

**Баева Елена Сергеевна**  
Воронежский государственный медицинский университет им. Н.Н. Бурденко  
**Асташенко Анжела Павловна**  
Воронежский государственный медицинский университет им. Н.Н. Бурденко  
**Тюнина Ольга Ивановна**  
Воронежский государственный медицинский университет им. Н.Н. Бурденко  
**Дорохов Евгений Владимирович**  
Воронежский государственный медицинский университет им. Н.Н. Бурденко

### ОРГАНИЗАЦИОННО-МЕТОДИЧЕСКИЕ АСПЕКТЫ И ПРОБЛЕМАТИКА ПРЕПОДАВАНИЯ РАЗЛИЧНЫХ ДИСЦИПЛИН НА КАФЕДРЕ НОРМАЛЬНОЙ ФИЗИОЛОГИИ ИНОСТРАННЫМ СТУДЕНТАМ МЕДИЦИНСКОГО ВУЗА

*В статье представлен опыт преподавания иностранным студентам дисциплин «Normal physiology», «Physiological basis of acute medical problems» и «Физика. Математика» педиатрического факультета ВГМУ им. Н.Н. Бурденко. Рассматриваются организационно-методические аспекты и проблематика преподаваемых дисциплин, а также задачи, которые стоят перед преподавателем при организации образовательного процесса. Обсуждаются возможности использования информационно-коммуникационных технологий в обучении иностранных студентов на языке-посреднике на примере системы дистанционного обучения Moodle. Данный электронный образовательный комплекс содержит как теоретические материалы, так и тесты для контроля знаний обучающихся. Учебно-методический комплекс, разработанный на кафедре нормальной физиологии, направлен на интенсификацию обучения студентов. На занятиях проводятся тестирования исходного, промежуточного и итогового уровня знаний, решение ситуационных задач, просмотр презентаций и видеосюжетов. Используемые наглядно-иллюстративные материалы позволяют обеспечить непосредственное восприятие изучаемого объекта или процесса, систематизировать полученные знания. Делаются выводы о значимости преодоления коммуникативных и социокультурных барьеров в условиях аудиторного обучения, учета морально-нравственных особенностей обучающихся при формировании групп студентов и становлении в них благоприятного психологического климата.*

**Ключевые слова:** коммуникативные барьеры, социокультурные барьеры, морально-нравственные принципы, проблемы преподавания, иностранные студенты.

**Информация об авторах:** Баева Елена Сергеевна, ORCID 0000-0002-9572-0101, кандидат биологических наук, доцент кафедры нормальной физиологии, Воронежский государственный медицинский университет им. Н.Н. Бурденко, г. Воронеж, Россия.

E-mail: galaxy1985@mail.ru

Асташенко Анжела Павловна, ORCID 0000-0001-6416-6454, кандидат биологических наук, доцент кафедры нормальной физиологии, Воронежский государственный медицинский университет им. Н.Н. Бурденко, г. Воронеж, Россия.

E-mail: cerseal@ Rambler.ru

Тюнина Ольга Ивановна, ORCID 0000-0003-1614-1804, кандидат биологических наук, доцент кафедры нормальной физиологии, Воронежский государственный медицинский университет им. Н.Н. Бурденко, г. Воронеж, Россия.

E-mail: olgaivanovnat@inbox.ru

Дорохов Евгений Владимирович, ORCID 0000-0002-2096-411X, кандидат медицинских наук, доцент, заведующий кафедрой нормальной физиологии, Воронежский государственный медицинский университет им. Н.Н. Бурденко, г. Воронеж, Россия

E-mail: dorofov@mail.ru

**Дата поступления статьи:** 16.03.2020.

**Для цитирования:** Баева Е.С., Асташенко А.П., Тюнина О.И., Дорохов Е.В. Организационно-методические аспекты и проблематика преподавания различных дисциплин на кафедре нормальной физиологии иностранным студентам медицинского вуза // Вестник Костромского государственного университета. Серия: Педагогика. Психология. Социокинетика. 2020. Т. 26, № 2. С. 192–196. DOI 10.34216/2073-1426-2020-26-2-192-196.

**Yelena S. Bayeva**

*Burdenko Voronezh State Medical University*

**Anzhela P. Astashchenko**

*Burdenko Voronezh State Medical University*

**Ol'ga I. Tyunina**

*Burdenko Voronezh State Medical University*

**Yevgeniy V. Dorokhov**

*Burdenko Voronezh State Medical University*

## ORGANISATIONAL AND METHODOLOGICAL ASPECTS AND PROBLEMATICS OF TEACHING VARIOUS DISCIPLINES AT THE DEPARTMENT OF NORMAL PHYSIOLOGY TO FOREIGN STUDENTS OF THE MEDICAL UNIVERSITY

*The article presents the teaching experience of the disciplines «Normal physiology», «Physiological basis of acute medical problems» and «Physics. Mathematics» of the Pediatric faculty of VSMU named after N. N. Burdenko to foreign students. Organizational and methodological aspects and problems of the taught disciplines are considered, as well as the tasks that the teacher faces when organizing the educational process. The possibilities of using informative and communicative technologies in teaching foreign students in an intermediary language are discussed using the example of the distant learning system (Moodle). This electronic educational complex contains both theoretical materials and tests for students' knowledge control. The educational and methodological complex developed at the Department of normal physiology, is aimed at intensifying students' learning. The classes are used for testing of the initial, intermediate and final level of knowledge, solving situational tasks, watching presentations and video materials. The visual and illustrative materials used allow us to provide a direct perception of the object or process being studied, and systematize the knowledge obtained. Conclusions are made about the importance of overcoming communicative and socio-cultural barriers in classroom learning, taking into account the moral characteristics of students in the formation of students' groups and the creation of a favorable psychological climate in them.*

**Keywords:** communication barriers, socio-cultural barriers, moral principles, teaching problematics, foreign students.

**Authors information:** Yelena S. Bayeva, ORCID 0000-0002-9572-0101, Candidate of Biological Sciences, Associate Professor at the Department of Normal Physiology of Burdenko Voronezh State Medical University, Voronezh, Russia.

E-mail: galaxy1985@mail.ru

Anzhela P. Astashchenko, ORCID 0000-0001-6416-6454, Candidate of Biological Sciences, Associate Professor at the Department of Normal Physiology of Burdenko Voronezh State Medical University, Voronezh, Russia.

E-mail: cerceal@rambler.ru

Ol'ga I. Tyunina, ORCID 0000-0003-1614-1804, Candidate of Biological Sciences, Assistant Professor at the Department of Normal Physiology of Burdenko Voronezh State Medical University, Voronezh, Russia.

E-mail: olgaivanovnat@inbox.ru

Yevgeniy V. Dorokhov, ORCID 0000-0002-2096-411X, Candidate of Medical Sciences, Associate Professor, head of the Department of normal physiology of Burdenko Voronezh State Medical University, Voronezh, Russia.

E-mail: dorofov@mail.ru

**Article received:** March 16. 2020.

**For citation:** Bayeva Ye.S., Astashchenko A.P., Tyunina O.I., Dorokhov Ye.V. Organisational and methodological aspects and problematics of teaching various disciplines at the department of normal physiology to foreign students of the medical university. Vestnik of Kostroma State University. Series: Pedagogy. Psychology. Sociokinetics, 2020, vol. 26, № 2, pp. 192–196 (In Russ.). DOI 10.34216/2073-1426-2020-26-2-192-196.

**Introduction.** Medical education in Russia has a long history and traditions. More than 70 universities in the country train specialists of the highest medical profile, graduates of Russian universities are in demand all over the world. Foreign citizens who study in both Russian and intermediary languages are also trained at the medical universities. Long-term research on the methodology of teaching foreign students various medical disciplines shows that the educational process is often accompanied by a number of difficulties, primarily due to existing communicative and socio-cultural barriers. These obstacles are based on differences in mentalities and established stereotypes of perception and behaviour of other nationalities [Sherstnikova et al.].

Due to the fact that people can get a higher medical education only by a full-time studying, the educational process must also takes into account the specifics of

the classroom work of foreign students, especially in the student-teacher dialogue. To achieve this goal, each specific group of students must individually approach the development of practical classes, based on the idea of the psychological climate of this group of students. It consists not only of taking into account the personal qualities, academic performance and professional orientation of individuals, but also of the difficulties that accompany students from mixed ethnic groups. The current microclimate of the group affects the success of their joint activities, satisfaction with the learning process and its effectiveness. In such an environment, some students find it difficult to realise their potential, although professional growth and self-realisation are the needs of any modern person.

**Background of problematics.** The teacher faces a difficult task – to organise the educational process by taking into account the peculiarities of the mental

and cultural aspects of the students' personality, to structure classes according to the existing Federal state educational standard (FSES), and to use a creative approach in the implementation of this goal. For foreign students, the teacher's communication skills (grammatical correctness, speech culture) are the defining criteria for both professional and personal qualities [Bulgakova et al. 2016].

It should also be noted that differences in moral values create additional difficulties in teaching foreign students, despite the fact that some scientists claim that social and moral thinking in people is automatic. Research in the field of neurophysiology has allowed us to identify specific areas of the brain involved in the social thinking, and other areas – in moral thinking, which indirectly indicate the existence of objective universal moral values. There is a scientific position of a number of sociologists and political scientists, according to which each society has the right to determine its own moral values in accordance with its religion, ethnic traditions, political and economic system, etc., which leads to the denial of the possibility of the existence of objective universal moral values [Slanevskaya]. Accordingly, societies that neglect the moral principles of the universal plan face social conflicts.

*Suggestions.* For example, it was shown during the research course of Burdenko VSMU for foreign students, that the moral consciousness of groups of participants from India (Hindus) and Russia (Orthodox Christians) is based on the principle of "Justice", according to Kohlberg; from Turkmenistan (Muslims) – on the principle of "Care"; Nigeria (Catholic Christians) – both principles play a key role. The maximal degree of consent of Indian group students is expressed for the stages of moral development, which imply an orientation towards compliance with moral rules and norms and their universality for the whole society, as well as a tendency to reflection in the decision-making process in the problems of moral behaviour. Students from Russia are also characterised by a focus on compliance with universal moral rules and norms, but the role of internal moral principles is high. Students from Tajikistan and Nigeria, when solving moral issues, use the following principles – empathy for another person; the opinion of others; voluntary change of behaviour in favour of another person [David, Astashchenko]. Moreover, there are internal moral values of foreign students and external ones – formed by the social environment and, in the most cases, more pronounced. These observations and remarks should be especially taken into account when forming "mixed" groups of students, since there are the moral attitudes which in general form the personality of the physician.

The use of visual and effective technologies in teaching foreign students in an intermediary language is also necessary to be mentioned. Quite often groups from Russian universities formed of foreign students

include individuals belonging to different language groups and use Arabic, Kurdish, French, Turkic and Indo-European languages for communication. Using an intermediary language (English) does not always solve the all pedagogic problems. It should be noted that the initial belonging to the "native" language group has an impact on the continuing formation of the student's thinking in the conditions of adaptation to the Russian University. The use of an intermediary language of a "non-native" language group can inevitably lead to complications in the formation of thinking among foreign students. Visually effective, visually imaginative and verbally logical thinking represent the main forms of thinking used by a person for cognition of the surrounding world. In the absence of a "language barrier", thinking goes through the process of formation and development from purposeful objective actions to verbal and logical forms. On the contrary, if there is a barrier, it is more effective for foreign students to form a relationship between the main components of cognition – action, word, and image. On this basis the visualisations are formed, which become more flexible and dynamic, and there is an improvement of full-fledged images and their operation in the mental plan. The lack of thinking processes formation that goes both from perception to visually effective and to visually imaginative thinking, may be irreplaceable at the subsequent stages of educational activity [Strebeleva]. Visually-effective thinking occurs when a person meets new conditions and a new way to solve a problem in practice. Many outstanding teachers at the beginning of the 20<sup>th</sup> century paid a special attention to the role of a sensory influence in the learning process. Sensory exercises awaken activity, enhance it. Having isolated a separate sensation and a separate stimulus, the student receives a clear, conscious impression. The passive mind receives only images limited to randomly collected objects, although each thing and phenomenon has an infinite set of properties, and, as often happens in a visual lesson, they are confused with the origin and purpose of the object itself, which tires and clouds the consciousness, which cannot be turned into a dynamic awakening of similar associations [Montessori].

It seems necessary to underline the importance of the chosen method of communication between a university teacher and foreign students. The language barrier intuitively encourages a person to fill in a significant part of poorly understood information with non-verbal information (facial expressions, gestures, voice intonation of the teacher). Even Simon Soloveychik in his monograph "Pedagogy for All" noted: "Pedagogical difficulties can be described as the inability to find a common language. The common language is rather the language of desire than the language of command and obedience. A common language is a common desire. This is the language of faith. The language of hope. Language of love. To communicate is to evoke a

feeling, to attract attention. Communication is possible only with the person from whom there is no danger. Authoritarian management restricts, oppresses, and communication brings the spirit to life, equalises the unequal, humanises. Voice and gaze are the first tools of communication. Sometimes it is difficult to express the kindness in a voice because unkind intonations and timbres surround us from all the sides and spoil our voices» [Soloveychik].

*Problem solving.* The educational and methodological complex (EMC) for teaching foreign students developed in accordance with the requirements of the Federal state educational standard-3, is used at the Department of Normal physiology of Burdenko VSMU. This EMC was created for the formation of professional and cultural competencies of students of the "general medicine" specialty [Bulgakova et al. 2017]. The textbook and notebooks for independent students' work are focused on the implementation of modern pedagogic methods; they allow monitoring the current progress of students by the presence of situational, test and practical tasks, and generally structure classes. However, the practice of conducting classes at the disciplines of "Normal physiology", "Physiological bases of topical medical problems", "Physics. Mathematics" indicates the need for the most visual presentation of theoretical material to foreign students, dictated by the peculiarities of their perception of such kind of knowledge. Solving the sophisticated problems of learning the discipline through the prism of socio-cultural barriers is aimed at using specialised video materials, posters, presentations in the classroom, contributing to the better assimilation of the material and its memorisation. Oral discussion of theoretical material is accompanied by duplication of thesis statements, which are emphasised through the use of presentations and drawing up diagrams. The focus of students' attention on the visual perception of theoretical material with its pronunciation contributes to the consolidation of information in memory, and the performing of experimental work – a better understanding of the studied physiological process. The usage of various forms of organisation of the educational process, including gaming, has a positive effect on the effective assimilation of educational material [Gajvoronskaya]. Participation in scientific circles and University Olympiads, speaking at conferences and seminars on topical issues of medicine leads to increased motivation of students to further study of medical disciplines.

*Distant learning tools.* The rapid development of information technology has long been a part of modernity. Young people's access to the Internet is an integral part of their lives. Getting information through various educational sites saves time, and their visibility often simplifies the assimilation of materials by students. Many universities have resorted to creating distance learning courses based on electronic platforms. At the

Department of normal physiology of Burdenko VSMU, the EMC developed in English for taught to foreign students' disciplines, works on the basis of the Moodle platform (Modular Object-Oriented Dynamic Learning Environment). The distant Moodle learning system is in the modern, progressive, constantly developing environment that allows creating a unified information space for students and teachers, combining the traditional values of full-time learning with information and communication technologies [Kravchenko; Tyunina]. The electronic educational complex contains theoretical material – presentations, lectures, books, as well as knowledge control tests. The distant unit allows students to individually master the educational material, planning time, and enable teachers to evaluate the students' knowledge based on the results of solving their relevant tasks. A comprehensive approach to learning-theory, practice, and control (Moodle) – takes into account the complexity of the taught discipline and allows ones to partially level them.

*Conclusion.* Thus, the development of medical science by foreign students is accompanied by a number of difficulties caused not only by the language barrier, but also by the national mentality. In this regard, it is necessary to timely identify and take into account potential differences that arise between students in the "mixed" groups. The use of various forms of organisation of the educational process opens up the possibility of overcoming the problems that arise for foreign students on the way toward obtaining a high medical education.

#### Список литературы

- Булгакова Я.В., Карнова А.В., Астащенко А.П., Баева Е.С., Нечаева М.С. 12-летний опыт преподавания дисциплины «нормальная физиология» на языке-посреднике в медицинском вузе // Материалы XIII съезда Физиологического общества им. И.П. Павлова с международным участием. 2017. С. 1126–1128.
- Булгакова Я.В., Нечаева М.С., Дорохов Е.В., Карнова А.В., Преображенская Н.С. Качества преподавателя вуза, важные для русскоговорящих студентов и студентов-англофонов // Педагогика и психология образования. 2016. № 4. С. 18–28.
- Гайворонская Е.Б., Ширяев О.Ю., Подвигин С.Н., Плотникова И.Е. Роль игры при обучении психологии и педагогике англоговорящих иностранных студентов // Научно-медицинский вестник Центрального Черноземья. 2016. № 64. С. 51–54.
- Кравченко Г.В. Работа в системе Moodle: руководство пользователя: учебное пособие. Барнаул: Изд-во Алт. ун-та, 2012. 116 с.
- Монтессори М. Мой метод. Руководство по воспитанию детей. М.: Центрполиграф, 2014. 416 с.
- Шерстникова С.В., Дедова О.М., Корнев В.И. Высшее образование на языке-посреднике: про-



блемы и возможные пути их преодоления // Научно-медицинский вестник Центрального Черноземья. 2016. № 64. С. 131–136.

Сланевская Н.М. Мозг, мышление и общество. СПб.: Центр междисциплинарной науки, 2012. 390 с.

Соловейчик С. Педагогика для всех. М.: АСТ, 2018. 384 с.

Формирование мышления у детей с отклонениями в развитии: Кн. для педагога-дефектолога / Е.А. Стребелева. М.: ВЛАДОС, 2005. 180 с.

Тюнина О.И., Япрынцева О.А., Дорохов Е.В. Использование информационно-коммуникационных технологий в обучении иностранных студентов на языке-посреднике на кафедре нормальной физиологии ВГМУ им. Н.Н. Бурденко / Четвертая международная научно-практическая конференция. Воронеж, 2019. С. 357–364.

David N., Astashchenko A.P. Особенности моральных суждений иностранных студентов в медицинском ВУЗе России // Молодежный инновационный вестник. 2017. Т. 6. № 2. С. 217–218.

#### References

Bulgakova Ya. V., Karpova A. V., Astashchenko A. P., Bayeva Ye. S., Nechayeva M. S. *12-letnij opyt prepodavaniya discipliny "Normal'naya fiziologiya" na yazyke-posrednike v medicinskom vuze* [12 years of experience teaching the discipline Normal physiology in an intermediary language at a medical university]. *Materialy XIII s"ezda Fiziologicheskogo obshchestva im. I.P. Pavlova* [Materials of the 23<sup>rd</sup> Congress of Pavlov Physiological society], 2017, pp. 1126–1128. (In Russ.)

Bulgakova Ya. V., Nechayeva M. S., Dorokhov Ye. V., Karpova A. V., Preobrazhenskaya N. S. *Kachestva prepodavatelya vuza, vazhnye dlya russkogovoryashchih studentov i studentov-anglofonov* [Attributes of a university teacher for Russian-speaking and Anglophone students]. *Pedagogika i psihologiya obrazovaniya* [Pedagogy and Psychology of education], 2016, No. 4, pp. 18–28. (In Russ.)

Gajvoronskaya Ye. B., Shiryayev O. Yu., Podvigin S. N., Plotnikova I. Ye. *Rolevye igry pri obuchenii psihologii i pedagogike anglogovoryashchih inostrannyh studentov* [Role-playing games in teaching psychology and pedagogy to English-speaking foreign students]. *Nauchno-meditsinskij vestnik Central'nogo Chernozem'ya* [Bulletin of the Central Chernozem

region of scientific and medical], 2016, No. 64, pp. 51–54. (In Russ.)

Kravchenko G. V. *Rabota v sisteme Moodle: rukovodstvo pol'zovatelya* [Working in the Moodle system]. Barnaul, Publ. Altai University, 2012, 116 p. (In Russ.)

Montessori M. *Moj metod. Rukovodstvo po vospitaniyu detej ot 3 do 6 let* [My method. Guide to raising children from 3 to 6 years old]. Moscow, Centrepolygraph Publ., 2014, 416 p. (In Russ.)

Sherstnikova S. V., Dedova O. M., Kornev V. I. *Vyshee obrazovanie na yazyke-posrednike: problemy i vozmozhnye puti ih preodoleniya* [Higher education in an intermediary language: problems and possible ways to overcome them] *Nauchno-meditsinskij vestnik Central'nogo Chernozem'ya* [Bulletin of the Central Chernozem region of scientific and medical], 2016, No. 64, pp. 131–136. (In Russ.)

Slanevskaya N. M. *Mozg, myshlenie i obshchestvo* [Brain, thinking, and society]. Saint Petersburg, Centr mezhdisciplinarnoj nauki Publ., 2012, 390 p. (In Russ.)

Soloveyichik S. *Pedagogika dlya vsekh* [Pedagogy for All]. Moscow, AST Publ., 2018, 384 p. (In Russ.)

Strebeleva E. A. *Formirovanie myshleniya u detej s otkloneniyami v razvittii* [Formation of thinking in children with developmental disabilities]. Moscow, VLADOS Publ., 2005, 180 p. (In Russ.)

Tyunina O. I., Yapryntseva O. A., Dorokhov Ye. V. *Ispol'zovanie informacionno-kommunikacionnyh tekhnologij v obuchenii inostrannyh studentov na yazyke-posrednike na kafedre normal'noj fiziologii VGMU im. N.N. Burdenko* [Use of informative and communicative technologies in teaching foreign students in an intermediary language at the Department of normal physiology of VSMU named after N.N. Burdenko]. *Innovacionnye tekhnologii obucheniya inostrannomu yazyku v VUZE i shkole: realizaciya sovremennyh FGOS* [Innovative technologies of teaching a foreign language in higher Education and school: implementation of modern Federal state educational standards], 2019, pp. 357–364. (In Russ.)

David N., Astashchenko A. P. *Osobennosti moral'nyh suzhdenij inostrannyh studentov v medicinskom vuze Rossii* [Features of moral judgments of foreign students at a medical university in Russia]. *Molodezhnyj innovacionnyj vestnik* [Bulletin of youth innovation], 2017, Vol. 6, No. 2, pp. 217–218. (In Russ.)