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CHATGPT RESHAPING UKRAINIAN EDUCATION

Keywords: *ChatGPT, AI, education, AI literacy*

Introduction. Rapid advances in AI and the exponential growth of digital data have made machine learning tools increasingly relevant across different domains, including education. One of the most prominent developments in this field is ChatGPT, a conversational AI application developed by OpenAI, built on large language models of the GPT family. This AI system processes natural language and can produce coherent human-like responses, engaging in dialogue, correcting itself, and adapting to user input.

Since its release, ChatGPT has generated both enthusiasm and concern among researchers and educators. On the one hand, it can effectively support academic activities by producing texts, summarizing information, generating educational materials, and assisting with language improvement. It also helps learners develop research skills by providing explanations, resources, and structured guidance on various topics, thereby contributing to more independent and flexible learning processes.

On the other hand, the use of ChatGPT raises a number of serious challenges. Ethical issues such as authorship, plagiarism, and the reliability of generated content remain highly debated. Studies indicate that the system may produce inaccurate or misleading information, which poses risks for both students and teachers (Kasneci, et al., 2023; Mhlanga, 2023; Shiri, 2023). In addition, concerns have been expressed about its possible impact on critical thinking, creativity, and problem-solving skills, especially in cases of excessive reliance on AI-generated outputs. These issues highlight the need for responsible use, transparency, and the development of AI literacy in educational contexts.

Despite attempts by some institutions to restrict access to ChatGPT, such measures are unlikely to prevent its widespread adoption. Instead, it is more realistic to assume that AI tools will become an integral part of educational practices, similar to the role of calculators or digital technologies in other disciplines. Therefore, examining both the opportunities and challenges of ChatGPT in education remains an important direction for current research.

Methods. A study combining literature review and survey research was conducted to examine the use of ChatGPT in education. Relevant academic sources were identified through Google Scholar, while additional materials were collected from reference lists of both scholarly and non-scholarly publications due to the emerging nature of the topic. To complement the theoretical analysis, an online questionnaire was distributed through several professional Facebook communities of Ukrainian educators, including “Ukrainian Scientists Worldwide”, “Higher School and Science of Ukraine”, “Union of Educators of Ukraine”, and “Treasure Chest of NUSh Teacher” (a professional community for New Ukrainian School educators). A total of 1,035 respondents participated, including teachers and educational practitioners from different levels of the education system: higher education, secondary schools, primary schools, as well as individuals working across multiple sectors. This mixed sample provided a broad overview of perceptions and practices related to the integration of ChatGPT in Ukrainian education.

Results. Most respondents (83.6 %) took a nuanced position, asserting that the impact of ChatGPT on education depends primarily on how it is used rather than on the technology itself; 12.1 % hold the opinion that ChatGPT can have a positive impact on education. Meanwhile only 4.3 % viewed its influence as exclusively negative. Attitudes varied notably by role and institutional level: primary school teachers expressed greater caution, whereas university instructors demonstrated comparatively higher openness to AI adoption.

Among the key advantages of ChatGPT, respondents most frequently identified: rapid access to information and time efficiency (71.2 %), support for critical engagement with content (63.8 %), data analysis and code generation (46.5 %), and

text compression or elaboration (44.2 %). The leading limitations were generation of inaccurate or fabricated information (83.6 %), difficulty in handling complex queries (64.7 %), and an outdated or restricted knowledge base (44.8 %).

Regarding student learning, the most valued benefits were: development of query-formulation skills (82.7 %), time savings on routine tasks (69.6 %), and increased engagement with academic subjects (48.2 %). The primary risks identified were: students submitting AI-generated work as their own (71.9 %), growing dependency and reduced autonomy (60.5 %), and increased susceptibility to misinformation (53.5 %).

In terms of pedagogical applications, respondents were most willing to use ChatGPT for designing tasks and assessments (56.3 %), compiling glossaries (42.9 %), and preparing administrative documentation (42.0 %). Among those who identified as researchers (31.1 %), the most anticipated uses included sourcing literature (59.3 %), editing manuscripts (42.2 %), and supporting data analysis (41.3 %).

Assessments of response accuracy were mixed: 32.6 % rated accuracy as low, 38.3 % as moderate, and only 5.3 % as high. Notably, 46.6 % of respondents acknowledged insufficient familiarity with technology to evaluate it adequately, highlighting an urgent need for structured AI literacy programs. When asked about desired improvements, respondents most frequently requested better answer accuracy (65.6 %), improved contextual understanding (47.1 %), enhanced visual output capabilities (40.3 %), and the ability to correct misunderstandings (37.8 %).

Discussion. This study, based on a large-scale survey of scientific and pedagogical staff and school teachers, explores diverse views on the integration of ChatGPT into educational practice. The findings indicate that while respondents generally recognize the transformative potential of this technology, they also emphasize its ambivalent nature, combining both opportunities and risks. In line with Khalil (2023), effective use of chatbot systems is closely linked to the way users interact with them, making interaction style a key factor in educational outcomes.

Consistent with Kasneci et al. (2023), we argue that learners should be encouraged to actively explore the capabilities and limitations of language models rather than relying on them as definitive sources of knowledge. ChatGPT can be used to generate hypotheses, compare perspectives, and support exploratory learning; however, its outputs must be critically evaluated and verified through textbooks, academic publications, and other authoritative sources. Embedding critical thinking, information literacy, and problem-solving tasks into curricula is essential for developing students' ability to assess AI-generated content. A responsible educational approach therefore requires awareness of limitations, development of digital literacy, and the integration of human expertise alongside AI tools.

Understanding the needs of both teachers and students is crucial for the safe and effective implementation of large language models. This includes addressing concerns related to data privacy, algorithmic bias, and ethical use, as well as providing methodological guidance and training. Regular evaluation of AI integration in educational settings is also necessary to better understand its pedagogical implications. While some researchers (e.g., Yeadon et al., 2022) view ChatGPT as a threat to traditional assessment formats, the survey results align more closely with Cotton et al. (2023), suggesting that AI can be constructively integrated into education when appropriately managed.

Educators may use ChatGPT to reduce routine workload, support instructional design, and gain insights into student learning processes (Baker & Smith, 2019). Unlike traditional summative assessment approaches, AI-supported systems offer opportunities for continuous feedback and more flexible forms of evaluation (Rudolph, 2023). At the same time, concerns persist regarding academic integrity and the reliability of AI-generated texts, particularly the risk of students outsourcing written assignments to automated systems. However, such challenges also reflect the need to modernize assessment practices rather than rely solely on traditional essay-based formats, which are increasingly criticized for limited pedagogical effectiveness (McMurtrie, 2023).

A more critical limitation of ChatGPT remains the potential inaccuracy and inconsistency of generated content (Warner, 2022). Issues such as bias, lack of transparency in output generation, and the risk of misinformation have been widely discussed in the literature, including the problem of producing plausible but incorrect information, sometimes referred to as the "lowest denomination problem" (Illia et al., 2022). These risks highlight the importance of responsible use and human oversight.

Despite these challenges, ChatGPT also creates opportunities for collaborative learning environments. It can support joint problem-solving, peer learning, and knowledge exchange among students, thereby strengthening communication and teamwork skills. As suggested by Mills (2023), limitations of text generation models can be mitigated through task redesign, including multimodal assignments, classroom discussion, analysis of extended texts, and reflection on real-time events. Similarly, requiring students to integrate personal experience into academic writing can reduce dependence on automated outputs (Nowik, 2022).

From a pedagogical perspective, AI-human collaboration is particularly promising. Halaweh (2023) emphasizes that combining human creativity with AI-assisted tools can enhance research efficiency, originality, and analytical depth. In this hybrid model, ChatGPT serves as a support instrument for idea generation, editing, and comparative analysis, while humans remain responsible for interpretation, critical evaluation, and final decision-making. In fields such as editorial training, AI-generated texts can be used for exercises in fact-checking, stylistic revision, source evaluation, and error detection, thereby strengthening students' analytical competencies.

At the same time, the study acknowledges several limitations. The findings primarily reflect early-stage perceptions of ChatGPT use in education, when its long-term pedagogical implications remain uncertain. Potential risks, including academic misconduct, data bias, and privacy concerns, require further investigation. In accordance with Pavlik (2023), ChatGPT should be regarded as an auxiliary educational tool rather than a replacement for human expertise or established academic sources.

Conclusion. We are only beginning to observe the broad influence that ChatGPT may exert across different spheres of society, particularly in education, where it is expected to reshape approaches to teaching and learning. One of its key strengths lies in supporting more individualized learning pathways, as it can adapt explanations, generate learning materials, and assist with academic tasks. However, its educational value is highly dependent on the user: in informed and responsible hands it can enhance cognitive development, while uncritical or unethical use may lead to dependency.

Survey results indicate that ChatGPT is perceived as a multifunctional tool capable of supporting lesson preparation, content creation, language practice, research assistance, and assessment-related activities. At the same time, respondents consistently stress that such systems should complement, rather than replace, teachers. The role of educators remains central, as it includes not only knowledge transmission but also mentorship, adaptation to individual learner needs, facilitation of discussion, and development of critical and social skills, which cannot be replicated by automated systems.

Effective integration of ChatGPT into education therefore requires attention not only to its technical capabilities but also to ethical, legal, and social dimensions. Key concerns include fairness, transparency, accountability, data protection, and intellectual property, as well as broader issues of accessibility and potential reinforcement of bias. Consequently, ChatGPT should be viewed as an assistive technology whose educational impact depends on responsible implementation and human oversight.

This study finds that ChatGPT is seen as a valuable tool for personalizing learning, supporting teaching, and improving research efficiency, but it also raises concerns about academic integrity, information quality, and independent thinking. Its impact depends primarily on pedagogical strategies rather than the technology itself. The study highlights the Ukrainian context under wartime conditions and calls for stronger AI literacy, revised assessment practices, and clear ethical frameworks, as well as further research on the long-term effects of generative AI in education and post-war recovery.

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PRAGMATIC CONSTRAINTS OF ARTIFICIAL INTELLIGENCE IN PROFESSIONAL BUSINESS CORRESPONDENCE

Keywords: generative AI, Business English (ESP), pragmatic competence, strategic communication.

Introduction. The ongoing transformation of business discourse under the influence of generative algorithms raises a fundamental question for higher education: how to integrate the advantages of artificial intelligence without compromising the professional identity of future specialists. Within Business English (ESP), this issue becomes particularly acute, as effective communication in professional settings requires not only linguistic accuracy but also pragmatic sensitivity, the ability to interpret context, and to adapt messages to specific communicative purposes.

Traditional approaches to ESP instruction are currently being re-evaluated under technological pressure. While scholarly debate ranges from strong scepticism, as articulated by Chomsky (2023), who characterizes AI as "high-tech plagiarism," to more optimistic views on technological support (Barrot, 2024), the role of the human agent requires clearer definition. In this study, the human is viewed as a strategic curator of machine-generated content rather than a passive user. The digital environment demands more than the ability to operate chatbots. It requires critical judgment.

Against this background, this study examines how ESP learners engage with AI-generated outputs in business writing tasks and how this interaction influences the balance between linguistic accuracy and pragmatic adequacy. Particular attention is