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THE ROLE OF EMOTIONAL INTELLIGENCE IN TEACHING CLINICAL DISCIPLINES: EXPERIENCE OF THE DEPARTMENT OF FAMILY MEDICINE, GENERAL PRACTICE AND POLYCLINIC THERAPY OF ODESA NATIONAL MEDICAL UNIVERSITY

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РОЛЬ ЕМОЦІЙНОГО ІНТЕЛЕКТУ У ВИКЛАДАННІ КЛІНІЧНИХ ДИСЦИПЛІН: ДОСВІД КАФЕДРИ СІМЕЙНОЇ МЕДИЦИНИ, ЗАГАЛЬНОЇ ПРАКТИКИ ТА ПОЛІКЛІНІЧНОЇ ТЕРАПІЇ ОДЕСЬКОГО НАЦІОНАЛЬНОГО МЕДИЧНОГО УНІВЕРСИТЕТУ

Abstract. In modern medical education, increasing attention is paid not only to clinical knowledge and technical skills but also to the development of emotional competencies of future physicians. Emotional intelligence is considered a crucial factor for effective communication, professional interaction, trust building, and the implementation of patient-centered care. Teachers of clinical disciplines play a key role in shaping these qualities, as they create the emotional climate of the learning environment and serve as professional role models for students.

The aim of the study was to determine the impact of the systematic integration of emotional intelligence development elements into the educational process of senior medical students on the quality of mastering clinical disciplines, psychological comfort during classes, and the formation of communication and self-regulation skills.

The study was conducted at the Department of Family Medicine, General Practice and Polyclinic Therapy of Odesa National Medical University among sixth-year students during the course “General Practice (Family Medicine).” A total of 75 students participated and were divided into a traditional teaching group and an emotional-intelligence-focused group. The intervention included role-playing, simulation of clinical scenarios, motivational interviewing, and structured reflection at the end of each class.

Effectiveness was evaluated through a comparative analysis of teacher observations and anonymous student questionnaires. Increased student engagement, improved teamwork, and better development of empathetic listening and emotional self-regulation were observed in the EI-focused group. Students in this group also reported higher levels of psychological comfort and satisfaction with the learning process.

The findings indicate that incorporating emotional intelligence development into clinical training contributes to the formation of professionally significant qualities in future physicians and may serve as a promising direction for improving medical education.

Key words: emotional intelligence; medical education; clinical disciplines; communication skills; empathy; self-regulation; professional training of physicians; educational process.

Анотація. У сучасній медичній освіті дедалі більшої актуальності набуває формування не лише клінічних знань і практичних навичок, але й розвитку емоційних компетентностей майбутніх лікарів. Емоційний інтелект розглядається як важливий чинник ефективної комунікації, професійної взаємодії, формування довіри та забезпечення пацієнт-орієнтованого підходу. Особлива роль у розвитку цих якостей належить викладачам клінічних дисциплін, які створюють емоційний клімат навчального середовища та виступають моделлю професійної поведінки для студентів.

Метою дослідження було визначити вплив системного впровадження елементів розвитку емоційного інтелекту в освітній процес студентів старших курсів на якість засвоєння клінічних дисциплін, рівень психологічного комфорту під час занять та формування комунікативних і регуляторних навичок.

Дослідження проведено на кафедрі сімейної медицини, загальної практики та поліклінічної терапії Одеський національний медичний університет серед студентів шостого курсу під час вивчення дисципліни «Загальна практика (сі-

мейна медицина)». У дослідженні взяли участь 75 здобувачів освіти, яких розподілили на групу традиційного навчання та групу з інтеграцією методів розвитку емоційного інтелекту. До інтервенції входили рольові ігри, моделювання клінічних ситуацій, мотиваційне консультування та структурована рефлексія наприкінці кожного заняття.

Оцінювання ефективності здійснювалося шляхом порівняльного аналізу викладацьких спостережень та результатів анонімного анкетування студентів. Встановлено підвищення рівня залученості до навчального процесу, покращення командної взаємодії, розвитку навичок емпатичного слухання та емоційної саморегуляції. Студенти групи з інтеграцією ЕІ частіше відзначали високий рівень психологічного комфорту та задоволеності навчанням.

Отримані результати свідчать, що включення елементів розвитку емоційного інтелекту до структури клінічної підготовки сприяє формуванню професійно значущих якостей майбутніх лікарів та може розглядатися як перспективний напрям удосконалення медичної освіти.

Ключові слова: емоційний інтелект; медична освіта; клінічні дисципліни; комунікативні навички; емпатія; саморегуляція; професійна підготовка лікарів; освітній процес.

Introduction. In modern medical education, increasing attention is being paid not only to professional knowledge and clinical skills, but also to emotional competencies that ensure effective communication between teachers and students and, subsequently, between physicians and patients. The concept of emotional intelligence (EI), introduced by P. Salovey and J. Mayer (1990) and later popularized by D. Goleman (1995), encompasses the ability to recognize, understand, regulate, and use one's own emotions and the emotions of others in order to achieve positive outcomes in interpersonal interaction.

For teachers of clinical disciplines, the development of emotional intelligence is no less important than academic competence. Teachers shape the emotional climate of the educational environment and serve as role models of professional behavior for future physicians. The effectiveness of learning largely depends on teachers' ability to understand students' emotional states and respond appropriately (Krupskyi et al., 2022). Moreover, teachers can lay the foundation for essential emotional skills and support the development of EI in future physicians, which may significantly influence their subsequent interactions with patients and overall professional success.

Several studies (Mayer et al., 2016; Fernández-Berrocal et al., 2020) indicate that teachers with a high level of emotional intelligence:

- create a positive learning environment;
- demonstrate tolerance toward students' mistakes;
- apply an empathetic approach when providing feedback;
- promote the development of students' reflection and self-regulation skills.

For physicians, personal development is of particular importance, as it directly affects many aspects of professional practice. Several studies emphasize the significant role of emotional intelligence in clinical care (Pashchenko et al., 2024; Elheet et al., 2025).

Emotional intelligence can be defined as an integrated ability to perceive, recognize, and regulate emotions, facilitating effective interaction with others. According to D. Goleman's model, emotional intelligence consists of five interrelated components:

self-awareness, self-regulation, motivation, empathy, and social skills.

In the context of teaching clinical disciplines, all these components are relevant for both teachers and students. Self-awareness enables teachers to recognize their emotional responses, enhance goal-oriented activities, and regulate emotions within the educational environment (Abdel-Hadi & Gharaibeh, 2023). For future physicians, self-awareness supports a deeper understanding of their own emotions and their influence on behavior and communication with patients, contributing to responsibility, reflection, and a conscious attitude toward the profession.

Self-regulation fosters the ability to maintain composure and professionalism in complex clinical or conflict situations, control emotional reactions, make balanced decisions, and preserve professional equilibrium. In teaching practice, this positively affects autonomy, motivation, and long-term learning outcomes (Zafar et al., 2024).

Motivation is a key factor in professional growth, encouraging students to engage in self-improvement, responsible learning, and high-quality performance of professional duties, ultimately contributing to effective patient care (Monderna & Voinarovska, 2019).

Teacher empathy is associated with lower levels of stress, anxiety, and depression and enhances student engagement in the learning process (Ampofo et al., 2025). In future clinical practice, empathy enables physicians to understand patients' experiences, demonstrate compassion and support, and build trusting relationships that improve therapeutic effectiveness.

Social skills ensure effective interaction with colleagues, patients, and their families and promote teamwork, leadership, and professional communication. Teachers play a crucial role in developing these skills through facilitating constructive group dialogue, discussions, and opportunities for students to express their ideas (Webb, 2009).

The development of emotional intelligence is a continuous process. Key approaches include professional reflection, emotional competence training (role-playing, case-based learning, empathetic listening techniques), supervision and peer mentoring, and psycho-emotional support aimed at preventing emo-

tional burnout. Several European medical universities have implemented programs such as “Emotional Skills for Medical Teachers,” focusing on emotional self-regulation, nonverbal communication, and group dynamics management.

Given the importance of emotional intelligence as a component of professional competence in future physicians, elements of EI development were incorporated into the teaching structure of the course “General Practice (Family Medicine)” for sixth-year medical students at the Department of Family Medicine, General Practice and Polyclinic Therapy of Odesa National Medical University. Particular emphasis was placed on self-reflection, emotional self-regulation, and empathy during practical classes. To assess the effectiveness of these changes, a comparative analysis was conducted between groups in which EI development elements were systematically implemented and previous cohorts in which these elements were less emphasized.

The aim of the article. To determine the impact of the systematic integration of emotional intelligence development elements into the educational process of undergraduate medical students on the quality of mastering clinical disciplines, psychological comfort during classes, and the development of communication and emotional self-regulation skills by comparing the outcomes of intervention and traditional teaching groups.

Methods. The study was conducted at the Department of Family Medicine, General Practice and Polyclinic Therapy of Odesa National Medical University among sixth-year medical students enrolled in the core course “General Practice (Family Medicine)” during the 2024–2025 academic year. This study employed a comparative observational design with an intervention and a traditional teaching group.

A total of 75 students participated and were divided into two groups: a traditional teaching group ($n = 36$) and an EI-focused group ($n = 39$). In the traditional teaching group, classes were conducted according to the traditional curriculum, focusing on theoretical and practical training without the integration of specific emotional intelligence development methods.

In the EI-focused group, several EI development elements were systematically introduced:

- active introductory interactions between teachers and students;
- preparation and performance of clinical cases in the form of role-playing activities (including motivational interviewing and delivering bad news), followed by mandatory group discussion;
- structured reflection at the end of each class addressing both acquired knowledge and emotional experiences.

The study focused on comparative qualitative analysis; no inferential statistical testing was per-

formed. Teacher observations and student questionnaires were used to evaluate effectiveness. Indicators included satisfaction with the educational process, perceived psychological comfort during classes, and self-assessed development of communication skills and emotional resilience. The collected data were analyzed using comparative and qualitative approaches. Simple quantitative indicators (percentages) were used to summarize teachers’ assessments and questionnaire responses. These indicators helped to demonstrate general trends across different groups. No statistical calculations were performed to identify precise patterns; therefore, the results should be interpreted as general observations rather than as definitive scientific evidence.

The study was conducted in accordance with institutional ethical standards. Participation was voluntary, and informed consent was obtained from all participants.

Results and Discussion. The integration of emotional intelligence development elements demonstrated a positive impact on communication and interaction between teachers and students. Outcomes were assessed using two complementary approaches: teacher evaluations and anonymous student questionnaires.

According to teacher evaluations (Figure 1), student engagement increased by 23% in the EI-focused group compared to the traditional teaching group (85% vs. 62%), while teamwork increased by 26% (84% vs. 58%). These changes were reflected in more active participation in discussions, increased initiative, and greater readiness for collaborative work.

Improvements were also observed in emotional competence, particularly in self-regulation (88% vs. 72%) and empathetic listening (81% vs. 62%). Teachers noted enhanced recognition of personal emotional states, greater tolerance toward others’ emotions, and increased supportive behavior during team-based activities. Teachers also reported improvements in the emotional classroom climate, increased mutual respect and empathy among students, and reduced learning-related anxiety.

Student questionnaire results (Figure 2) showed higher overall satisfaction with classes in the EI-focused group (92%) compared to the traditional teaching group (85%). Psychological comfort during classes was reported by 83% of students in the EI-focused group versus 68% in the traditional teaching group. Additionally, 78% of students in the EI-focused group rated their communication skills development as “high” or “very high,” compared to 61% in the traditional teaching group.

The authors acknowledge that self-reported measures may be subject to response bias; however, the use of combined teacher evaluation and student feed-

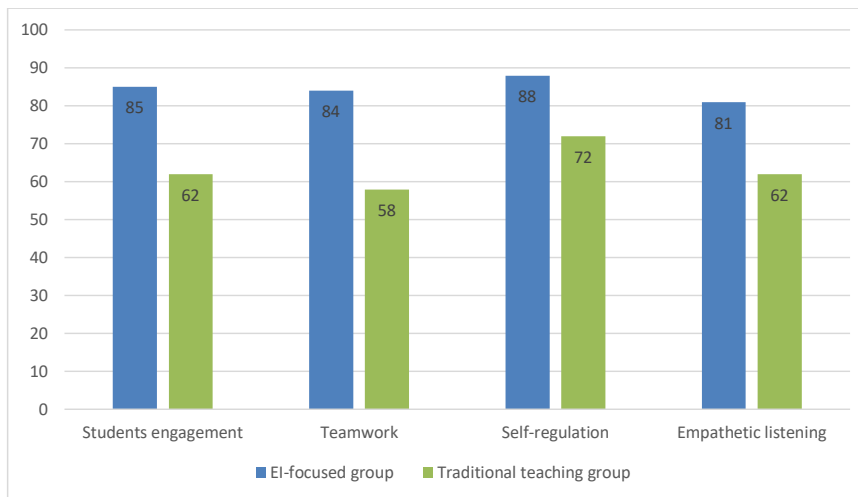


Fig. 1. Teachers' assessment of introducing elements of emotional intelligence improving into the educational process

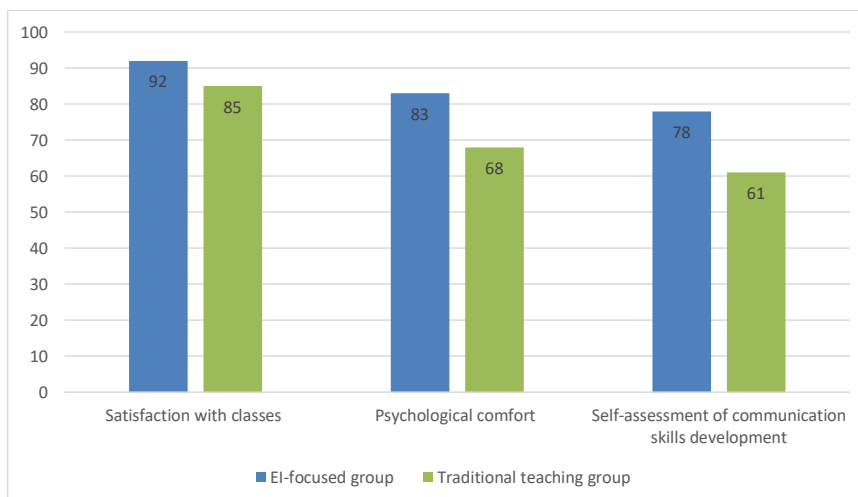


Fig. 2. Results of the survey of students

back provides a broader perspective on the observed changes.

The single-center nature of the study may limit the generalizability of the findings; nevertheless, the results highlight trends that may be relevant for similar educational settings.

Conclusions. 1. Emotional intelligence is an essential component of pedagogical competence in teachers of clinical disciplines and significantly influences the quality of professional interaction with students.

1. A high level of emotional intelligence promotes effective communication, trust-building, increased student motivation, and the creation of a positive learning environment.

2. The systematic development of emotional intelligence among teachers requires the integration of specialized training programs, reflective practices,

supervision, and emotional well-being support into professional development curricula.

3. The formation of teachers' emotional culture is a crucial prerequisite for the professional development of future physicians, fostering empathy, stress resilience, and patient-centered thinking.

4. Practical implementation of the study findings may be achieved through incorporating emotional competence development into medical education curricula and integrating emotional learning elements into clinical training, simulation-based education, and interprofessional learning activities.

Overall, the development of emotional intelligence among teachers and students in higher medical education appears to be an important factor in enhancing the effectiveness of the educational process, fostering professionally significant qualities

in future physicians, and ensuring a supportive and emotionally safe learning environment.

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Anastasia Myrhorod – writing – investigation, data curation, software, formal analysis.

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Information on the use of artificial intelligence.

The authors certify that, in the course of conducting the research and preparing this manuscript, they did not use any generative artificial intelligence tools or services to perform any of the tasks listed in the Generative Artificial Intelligence Delegation Taxonomy (GAIDeT, 2025). All stages of the work – from conceptualization to final editing – were carried out exclusively by the authors, without the use of generative artificial intelligence.

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