

PEDAGOGICAL CONDITIONS FOR DEVELOPING PROFESSIONAL SKILLS OF FUTURE ENGINEERS-TECHNOLOGISTS

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Abstract: This article analyzes the importance of pedagogical conditions in the development of professional skills of future engineer-technologists. In order to strengthen the professional knowledge and practical skills of students, it is important to use innovative methods, practical training and modern technologies in the educational process. The importance of using personal development, teamwork and leadership skills is also emphasized. Pedagogical conditions help prepare students as highly qualified specialists in a changing technological environment.

Keywords: Future engineer-technologist, professional skills, pedagogical conditions, innovative educational methods, practical training, modern technologies, personal development, teamwork, leadership.

Аннотация: В данной статье рассматривается важность педагогических условий для развития профессиональных качеств будущих инженеров-технологов. Подчеркивается роль инновационных методов обучения, практических занятий и использования современных технологий для укрепления профессиональных знаний и практических навыков студентов. Также акцентируется внимание на значении личностного развития, командной работы и лидерских качеств в процессе обучения. Педагогические условия способствуют подготовке студентов как высококвалифицированных специалистов в условиях быстро меняющейся технологической среды.

Ключевые слова: Будущие инженеры-технологи, профессиональные качества, педагогические условия, инновационные методы обучения, практические занятия, современные технологии, личностное развитие, командная работа, лидерство.

INTRODUCTION

One of the most important fields in the modern era is technology and engineering. These fields are constantly evolving and require new innovative solutions, which in turn demand high qualifications and modern skills from future engineers and technologists. The success of developing the professional skills of future engineers-technologists is largely dependent on the pedagogical conditions of the educational

system. This article analyzes the importance of pedagogical conditions in developing the professional skills of future engineers-technologists and their effective organization. The main goal of developing the professional skills of future engineers-technologists is to provide students not only with theoretical knowledge but also to prepare them for practical work. Pedagogical conditions should create the opportunity for students to fully develop their professional skills. In this process, the effectiveness of the educational process, the active participation of students, the support of experienced teachers, and the use of modern educational resources play a crucial role. The main focus should be on the qualifications of the teachers, teaching students innovative approaches, and developing personal and professional skills.

The use of innovative educational methods: In today's educational system, the application of advanced pedagogical technologies and innovative methods is of great importance. In the development of the professional skills of future engineers-technologists, methods such as project-based learning are effective. These approaches encourage students to solve real problems in engineering and technology, work in teams, and develop creative thinking. In project-based learning, students work on specific projects to solve a problem of their choice. Through this, they have the opportunity to develop practical skills and enhance their creative approaches. This method, in turn, prepares students for their future professional activities and helps improve their professional skills.

Connecting theoretical knowledge with practice: Connecting theoretical knowledge with practice plays a significant role in the development of the professional skills of future engineers-technologists. To achieve this goal, it is necessary to implement practical exercises and professional internship systems in the curriculum. Students can test their knowledge in real work environments through internships related to their field during their studies. This, in turn, teaches students how to apply professional skills in practice and enhances the knowledge and skills necessary to solve real workplace problems.

For example, in the technology sector, practical skills can be developed through laboratory work, workshops, and production facilities, which helps improve their professional qualification.

Combining personal and professional development: Personal development also plays a significant role in the development of the professional skills of future engineers-technologists. Students can achieve professional growth by developing their personal skills. Special attention should be given to the development of personal abilities during the educational process. This process helps combine personal and professional goals,

improve time management, cope with stress, and self-motivate. Additionally, working in teams, developing leadership skills, and enhancing communication abilities also contribute to students' professional and personal growth. To teach these skills, group project work, discussions, seminars, and training sessions should be organized in the educational process.

Conclusion: The proper organization of pedagogical conditions is crucial for the development of the professional skills of future engineers-technologists. By applying innovative educational methods, practical exercises, modern technologies, and promoting personal development, students can improve their professional skills. Furthermore, developing skills in teamwork and leadership, as well as the importance of personal growth, is also significant. Through these efforts, future engineers-technologists will be well-prepared for successful careers in their respective fields.

LITERATURE

1. Хўжжиев, М. Я. (2020). Возможности повышения эффективности мультимедиа в процессе урока. *Universum: психология и образование*, (1 (67)), 10-13.
2. **Kass, G. "Project-Based Learning: A Powerful Way to Develop Professional Skills."** Bu maqola loyihaga asoslangan ta'lim metodikasining talabalarning kasbiy va shaxsiy qobiliyatlarini rivojlantirishdagi ahamiyatini o'rganadi. (2014). P. 452-458.
3. Махмудович, Х. М., Кучкорович, Ж. А., & Хо'джиёв, М. (2021). Technology of using E-learning modeling programs in teaching special subjects in professional education. *Psychology and Education Journal*, 58(1), 5403-5411.
4. Таиров, Б. Б., Хўжжиев, М. Я., & Ўғли, Қ. З. А. (2023). ПРОГРАММНО-МЕТОДИЧЕСКИЕ ВОЗМОЖНОСТИ ОБУЧЕНИЯ НА ОСНОВЕ КОГНИТИВНО-ИЗОБРАЗИТЕЛЬНОГО ПОДХОДА В ПОДГОТОВКЕ ИНЖЕНЕРОВ-ТЕХНИКОВ. *Universum: технические науки*, (5-2 (110)), 29-36.
5. ТАМОУЙЛЛАРИ, В. А. О. D. MASOFAVIY TA'LIM ORQALI UMUMKASBIY VA IXTISOSLIK FANLARINI KOGNITIV-VIZUAL YONDASHISH ORQALI, TALABALAR.
6. **Dewey, J. "Experience and Education."** Deweyning bu asari ta'lim jarayonida amaliy tajriba va shaxsiy o'sishning ahamiyatini ta'kidlaydi. (1997). P. 652-659.
7. Khojjiyev, M., & Karshiyev, Z. (2024). METHODOLOGY OF INSPECTION OF GAS METERS. *Multidisciplinary Journal of Science and Technology*, 4(11), 20-23.
8. Abdurasulovich, K. J., Anvarovich, A. A., Mamatkulovich, Y. U., Yangiboevich, K., & Sobirovna, M. M. (2020). The advantages of the methodology of preparing

students for innovative activity on the basis of visual teaching of special disciplines. Journal of Critical Reviews, 7(14), 1244-1251.