeria

1 Introduction

New media's emergence in the 1980s within the context of the Information and Communication Technology's (ICT) revolution, has borne enormous consequences across disciplines and industrial practices. The creative media industries are no exception to the recognizable effect of the continuing appropriation of these new technologies. The broader graffiti writing community, in particular, is also increasingly leveraging on and being affected, either positively or negatively, by new media, to improve its creativity and artistic outputs, as well as to engage with the 'reading' publics for the purpose of learning in newly constructed virtual or web environments.

As alternative channels, through which disenfranchised individuals and marginalized groups represent themselves and their activities, express their views and make their protest voices heard, the integration of new media into the practice of graffiti expression in contemporary times, it is argued, is improving the quality of the writing and making social connections and the dissemination of messages broader and faster than before. Thus, new media is today intensifying the democratization of the communities of graffiti writers and improving the quality of graffiti experience to satisfy the communication and learning needs of a wider range of graffiti readers/viewers.

As noted by Keçeci (2021), on the one hand, it is both the sustainability of the artistic work and its message as well as the purpose of reaching out to the whole world that makes new media a suitable communicating aid for graffiti artists. Baird (2022), on the other hand, argues that while a number of tangible benefits accrue from the use of social media by graffiti artists, it is more significantly the sense of 'community', that is, "the physical social interaction afforded by participation in real world graffiti crews" (p. 1) that makes new media vital to the wellbeing and continuity of graffiti culture.

In view of the increasing relevance of new media vis-à-vis graffiti writing today, this paper investigates how new media (digital and social) is being used within the graffiti writing community in Nigeria, to improve creativity and strengthen learning across different settings. The study examines the functional connection between new media and graffiti writing on the one hand; and social media interactivity among young graffiti writers and their active offline civic education, on the other hand. Understanding how social media fosters participation in graffiti writing (online or offline) and civic learning through graffiti writing, it is argued, is

very significant for assessing how modern communication technologies could affect youth's empowerment, generally. Through a qualitative method of investigation and analysis, this study contributes to scholarship on graffiti culture by offering a discussion on how new media affects the conceptualization, creative quality, reach, dissemination of messages and learning by way of graffiti writing in Nigeria. The objectives of this paper, therefore, include the following:

- (1) Streamlining the level of new media leveraging in graffiti writing in Nigeria;
- (2) Identifying the kind(s) of new media forms and formats that are mostly used by graffiti writers in Nigeria;
- (3) Specifying the ways (and manners) new media appropriation affects graffiti writing in Nigeria;
- (4) Highlighting how the integration of new media into graffiti writing improves learning across different social settings in Nigeria.

1.1 Theoretical framework

The theory of 'technological determinism' is drawn upon to guide and shape the conceptual direction of this paper. First coined within the socioeconomic field by Thorstein Veblen (1857-1929), the term 'determinism' became later associated with technological progress vis-à-vis socioeconomic and cultural developments by Karl Marx, Marshall McLuhan and a host of other theorists and philosophers. The theory of technological determinism, with its multi-forms ('hard' or 'soft'), centrally assumes that "a society's technology progresses by following its own internal logic of efficiency, while determining the development of the social structure and cultural values" (Héder, 2021). The theory understands that it is technology that shapes social changes and determines the future of human societies (Singh, 2023).

The Internet and social media are some of the most disruptive technologies that have revolutionized the human experience in the last couple of years. With the invention of the new media, according to technological determinism, social change and the reinvention of human history were the inevitable processes. While new media now allows access to a wide range of communication materials (street arts, pictures, music, movies, printed texts, etc.), it also enables instant multimedia communication with millions of distant people across the globe. Additionally, the emergence of new media has facilitated the constitution of what Anderson (1983) once described as "imagined communities"; that is, cohesive societies that are virtual and different from the traditional nation-states in which human affairs are organized in tribal terms. In these imagined communities, members are naturally dispersed and most members will never meet each other. Members are, however, united with common languages and cultures through the technologies of new media (Singh, 2023).

Though critiqued, among others, for its reductionist tendency whereby complex and multilayered changes in societies are explained only in terms of technology without a consideration of other factors and its bent towards underplaying the importance of human free will in deciding how to use technology (Singh, 2023), the theory of technological determinism is still considered valuable to this study on the following grounds: its ability to explain the importance of technological changes down through human history and creative processes; its provision of a theoretical explanation for understanding the evolution of all human societies and activities; and its adaptability to recognizing the special role of digital and social media in the packaging or repackaging of creative skills (especially graffiti writing skills), the construction and sustenance of virtual graffiti communities with shared cultures for the purpose of broader social interactions among graffiti writers and the quick global distribution of mediated knowledge about graffiti arts, artists and communities.

1.2 Graffiti as subculture and art

Graffiti writing is "as old as human civilization" (Lannert, 2015: 47). While its earliest forms were identified with the creative writings of the early caves' men (Ganz, 2021; Okon et al., 2023), its modern manifestations began with the inner-city gang 'tagging' activities and hip-hop writing subcultures of the New York city in the 1960s and early-1970s (McCollum, 2019). Since then and over the decades, graffiti writing has developed and gradually spread across the different world regions for a variety of purposes (Curry & Decker, 2020). And, with the eventual introduction of some of these radical artistic writings into some art galleries and museums in the Anglo-American cities, the way was gradually paved for graffiti writing to be considered as an art form in its own right. Scholars (Ganz, 2021; Graffiti, 2023; Simbirtseva & Porozov, 2019) are, however, of the view that it is the emergence of the Internet, social media and online graffiti blogs that has today propelled graffiti's monumental presence and publicity on the world stage. In this regard, graffiti writing may be considered both as an art and a subculture.

As an art, graffiti is simply referred to by the artists as 'writing'. The art form has a lot of affinity with the *hip hop* culture that picked up in the 1970s, as *hip hop's* visual component

(McCollum, 2019). In this regard, graffiti was seen for decades as an element of *hip hop* that predates the dance scene itself. But, just like the *hip-hop* chest-thumping music and gravity-defying dance, graffiti has blended well a number of stylized artistic writing elements to become a *culture* – "a means for seeing, contemplating, celebrating, experiencing, understanding, confronting, and commenting on life and the world" (www.kennedy-center.org).

In view of this, graffiti arts, therefore, function alongside other alternative art forms as a means of cultural expression. They engage in storytelling, using a specific stylized language that requires interpretation by writers and viewers. According to Aguilar-Garcia (2022), whether or not graffiti communicate understandable messages, basically they do provide a *voice* for the voiceless and effective avenues for people to express their ideas, feelings and thoughts, that ordinarily would not have been expressed within the mainstream. Like the other alternative media forms, graffiti and the subculture that produced and promoted them also express resistance to the dominant positions of the mainstream. They are not separated from the mainstream of the community, even when it opposes and struggles against it (McCracken, 2002; cited in IvyPanda, 2019). They are essential for the expression of identity and frustrations by the artists and for honouring their culture and preserving their history.

But as a subculture, graffiti writing is distinguishable from other subcultures and the dominant culture under or alongside which it exists. Subculture conceptualizes "a category of people who share distinguishing attributes, beliefs, values, and/or norms that set them apart in some significant manner from the dominant culture" (Asali, 2023). The phenomenon is constituted by a people within a wider society, who share common values and norms and are organized around shared interests and practices. Graffiti writers are, therefore, not just a group of rascals and vandals, they have identifying cultural characteristics, bigger political end goal and practice criteria; and, hence, create a sense of identity for themselves (Asali, 2023; Lannert, 2015). It is the search for *voice* and identity, according to MacDonald (2016), that generally drives members of the subculture in their careers as creative 'writers'. It is not just about the fame or the financial gain that comes with graffiti writing, what matters most is the message communicated, the social bond created, and the respect received from viewers.

While the internal social dynamics of the subculture are not strictly defined by delinquency, generally, it is their mode of emergence and places of display that provoke favourable or unfavourable reactions within societies and the level of accommodation societies are willing to offer (Lannert, 2015). Sometimes, in a largely multiracial and multiethnic societies, the question of race could also affect public appreciation of graffiti (Soergel, 2021). Wilson and Kelling's (1982) "broken windows theory" of crime and urban decline, whereby graffiti writing is often seen as contributive toward increase in smaller-scale urban disorder, could also provide pathways for anti-graffiti measures.

While the conceptualization of graffiti writing as a subculture has now, generally, been recognized and accepted both within the creative industries and in the academia, their perception and acceptance as an art form has remained controversial for years. That is because, in a number of societies, graffiti writing is still linked to crime against public or private property as opposed to art (Lannert, 2015). This controversy, literature review shows, is consequent upon the enduring tension in the framing of graffiti writers as members of deviant or delinquent group(s) and the reading of graffiti writing either as vandalism or as expressive of legitimate artistic practice.

Regardless of the differences in scholarly viewpoints, this paper approaches graffiti writing as a legitimate art form, and not as a criminal activity. Because graffiti writing could today be seen and accepted in a number of quarters as a legitimate public art, many legal spaces and walls are also being created today across communities (especially schools) to enable graffiti writers practice their trade without fear of any backlash. This development, it is argued, has further empowered a number of graffiti writers across the world and strengthened their writing commitments. In this regard, it is not uncommon today for graffiti writers to move on from either illegal tagging or legal graffiti writing to formal mural art or to put their graffiti-inspired work in galleries and social media. This is a further proof of the increasing appreciation of graffiti writing as a legitimate art.

Additionally, graffiti movements and communities are increasingly evolving across societies to enable members of the subcultural group to distinguish themselves and to strengthen social interactions among graffiti writers, new entrants, mentors, and audiences. Consequently, some graffiti writers have moved away from the more traditional graffiti writing methods to embrace other complementary forms, including new media forms, that could broaden, not only their subcultural interests, practice norms and values, but also the visibility of their artworks, movements and communities (Soergel, 2021; Graffiti, 2023).

Lannert (2015), accordingly, identifies the different graffiti writing communities that have evolved over the years to include 'graffiti artist', 'gang graffiti', 'immediate graffiti', 'ethnic

neighbourhood graffiti', and 'street art'. Graffiti artists "value style, motivation, and inaccessible locations" (2015: 49). Ethnic neighbourhood graffiti are found in locations with large ethnic diversity and social tensions resulting from the sociocultural composition of the neighbourhood. While 'gang graffiti' represents territorial demarcations or an individual's gang affiliation, through symbolic expressions directed at other or rival gang members, 'immediate graffiti' community are randomly found in some private areas like toilet and bathroom walls and a few public areas with low visibility.

Regardless of the kind of graffiti writing community graffiti artists belong, the adoption of new media technologies to broaden social connections across groups, advance the visibility of graffiti artworks and community dynamics on a global scale, as well as improve creative writing skills is gradually becoming a global and intergroup phenomenon, bringing to an unimaginable realization of Anderson's (1983) "imagined communities"; those cohesive virtual societies that are different from the traditional nation-states and where human affairs are organized by members in cultural terms. The increasing leveraging of new media to advance community, creativity and learning in contexts and the resultant heightened development of virtual communities of graffiti artists, it is argued, is worth being recognized and investigated, particularly in relation to the Nigerian society.

1.3 Graffiti writing and new media

The connection between graffiti and new media is now a growing phenomenon. A number of authors have also, in varying ways, shown how the connection should be understood. Scholars define new media in varying ways; and, in literature, new media is studied using different approaches: the message, the technology, and the social/cultural context in which it is used. It is the differences in the aspects of study that inform the differences in the definition of the term (Mitra, 2011; Friedman & Friedman, 2008). Rouse (2022), for instance, defines new media as "a catch-all term used for various kinds of electronic communications that are conceivable due to innovation in computer technology" (www.techopedia.com). The authors' approach considers the communicative and technological value of new media. Mitra's (2011: 3) definition of new media as "new technological advancement to induce socio cultural change in the developing society", however, takes notice of both the socio-cultural and technological aspects of new media.

This paper, however, adopts for its purpose Logan's (2010) conceptualization of new media. For Logan, new media are "those digital media that are interactive, incorporate two-way communication, and involve some form of computing" (p. 4). The definition is significant because it incorporates the different perspectives to new media – the technology, the message and the social context of use – as well as how the technology empowers users. Whichever definition others adopt, the basic fact remains that new media provide for communication, connectivity, convergence, community, interaction, participation, and creativity as some of its core characteristics (Britto, 2023). New media, therefore, describes those online media formats (social media, websites, blogs, vlogs, email, virtual realities, social networking platforms, etc.) that enable two-way communication, that involve the digitization of communication, and that enable consumers to become producers. They are, generally, ICT-based and require computer or mobile devices, with Internet access, to function (Bercovici, 2010; cited in Britto, 2023).

Literature further reveals that, technically, new media differs from the traditional media forms (sometimes referred to as the "old media" – newspapers, magazines, radio, television, etc.). But new media now functions to provide the technological basis for the migration and convergence of the traditional media forms online (Friedman & Friedman, 2008). Scholars, however, note that the main difference between new media and the traditional media lies, basically, on new media's digital, interactive, hypertextual, virtual, networked, and simulation capacities (Levinson, 2012). Each of these elements is more broadly explained in Lister et al. (2009). But, according to Friedman and Friedman (2008), the 'newness' about new media is dependent on four things: changes in *production approach*, caused by the convergence of technology and media; changes in *storage procedure*, whereby digitization and indexing becomes the dominant in new media; changes in the *mood of presentation*, whereby multimedia displays now takes on the center stage in new media; and changes in the *distribution channel*, whereby distribution, in the case of new media, is mostly via telecommunication networks.

Scholars, however, identify two formats of new media, namely, the 'digital' and 'social' media processes (Drew, 2023). The *digital media* format, on the one hand, refers to the electronic contents (text, images, audio and video) that are packaged into digital formats and are distributed and accessed through digital devices and platforms (such as Twitter, Instagram, Snapchat, TikTok, Facebook, YouTube, Podcast, etc.). *Social media*, on the other hand, describes those technological applications and software that enable the creation, communication, and display of digital media contents. These applications are of different kinds, a number of which

can be downloaded from google play store and other websites, using Internet-based computers or mobile devices. *Social media* are, therefore, different from the *digital contents* that they run and give access to.

The link between new media and graffiti have also been recognized and highlighted by a number of scholars (Kondakova & Shtifanova, 2022; Laffier & Bowman, 2021; Salter, 2010; Smyk, 2017). According to Avramidis and Drakopoulou (2015), this development problematizes "the role of technology in connecting and mediating various learning and communication practices" (p. 1). Smyk (2017), in turn, admits that the interface between street arts and technology, in particular, has continued to evolve and intertwine over the years, extending into different areas of design and creating new creative outlets and audiences. For the author, the challenge now is for audiences to carefully evaluate what they meet on the streets and elsewhere; and to understand whether they are seeing a truly natural piece of graffiti art or seeing merely digitalized components yet to be experienced and discovered. The author avers that "technology is empowering street artists to find new venues for their creativity, mixing analog and digital within cityscapes and fostering community experiences" (www.blog.adobe.com).

While Demuyakor (2020) is concerned particularly with the convergency and socio-economic benefits of digital media to visual arts, Friedman and Friedman (2011) address the 5Cs in favour of graffiti writing - communication, collaboration, community, creativity, and convergence. These qualities of new media and how they function to enrich graffiti writing culture are, however, not just distinct; they are intertwined and support each other (Nicoleta, 2008). And, the fruits of the increasing interface between new media and graffiti writing today may, therefore, be read along these conceptual lines. As argued by Salter (2010) from the perspective of performative and experimental arts (visual, theatre, dance, music, interactive, etc.), modern technologies now provide the "harbinger" for the directions that performances would take in the twenty-first century, in terms of temporality, duration, spatiality, participation, interaction, architecture, and environments. Salter's theoretical convictions do assist, somewhat, the technological determinists' debates on the disruptive nature of emergent new technologies and, in particular, the debates on the possible outcomes of the entanglement between modern technologies and artworks.

A few other authors (Bilyeu et al., 2022; Okon eta al., 2023; Smyth, 2017; Mitra, 2011; Biggs, 2006; Nicolete, 2008) have also provided the possible pragmatic directions for the interface. These suggest some of the practical ways that new media-graffiti integration is (or should be) done. Bilyeu et al.'s (2022) exploration of the different elements of New Media Art (NMA), for example, suggests the pathways and the innovative potentials of the new media-graffiti integration. These potentials are tied around the many approaches to art making, namely, computer-based art, electronic music, social media, digital photography, net art, video games, interactive installation art, and projects employing virtual or augmented reality" (www.openoregon.pressbooks.pub). For the authors, it is these elements, among others, that make digitalized arts different from the more Traditional Media Art (TMA) like painting and sculpture, creating consciousness around the marginalized (and sometimes misunderstood) art forms.

While these approaches to NMA, generally, challenge the status quo in artmaking and encourage people to see the world around them in exciting new ways, the authors suggest, among others, that such alternative to TMA as the time-based digital video arts, animation, pulse indexing, remixing, chancing, and simultaneity with its multicamera angle's effects, as well as the use of 3D and 4D modelling to refigure arts are necessary. The authors maintain that, while the concept of the NMA operates on the logic of replicability, its significance, however, rests on its ability to bypass the limits around the gallery and museum systems and to provide a more reliable methods of making multiple copies of artistic images available.

The shift towards the integration of new media into graffiti writing practice to produce "new network capacities for the promotion of connections or interpersonal interactions between graffiti writers, apprentices and mentors, and between graffiti communities and learning resources" (Okon et al., 2023: 146), in particular, is also considered in scholarship as a highly significant pragmatic approach. This development is seen in different ways to hold *the key* to how graffiti writers now find inspirations and ideas to improve on their writing practices, as well as increase the introduction of signature graffiti subculture on virtual spaces.

While Biggs (2006) stresses the importance of the interactive publishing platforms like *grafedia* and their coded graffiti expressions, Nicoleta (2008) mentions the significance of personalized blogs as valuable practical components to the graffiti-new media interface. The role of personalized blogs in bringing about a new era in graffiti writing has, however, been viewed differently across contexts. While a few see this as a move towards the 'death' of graffiti art as a natural creative occurrence, through the increasing personalized commercialization of the practice and its products online, others view the use of blog platforms as the inevitable

guarantor of the upward mobility of the art industry, whereby young people are influenced to engage in this art practice as personalized creative adventures (Graffiti, 2023).

Smyk (2017) also draws attention to the tendency to mix graffiti in the form of murals and augmented reality. The author argues, just like Bilyeu et al. (2022), that this development has become one of the primary ways by which graffiti writers now merge street arts with technology and extend audience's visual experiences online, as well as how new technologies now influence trends even in advertising campaigns. And, because the augmented reality-interactive murals now exist in a digital format, they can be viewed online anywhere in the world. Their presence on the world stage via the internet are, therefore, no longer purely context-bound, but universally driven

Mitra's (2011: 4) concept of 'fluidity' of new media, however, suggest a pragmatic way of amalgamating the different aspects of or approaches to the new media-graffiti interface. Comparing the 'fluidity' of new media to the quality of water (H_20) , Mitra points out four areas of an art that can be amalgamated with the help of new media technology and made into one form of digitized content online. This paper adapts and adopts this model to provide the framework for understanding how the multi-dimensional aspects of graffiti could be amalgamated and represented online for the benefits of graffiti writers and audiences. Below is an illustrative diagram adapted from the one offered by Mitra (2011) and extended to fit in with the graffiti-new media consideration of this paper.

Figure 1 shows that through new media, graffiti writers can, among others, reach a global audience with their writeups on graffiti, post digitally photographed images of their artworks and receive responses in seconds, present graffiti writing in animation or movie or gameplay formats, refigure their graffiti arts into 3D or 4D formats, as well as gain quick recognitions for themselves.

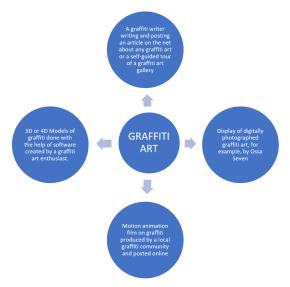


Figure 1 The openness of new media to aspects of graffiti writing (**Source**: Adapted from Mitra, 2011)

Regardless of the divergency in the pragmatic belief or theoretical direction, the very ubiquitous presence of new media, as well as its innovative engagements across a wide range of subject fields, now make the technology a 'must' for use in a number of artistic initiatives across the world. All stakeholders in the graffiti writing industry in Nigeria, for example, now need a coordinated strategy to migrate from "analog" to "digital" graffiti, so as to generate the needed contents and make them accessible to the public. Digital graffiti, it is argued, should be seen as the instrument of educational development and social prosperity (Friedman & Friedman, 2011). What is required of graffiti artists and their mentors, then, is for them to make maximum use of new media, judiciously maximize its opportunities, and minimize the drawbacks.

2 Methods of the study

Qualitative research design was adopted for the study, with oral interview and documentary study serving as the methods of empirical investigations. The dominant method was oral interview. This method was chosen to allow for in-depth engagements with respondents. Documentary study only served as a supplementary instrument to enable the researchers make up for any gaps in information. The documents studied included academic writeups and

newspapers published online. Oral interviews were conducted with three graffiti artists selected from different parts of Nigeria and two academics in the fields of arts and media studies, using WhatsApp voice chat systems. Physical presence with the interviewees was difficult because of the current insecurity situation in the country. Jesse Josh Goje of Shaygo Artistry and David Samuel Ainzet of the Ainzet Artistry, both of which were based in Kaduna, and Chima Paul James from Abia State, were the graffiti artists interviewed. The academics were Professor Esekong Andrew-Essien of the Department of Theatre and Media Studies of the University of Calabar, Calabar; and Mr. Malachy Onyema, a lecturer at the Department of Mass Communication of the Chukwuemeka Odumegwu Ojukwu University, Igbariam, Anambra State. The interviews were conducted between June and August 2023. These respondents were *purposively* selected. They were given a set of research questions to respond to, verbally. Their recorded responses were then transcribed and used to address the objectives of the study. The data obtained were theoretically arranged and analyzed, guided by a conceptual code earlier developed to correspond to the demands of the chosen objectives of the study. The analytical process was, however, that of *explanation building* for the purpose of generalization.

3 Findings and discussion

The presentation and discussion on the empirical data were meant to respond to each of the objectives of this study, as well as to take notice of the need to connect empirical findings with some of the conceptual issues raised under the literature review and the adopted theoretical framework of the study. The presentation, therefore, begins with the first objective, followed by the others.

3.1 The level of new media leveraging in graffiti writing in Nigeria

All the respondents admitted that they owned and were active on social media; and, that they used their social media for different purposes. James, for example, has subscribed to *Instagram*, *Facebook*, *WhatsApp* and *YouTube*. Ainzet, in turn, has been part of a number of graffiti new media sites lately. He has, additionally, subscribed to *Twitter*, *LinkedIn* and *Telegram*. The same is the case with Andrew-Essien who has registered on a number of social media. Onyema also has subscribed to *Trends* and a few other social media. Goje, too, has enrolled on a number of new media platforms in the most recent time. This level of connectivity is in itself a proof of the increasing appreciation and widespread use of social media by creative artists across Nigeria today, as it is the case in other world regions.

But, most of the interviewees were yet to build any personal online platforms for their artistic practice. They used only those built by other people. Only James owned a personal social media platform for the publicity of his different artistic projects, including *Maccee Wears*, an artistic clothing brand and mentorship programme for young people to learn the art of painting on wears as an artistic and commercial enterprise; the *Big Blow Squad*, a project-oriented art professional team he founded and used to share the artworks of its members; as well as *The African Grin*, a project launched on the 25th of May, 2023 as a social movement geared towards equipping Africans with the knowledge of their unique and exciting history through the use of creative media meant to provoke, promote and sustain positive social reforms in Africa. The project's campaign initiative, tagged "JUST S.M.I.L.E", offered participatory opportunities for people all over Africa to express and embrace their unique selves through arts. His new media site helped him to share his arts with people living beyond his local community (Interview, 2023).

In varying ways, interviewees also indicated that they used social media for different purposes, except advertising graffiti products for sales. Andrew-Essien, for example, used his social media purely for the purpose of gathering information on a number of issues, including art designs and exhibitions. He also had a few of his art designs posted on a few of his social media sites. For him, "it is difficult to live as an academic without subscribing to new media sites" (Interview, 2023). Goje, in turn, used social media for self-expression, uploading and listing of his artworks, advertising himself, and telling his stories to inspire people that looked up to him. Though he used new media every day to advertise his graffiti arts, posting his artworks for sales was not his main reason for engaging with new media. Some of his invitations for artistic exhibitions and tours could be picked up on his Facebook and Instagram pages.

Ainzet, however, first engaged with social media to post on the platforms just for fun. It was much later that he realized how important they were for expressing his feelings and thoughts about issues through arts, as well as for reaching out to more clients and targeted audience and "to seek out collaborations with other artists and bigger brands" (Interview, 2023). Just like Goje, he was emphatic that he did not engage with new media primarily to advertise his graffiti arts for sale; he used them, rather, to interact with his audience through various forms of arts, especially graffiti murals. He also used his social media to engage in a give-back project for the

community he came from or any community that needed to pass a message to a particular set of people, so that "they could use graffiti writing to speak with one voice as a community - talk about the problems they faced and how they felt, trying to fight for them, or put a smile on their faces" (Interview, 2023).

Additionally, Ainzet engaged with new media to promote peace and to educate people to engage with arts and impact the society positively: "I have had an opportunity to train some individuals personally to paint with words. Also, I have been part of the *Croccity Graffiti Masterclass* (CGMC) movement started by Jessy Josh in Kaduna State, where I instructed and helped to teach some young generations who have the passion and the zeal to learn art, to learn graffiti and to want to impact on the society generally. I, myself, I am a product of CGMC in 2019 when I graduated. It has really helped me to promote the growth of graffiti community and to associate with a lot of people... So, basically, I use these new media platforms for the purpose of growth and to communicate, to collaborate, to reach out to targeted audience and to serve my community" (Interview, 2023).

Unlike others, Onyema has never used any of his social media platforms to promote graffiti or connect with online graffiti communities. He has, equally, not met with any graffiti artists that used online media to showcase their artworks; that was because, even as a lecturer in a media department, he didn't have any of them as friends. He used his social media mostly to make friends and engage with his customers in relation to his other businesses. This difference in usage may be explained, to some extent, by the contrasting exposure of the respondents to the broader art industry, on the one hand, and personal interest in graffiti art, on the other. But it also reflects, to a certain degree, the more fundamental debate about the extent of the availability of graffiti art learning resources to streamline the importance of the art and graffiti artists in Nigeria today.

Onyema, also, indirectly affirmed this reality when he stated that, though one might see graffiti arts scattered here and there in Nigeria and used "sometimes to express political intentions" (Interview, 2023), it was still a very rare art form that was yet to become popular in Nigeria. He admitted, however, that new media was "a window" that artists could use to showcase their artworks; and that people in the creative art business, who were very much interested in digital art, could benefit from the advantages of using social media to improve on and showcase their artworks, as well as popularize the business (Interview, 2023).

Respondents, therefore, acknowledged that there was today an increasing presence of graffiti artists on social media and that the level of social media appropriation by graffiti artists was improving. They also acknowledged, in varying ways, that their engagements with new media, just as predicted by the technological determinism theorists, were bearing some innovative and socio-cultural benefits to their artistic practices. They argued that the increasing use of social media was essentially important for the success of the graffiti art industry as well as the popularization of this emergent new art form in Nigeria. Most respondents, however, noted that, contrary to a few public beliefs, their intentions for using social media in relation to their graffiti writing was never to sell their artworks; they used them rather to communicate, advertise themselves and their artistic practices, build contacts with other graffiti communities and audiences, collaborate with bigger brands, mentor their apprentices, find inspirations to improve their artworks and grow, creatively, in their graffiti writing practices.

3.2 The kind(s) of new media forms and formats mostly used by graffiti writers in Nigeria

Respondents were, generally, of the view that a wide range of new media sites and formats were being used by graffiti artist in Nigeria. Goje, for example, expressed certainty that most top graffiti writers and other performing artists in the country were on *net* and used social media to publicize, promote and sell their artworks. He indicated that such new media sites as *Facebook*, *Instagram*, *WhatsApp*, *YouTube*, *Blogs*, *Twitter* and a few others were the ones mostly used.

This perspective was shared by James who also noted that he personally preferred *Instagram* for some reasons: "I mostly use *Instagram* because Instagram promotes more quality videos and pictures and many artists are present on Instagram more than on any other platforms. *Instagram* links me up with other artists easily and it's loaded with videos and pictures and mainly that's how we promote our graffiti arts using videos and pictures. So, for artist like me, I just like to make some short videos to make it look interesting and to bring our projects into them. So, *Instagram* really supports that and a lot of people go into that platform to check on art stuffs. That's why *Instagram* is my preferred platform." (Interview, 2023).

Interviewees noted that they had different target audiences for each of their artworks. This required the use of different platforms. *Facebook* and *WhatsApp* could help them to connect only with the people they had met personally and accepted as friends, to keep them updated and

to strengthen their personal relationships. *Twitter*, they stated, was more open to the posting of a few pictures and short comments to pass messages and *Blogs* valuable for personalized multimedia stories on graffiti. But *Instagram*, they observed, provided for a broader community and "mostly works with hash-tags, such that people of similar interest get to see their artworks" (James, Interview, 2023). For the respondents, *Instagram* was more involving and offered different unique creative benefits than other platforms. James, however, advised that every graffiti artist should leverage on the advantages that each platform offered to connect with audiences, form a community of graffiti artists, push forward a particular agenda, and promote his or her artworks. In this way, he or she would help bring about a lot of positive changes in the society, including innovations in the educational sectors in their immediate communities.

Additionally, James averred that leveraging on new media by graffiti artists could become a culture that would make the industry solid, known and popular, and graffiti artists seen as relevant: "That is something that is needed here in Nigeria. For example, recently, I was involved as an instructor in the *Croccity Graffiti Masterclass* project, a graffiti writing training programme initiated by Jesse Josh. We were able to impact on people who have interest in learning graffiti art or in the art generally. We taught them how to make graffiti installations. These youths are people that may not be really involved in something like that but love it. We gave them skills, not just to practice, but to say something and to bring them income. We do not just teach them the skills; we also teach them a mind-set and how to become competent and relevant, problem solvers, and promoters of good values". (Goje, Interview, 2023).

Corroborating, Goje noted that one of the most outstanding aspects of the CGMC programme was how new media was integrated into the project, whereby the *Croccity Graffiti Masterclass* community was on *WhatsApp* and *Facebook*. The advertisement, he noted, was done to bring people who were interested in the programme together from different parts of the country, to learn the skills and become part of the community. Additionally, when participants created their artworks, the outstanding ones were documented online. Participants, therefore, used social media to put out their works for the general public, especially people who were on the platforms. "We can get patronage or get paid for these skills" (Goje, Interview, 2023).

For the respondents, social media were valuable items that could be used by every creative artist either for good or bad, depending on the graffiti artist himself. And, whatever was put out there through online media by a graffiti artist also determined people's reading of the artist himself – "his kind of mindset, positive energy, values, and what can bring satisfaction and help people feel better and comfortable" (James, Interview, 2023). Social media, respondents agreed, could help such artists to get immediate feedback from audiences to help them know whether they had misinformed or well-informed mindsets or whether their works had positive or negative impacts. Social media, they stressed, did give opportunities for graffiti artists to share their gifts with the world, to educate the public on a number of things, as well as to form communities of graffiti artists willing to collaborate to reduce negative competitions. These communities, respondents noted, could trend on *Twitter*, *Facebook* and a number of other social media platforms, building awareness for themselves across societies.

These findings, not withstanding, it is important that graffiti artists who make preferences for the use of *Instagram* or any other social media platform address themselves to a possible dilemma that could result from such choices. From the 'tagging' associated with simple street arts to the digital architecture of 'hash tagging', *Instagram* and other social media platforms, for example, are rewriting the aesthetics and the consumption of graffiti and street arts, enabling them to be globalized and inciting virtual responses across the globe (see Figure 2). As Naomi Martins pointed out, graffiti artists should be certain, when making their social media choices, as to whether their preferences would serve as a sign of engagement with the artwork itself or stand in the way of a genuine appreciation of the art (https://magazine.artland.com).



Figure 2 Social media mostly used (Source: The authors)

Again, James' emphasis on the importance of documentation of artworks online and the circulation, across a number of social media, of short digital videos and pictures to support any mentoring programme initiatives, is a good illustration, not only of the different opportunities open to graffiti artists that use new media, but also indirectly suggested the need for graffiti and other artists in Nigeria to stay open to Mitra's (2011) 'fluidity' concept that indicates the integrative possibilities for the amalgamation of graffiti-based digital materials online, as well as Bilyeu et al's (2022) proposals for the integration of the elements of New Media Art (NMA), particularly the use of 3D and 4D graffiti images to boost the artistic practice in the country.

3.3 The ways (and manners) new media appropriation affects graffiti writing in Nigeria

Respondents, again, were in agreement that the increasing use of new media was actually improving creativity in relation to graffiti writing in the country. Goje, for example, was of the view that, apart from enabling the artists to make a reputation for themselves by publicizing their creative talents and advertising their artworks online, social media increased followership and apprenticeship on a global scale, which could further empower the artists in a number of ways. Additionally, new media was giving the graffiti artists opportunities to create new artistic stuffs, post messages in relation to their artistic career and in response to events in their immediate environments, as well as to engage with people interested in their artworks. For Goje, because the opportunities were enormous, it was left for each artist to let his or her luck to shine online: "Once you are good, it is left for your own luck to shine. Times and seasons come; when your own time comes, you'll get whatever you want to get and that's just it" (Interview, 2023). (see in Figure 3)

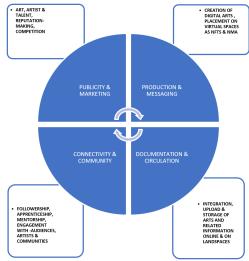


Figure 3 Chains of effect areas of new media on graffiti (Source: The authors)

Also assessing the extent to which new media has improved graffiti writing in the country, Andrew-Essien admitted that new media have, in varying ways, helped to publicize the activities of graffiti writers. He pointed out the activities of Osa Seven at Lagos Island as an example. While Osa Seven's works have been publicized in local newspapers and on electronic media, Andrew noted that the Internet has played a prominent role in making this graffiti artist and his paintings more widely known.

For him, the transformation of graffiti unto virtual spaces was *the key* responsibility that the graffiti artists should embark upon. They should, for example, try to merge their arts with new media as *Non-Fundable Token Arts* (NFTs) and then publicize and sell them. Andrew-Essien argued that arts painted on walls were generally transient, as they wore off easily overtime and could be cleaned off by the owners of the property or law enforcement agencies where they were illegitimately installed. For him, to avoid losing these artistic treasures, documenting them online and beyond the actual physical spaces in urban areas where they were originally installed, was essentially important. But more importantly, he observed, the capturing of these artworks as NFTs could help extend their aesthetics and forms on virtual spaces. This line of argument aligned well with Smyk's (2017) earlier observation that "Graffiti can mark a landscape for a long time, or can quickly be washed off, but it's said that what's on the internet is on the internet forever" (www.blog.adobe.com).

Andrew-Essien also admitted seeing some of the artworks of such prominent Nigerian NFT artists like Prince Jacon Osinachi Igwe (commonly called Osinachi) from Abia State and Owo

Anietie Emmanuel from Akwa Ibom State. He noted that these artists were doing great NFT arts, unveiling "the extraordinary out of the ordinary" using new media technologies in the NFT art community (cf. Partner, 2022). Emmanuel, for example, was a 3D Afrofuturism artist leveraging on the goodness of the past to build a better future. He used motives like *Nsibidi* motives to connect Africa's rich history, through the Afrofuturist lens, to her current predicament and a promising future and imposed them on landscapes as well as on NFT panels, which simply electronically transformed and replicated what readers of these arts could see on street walls. Osinachi, who has been known as the Africa's foremost digital or crypto visual artist, has also distinguished himself by having most of his works on walls replicated online as NFTs. He is known for using Microsoft Word processor as his artistic medium, different from the usual uses of paints, brushes and canvasses by other artists (Ndukwe, 2022), and for having his works digitally auctioned as NFTs.

Andrew-Essien was of the view that works that were rendered as graffiti arts on land spaces or as wall murals should be captured as NFTs, so that the contents, the ideas and the aesthetics within those art forms could be extended to a wide range of people who were online. The reverse movement from digital art to street walls was also necessary (cf. Avramidis & Drakopoulou, 2015). He averred that NFT arts, substantially, carried the same features as the actual arts seen by readers on landscapes. Those features were only replicated on NFTs for online audiences and for the purpose of documentations and preservations.

Critically, Andrew-Essien's argument indirectly supports Bilyeu et al's (2022) concern about the limiting nature of the gallery and museum systems today and the implications of this for the preservations of valuable artworks. For the duo, the logic of *replicability* upon which NFT and NMA operate was today needed if graffiti artists must bypass the reductionist tendencies of the gallery and museum systems, to enable their works reach some level of durability and availability online.

Andrew-Essien, again, affirmed that promoting these kinds of digitalized artworks could go a long way in exposing what was done in the graffiti world in Nigeria. He was emphatic that using social media, which was a component of new media, was one of the best ways of publicizing the process of graffiti writing and raising people's consciousness in relation to the art practice.

James, however, noted that it was the ability to get connected with other graffiti artists, document one's artistic products, gain inspiration from the different graffiti communities, and to learn from each other's artworks on social media that held *the key* to understanding how new media, especially social media, were working to improve creativity in the local graffiti writing industry in Nigeria. For James, while the increasing appropriation of new media could help increase competitions especially among graffiti artists who were oriented towards commercializing their writing practices, as well as encourage the overload of contents online, there would be options in graffiti arts styles or in its digital formats, as well as options in arts' prices: "in this case, if a client reaches out to one of the artists and doesn't like the person's price in relation to his or her artworks or commissioned projects, there are several others online. Social media enables the client to reach out easily to a number of other graffiti artists or styles from different cultural settings and to variations in pricing, without getting tied to one person or a single style or price range" (Interview, 2023). Social media, he argued, apart from helping the artists find better ways to do their writing and stay connected to their clients, do help clients to find better alternatives in the graffiti writing styles that they love.

These and many more, suggested the different ways respondents viewed how the increasing appropriation of new media was affecting graffiti writing culture and artists in Nigeria. Andrew-Essien's graffiti-NFTs' merger logic, in particular, found agreement with Bilyeu et al.'s (2022) logics of replicability of graffiti arts for posterity in relation to the New Media Arts culture. Digital media's possible effects on competition and variation in the pricing of commercialized arts or flexibility in the selection of expressive styles by consumers were also noted.

Figure 3 shows the possible effect areas of new media on graffiti in Nigeria, as drawn out from empirical data. The areas of effects are broadly categorized into four, each with its subsets: production and messaging (creation of digital arts, placement on virtual spaces as NFTs or as NMA), publicity and marketing (art, artist & talent, reputation-making, competition), documentation and circulation (integration, upload & storage online & on land spaces), connectivity and community (followership, apprenticeship, mentorship, engagement with audiences, artists & communities), with replicability and preservation as the connecting threads.

3.4 How the integration of new media into graffiti writing improves learning across different social settings

Respondents were, generally, of the view that civic education would improve as a result of the new media-graffiti interface. They considered this issue from two perspectives – learning about

sociocultural and political issues through graffiti arts and knowing about the graffiti art culture itself online. Interviewees admitted that civic learning, just like other social issues, was the reason graffiti artists engaged in creating better graffiti arts (especially mural arts) installations across the country (cf. Laffier & Bowman, 2021). As a result, there were a number of art movements engaged in a number of civic education projects, by creating installations that had to do with educating the people on issues that were affecting them.

James, for example, mentioned a few colourful parts of Kaduna adorned recently with a number of graffiti paintings and meant to educate every child and others on what was going on in the city. The artist was part of the 'JUST S.M.I.L.E' campaign and *The African Grin* project. According to James, "we make installations. The idea behind it is to promote your own light, spread your light in your own unique way. So, you are going to use your own unique abilities to spread your light in a way you feel is unique to you. Those kinds of artworks helped people to be educated on a number of issues. We also have social media platforms that helped us spread what we call *The African Grin* and helped us connect with people registered on the platforms. Creating and promoting mural installations on these social media platforms do help promote moral solutions to certain issues as well as civic education in relation to these issues. That's the more reason we need people that want to be solution providers to become graffiti artists and to make more graffiti paintings on different topics" (Interview, 2023).

Also, addressing the learning implication of graffiti -new media interface, Onyema noted that since graffiti was born out of political revolutions or the need for individuals to ventilate their opinions on government and other issues, their displays, whether done online through social media or offline on street walls, held out a lot of values for learning. For Onyema, the only things that could serve as drawbacks in this regard were the income gaps between the rich and the poor across societies, poor access to new media technologies for online graffiti 'readings', as well as low graffiti arts displays caused by the slow progress in graffiti practice in the country.

Corroborating, James and Andrew-Essien agreed that it was the poor state of the economy and low access of people to modern technologies that prevented them from gaining improved learning as a result of the new media-graffiti integration. James observed, on the one hand, that people in some parts of the country were lacking accessibility to social media-based graffiti arts because of their low-income status. On the other hand, there was the possibility that these people could still access these digitalized artworks, even in five- or 10-years' time, once they were able to acquire their mobile devices and have regular access to Internet. In this regard, he argued, nothing could hold them back from learning at any point in their life from the documented graffiti arts. What mattered most was that there should be regular updates by the artists themselves on the platforms, in such a way that what was earlier uploaded could not be tampered with: "My point is because it is still going to be there, so no matter when these people get access to these platforms, they still get to experience it because it is timeless; once it is documented and stored, it is timeless. So, no matter how long it is for these people to have access to it, they will still experience it, even when the artists themselves no longer exist. So, that is one good thing about the interface" (Interview, 2023).

Andrew-Essien, in turn, noted that once graffiti arts were publicized online, the bar of consciousness among the citizens would be higher (cf. Friedman & Friedman, 2011). He argued, just like James and Onyema, that one of the drawbacks we had in the new media-graffiti interface in the country was the fact that many people did not know about the nature of graffiti and many people, too, did not have access to the relevant social media sites where graffiti arts and the activities of the artists were publicized. For him, the lack of this kind of publicity was a major drawback that should be resolved, to enable people navigate the sites to get information on graffiti and graffiti artists. He admitted that access to the gadgets and equipment that would enable people to navigate the sites and to get information was important. He maintained that information and knowledge were required to publicize the new media-graffiti relationship. And, when this knowledge was available, he asserted, "enlightenment would be great and the graffiti art form would be well propagated and the benefits that accompany such knowledge would be overwhelming" (Interview, 2023).

Respondents, therefore, agreed that civic learning would improve once the new media-graffiti interface was effective in Nigeria; and, again, once the low economic and technological status of the country have been reasonably addressed to allow people have the money and the needed cutting-edge technologies to produce and access information about graffiti writing vis-à-vis the messages they bore on social issues in the country, then civic consciousness and learning would deepen to a considerable degree.

4 Conclusion and recommendations

This paper set out to investigate the relationship between graffiti writing and new media use

in Nigeria. The study concluded that new media held a wide range of opportunities for graffiti writers to improve their skills, earn a better living than before and to intensify the education of the public through online-based graffiti arts. This was in spite of the recognized drawbacks that would have prevented some people from drawing on the full potentials of new media to improve their artistic practices and 'readings', such as inequitable internet connectivity, lopsided access to mobile devices and applications, possession of skills relevant to the proper utilization of new media, existing control measures that restrict freedom of expression, and the proliferation of misinformation online about graffiti subculture, as a consequence of improper usages of new media.

The above scholarly conclusion can, therefore, help us to understand that new media, as envisaged by the technological determinists, is indeed changing, not only the way graffiti writing is now done, but also the way graffiti writers now interface with one another globally and also how audiences now experience graffiti arts in the 21^{st} century. It can also help to sustain the authors' initial assumption that when graffiti writing are increasingly technologized, radical transformations of the artistic performance, the manner and place of display of the artworks, and the nature of the dialectical relationships between the artworks and the 'reading' public are bound to happen. Even the relationship among the graffiti writers themselves would become more and more global, time-bound, context-bound, participatory, interactive, dialogical, and quick. Graffiti writers themselves could become empowered by the use of social media to actively participate in the civic education of young people both online or offline, to strengthen communities and the drive for social changes. The connection between graffiti writers' social media interactivity with young people and their active offline engagement with the youth for pedagogical and other developmental purposes is, also, undeniable.

In view of these findings, the following recommendations are made: (i) Bearing in mind the current unpopular nature of graffiti arts and writings in Nigeria, graffiti writers should consciously engage more and more with new media to popularize the practice in its contextual form, so as to conscientize the public on graffiti's importance; (ii) the online documentations and placements of graffiti arts on digital panels as NFTs or NMAs should be seen as a step in the right direction, towards preserving and improving graffiti writing in Nigeria for the purpose of posterity; but, as argued by Naomi Martins, artists should also remain conscious of how "the rise of ubiquity as the supremacy of online trends" could take over the integrative practice, "causing diversity to become diminished and diluted" (www.magazineartland.com); (iii) graffiti communities in the country should consciously work as a group to heighten the production and publication of 3D and 4D graffiti arts in recognition of the enormous potentials that come with the emergence of new media unto the world stage; and (iv) the integration of new media and graffiti should be more purposively pursued, principally for the purpose of intensifying the education of the public through online graffiti arts; and, (v) for the purpose of further study, the paper recommends a rigorous and intensive investigation into the policy and regulatory implications of the new media-graffiti interface for the country.

Conflict of interest

The authors have not declared any conflicts of interest.

References

Aguilar-Garcia, C. (2022). Graffiti preserves history and culture. Daily Titan. California State University. https://www.dailytitan.com/opinion/graffiti

Anderson, B. (1983). Imagined Communities: Reflections on the Origin and Spread of Nationalism. London: Verso.

Asali, R. (2023). Graffiti Writers: A Subculture Analysis.

https://www.ipl.org

Avramidis, K., & Drakopoulou, K. (2015). Moving from urban to virtual spaces and back: Learning in/from signature graffiti subculture. Critical learning in digital networks, 133-160. https://doi.org/10.1007/978-3-319-13752-0_7

Baird, R. (2022). Youth and social media: the affordances and challenges of online graffiti practice. Media, Culture & Society, 44(4), 764-784. https://doi.org/10.1177/01634437211069969

Biggs, J. (2006). Grafedia: Graffiti Enters New Media. https://www.trendhunter.com

Bilyeu, E., Ferreira, K., Peterson, L., & Weber, C. M. (2022). Understanding new media art: Introduction to new media art. https://openoregon.pressbooks.pub Britto, R. J. (2023). Social media engagement and democracy: Understanding the impact of social media on youth civic engagement in Tanzania. Journal of Media and Communication Studies, 15(2), 13-20. https://doi.org/10.5897/JMCS2023.0795

Curry, G. D., & Decker, S. H. (2020). Graffiti art. In Encyclopedia Britannica. https://www.britannica.com/art/graffiti-art

Demuyakor, J. (2020). Opportunities and Challenges of Digital Media: A Comprehensive Literature Review of Ghana. Electronic Research Journal of Social Sciences and Humanities, 2(2), 95-101. https://doi.org/10.2139/ssrn.3576045

Drew, C. (2023). 19 Examples of Digital Media. https://www.helpfulprofessor.com

Ferrell, J. (1996). Crimes of Style: Urban Graffiti and the Politics of Criminality. Boston, MA: Northeastern University Press.

Friedman, L. W., & Friedman, H. H. (2011). Using Social Media Technologies to Enhance Online Learning. Journal of Educators Online, 10(1), 1-22. https://doi.org/10.9743/JEO.2013.1.5

Friedman, L. W., & Friedman, H. H. (2008). High impact areas of the new media technologies: A review. Management Online Review.

Ganz, N. (2021). Graffiti. In Art History.

https://doi.org/10.1093/obo/9780199920105-0159

Goodbye Graffiti. (2023). The social media Effect.

https://goodbyegraffiti.com/the-social-media-effect

Héder, M. (2021). AI and the resurrection of Technological Determinism. Information Society, 21(2), 119-130.

https://doi.org/10.22503/inftars.XXI.2021.2.8

IvyPanda. (July 3, 2019). Analyzing Graffiti as a subculture.

https://ivypanda.com/essays/graffiti-as-a-subculture

Keçeci, E. (2021). Graffiti as Alternative Communication Tools: Discussions of Vandalism and the Effects of New Media. International Journal of Advanced Research, 9(6), 564-575. https://doi.org/10.21474/IJAR01/13047

Kondakova, J. V., & Shtifanova, E. V. (2022). The role of digital street art in shaping and implementing the "smart city" concept in Yekaterinburg. In AIP Conference Proceedings, 2657(1). AIP Publishing. https://doi.org/10.1063/5.0107521

Laffier, J., & Bowman, M. (2021). Graffiti in the 21st Century Classroom: Promoting learning and empowerment for students with traditional and digital graffiti. In EdMedia+ Innovate Learning (pp. 1-6). Association for the Advancement of Computing in Education (AACE).

Lannert, C. (2015). The perpetuation of graffiti art subculture. Butler Journal of Undergraduate Research, 1(1) 5

Levinson, P. (2012). New New Media. Second Edition. Allyn & Bacon.

Lister, M., Dovey, J., Giddings, S., Grant, I., & Kelly, K. (2009). New Media: a critical introduction. Second Edition. London & New York: Routledge. https://doi.org/10.4324/9780203884829

Logan, R. K. (2010). Understanding New Media: Extending Marshall McLuhan. New York: Peter Lang. MacDonald, N. (2016). The graffiti subculture: Youth, Masculinity and Identity. https://www.academia.edu

McCollum, S. (2019). Hip Hop: A Culture of Vision and Voice.

https://www.kennedy-center.org

McLuhan, M. (1962). The Gutenberg Galaxy: The Making of Typographic Man. Toronto: University of Toronto Press.

Martin, N. (2020). How Social Media Is Shaping Art–The Impact of an Instagram Obsessed Culture. https://magazine.artland.com

Mitra, A. (2011). New Media and Convergence: A Development Communication Perspective. Global Media Journal, 2(2). Indian Edition. Winter Issue.

Musthafa, A. (2015). New Media. Scribd Slideshare.

https://www.slideshare.net/afeef-musthafa/new-media

Ndukwe, I. (2022). Nigerian NFT artist Osinachi: The work created by using a word processor.

Nicoleta, C. (2008). The Impact of new media on society. https://www.researchgate.net/publication/215489586

Okon, P. E., Udoyo, O. E., & Nje, J. A. (2023). "One man's trash is another man's treasure": Graffiti and civic education among youths in Nigeria. Educational Research and Reviews, 18(7), 140-155 https://doi.org/10.5897/ERR2023.4330

Partner. (2022). Owo Anietie, The Guardian of the African NFTs Art's Galaxy. https://www.techcabal.com

Rouse, M. (2022). New Media. Techopedia.

 $https://www.techopedia.com/new_media$

Salter, C. (2010). Entangled: Technology and the Transformation of Performance. Cambridge and London: The MIT Press.

https://doi.org/10.7551/mitpress/9780262195881.001.0001

Simbirtseva, N. A., & Porozov, R. Y. (2019). Visual representation of graffiti in the media environment: Between art and vandalism. Advances in Economics, Business and Management Research, 105, 879-883.

https://doi.org/10.2991/iscde-19.2019.174

Singh, K. G. (2023). Technological Determinism Theory (5 Examples, Pros & Cons). https://helpfulprofessor.com/technological-determinism-theory

Smyk, A. (2017). From the Street to the Screen: Street Art's Influence on Digital Design. https://www.adobe.com

Soergel, A. A. (2021). The writing on the wall: exploring the cultural value of graffiti and street art. https://news.ucsc.edu

Wilson, J. Q., & Kelling, G. L. (1982). Broken Windows. The Atlantic Monthly, March: 29-38.