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34

IMPLEMENTATION OF THE FLIPPED CLASSROOM MODEL IN FORMING STUDENTS' PROFESSIONAL COMPETENCE

IMPLEMENTACIÓN DEL MODELO DE AULA INVERTIDA EN LA FORMA-CIÓN DE LA COMPETENCIA PROFESIONAL DE LOS ESTUDIANTES

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ABSTRACT

The purpose of the study is to substantiate the need to utilize the flipped classroom model in teaching in order to intensify the professional training of students. The key research methods include analysis of normative documents and pedagogical, psychological, and methodological literature on the studied problem, generalization of advanced pedagogical experience and experience of the authors in the field; empirical methods, such as scientific observation, questionnaires, testing, and interpretive methods (qualitative analysis of results, mathematical processing of data). The authors review the results of a study on the implementation of the flipped classroom model in the formation of students' professional competence in the study of the Methods of Teaching and Upbringing in the English Language.

Keywords:

Flipped classroom model, individualization of learning, professional competence, English language teaching methodology.

RESUMEN

El propósito del estudio es fundamentar la necesidad de utilizar el modelo de aula invertida en la enseñanza para intensificar la formación profesional de los estudiantes. Los métodos clave de investigación incluyen análisis de documentos normativos y literatura pedagógica, psicológica y metodológica sobre el problema estudiado, generalización de experiencia pedagógica avanzada y experiencia de los autores en el campo; métodos empíricos, como la observación científica, cuestionarios, pruebas y métodos interpretativos (análisis cualitativo de resultados, procesamiento matemático de datos). Los autores revisan los resultados de un estudio sobre la implementación del modelo de aula invertida en la formación de la competencia profesional de los estudiantes en el estudio de los Métodos de Enseñanza y Formación en el Idioma Inglés.

Palabras clave:

Modelo de aula invertida, individualización del aprendizaje, competencia profesional, metodología de enseñanza del idioma inglés

INTRODUCTION

In recent years, the flipped classroom, a model of learning that puts the learner at the center of the educational process, has become a steady trend. This model differs from the traditional learning process.

In traditional learning, the Methods of Teaching and Upbringing in the English Language discipline involves the delivery of materials in presentations during lectures for students to take notes on them and discuss in seminars. Practical application of the obtained knowledge takes place only during laboratory classes, which are relatively few (Yaremenko et al., 2021). Furthermore, traditional learning is marked by a linear organization and does not allow to repeatedly return to the previously studied materials, whereas the flipped classroom method enables students to choose the optimal pace of their studies for themselves (Paimakova & Vostrikova, 2020, p. 21).

In the flipped classroom model, educational materials are offered to students for independent study as part of their homework, and classroom hours are used for discussions and interactive projects. Collaborative learning, problem-based learning, the case method, and project-based technology allow students to acquire knowledge and form skills and abilities in practice, apply their knowledge to solve problems, and fully digest the educational material.

Being free of the need to explain the materials to every student allows the teacher to spend more time with the students who have difficulties understanding the topics (Yaroslavova et al., 2020). This enables the teacher to take an individualized approach and adjust each lesson to the needs of students, encouraging their cooperation and critical thinking. The fact that the study of training materials is taken out of the classroom process gives an opportunity to create a comfortable learning environment for students and frees time for creative and interactive activities during lessons (De Jaegher, 2020). It should also be noted that the flipped classroom model is easily adapted to both face-to-face and distance learning, which makes it universal. We believe it to be particularly important to utilize the flipped classroom model with university students studying a foreign language in the Methods of Teaching and Upbringing in the English Language course so as to enable them to employ this model in their future professional practice. The flipped classroom also benefits teachers, allowing them to more efficiently use their time and resources (Kurvits & Kurvits, 2014).

Following De Jaegher (2020), we understand flipped classroom as a learning method under which students study the main information on the topic before the class

and receive an active learning experience in the classroom in interaction with each other and the teachers.

The foundation for the flipped classroom model is believed to be the research of Bergmann & Sams, 2014; Bergmann (2018), were its most famous proponents. The problem is covered by a substantial amount of works, including those by Vorobev & Murzaeva (2018); and Vinichenko et al. (2021).

Despite the great interest of teachers in the flipped classroom model, out pedagogical experience suggests that it has not been widely implemented in higher education. Thus, there arises the need to find more effective ways to introduce this model in the professional training of students.

The main objectives of the study include:

- 1) to study scientific and pedagogical literature on the problem;
- 2) to develop a model of flipped classroom;
- 3) to experimentally test the model in the learning process;
- 4) to analyze the results obtained.

MATERIALS AND METHODS

The study was conducted among 78 students of the foreign languages department of the South Ural State Humanitarian Pedagogical University. The experimental work was carried out as part of the Methods of Teaching and Upbringing in the English Language course for two semesters.

To meet the research goal, we developed a learning model based on the flipped classroom method proceeding from the analysis of research literature, scientific observation, and a survey of students determining their attitude toward the studied discipline and the difficulties they faced in assimilating educational materials. The developed model was implemented at lectures and seminars in the discipline Methods of Teaching and Upbringing in the English Language.

The implementation of the flipped classroom model started with the beginning of the lecture part of the course. The first lecture on methodology started not with taking notes but with questions about what methodology studies, whether it is necessary for a talented teacher, what differentiates language courses from other disciplines, what are the differences between mastering one's native language and a foreign one, etc. Working in pairs, students tried to answer the posed questions using their cognitive experience. They were also presented with learning materials, which were commented on and explained during

the lecture. The lecture was later posted on the Internet for free access in a methodological group. The rest of the lectures and problem questions for them were also provided in advance and used by students to prepare for tests, complete seminar and laboratory assignments, and study for exams.

In seminars, students were offered practical tasks. This included, for example, the problem-based case method. The case method essentially consists in students' independent work in an artificially created environment. This method provides for more effective assimilation of educational materials, as the process involves all students and is quite emotionally intense. In fact, the case method is a subtype of group analytical research activity (Popova, 2015). Students are asked to reflect on situations that suggest the need for a solution to a problem.

In this vein, discussing the role of the learning environment, students analyzed video clips of classes at different educational institutions, evaluated different components of the learning environment, and offered their own ideas for improving the learning environment at their university.

When considering the concept of second language identity, students analyzed real communication situations containing problems that emerged due to insufficient formation of the components of foreign-language communicative competence, and proposed and argued their solutions. When working on an article devoted to the expression of the category of tolerance in different communicative cultures, students learned to compare these cultures and tried to find objective reasons for their peculiarities using the available knowledge and materials found online.

Seminar classes also taught the techniques of critical thinking. Students independently studied various techniques of Critical Thinking Development through Reading and Writing and worked on texts during seminar classes using these techniques, such as prediction trees, thick and thin questions, board logs, wise owls, cinquain, etc.

Prior to the seminars devoted to the main categories of the methodology of teaching the English language, students watched video recordings of real English lessons and analyzed them by the assigned criteria. As a result, they made conclusions about how well these categories were implemented in the instructional process. During the seminar sessions, students worked in groups to compare their analyses and, with the teacher's help, suggest ways to improve the quality of these lessons.

In seminars on the means and forms of learning, having discussed the topic with each other and the teacher, students picked some methodological complexes of school and university disciplines and analyzed them from the point of modern methodological requirements.

As part of their independent work on the topic "Teaching written speech", students engaged in expert assessment and evaluation of real letters, essays, and oral responses in the format of the Unified State Exam. During the lessons, working in pairs, they compared their results and filled in additional grading schemes.

RESULTS AND DISCUSSION

Integration of the developed flipped classroom model in the course Methods of Teaching and Upbringing in the English Language across all stages, from the presentation of materials to their application in the development of lessons, provided for a more efficient formation of students' professional competence. The proposed model is presented in Figure 1.

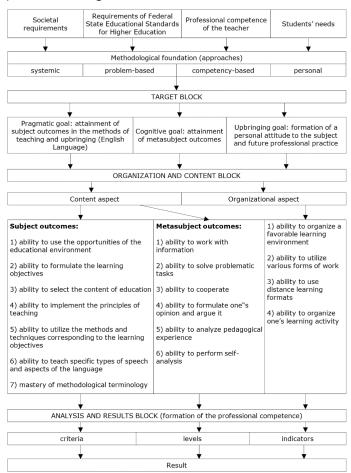


Figure 1. The Flipped Classroom Model.

The level of development of GPC-7 (ability to interact with participants in educational relations as part of the implementation of educational programs) and GPC-2 (ability to participate in the development of basic and additional educational programs and develop their individual components (including the use of information and communication technologies) necessary for future professional activities) (Pivneva et al., 2022; Kudashkina et al., 2022) were assessed based on the results of midterm examination.

The share of students showing the high and average level of mastery of these competencies increased by 31.3 and 24%, respectively. Conversely, the number of students at the low level lowered by 19 %.

At the stage of reflection on the results of the training course, students expressed a positive attitude toward the new format of classes, and, noting some difficulties at the initial stage, recognized its effectiveness and the increase in their motivation for the subject and for their future professional activity.

Summarizing the study, we can draw the following conclusions:

- 1. the problem of forming the professional competence of future teachers is relevant for higher education;
- 2. the flipped classroom model is developed and tested as part of students' training in the discipline Methods of Teaching and Upbringing in the English Language;
- 3. diagnostics conducted after the implementation of this model show positive dynamics in the development of professional competence.

CONCLUSIONS

Application of the flipped classroom model, which ensures personal involvement of each student in the cognitive activity and creates conditions for independent handling and conscious assimilation of educational content, results in considerable improvement of the quality of training and the development of students' intellectual skills and ability to self-organize and be autonomous. The priorities are shifting lectures should support learning rather than take center stage.

Learning content is no longer an end in itself, but becomes a kind of starting point. The emphasis is placed on the process of cognitive activity, in which the student, relying on the educational content, discovers new knowledge for themselves. All of this makes the case for flipped classroom technology to become an integral part of higher education practice.

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