

Exploring Digital Communication: Language Use by South African University Students

Tiyiselani Ndukwani^{1*}, Shaun Livhuwani Muobeleheni²

^{1,2}University of Johannesburg, Gauteng, South Africa
¹ndukwanit@uj.ac.za*, ²muobeleni3@gmail.com
*corresponding author

ARTICLE INFO

Article history

Received January 22 2025
Revised April 11 2025
Accepted April 30 2025

Keywords

Keyword_1 Social Media
Keyword_2 Digital
Communication
Keyword_3 Language
Keyword_4 Student
Keyword_5 Cyber Socialising

ABSTRACT

This study explores the use of language on social media. The researchers investigated the problems related to language that undergraduate students encounter when they socialize on cyber socializing platforms. The study also highlights the relationship between language and cyberbullying, incorporating AI tools used by cyber socializing platforms to explore their effectiveness in detecting improper linguistic communication on social media. The study employed a qualitative approach, which entailed semi-structured interviews to collect the desired data. Ten undergraduate students volunteered to be part of the interviews. The findings of this study showed that all 10 students encountered problems related to language, and for some students, these problems led to mental health issues. The following are some of the problems encountered by students when interacting on social media: slang, misinterpretation, grammar and spelling errors, informal language, fake news, language barriers, cyberbullying, discriminatory language, the difference between face-to-face communication and online communication, and AI tools such as natural language processing, having difficulties in detecting improper linguistic communication.

This is an open access article under the [CC-BY-SA](#) license.



1. INTRODUCTION

The rapid advancement of technology has significantly simplified access to information and communication through smartphones and digital platforms. Among these advancements, social media has emerged as a cornerstone of modern communication. Appel, Grewal, Hadi, and Stephen (2020) describe social media as a collection of software-based digital technologies, usually presented as apps and websites that provide users with digital environments in which they can send and receive digital content or information over some online social network. Similarly, Dhiman (2023) defines cyber socializing tools as websites and online platforms enabling users to create, share content, and interact with others. Popular platforms such as Instagram, Facebook, LinkedIn, Twitter, and TikTok exemplify this digital socialization.

These platforms serve as crucial tools for individuals to connect with friends, family, and various communities. Dhiman (2023) highlights numerous advantages of social media, including keeping users informed and social ties, facilitating business-customer communication, and enabling the exchange of ideas, thoughts, and information. However, despite these benefits, challenges such as cyberbullying have emerged, prompting the need

for focused studies. This research aimed to explore the problems arising when students interact on social media and to propose strategies for addressing these challenges.

The study also sought to address the pedagogical and academic dimensions of responsible social media usage. Understanding how students engage with cyber socializing tools is essential, as their linguistic practices in these spaces can influence their academic and interpersonal communication. In addition, the study made a significant contribution to the existing literature on language in social media. The information gathered from the study provided valuable insights into how language can be used to cause harm to social media users. Specifically, the research critically examined the use of language on platforms like Facebook, Twitter, and WhatsApp among students at a South African university. The rationale for focusing on South African students is that a study focusing on South African students could contribute valuable data to the global understanding of language practices in an African context, which is underrepresented in global studies on social media language or digital linguistics. Also, the study utilized undergraduate students, who can potentially give insight into how younger generations are shaping language use online, including trends like Slang, abbreviations, and emojis.

The following questions guided the study:

1. What problems arise in discourse during interactions on social media platforms?
2. What is the relationship between language use and cyberbullying?
3. Can innovative automated language analysis tools, such as natural language processing tools, detect improper linguistic communication on social media?

The objectives of the study were: a) To explore the phenomenon of university students' language use on social media platforms. b) To examine the relationship between communication patterns, language use, and the perpetuation of cyberbullying behaviors. c) To investigate the innovative use of automated language analysis tools, such as natural language processing tools, in detecting improper linguistic communication on social media.

By addressing these objectives, the study aimed to shed light on the interplay between language use and social media interactions, ultimately fostering a better understanding of how to promote safe and effective communication in digital spaces.

2. LITERATURE REVIEW

2.1 Definitions and the History of Social Media

2.1.1 Language

Language is a means of communication. It conveys our thoughts, ideas, feelings, and emotions to different people (Alshami, 2019:1). The researcher knows that defining language is not a smooth venture. Thoughts, feelings, ideas, and emotions are not the only things language communicates. The term covers a wide variety of components. However, for the sake of the paper and the idea it is attempting to paint, the paper will utilize Alshami's definition.

According to Alshami (2019:3), language serves many purposes, from letter writing to self-reflection. However, this research is specifically interested in the role of language in cyber socializing tools, a focus that will guide the paper's exploration.

2.1.2 Cyber Socialising Tools

In studies, social media is typically used as an umbrella term that describes a selection of online platforms, which include blogs, forums, product reviews, business networks, photo sharing, collaborative projects, enterprise social networks, microblogs, social gaming, video sharing, and virtual worlds. Given this broad spectrum of social media platforms, social media applications are quite diverse and are now not confined to sharing holiday snapshots or advertising and promoting (Aichner, Grunfelder, Maurer and Jegeni, 2021:215). The research paper did not utilize every social media platform; it only used Twitter, Instagram, WhatsApp, TikTok, and Facebook. The researcher believes the previously mentioned platforms dominate when it comes to problems in discourse and perhaps low-resourced artificial intelligence machines.

2.1.3 Cyberbullying

Cyberbullying can be defined as harassment or bullying via offensive language on cybersocializing tools. According to Mat Sood, Tan & Hamid (2020:280), Cyberbullying is one of the adverse effects regularly related to and resulting from the growth in the use of offensive language in social media. Cyberbullying has many social effects that will be discussed later in this chapter.

2.1.4 History of Social Media

Social media is or can be perceived as a phenomenon that emerged in the late 1990s, passed through a rapid proliferation in the 2000s, and has since become a significant part of online culture (Ortner, Sinner & Jadin, 2018:372). Similarly, the idea of Aichner et al. (2021:215) is that the term social media was first utilized in 1994 in Tokyo's online media surroundings, referred to as Matisse.

In these early days of the commercial internet, the primary social media structures were developed and launched. Over time, both the quantity of social media platforms and the wide variety of lively social media users have expanded appreciably, making it one of the most essential packages of the internet.

2.2 Language Usage on Social Media

The language utilized on cyber socializing platforms is perceived by its unique linguistic features and informality. In other words, cyber socializing tools have implemented new, unique ways of engaging, resulting in the evolution of distinct language patterns and norms. According to Al-Salman (2017:173), writing and communication styles have been permanently altered by using cyber socializing platforms, email, or text messages. In other words, social media has dramatically impacted and influenced our discourse patterns. In addition, "with the distinctive features of social media discourse, the standard discourse markers of elevated style, vocabulary, grammaticality, well-informedness, coherence, connectives, are hardly attained in this genre of social media discourse" (Al-Salman, 2017:173).

Al-Salman (2017:174) found that the language encountered on these platforms, especially acronyms and shorthand text messages, which may be fragmentary, does not fit the standard pattern of discourse properly. It means that neither social media texts nor texting is a written language, as it does not in any way portray or respect the rules of standard language use. The discourse utilized in cyber socializing platforms may be perceived as a unique jargon, which features symbols, contractions, abbreviations, etcetera,

to create new words. According to Al-Salman (2017:180), “the ungrammatical structures, neologisms in vocabulary, non-compliance with the rules of punctuation and spelling, are but a few instances of a myriad of changes affecting language”.

2.2.1 Miscommunication on Social Media

The advent of cyber socializing platforms has brought about new ways of communication. There is evident creation of new forms of language, such as abbreviations, Slang, and a combination of several languages into one word (Rusli, Aziz, Aris, Jasri & Maskat, 2018:116). Similarly, the study shows how creating this new language via social media causes confusion and miscommunication among users of cyber socializing platforms. According to Rusli et al. (2018:116), even though there are different types of translation software available at the user’s disposal, they do not cater to every language, especially the Slang invented on social media.

In a nutshell, the study by Rusli et al. (2018) explores the emergence of a newly formed language on social media named Manglish, a combination of English and Malay. The researchers argue that Manglish can lead to confusion and miscommunication among different generations of cyber socializing platform users. In the same way, this research shows the miscommunication and misinterpretation encountered when people communicate on social media. It further shows how artificial intelligence tools are not so helpful in these types of problems, which is the problem that will be explored later in this chapter.

2.2.2 Slang

It is ideal to look at the issue of Slang in different places of the world since social media is universal, and the problems encountered seem to be the same and portray the same effects. According to Budiasa, Savitri, and Dewi (2021), utilizing Slang has become prevalent among today’s youth, especially in cyber socializing platforms. This study by Budiasa et al. (2021) named “Slang Language in Indonesian Social Media” renders the different types of Slang encountered on social media, namely fresh and creative (new vocabulary created from imagination, informal forms, or contemporary usage), flippant (phrases formed from two or more words, creating new meanings unrelated to the original words), imitative (Existing words with expanded or altered meanings), acronyms (words formed from the initial letters or syllables of a phrase), and clipping (shortened forms of words).

The study by Wahyu Trimastuti (2017), named “An Analysis of Slang Words Used in Social Media,” suggests that slang words affect the standard language. It also shows the potential errors and communication issues that arise as a result of using slang words.

The general idea is that while Slang provides quicker and more personalized communication among the youth, it also introduces many errors in the standard language. The study suggests minimizing the use of Slang in social media to preserve the standard language and ensure more precise communication.

2.3 Language and Cyberbullying

Cyberbullying represents a language-related problem in interpersonal communication. The language utilized in cyber-socializing tools portrays people’s internal thoughts, emotional states, and intentions and may entail directly or indirectly offensive words (Zhong et al., 2022).

2.3.1 Linguistic Factors Contributing to Cyberbullying

Zhong et al. (2022) believe that “cyberbullying is conventionally detected based on linguistic features. Early researchers used n-grams, the bag of words approach, and similar techniques to make coarse-grained predictions about cyberbullying content by analyzing certain linguistic features”. Most studies on cyberbullying detection revolve around specific linguistic attributes, such as lexical features and grammatical features. Concerning lexicality, a hallmark of cyberbullying is a high density of vulgar phrases. Most offensive sentences consist not only of offensive phrases but also user identifiers (in other words, second-person pronouns and other person-centered terms). Punctuation, which entails exclamation points, can also predict offensive content material by portraying the user’s feelings or the volume of speaking (Zhong et al., 2022). Zhong et al. (2022) also found that “scholars have realized that speakers/commenters who frequently use imperative sentences tend to be more insulting as they deliver stronger sentiments”. The following are some of the linguistic factors contributing to cyberbullying.

2.3.1.1 Insults and Offensive Language

Cyberbullying initially starts with language. Cyberbullies frequently use derogatory terms, slurs, or, at times, offensive language to target their victims. In addition, they might also interact in name-calling, body shaming, or making private attacks, using phrases to belittle and demean others. According to Zhong (2022), a linguistic analysis of a cyberbullying incident found that bullies tended to apply negative words, derogatory nouns, and more second-person pronouns, for instance, “you” or the victim’s actual name, to accuse the victim. Hosseinmardi, Mattson, Rafiq, Han, Lv, and Mishra (2015:2) showed an example of a post on Instagram where a boy posted a picture, and hateful comments were posted for the profile owner. One of the comments was, “Hey, do the world a favor and go kill yourself”.

2.3.1.2 Threats and Harassment

Cyberbullies may use threatening language to intimidate and harass their victims. They may employ threats of physical harm or spread rumors or fake facts to harm someone’s reputation. Similarly, Naylor and Fellar (2019:7) state that cyberbullies utilize social media to transmit threats, harassment, demeaning messages, or malicious rumors to harm or inflict shame on their targeted victims.

2.3.1.3 Online Trolling

Trolls use inflammatory language and provocative statements to incite a lousy reaction or disenchant others. They intentionally try to initiate emotional responses to their victims, and the perpetrators might interact in relentless teasing, sarcasm, or mockery. According to Berghel (2018:40), online trolling tries by any means necessary to engage or inflame the receiver, usually through misinformation, lies, distortions, etcetera. Berghel (2018:41) gives an example of different types of online trolls, such as provocation trolling, which looks at eliciting a particular response from one or more participants on social media. Secondly, ad hominem trolling, which invests in harassing, defaming, and delegitimizing individuals or particular groups. Furthermore, snag trolling aims to evoke responses to satisfy curiosity - lastly, sport trolling looks to gratify the troll, just for fun.

To be more precise, Berghel (2018) gave and explained many different online trolls. However, the researcher only took those that aligned with the purpose of the research.

Berghel (2018:41) believes that all forms of trolling should not be taken lightly, for the consequences of trolling can be severe and disruptive to the prevailing social order or civility of the participants to one another.

3. RESEARCH METHODOLOGY

3.1 Research Design

This study followed a qualitative approach. This approach was suitable for addressing the research questions and achieving the objectives of this study. A qualitative approach was chosen for this study to gain a more comprehensive and nuanced understanding of the research topic by providing a more extensive and profound dataset capable of capturing the diversity and complexity of the research phenomenon.

3.2 Research Site

The study was conducted in South Africa, Gauteng Province. A massive range of the population resides in Auckland Park. Auckland Park is a suburb that was laid out in 1888 and was developed by a New Zealander named John Landau. Landau saw fantastic similarities inside the area to his domestic metropolis, Auckland, hence the name's evolution. The sample was drawn from the local University's Humanities faculty. The Auckland Park population was ideal for the researcher because that is where all learning activities occur.

3.3 Data Collection Methods

The research employed semi-structured interviews to collect data from the participants. The semi-structured interviews employed open-ended questions. Open-ended questions are questions that will enable participants to give a free-form answer. The most crucial benefit of open-ended questions is that they enable the researcher to find more than anticipated. "The semi-structured interview is an exploratory interview used most often in the social sciences to gather data. While it generally follows a guide or protocol that is devised prior to the interview and is focused on a core topic to provide a general structure, the semi-structured interviews also allow for discovery, with space to follow topical trajectories as the conversation unfolds" (Magaldi & Berler, 2020).

3.4 Population Sampling

The study's population sample was students from one of the universities in South Africa, Gauteng province. The study aimed to use undergraduate students from the first to third year. In addition, the study was gender-neutral, meaning it used both males and females from the Faculty of Humanities. The study suggested using undergraduate students from the Department of LanCSAL and Communications, mainly because LanCSAL students are more focused on language. In contrast, Communications students are focused on the media, making it easier to comprehend the proposed questions. Moreover, most undergraduate students are on social media, and they have a larger population than postgraduate students; hence, the study proposed utilizing them instead. The study sample was limited to 10 participants. The rationale behind the sample size was that 10 students could be thoroughly analyzed compared to being overwhelmed by excessive data. A smaller sample often allows for a richer and more nuanced insight from each participant since interviews require detailed responses. In addition, the study utilized students aged 18

going upwards, meaning undergraduate students younger than 18 were not eligible to participate in the research. The study used convenience sampling.

3.5 Data Analysis

The first step in qualitative data analysis was to transcribe the data collected. The researchers then highlighted key findings from the data. The second step was coding data from interviews using labels that will be clearly defined and assist in identifying potential themes that arise (Dawadi, 2020). Moreover, the codes were grouped into categories. The next step of data analysis was the interpretation of data, in which the researcher made sense of the data. During data interpretation, the researcher linked the interpretation with an already existing body of literature (Creswell, 2013). The last step of data analysis was visualizing the data. The researcher provided a detailed analysis of the findings and concluded.

4. FINDINGS

4.1 Problems Surfacing in Discourse When Interacting on Social Media

4.1.1 Misinformation and Manipulation in Digital Spaces

This theme highlights the pervasive issue of misinformation and its impact on social media users. Participants frequently cited the spread of fake news as a significant problem in their cyber socializing experiences. All ten participants reported encountering fake news on platforms such as Facebook. For instance, P10 shared their experience during elections: “Yes, during elections. Many people are spreading false news about different parties and how voting is going to work. So, if you are someone who is not politically inclined or someone who does not really understand or enjoy politics, that information could have really affected you.”

The data revealed that misinformation spreads rapidly on social media, often misleading users. For example, P4 discussed the impact of misinformation during elections: “Recently, with the elections, most people were not able to vote due to section 24a, so people were misled to say it’s a national election so that you can vote anywhere. However, two days before, there was an item that was brought up, which was called section 24a, where people needed to state where they were located so they could vote in the voting district, only to find that they couldn’t. So, even more people at UJ couldn’t vote. So yes, most of us, social media misled us; people post stuff, and we believe it to be true.”

The reputational damage caused by misinformation was also a concern. P4 shared: “Yes, I can say that, and that actually got me into trouble. It happened this year during a campaign. We were assisting students, and I, as a community development student leader, should help and engage where I can. So, whilst I was participating and helping students with admissions and other things, some person, I think from the opposing party, just posted my picture to say, ‘This guy is a scammer.’ That was actually cyberbullying.”

Participants also noted that misinformation during critical events, such as the COVID-19 pandemic, had harmful consequences. P6 explained: “I think the biggest time I have experienced such was during COVID. During that time, everyone was having all these conspiracy theories about the vaccine, the government, and all these kinds of stuff.” This theme underscores the detrimental effects of fake news, including reputational harm,

misinformation during critical events, and its ability to provoke harmful behavior. It highlights the need for improved digital literacy to combat misinformation effectively.

4.1.2 Communication Barriers and Evolving Language

This theme explores challenges related to understanding idiomatic expressions, Slang, and cultural differences on social media. The study found that language barriers often hinder knowledge sharing. P2 remarked: “Yes, there is a language barrier on social media because there are some people who don’t want to learn other languages; they want to stick to their languages. So, language barriers on social media prevent knowledge or spread of information.”

P1 added: “I think there is a social language barrier. We have different cultures and come from different backgrounds, so there’s no way you would know everything that’s happening on social media; there’s always different languages.” Participants also noted that translation tools could mitigate language barriers. P6 stated: “Yes, but also, a lot of social media apps literally translate stuff.”

However, evolving language use on social media, including Slang and abbreviations, was also identified as a challenge. P1 explained: “On social media, there are certain linguistic words that people use that only apply to social media, like LOL (laugh out loud) and LMAO. I do not think people can say that in person.”

While these linguistic features foster quicker communication, they can alienate users unfamiliar with them. P4 highlighted how this impacts academic contexts: “It does a lot. Our ways of communication, the abbreviations, the use of informal communication. We can communicate in English. However, when we met, I noticed that you are Tswana so I will speak Tswana. We also tend to take our social media lingo and put it in academic lectures, and that actually inconveniences us in a way because those are social media language; you can’t take it to academia or maybe formal platforms such as email.”

This theme underscores how communication barriers and the evolution of language on social media can hinder understanding and knowledge sharing while also revealing the cultural and linguistic dynamics unique to these platforms.

4.2 Relationship Between Language, Cyberbullying, and Emotional Impact

4.2.1 Toxic Behaviour and Social Harm

This theme examines how toxic language, harassment, and cyberbullying disrupt online interactions and affect emotional well-being. Many participants noted that social media fosters anxiety and stress. P9 shared: “I think you cannot be 100% real, like on Instagram, you don’t get to show the ugly part of your life; you only get to show the winnings, the positive things. So, you do have anxiety, especially if you want to be real and take a picture of yourself on sad days. It’s like, no, I won’t get as many likes.”

Participants also highlighted that trolling and harassment are not adequately addressed by social media platforms. P5 stated: “I don’t think so. It is because you hear people saying their account got suspended for this time, but then they are able to open another account. For example, let’s look at Chris Excel and how long he has been saying things that are mean about celebrities and other people. So, many people troll, and we don’t see any action.”

This lack of effective moderation allows toxic behavior to persist, contributing to emotional distress among users. For instance, P9 described her experience with

cyberbullying: “There was once a point where I had a YouTube channel. So, I have tattoos, and I posted about them; I don’t remember what I wrote, but people were so negative about it.” Such experiences highlight the significant emotional toll of cyberbullying and the need for stricter measures to prevent harmful interactions.

4.3 Limitations of AI in Detecting Contextual Meaning and/or Cyberbullying

4.3.1 Challenges Encountered by AI During Online Communication

This theme explores the significant challenges associated with the use of artificial intelligence (AI) tools in moderating online content effectively. While these tools have revolutionized content management in some areas, their limitations are evident when dealing with the complexities of human language and communication. A recurrent concern among participants was the difficulty AI faces in grasping contextual nuances and addressing linguistic diversity, which is essential for accurate moderation.

Participant 4 (P4) provided an insightful perspective on the struggles AI has with translation and understanding context in diverse languages. They remarked: “Well, they’re not always accurate. I don’t know how many languages we have in this world; even when translating something from Tswana, deep Tswana, to English, it misinterprets, and sometimes it says whatever it wants to say.” This comment underscores the significant challenge AI faces when translating or moderating content in less commonly represented languages, where the richness and depth of the language may be lost in automated processes.

Another participant, P10, elaborated on the inherent limitations of AI training and how these constraints impact its effectiveness. They explained: “They are as effective as people make them. With AI, we know we must train it, and it can only be trained as far as people take it, so if people don’t teach it all the nuances, all the understandings, all the translations, for example, a language like Xhosa has many clicks if it’s not taught those clicks, it won’t understand fully. I think that’s where the barrier comes”. It highlights that AI’s effectiveness is directly tied to the quality and depth of its training data. When linguistic nuances, cultural context, or intricate features of a language are not included in its training, the AI remains ill-equipped to handle real-world scenarios effectively.

While some participants acknowledged that AI tools are partially effective in moderating content, they were also quick to point out areas where improvements are needed. Participant 8 (P8) observed: “They are mildly effective. The problem is, they only detect direct language, so when you say it indirectly, it does not detect it.” This critique highlights another critical limitation of AI in detecting subtle or indirect forms of communication, such as sarcasm or veiled cyberbullying. The reliance on AI to identify problematic content often falters when faced with such indirect or implicit messaging.

In summary, this theme sheds light on the numerous challenges AI faces in moderating content on online platforms. From the inability to capture linguistic diversity and cultural nuances to struggles in detecting subtle forms of harmful content, these limitations suggest that while AI has potential, its effectiveness is far from comprehensive. Moving forward, addressing these gaps, particularly in linguistic representation and contextual understanding, will be critical to enhancing AI’s role in fostering safer and more inclusive digital spaces.

4.4 Limitations of the Study

The study's sample size, which was limited to 10 students, makes it difficult to generalize the data collected to all undergraduate students of a specific faculty. Future studies could interview more students to generalize better and comprehend the issues that students or people at large encounter on social media.

4.5 Recommendations

Researchers can investigate or explore the development or enhancement of AI tools to better detect improper linguistic communication, such as Slang or sarcasm.

Better yet, people in the field of linguistics, IT, or AI developers can collaborate to enhance these cyber socializing platforms. It might help reduce the language barrier and harm encountered by students.

The researcher recommends that students be mindful or thoughtful of their audience. They should consider the fact that they engage with diverse people from different cultural and language backgrounds, so when interacting, and they should be clear and try to utilize a universally understood language in public posts or comments. It can help tackle the issue of miscommunication.

On the issue of fake news, social media can implement a "fact checker" tool that checks if posts are accurate/true or false so that there can be less confusion and misinformation. Platform X seems to have implemented this. When a person posts fake news, the platform comments to the audience that the post is fake or inaccurate. However, this is not done on all the posts, which might leave some of the users affected. Also, users can tag AI such as Grok or perplexity to ask if the post is true or not, which works most of the time.

The study also recommends that social media should be harsh when it comes to banning users who are problematic towards others. A one-week ban cannot make a person change their behavior. The results on victims leave lifelong scars, and the consequences to the perpetrators should be the same.

Students who face problems such as trolling or harsh language should consistently consult with psychologists, which might help with mental health issues. This service is mostly free in most universities in South Africa. It is also suggested that students report inappropriate language or trolling on social media.

6. CONCLUSION

Despite the limitations that the study encountered, it successfully achieved its primary goal and objectives. The researchers investigated the phenomenon of language use on social media, shedding light on the various ways individuals communicate within these digital spaces. The study also explored the intricate and often complex relationship between language use and the perpetuation of cyberbullying, offering valuable insights into how linguistic choices can contribute to or mitigate harmful interactions online. Furthermore, the study examined the effectiveness of automated language analysis tools, evaluating their ability to detect improper or inappropriate linguistic communication on social media platforms. By addressing these interconnected areas, the study provided a comprehensive understanding of language dynamics in the context of online interactions

while also highlighting the potential and limitations of technological tools in managing digital communication challenges.

REFERENCES

- Adedamola, A. A., Modupe, A., & Dehinbo, O. J. (2015). Development and evaluation of a system for normalizing internet slang in social media texts. *Proceedings of the World Congress on Engineering and Computer Science 2015 Vol I WCECS 2015, October 21-23, 2015, San Francisco, USA*. https://www.iaeng.org/publication/WCECS2015/WCECS2015_pp418-423.pdf
- Aichner, T., Grunfelder, M., Maurer, O., & Jegeni, D. (2021). Twenty-five years of social media: A review of social media applications and definitions from 1994 to 2019. *Cyberpsychology, Behavior, and Social Networking*, 24(4), 215-222. <https://doi.org/10.1089/cyber.2020.0134>
- Al-Ajlan, M., & Ykhlef, M. (2018). Optimized Twitter cyberbullying detection based on deep learning. *Proceedings of the National Computing Conference*, 1–5. <https://doi.org/10.1109/NCG.2018.8593146>
- Almalki, S. (2016). Integrating quantitative and qualitative data in mixed methods research—Challenges and benefits. *Journal of Education and Learning*, 5(3), 288–296. <http://dx.doi.org/10.5539/jel.v5n3p288>
- Al-Salman, S. M. (2017). Has the power of language been compromised by the influence of social media? *Studies in English Language Teaching*, 5(2), 172–185. <http://dx.doi.org/10.22158/selt.v5n2p172>
- Anderson, R. (2007). Thematic content analysis (TCA): *Descriptive presentation of qualitative data*. <http://rosemarieanderson.com/wp-content/uploads/2014/08/ThematicContentAnalysis.pdf>
- Appel, G., Grewal, L., Hadi, R. et al. (2020). The future of social media in marketing. *J. of the Acad. Mark. Sci.* 48, 79–95. <https://doi.org/10.1007/s11747-019-00695-1>
- Ariantini, K. P., Suwastini, N. K. A., Adnyani, N. L. P. S., Dantes, R. G., & Jayantini, G. A. S. R. (2021). Integrating social media into English language learning: How and to what benefits according to recent studies. *Nobel: Journal of Literature and Language Teaching*, 12(1), 91–111. <https://doi.org/10.15642/NOBEL.2021.12.1.91-111>
- Aspers, P., & Corte, U. (2019). What is qualitative in qualitative research? *Qualitative Sociology*, 42(2), 139–160. <https://doi.org/10.1007/s11133-019-9413-7>
- Bonvillain, N. (2020). *Language, culture, & communication: The meaning of messages* (8th ed.). Lanham, Maryland: Rowman & Littlefield.
- Budiasa, I. G., Savitri, P. W., & Dewi, A. A. S. S. S. (2021). Slang language in Indonesian social media. *Lingual: Journal of Language and Culture*, 11(1), 30. <https://doi.org/10.24843/ljlc.2021.v11.i01.p06>
- Clark, E., & Araki, K. (2011). Text normalization in social media: Progress, problems, and applications for a pre-processing system of casual English. *Procedia - Social and Behavioral Sciences*, 27(3), 2–11. <https://doi.org/10.1016/j.sbspro.2011.10.577>
- Çöltekin, C. (2020). A corpus of Turkish offensive language on social media. *Proceedings of the Twelfth Language Resources and Evaluation Conference*, 6174–6184. Marseille, France. European Language Resources Association. <https://aclanthology.org/2020.lrec-1.758/>
- Creswell, J. (2013). *Research design: Qualitative, quantitative, and mixed methods approaches* (5th ed.). New York: SAGE Publications, Inc.
- Dalvi, R., Chavan, S., & Halbe, A. (2020). Detecting Twitter cyberbullying using machine learning. *Proceedings of the International Conference on Intelligent Computing and Control Systems*, 297–301. <https://doi.org/10.1109/ICICCS48265.2020.9120893>

- Dawadi, S. (2020). Thematic Analysis Approach: A Step-by-Step Guide for ELT Research Practitioners. *Journal of NELTA*, 25(1-2), 62–71. <https://doi.org/10.3126/nelta.v25i1-2.49731>.
- Dhiman, B. (2023). Ethical issues and challenges in social media: A current scenario. *TechRxiv*. <https://doi.org/10.36227/techrxiv.22662844.v1>
- Driscoll, B. (2019). Book blogs as tastemakers. *Journal of Audience & Reception Studies*, 16(1), 280–305. <https://www.participations.org/16-01-14-driscoll.pdf>
- Duarte, N., Llanso, E., & Loup, A. (2017). Mixed messages? The limits of automated social media content analysis. *Center for Democracy and Technology*.
- Fleming, J., & Zegwaard, K. E. (2018). Methodologies, methods, and ethical considerations for conducting research in work-integrated learning. *International Journal of Work-Integrated Learning*. https://www.ijwil.org/files/IJWIL_19_3_205_213.pdf
- Grant, T., & Macleod, N. (2016). Assuming identities online: Experimental linguistics applied to the policing of online pedophile activity. *Applied Linguistics*, 37(1), 50–70. <https://psycnet.apa.org/doi/10.1093/applin/amv079>
- Halcomb, E., & Hickman, L. (2015). Mixed methods research. *Nursing Standard: Promoting Excellence in Nursing Care*, 29(32), 41-47. <https://doi.org/10.7748/ns.29.32.41.e8858>
- Kasavana, M., Nusair, K., & Teodosic, K. (2010). Online social networking: Redefining the human web. *Journal of Hospitality and Tourism Technology*, 1(1), 68-82. <https://doi.org/10.1108/17579881011023025>
- Kim, S., Kimber, M., Boyle, M. H., & Georgiades, K. (2019). Sex differences in the association between cyberbullying victimization and mental health, substance use, and suicidal ideation in adolescents. *The Canadian Journal of Psychiatry / La Revue Canadienne de Psychiatrie*, 64(2), 126-135. <https://doi.org/10.1177/0706743719825567>
- Lenhart, A., Madden, M., Smith, A., Purcell, K., & Zickuhr, K. (2011). Teens, kindness, and cruelty on social network sites. *Pew Research Center*. <https://www.pewresearch.org/internet/2011/11/09/teens-kindness-and-cruelty-on-social-network-sites/>
- Locher, M. A., & Bousfield, D. (2008). Introduction: Impoliteness and power in language. In *Impoliteness in language: Studies on its interplay with power in theory and practice* (pp. 1-9). Amsterdam: John Benjamins.
- Magaldi, D., & Berler, M. (2020). Semi-structured interviews. In V. Zeigler-Hill & T. K. Shackelford (Eds.), *Encyclopedia of personality and individual differences* (pp. 2346-2352). Berlin: Springer.
- Martinez-Monteagudo, M. C., Delgado, B., Diaz-Herrero, A., & Garcia-Fernandez, J. M. (2020). Relationship between suicidal thinking, anxiety, depression, and stress in university students who are victims of cyberbullying. *Journal of Affective Disorders*, 286, 112-119. <https://doi.org/10.1016/j.jad.2020.02.039>
- Mat Sood, S. M., Tan, K. H., & Abdul Hamid, B. (2020). Cyberbullying through intellect-related insults. *Jurnal Komunikasi: Malaysian Journal of Communication*, 36(1), 278-297. <https://doi.org/10.17576/jk-2020-3601-15>
- Naylor, E., & Fellar, E. (2019). Cyberbullying: Harassment at your fingertips. *Rhode Island Medical Journal*, 102(9), 7-9. <https://pubmed.ncbi.nlm.nih.gov/31675779/>
- Nesi, J. (2020). The impact of social media on youth mental health: Challenges and opportunities. *North Carolina Medical Journal*, 81(2), 116-121. <https://doi.org/10.18043/ncm.81.2.116>

- Ortner, C., Sinner, P., & Jadin, T. (2018). The history of online social media. In N. Brügger & I. Milligan (Eds.), *The SAGE Handbook of Web History* (pp. 372-384). New York: SAGE Publications.
- Pitsoe, V., & Letseka, M. (2013). Foucault's discourse and power: Implications for instruction classroom management. *Open Journal of Philosophy*, 3(1), 23-28. <https://doi.org/10.4236/ojpp.2013.31004>
- Rahman, M. S. (2016). The Advantages and Disadvantages of Using Qualitative and Quantitative Approaches and Methods in Language "Testing and Assessment" Research: A Literature Review. *Journal of Education and Learning*, 6, 102-112. <https://doi.org/10.5539/jel.v6n1p102>
- Riger, S., & Sigurvinsdottir, R. (2016). Thematic analysis. In L. A. Jason & D. S. Glenwick (Eds.), *Handbook of methodological approaches to community-based research: Qualitative, quantitative, and mixed methods* (pp. 33-41). Oxford: Oxford University Press.
- Rusli, M. F., Aziz, M. A., Aris, S. R. S., Jasri, N. A., & Maskat, R. (2018). Understanding Malaysian English (Manglish) jargon in social media. *Journal of Fundamental and Applied Sciences*, 10(2S), 166-175. <https://doi.org/10.4314/jfas.v10i2s.10>
- Subaramaniam, K., Kolandaisamy, R., Jalil, A. B., & Kolandaisamy, I. (2022). Cyberbullying challenges on society: A review. *Journal of Positive School Psychology*, 6(2), 2174-2184. <https://www.journalppw.com/index.php/jpsp/article/view/1796/1013>
- Trimastuti, W. (2017). An analysis of slang words used in social media. *Jurnal Dimensi Pendidikan dan Pembelajaran*, 5(2), 64-68. <http://dx.doi.org/10.24269/dpp.v5i2.497>
- Weiyen, L. (2015). A historical overview of uses and gratifications theory. *Cross-Cultural Communication*, 11(9), 71-78. <https://doi.org/10.3968/7415>
- Wu, S., Lin, T., & Shih, J. (2017). Examining the antecedents of online disinhibition. *Information Technology and People*, 30(1), 189-209. <https://doi.org/10.1108/ITP-07-2015-0167>
- Yosep, I., Hikmat, R., & Mardhiyah, A. (2023). Nursing intervention for preventing cyberbullying and reducing its negative impact on students: A scoping review. *Journal of Multidisciplinary Healthcare*, 16, 261-273. <https://doi.org/10.2147/JMDH.S400779>
- Zhong, J., Qiu, J., Sun, M., Jin, X., Zhang, J., Guo, Y., Qiu, X., Xu, Y., Huang, J., & Zheng, Y. (2022). To be ethical and responsible digital citizens or not: A linguistic analysis of cyberbullying on social media. *Computers in Human Behavior*, 13, 789-799. <https://doi.org/10.1016/j.chb.2022.107423>