



THE LINGUISTIC IMPACT OF ARTIFICIAL INTELLIGENCE ON HUMAN COMMUNICATION: A STUDY OF AI MEDIATED LANGUAGE CHANGE

Zarmala Khan

BS English (Linguistics), Institute of Management Sciences, Peshawar

Email: zarmalakhan29@gmail.com

Abstract

This paper aims to explore the linguistic consequences of the artificial intelligence (AI) on human interaction and understand how artificial intelligence-mediated interactions affect the language construct, practical application, emotionality and linguistic inclusivity. The study uses a mixed-method approach to analyze survey data taken by two categories of survey participants, i.e frequent AI users and non- or low-frequency users and takes on five key objectives, i.e. an analysis of syntactic and stylistic changes in AI-mediated communication, a comparison of human-generated language and AI-generated language, user adaptation and perception, the impact of AI on minority languages, as well as the development of inclusive design practices. The results show that those who use AI have simplified syntax, employed formal and neutral tones and corrections of the AI to create more emotional and cultural appeal, a functional response to the logic of the machine. On the contrary, non-AI users are interested in the authenticity of their relations, subtlety in emotional communication, and social responsibility in the use of language based on human dynamics. The two factions complain that the use of AI is emotionally desaturated, fails to add context, and does not work in favor of underrepresented languages such as Pashto, Hindko and Khowar. The study highlights a collective need of AI systems, which are emotionally intelligent, linguistically inclusive, as well as culture-aware. In theory, the thesis contextualizes AI-mediated language as a peculiar sociolinguistic realm between human deliberate agency and algorithmic design, which is in line with the current debate in digital sociolinguistics and ethical artificial intelligence. It harshly criticizes the nature and the danger of the existing AI technologies to enable the reinforcement of linguistic uniformity and marginalization unless it is specifically preconceived that the existing technologies will promote linguistic equality. Finally, the thesis is a demand of AI communication tools that maintain the traditional expressive fullness, range and cultural imbedding of human language but that will also be able to assist in functional efficiency as the world continues to move in the digital direction.

Key words: *AI-Mediated Communication, Linguistic Adaptation, Digital Sociolinguistics, Culturally Inclusive AI, Language Representation*

INTRODUCTION

Background

With the era of rapid change due to the impact of digitalization, artificial intelligence (AI) has been one of the increasingly dominant factors in the lives of people to influence the process of human communication. AI technology have become more of lingual intermediary, whether it is everyday use of virtual assistants and chatbots, academic writing helper and automated translation. Such systems built on large language models (LLMs) do not equally reproduce human language but act as mediators, rearrangers and shapers of language use. With increasing involvement of algorithmic processing in communication, there is a key question of how the communication through AI can influence the nature, form and variety of human language. Although it has been many times whether AI systems are right in a technical sense and what they are able to do, it has not been understood yet rather well how they affect society, especially in the realm of language. The existing studies to a large extent focused on the efficiency and



usefulness of AI with a little consideration on how such systems transform linguistic behaviour, adaptation by the user, expressiveness of emotions and recognizability of minority languages. Since AI-made language approaches all spheres of education, professional language use and personal communication, it is necessary to consider the impact it has on syntax, passion, pragmatics and linguistic representation critically.

This thesis aims to fulfill that gap by examining the linguistic and sociocultural implication of AI-mediated communication. Using the lense of changes in language use, communicative behaviour and identity negotiation provided through the perceptions and experience of AI users and non-users using a comparative mixed method approach will enable an analysis of the differences in the way language is used, behaviour the communicator will undertake to communicate with or without AI. Along with the overall view of the impact of AI on exactness of syntax, intonations, affective appeal and use or non use of minority language like Pashto, Hindko and Khowar receive special attention. It has five main aims: (1) to research the impact of AI on linguistic aspects, (2) it compares AI mediated and human mediated communication, (3) the user adaptation of AI language , (4) the risks that AI poses to endangered languages, (5) the strategies of AI design that can be inclusive and culturally sensitive. This study is relevant to new academic discussions in digital sociolinguistics, ethical building of AI and language justice by challenging the assumption in AI that it is a neutral tool instead of a linguistic agent with power to transform.

Research Objectives

This study aims to achieve the following objectives;

1. To study the ways in which AI affects how people communicate using language. We seek to find out how Chatbots, Virtual Assistants and Generative Language Models change human language structure and function. In this study, we will pay attention to syntax, semantics and pragmatics as parts of language. The purpose is to find out if frequent use of AI can change how individuals form sentences, select vocabulary or talk with others using speech norms.
2. To explore the way AI systems impact language, by analyzing responses created by non-AI users and responses produced by AI users. In this objective, we will evaluate language created in situations with AI tools against normal human-to-human talk. The goal is to find out if AI introduces novel rules to language, sticks to how we talk now or leads to soft changes in wording over the years.
3. To look into how users are coping with communicating through AI and what they think of it. It studies user's opinions of how well AI-generated language is fluently structured, makes sense, can be understood, expresses emotions and seems trustworthy. The research will examine how users respond or react to communication styles seen in AI systems.
4. To discover the main risks endangered languages are exposed to. The priority is to examine how AI influences the variety of languages, mainly for minority and critically endangered ones. AI systems are frequently prepared using big collections of data, mostly in English which might make it harder for minor languages to be recognized. This research seeks to determine if AI technologies downplay these languages or leave them out which may cause their speakers to abandon them.



5. To create practical and right suggestions for improving how AI systems work with different languages and cultures. The aim is to strengthen AI so it can write language that matches the situation, stays understandable and is relevant to each culture.

Research Questions

1. How does interaction with AI shape conversational norms, vocabulary and syntax in users?
2. Are users adopting simplified or AI optimized language patterns for better interactions?
3. How AI is influencing non-verbal communication?
4. How does AI-Mediated communication affect endangered languages?
5. How do AI-mediated communication systems adjust responses based on cultural, social, and situational context?

LITERATURE REVIEW

The rapid adoption of AI within communication platforms has drastically transformed the ways in which language is created, transmitted and understood by humans. The change of AI from passive tool to active part of the interpersonal process has caused noticeable changes in the patterns of language at different levels – at the level of individual word and at the level of overall discourse structure. Recent studies underscore that such AI platforms as ChatGPT, Meta and other linguistic models transcend facilitating communications and instead become tools for changing language itself through altering grammatical systems, pioneering new styles of conversation and influencing practices of discourse. Such scholars as Guzman and Lewis (2019), Hancock, Naaman and Levy (2020), Lopez Jimenez and Quariachi (2021), Wiesenbergs and Tench (2021) and Saadat et al. (2024) have carried out research that provides a valuable insight into the manner in which AI systems regulate human expression, redefine authenticity and influence both standardized and diverse linguistic practices. Working in a unified fashion, these investigations lay a robust groundwork for theory and practice on how to analyze the evolving role of AI in defining the course of language. Hence, it is also important to investigate how the expanding position of AI in human communication forms the language.

Thematic Literature Review

The study of Guzman and Lewis (2019) provides a fundamental theoretical basis for the realization of the important change in human communication. In their detailed work they emphasize the Human Machine Communication (HMC) framework that they reiterate as being an emerging area of communication that questions the long standing communication focus on human interaction. In the past, most communication research focused on how people use technology to share messages but now interactive AI technologies such as voice assistants, socialbots and automated writing tools are turning into their own proactive communicators stepping out from serving as tools. This shift alters the conventional line between humans and machines and forces experts to rethink conventional approaches to studying communication. From the point of view of language, this change has a good deal of significance because it indicates that machines now are involved in the process of meaning-making: not only do they facilitate exchanges between humans in their language's form and structure, but they also influence its form and structure. As all communicative artificial intelligence technologies are designed to operate dynamically; adapt responses and learn from man, context-specific language patterns emerge that may grow on their own apart from the traditional human linguistics standards differentiating them from previous media tools.



Hancock, Naaman and Levy's (2020) work offers a basic framework for interpreting how artificial intelligence is progressively integrated into human communication, so producing what the scholars define as AI Mediated Communication (AI-MC), a mode in which AI agents actively generate, alter and enhance messages, so influencing not just the mechanics of interaction but the language itself. This change brings computational logic into communication which is converting the way linguistic forms evolve in digital surroundings. One of its critical themes is that artificial intelligence-mediated communication technology, from auto complete to smart responses, and natural language generation tools, conveys subtle influence on human communication by adding pre-selected phrases and emotional cues, tilting linguistic choice toward common and positive expressions such as "Sounds great!" without the awareness of the users. In this way, artificial intelligence becomes a powerful linguistic body not only structuring individual communication but also the collective ones. Apart from mutating the ways we frame our words, AI-MC modifies the way we employ polite speech, tell jokes and convey emotions. The extensive use and promotion of dominant speech styles is causing a risk of marginalizing regional dialects, sociolects and gendered variations which is posing a dual potential of either uniting or fragmenting language norms. This study investigates how AI-MC affects self-presentation and interpersonal relationships by stressing how AI curated messaging creates uncertainty about authorship and authenticity, which is a reason for generating phenomenon like "replicant effect" in which mistrust of AI participation compromises confidence in digital communication. Ethical concerns also appear particularly in relation to artificial intelligence's tendency to reflect and propagate prejudices ingrained in training data as well as the dangers of enforcing homogeneous communicative rules that might marginalize many language identities. As artificial intelligence mediated communicative tools get more advanced, questions about openness especially the need to reveal AI help in message production became even more important. In essence, the paper presents AI-MC as a transitioning participant actively changing language and warns against careless design and ethical oversight since AI can standardize communication in ways that reduce linguistic diversity and interpersonal authenticity.

Lopez Jimenez and Quariachi (2021) examine in great detail how the landscape of human interaction is changing as a result of the incorporation of automation and artificial intelligence into communication practices. Their research demonstrates how AI technologies impact the communication industry by automating repetitive tasks, freeing up professionals to focus on strategic, creative and analytical duties. The findings highlight AI's primary role in improving productivity and efficiency as well as the massive change that currently characterizes generation, transmission, and meaning-making of language. This is particularly true of such operations as digital interaction management and press release composition, which are using automated content creation. The findings were obtained using expert panels, discussions with focus groups, and detailed analysis of relevant published works. The study really portrays that though artificial intelligence is able to get repetitive work done efficiently, it still lacks in recreating basic human elements, like creativity, emotional sensitivity, and high grade decision making.

Wiesenberg and Tench's (2021) study provides the first extensive, quantitative examination of artificial intelligence function in strategic communication from the point of view of practitioners. It displays a fundamental investigation into how AI is viewed, comprehended and used by communication professionals throughout Europe. This work analyzes knowledge



of professionals and their use of AI; it examines the expected effects on communication management, the obstacles to AI integration and perceived risks using data from 2,689 communication professionals in 50 countries.

Saadat et al. (2024) in their comprehensive analysis discuss how AI tools (from language models like ChatGPT) are changing how language evolves and how communication practices are changing online. The scholars reason AI speeds up changes in language by bolstering traditional norms and at the same time creating new slang, vocabulary and linguistic combinations. Such dynamic moves AI from passive enabler to the role of an engaging player. According to the study, AI is used to both unify linguistic norms and to provide new forms of linguistic diversity. AI has one of its impacts in the form of homogeneity, since it uses globally recognized grammatically consistent English in its predictive features and in its creation of content, making communication clearer but also endangered regional accents and idioms and creative language forms.

Collectively, the reviewed literature highlights how artificial intelligence is revolutionizing modern communication practices, especially through the incorporation of language models that affect efficiency, tone, register and message construction. The discussed studies provide useful conceptual and empirical underpinnings for comprehending AI effect on communication in digital, educational and organizational contexts. The investigations fall short to address the more profound linguistic and interpersonal aspects of communication mediated by AI. In particular, previous studies have not thoroughly explained the comparative dynamics between AI generated and human generated language, nor have they adequately investigated the ways in which AI systems support long term language evolution at the levels of syntax, semantics and pragmatics. Additionally, there is little information about how users perceive the risks to linguistic diversity, especially with regard to endangered languages and how they adjust to AI mediated discourse. By examining not only the linguistic changes brought about by AI but also the human experiences, adaptations and vulnerabilities connected to the shifts in technology, this study will fill important gaps. By doing this, it seeks to advance a more thorough comprehension of the AI impact on communicative identity, language change and the direction of human interaction in future.

METHODOLOGY

This research work applies a qualitative mixed-methods research design to evaluate the linguistic, functional and cultural dimensions of the AI-mediated communication effect. Considering the fact that the research spans across sociolinguistics, discourse analysis and human-computer interaction, the mixed-method approach is chosen as the one that will allow covering the observable patterns in the language use and the subjective experience of the research participants. The methodology is geared towards the achievement of five research objectives which analyze dynamic aspects of syntax and pragmatics, adaptation of users, styles of communication, threats to linguistic variability and user-guided approaches of creating culturally sensitive Artificial Intelligence. A combination of quantitative and qualitative data allows understanding in full the way the AI technologies influence human communication. This method enables not only to identify trends within the groups of participants, but to analyze more closely the implications of the meaning of user choices, actions and impressions.



Sample

The participants are chosen through the stratified purposive sampling technique where 60 participants are selected but their differences within the various pertinent subgroups are ensured. The sample is split in two groups:

Group A: The AI Users (n = 40)

The population of this type of group uses AI on the regular basis to make communication or writing. This group includes users of ChatGPT, Google Assistant or Alexa. They are chosen according to their frequency received on a measurement and a familiarity with the text-based AI systems and at least two times per week being used.

Group B: Non-AI Users (n = 20)

In this group, there are those who mainly use communication mediated by a human such as messengers, email or social media, but who do not regularly use AI tools in language and communication. Such participants offer essential information on how AI-based systems signify, or lack the ability to signify, the non-dominant linguistic community. Although the sample size is small, it was large enough to employ comparative study in a focused and in-depth way in line with the goals of the research.

Analysis Process

Analysis of the structured responses of the survey and qualitative thematic analysis of the open-ended responses. These approaches allow triangulating data and depth in their interpretation of the findings.

Survey Design and Administration

The two parallel surveys are created, one targeted at the AI users and the other one to non-users. All of them have demographic questions, Likert-scale questions and multiple-choice questions, and also open-ended questions which vary according to whether a participant experienced AI interaction or not. The survey include some sections, which covered the issues of language preferences, emotional tone, perceived effectiveness of the final communication, the awareness of the linguistic behavior of AI, and the attitudes toward language representation.

The surveys are carried out online by means of computerized forms. The focus group is voluntary and any kind of responses was anonymized. The surveys are written in simple English and clarifying phrases are given where necessary so that it can be understood.

Quantitative Analysis

The multiple-choice and Likert-scale responses formed quantitative data, which are presented in a descriptive manner that uncover patterns and frequencies between the two categories of users. This included:

- Usage of AI frequency
- The AI-generated responses were viewed as grammatically correct or not
- Emotional tone, naturalness of language and trust ratings
- Feelings about using AI to support or reject the minorities languages

The analysis is directed to reveal the general patterns and to mark the differences in behavior and attitudes of the participants in the comparison aspect. Manual review, categorization and tallies of data summaries are done to determine the contrasts between AI and non-AI users. The interpretation of visible patterns that are present in user responses is given priority instead of using statistical modeling, in order to match them with the thematic and linguistic issues that are presented in the objectives of the study.



Qualitative Thematic Analysis

A thematic coding framework is used to analyse open-ended responses and identify patterns of user behaviors, perceptions and emotional disposition towards an AI-mediated language. Themes that reappeared again and again were:

- Linguistic change of adaptation to AI language structures
- Post-processing editing of AI responses
- Emotional expressiveness issues
- Personalization and Linguistic genuineness
- Misrepresentation or omittance of regional languages

Answers are manually encoded and compared in both these groups so that a clear mapping can be established of user experiences and so as to retain validity of interpretation. The categories in coding are iterative and are further developed according to the emergent themes in the information and are based in the five objectives of the research in the study.

Comparative Synthesis

The last analysis step is cross-group comparison, in which the quantitative summary and qualitative details are integrated to establish viable comparisons across AI-mediated communication and human-mediated communication. Such a side by side comparison enabled a well-organized experiment in which the varying use of language, perception and adaptation are examined in varying prevalence of the absence or existence of AI. The results are reported in thematic format to four analytical chapters to respond to the core research aims and evidenced by the voice of participants and contextual interpretation.

CHAPTER 4

ANALYSIS AND DISCUSSION

The discussion part of this thesis outlines a close investigation of the linguistic, sociocultural, and perceptual changes that have occurred in connection to communication mediated by AI with reference to responses carried out through surveys with AI users and non- or low-frequency AI users. The analysis present the impact of artificial intelligence on the language use, user adaptation, communicative behavior, and linguistic inclusiveness, arriving at the issues of minority languages representation. The chapters are explored through comparative and interpretive frameworks in order to provide answers on both the functional capabilities and the sociolinguistic shortcomings of AI-generated language. This discussion will offer more than answers that describe how AI is transforming communication within the human sphere; through the lenses of the user in coordination with the theoretical elements of sociolinguistics, discourse studies, and critical digital linguistics. This analysis will be able to reveal the active roles that human users play in reshaping, transforming and resisting emerging linguistic changes.

Language Use in AI-Mediated vs Human-Mediated Communication

The comparative linguistic research between the AI users and non-AI users brings out substantive and measurable linguistic changes in the construction, expression, and adaptation of linguistic communication in AI-mediated ecologies. Such language changes do not only concern the superficial aspects of language like grammar or vocabulary, they also affect the more profound aspects of interactional pragmatics, like tone modulation, communication purpose, and awareness to the audience. The use of AI technologies can be concluded by cross-comparing the results of a survey of users: the overwhelming majority rely on generative



technologies like ChatGPT, Alexa, and Google Assistant in their communicative activities: to think out academic writing or to rewrite email messages and create summaries. With constant communication, consumers have embraced rules of communication that incorporate simplification of the syntax, standardization of lexicons, and formal and neutral tone to promote readability by machines. These modifications signal a new understanding of the interpretive deficiency of AI as well as an aware reformulation of language to correspond with algorithmic demands. This action in sociolinguistic terms is a good example of linguistic accommodation but in a very unequal and transactional sense. In contrast to the human-to-human accommodation which is relational and reciprocations, the adaptation connected to AI is efficacy-driven and accurate instead of focusing on expressiveness and creativity. At that, as one of the participants stated, "I make my inputs as precise and formal as I can: otherwise, AI gives a vague response or not matters at all," which reflects how the algorithm itself defines the parameters of communication so that promoting a transactional approach toward the language use instead of the social-impregnated discourse.

On the contrary, users who do not use AI, in spite of being so entangled in the world of digital communication, demonstrate much less algorithmic efficiency in their language practices and root them in social responsiveness and situational adaptability. These reactions indicate sensitivity with regard to the emotional attractiveness and relational touch. The lexical choice, tone and structural elements are shaped by the familiarity of audience, social situation, which is to be evoked and the emotional purpose. To provide an example, one respondent said that when writing to a teacher and a friend, they did not write in the same manner, used emojis, slider, informal vocabulary in one case and a form of register in another case. This type of interactional variety indicates a humanistic interest in language or being concerned with situational and contextual suitability, emotional compatibility and cultural authenticity. When responding to the question concerning the indicators of positive communication, AI users tended to mention such aspects as clarity, grammar accuracy, and structural integrity which can be enhanced with the help of AI tools. On the other hand, the non-AI users emphasized more on emotional expressiveness, authenticity, and cultural sensitivity as vital communicative values. These conflicting views are reflected in the general theoretical conflict between transaction and interaction models of communication. The users of AI are increasingly coming to conceptualize language as an information sending tool, which has been influenced by the repetitive nature of the use of the computational tool, but those who do not use it carry the interactional conception of language, where language is seen as a means of identity negotiation, creating a relationship, and sociocultural expression. This difference can also be shown by the way the users perceive and practice tone. It has been observed that the outputs of AI models are too neutral, or too formal, or too monotone, and their users are forced to manually edit and modify the responses to suit the requirements of the audience in terms of their mood or situational demands. Non-users were, in contrast, fluid in an intuitive command of tone modulation and easily able to move in and out of humorous, intense, or subtle expressive styles without systemic limitation.

In addition, there appeared a big gap in the lexical diversity and the cultural representation between the two groups. The users of AI expressed the desire to use a standardized vocabulary that can be characterized as scholarly or formal in nature- which stems to have been included in the training corpora of the AI. This lexical conformity helps reinforce the lack of representation of the native expressions which are idiomatic, regional, and culturally



entrenched expressions especially by those minority people who speak lesser spoken languages like Hindko, and Khowar. Such users claimed that they used native languages very rarely when talking to AI citing the answers they received as being literal, stiff or even culturally inappropriate. In contrast, the non-AI users also described a high rate of the comfortable use of the local and the culturally context language in daily communications. However, such linguistic diversity seems to be lost in AI-mediated community, which is consistent with theoretical criticism of Deborah Cameron (2001) and Norman Fairclough (2001), who warn about technologization of discourse and the displacing of non-standard varieties through systematized standardization. The results reveal that the dependency of AI on prevalent language rules may redefine the user behavior in an unobtrusive manner in the long run, promoting adherence to the algorithms-friendly standards. Awarding a group of AI users, some admitted to having already started using simplified or formalized patterns of language, obtained by means of interacting with AI, at a daily level communication, even at the level of text messages and scholarly writing. It implies not just a local adaptation of the AI interaction, but a spillover effect, in which the lingo of the AI applies to a wider protect or communicative patterns. By contrast, non-AI users are subject to the concept shackles of communicative ideologies as constructed by society since they subscribe to such practices as informal tone, personalized expression, and language use with an emphasis on context. Both these tendencies indicate an underlying ideological contrasting divergence: AI users are drifting towards a functionalist and system-based vision of language, whereas non-users continue to share a relational, expressive and culturally-based perspective of language. Such results raise serious concerns regarding the future development path of language within digitally mediated cultures, to be directed either toward linguistic conventions being drawn towards the ease of algorithmic performance or resisting by insistence on the retention of human specificity and emotionality and cultural diversity.

User Adaptation and Perception of AI-Generated Language

This chapter addresses the linguistic aspect of how users interpret the linguistic characteristics of the AI generated language and the adaptive behaviors they resort to in order to equate with the functional, stylistic and expressivity constraints related to the limitations of using machines to communicate. The results can be explained based on the data of the surveys of people who have a regular experience of using AI tools, including ChatGPT, Alexa and Google assistant, as the results indicate that there is not a straightforward correlation between trust and the sense of user control, communicative efficiency, and the alignment of language. These findings are compared to the data of non- or less-frequent AI users, whose preferences are either based on a slight firsthand experience of AI or observation of AI use by the means of social media and the media in general. One of the most important observations that could be made based on such a comparison is that in evermore normalized AI-mediated communication, not only do the specifications of the user expectations, as regards to the quality of language, alter in favor of clarity, grammaticality, and formal structure, but the expectations related to the emotional affect, conversational genuineness and interpersonal pertinence are also affected. The majority of AI users recognized linguistic competency of the AI especially its capacity to provide grammatically more or less correct and syntactically coherent answers. They observed that it is productive in school and work activities, particularly at the time when clarity and accuracy mattered. Some statements are of the form of “I use AI when I cannot think of how to begin a sentence or how to construct a paragraph and they show that I saw AI as a linguistic scaffold”.



These users tend to perceive AI as a useful communicative aid, which increases communicative clarity, at the expense however of its inability to convey spontaneity, or human-like affect.

Although AI users value structural precision, there is a collective consciousness of emotional and pragmatic flaws in structured messaging in AI applications. Although they admire how fluent and clear the results of AI are, a large number object that the materials lack the emotional warmth associated with other personalities, spontaneity, and the ability to adapt to social interactions. They also describe an AI response with adjectives such as robot-like, impersonal, or flat, and they tend to give a response to a survey question that either do not support a positive or negative response to questions on whether AI communication is natural or emotional. Several respondents also acknowledge post-editing AI results by including emotional or emotionally appealing language, slang, or their own individual terminologies so that they can connect better with the material and the general society. These results indicate that the AI interaction is likely to be describe by two-stage process of communicating: preliminary drafting with the help of AI and subsequent correction by humans to match the social-emotional demands of a particular situation. In its turn, non-AI users, being less acquainted with these tools, proved to be more doubtful in their communicative validity. Their answers contextualize the language of AI as dispassionate, unreliable and lacking a personal tone of voice. Most of the non-members are negative or unsure when responding to the idea of their expressed linguistic or cultural identity through AI. The underlying issue in this community involve the notions of genuineness and emotional appeal and they feel that AI would never be able to emulate the same. This difference in user orientation is significant: users of AI show a pragmatism adaption threshold and post hoc control and non-users show principle rejection with reference to perceived breach of communicative sincerity and personal expression.

The differences are further exemplified in the type of communicative approaches that each group has. Users of AI said that they intentionally make their entries less complex, less ambiguous, and similar to the previous wording of AI as a way of maximising the quality of output. It means that it is a kind of self-regulation within the linguistic system because the users understand the logic of operation of AI and follow it but in a healthy one-sided and non-reciprocal way, corresponding to the theory of communicative accommodation. The AI will not adapt and change its behavior in response to the tone and intonation of the writer as it would be done with living interlocutors, but the users adjust their language to fit the preferences of the algorithm. Non-AI users, however, demonstrate the sensitivity of their communication both to the audience and situations, varying their style as they see fit to the situations at hand, professional with work mates, informal with friends, emotional when talking to family. However, what the two groups have in common is the realization of the boundaries of AI in conveying emotional depth, humor, sarcasm, or expressing cultural peculiarities. Some of the AI users mention specifically trying to avoid AI in emotionally sensitive situations, due to recognition of the incapacities of AI to be emotionally empathetic or subtly interpersonal. The areas to improve are suggested as allowing the setting of a custom tone, improving the understanding of emotions and integrating culturally informed language modeling. On the one hand, the user expectations have changed with some participants emphasizing AI systems that can imitate the regional speech patterns or tonal differences. More and more users are interested to have AI systems not as a provider of linguistic correctness but rather an agent that can interact with language as social, cultural, and emotional practice. The increased use and demand suggests a questioning of the communicative purpose of AI: the use of language no



longer remains a set of neutral, instrumental functions; from the perspective of those who use it, language is itself social, entangling identity, the creation of relationships and cultural membership. Such observations imply that syntactic fluency may not be enough to bring about the legitimization of AI as a valid conversation participant; the technology in question should be made capable of interacting with human aspects of speaking and writing.

AI and Linguistic Diversity- Representation of Minority Languages

The combination of artificial intelligence and linguistic diversity continues to bring up alarming issues about representation of language, cultural inclusiveness, and marginalization of non-dominant lingual groups. The development of AI systems as a point of focus of global communicative infrastructure contributes to more than delivery of information with AI systems being a generative and stabilizing factor in the development of linguistic hierarchy. The implicit assumptions guiding the construction of the AI training clusters, structure of the system, and design of linguist formats define the range and scope of the languages represented and, more importantly, how they are represented and deemed as acceptable to digital communication. The concern that is found in both the users and non-users of this AI indicates a general worry that the high-resource languages (especially English and to an inordinate degree, normalized national languages like Urdu) are being represented more when compared to the less popular ones (e.g. Pashto, Hindko, and Khowar). According to AI users, when they tried using their native languages in AI, they would often receive inaccurate grammatically, semantically obfuscated, or completely disregarded results. In numerous cases, instead of failing to read the regional data, AI resorted to English, which give rise to the fact that users are implicitly forced to use languages other than their own when interacting with computers and any other digital environment. This situation is not simply due to a technical overlooking but system is designed in such a way that it allows dominant languages around the world to take prevailing power yet quietly marginalizes those particular linguistic identities that are local in the process. The same concerns were voiced by non-users, who may not be engaged directly with AI but are afraid that the rapid development of this technology would lead to the proliferation of homogenized discourse that will further endanger the existence of minority languages, forcing out the local linguistic expression in both private and public spheres of communication.

Social and ethical considerations of such marginalization are not limited to restriction of AI functionality. Even in the situation where AI systems are technically capable of using regional languages, the users stand to report that results of language choice are not culturally relevant, do not carry idiomatic expression and pay little attention to contextually appropriate form of address. As one example, Pashto-speaking respondents are observed to remark that where in some cases AI can present grammatically perfect hashes, lacking any culturally relevant vocabulary, the resulting communication can be considered sterile, aloof, even insulting without any form of intent. It is noticed by other users that informal dialects will automatically be overridden by an AI preference of standardised forms thus helping to reduce the diversity and authenticity of local languages. This process is a technological induced language change, whereby the language users discard their own linguistic norms either consciously or subconsciously and adopt machine readable conventions and thereby compromise the process of language transmission across generations as well as usage of the language. Non-users do not express the ideas of disenfranchisement as directly, but they have the same sense of their inability to connect with the idea of digital. Ironically enough, their readiness to use the AI



tools is much greater than it currently is, provided that the systems can prove their ability to instigate and reciprocally identify the linguistic and cultural identities of their users. According to one of the participants, “AI will be more reliable when it will be able to communicate with me in my language”. The type of sentiments highlight the affective and symbolic value of linguistic representation in the digital world; a lack of representation of a user language by AI is not only a failure of functionality, but also of psychology, a lack of belonging in the digital world in the view of cultural censorship. Therefore the conversation on AI and language cannot only be seen in terms of access or efficiency, but dwelling on recognition, identity, and social cultural legitimacy in an algorithmically mediated world.

There are fears about the long-term sustainability of languages particularly among speakers of regional and minority languages. One of the concerns is that the younger generations will eventually become less fluent in their native language in the possible absence of deliberate AI assistance so that educational, workplace, and social activities will become more and more digitized and AI-immersed. Respondents have underlined that information their languages perform more than a communicative one, it is the historical, spiritual, and intergenerational wisdom; exclusion of their language in AI technologies indicates inability to sustain the cultural continuity. In reacting to this, users suggested tangible actions such as increasing AI training data to encompass dialectal and regional linguistic contrast and include native speakers of language in program development and creation of multilingual interfaces capable of giving cultural-specific responses. These observations are similar to those made by academic authors like David Crystal (2000) and Tove Skutnabb-Kangas (2012), who believe that digital marginalization has the potential of being linguistically genocidal, i.e. whereby language loses any functional significance within the day to day life since it is not represented in mainstream technologies. The respondents participating in the present study give voice to a demand of AI systems that will go beyond the superficial understanding of multilinguality by being ethnolinguistically aware, i.e. have to interact with language as culturally embedded practice of identity affirmation. The effects of non-acquisition of such inclusivity are wider than language disenfranchisement: it also translates to trust, adoption, and perceived legitimacy of AI systems themselves. In cases where users feel that their language is underrepresented or underestimated, they will not be ready to use AI tools, which will only intensify the digital inequality loop. In this sense, linguistic exclusion does not only present a situation of communication; it is a socio-economic and cultural disadvantage that creates unparalleled differences in access, representation, and involvement in technology in a world where language also serves as a right and a resource.

Towards Inclusive and Culturally Sensitive AI Design

The growing centrality of artificial intelligence in human communication has led to a shift in the questions defining the contemporary inquiry not on whether AI is going to affect language but how AI is inevitably going to be developed ethically and linguistically to account for the communicative, cultural, and emotional diversity of its users. The increased presence of AI technologies in education, workplace, arts, and social environments make AI is not only the tool of language processing but a cultural actor that is involved in the perpetration of the imagery of language usage, perception, and value. The research results on users and non-users of AI show an evident agreement that the current AI systems are not adequate enough in terms of emotional disposition, cultural focus, and linguistic variation, and this is true despite the high semantics in acceptable grammar and structural integrity. Respondents raised the



necessity of AI systems getting out of the box of syntactic accuracy and into the more humanistic matters of the communication, including style variation, local expressions, and culture-based communication affect. The technical utility of AI, as applied to such a task as a summary, paraphrase or editing, is recognised often by AI users. However, such functionality is always counterpoised with criticisms of the expressive deadness, robotic impersonality, and lacking cultural interest of AI-generated responses. Some of the respondents talk of adjusting AI output regularly, to add human warmth, tone, or culturally specific language to it, and it is clear that, despite having a grammatical shell, the user is still very much on the hook in terms of being emotionally and contextually correct. Non-users additionally emphasize that there is no possibility at the current level of AI being able to interact with the nuances of social communication and personify or regionalize the personal style of communication. However, the willingness to interact with AI is similar, i.e., under the condition that the future systems will exhibit more adaptive, personal, and linguistically inclusive features.

The suggestion that received one of the strongest responses in both AI users and non-users is that AI systems need to improve their integration and support of minority and regional languages. Individuals speaking Pashto, Hindko and Khwar all complain consistently that these languages have no representation (or inadequate representation) in the current AI interfaces. In these cases where the AI tools may have identified the inputs entered into these languages, the output achieved may be condemned as being too literal or worse described as being awkward or even culturally insensitive negating the intent of the communication and reducing the likelihood of further utilization. The participants request AI systems to be taught national languages, as well as different dialects and many-faceted data sets, reflective of actual contextual use of the language. These involve appreciating regionalisms, correct interpretation of culture specific honorifics or terms of reference, and preventing a mistaken association between dialects and languages that are not related. The broader demand of linguistic justice in the face of technological inequality expresses itself through these appeals, the notion that every language, no matter how little it is represented at the global scene, or how poor is its economic value, still has its right to be considered and addressed by the means of any technological system. Along with the aspect of linguistic inclusion, the listeners provide feedback with the need to personalize the tone and formality, and stylistic register. The users of the AI explain that AI may provide factually accurate information, even though in some instances this information may lack the interpersonal touch required in emotionally sensitive or even informal situations, even though it may be correct in the factual sense. Respondents demand the possibility to switch between different set tones (e.g. formal, casual, empathetic, humorous), to customise writing style to an audience and to make the system more consistent with the personal or regional style of speech. These requirements emphasize the inherent need that language has on communicating and establishing identity and trust such that systems that do not identify with language preferences of users will not attract their trust and support.

Additionally, participants raise significant issues on ethical and normative aspects of AI design, especially in the areas of privacy, transparency, and the sociolinguistic implications of algorithmic bias. Of particular concern to non-users is an uninformed ability to store, manipulate, or reuse their linguistic inputs. Some respondents suggest that there should be open policies on data handling and consent systems to be used to explain the flow of linguistic contributions to language models. Others advanced more community-based systems of governance where speakers of underrepresented languages will be involved in managing how



their languages are used, modelled, and deployed by AI systems. These modes of participatory design have become very popular among these two user groups as an avenue of guaranteeing the depth of the lived-in linguistic representation and not just its very skin-deep, superficial tokenism. The participants also propose that AI systems must enable users to customize features that include tonal inflexions, vocabulary lists, and cultural references; they opine that the system must be adjusted to the user; instead of the user having to adjust to the system. Lastly, a few of the individuals touch upon the pedagogical value of AI, cautioning that a fixation on a common standard of language application might result in the entrenchment of linguistic power structures, particularly amongst the younger generations. The hysteria that the regional dialects will be misunderstood as unconsciousness unless it is recognized or sufficiently represented by the AI system reflects the potential of AI in causing language shift. On the other hand, the participants also imagined the use of AI as language renewal means, which would allow it to record the dying languages, go into describing grammar and vocabulary to people learning them, and give direct translation assistance. All these insights show that AI should not be seen as the means of efficient communication only but as the sociocultural phenomenon that is likely to either deteriorate linguistic inequality or finally contribute to the existence and thriving of linguistic diversity.

[Synthesis and theoretical Implications](#)

Artificial intelligence is no longer simply a technological instrument, but has developed into a social and linguistically interactive system that dramatically alters the means through which human languages are communicated, how they observe norms and how they negotiate identity. The data obtained through an online survey on generative AI models (ChatGPT, Alexa, Google Assistant) have shown that the conversation with such an interface has led to the emergence of an emergent language phenomena known as the algorithmic register in the form of syntactic simplification, the banishment of natural ambiguity, and a tendency towards the use of formal standardized language. Users are aware that they adjust their input to fit within processing limitations of the machine, and in serving the clarity and task-oriented limited efficiency rather than expressive richness. In their turn, those who do not trust AI have a much more free manner of speaking and adjust to certain situations and different goals of relations through the change of tone and style. Such contrasting practices reflect sociolinguistic theories of accommodation and domain-specific variation, in which speakers adapt their language to appropriateness in relation to their perceived requirements by the interlocutor, whether human or machine, but highlight the distinctive differences in requirements of algorithmic and social interlocutors.

In addition to structural adaptation, the perception of language generated by AI demonstrates the notable contradiction between functional competence and affective authenticity, even on the level of users. On the one hand, it is possible to praise AI as a tool that does not make many errors in grammar and as software that helps in the task of writing a summary or editing information, but on the other hand, it is understandable why many users criticize it as a resource that lacks emotional undertones, cultural specifics, or even interpersonal empathy. This has created a two-way communicative process whereby the post-editing comes into action to add social and emotional connotations into the previously drafted, or corrected by the AI. Neither AI users nor none are convinced of the ability of the systems to imitate the intentionality, empathy and subtle meaning-making that define real-life human conversation. This is a conflict in the user-orientation and falls on the line of theories, where the difference between communicative and strategic action and between acting, seeing, and projecting flow, where



authentic discourse is produced through mutual comprehension and negotiation of meaning, something that cannot be approximated in the current AI systems.

Lastly, the biased coverage of minority and regional languages provided by AI highlights greater moral and social-cultural implications. Those who speak underrepresented languages claim that the AI systems often do not recognize or interpret what they enter as the literal meaning, which eliminates the cultural cues and keeps language users away when it comes to online interactions. This kind of systematic exclusion contributes to linguistic hierarchies and exposes the language to the risk of increasing the pace of language shift in the younger speakers who are already more engrossed in the digital world. Contributors will need to insist on an AI design ethos that is reimagined as one based on participatory practices that are inclusive, enabling the integration of diverse dialectal datasets, allow the customization of tone and style and leaving the governance of linguistic data to the community, with plenty of transparency. It is especially when the concept of language is embraced in a pluralistic; that is, when language is embraced as a medium that is both emotionally expressive, content-based; in other words, culturally contextual, and language that is also characterized by an equity in language use in terms of functional correctness that AI systems will be able to develop into truly communicative entities with the richness and dynamism of human language.

CONCLUSION

Summary and Conclusion

The results listed in the four analytical chapters provide a strong argument that artificial intelligence is transforming the environment of human communication both structurally and socio-culturally. Having noted visible changes in syntax and tone shift, user-based adjustments and linguistic representation issues, the analysis shows that the AI-mediated language is not simply a scale of the technological breakthrough but a phenomenon that has the inertial powers to change linguistic norms as well as communicative expectations and culture at large. Expressions of both AI users and non-users emphasize an implicit multi-relational dynamic among trust, usefulness, expression of emotion and inclusivity. Although AI may be efficient and accurate in terms of grammar, it is usually not capable of empathy, context and culture awareness. However, there is agency among the users who change, criticize and re-imagine their interactions with these systems. On the whole, the analysis addresses the thesis objectives by showing the fine subtleties with which AI is bridging language use and giving a basis on which ethical, inclusive, and linguistically sensitive development of AI needs to be done.

Limitations of the Study

Although the thesis is valuable to examine linguistic and sociocultural consequences related to communication through AI mediation, a number of limitations should be provided that might affect the limitation of the provided results. Firstly, although the sample was purposely stratified and balanced to represent AI users and non-users, it was relatively limited in size ($n = 60$), hence, restraining the statistical power of quantitative research findings. Although mixed-methods design can be used to interpret the information qualitatively, there might be a rather poor representation of patterns across populations, age groups, or geographical regions. The findings described here must be validated and generalized by future studies with a more diverse and large sample of the population. Secondly, the study is based on self-reported survey data, and they can be biased because of the social desirability phenomena, selective memory, or even technical ignorance of the participants. There is a level of subjectiveness in the manner respondents perceive that AI rises as a factor in their language use, which might not even



connote ongoing or unconscious linguistic changes. Moreover, even the non-users might be indirectly exposed to AI-generated content due to using digital platforms, which can possibly erase the boundaries between user pairs. Thirdly, the research is restricted to written and textual communication. Although most current AI systems work in multimodal environments (voice interactions, image-based prompts, etc. and even gesture recognition), this thesis limits itself only to the AI systems that work with text because of this, it fails to consider the possible linguistic and pragmatic variations that can occur during spoken AI conversation or nonverbal communication. Finally, although research on minority language representation is in focus, the analysis was limited by the possibility to use participants who were fluent in certain underrepresented languages. In this sense, the opinions provided are exemplary and not exhaustive. A more fine-grained linguistic ethnographic or corpus based analysis would provide a more inclusive insight as to how AI has conceived and dealt with endangered or marginalized languages. These limitations notwithstanding, the study offers a beneficial platform to proceed with the follow-up study and sets the guiding principle towards more adhesive and catholic research at the triplex point of language, technology and society.

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