

## The evaluation of intercultural professional technology-based communicative competence formation for students

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### Abstract

The purpose of the study is to determine the evaluation of the Intercultural Professional-Technology based communication Based Communicative Competence Formation of Students. Overall 22 respondents of the 2nd year at a State university took part in the research like focus groups. The results were taken by the interview in the Google forms. The results of the analyzes showed that the development of the intercultural professional-communicative competence of natural studies students is considered to be a very important requirement, and the formation of their professional communication skills can open up great opportunities for the future career of students. Students' interview has also shown that from methodological aspect a case study technology-based communication is highly valued. Therefore, effective ways of using communicative-cognitive case technology-based communication in the classroom were analyzed and an algorithm for working with it was developed.

**Keywords:** Intercultural Professional Communicative Competence, technology based communication, cognitive, intercultural.

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## 1. Introduction

Nowadays the development of international cross-cultural relations is changing the requirements for the modern specialists of the natural studies faculty which is carried out both in domestic and international methodology. Globalization of the cultural integration of education and culture contributed to the enhancement of the foreign language education together with the professional orientation (Saree, 2021). Accordingly, there is a big demand of the natural studies specialists in the labor market who have professional communicative competence, that is to say specialists with relevant professional foreign language acquisition, who can easily and successfully adopt to the current global situations, can solve various profession-oriented problems in foreign language (Charupash, 2019).

Although there are a lot of scientists who found out the methods and technologies that can strengthen the level of the professional foreign language education we have to admit that today there is still a lack of such specialties both with a high level of foreign language and knowledge of their profession. In order to have such specialties the teachers also must be very competent and versatile, they also need to have deep knowledge and experience in the field of language and subject matter. Thus, observing the situation in the educational process and applying the existing methods and approaches we attempted to reconsider methodic guidelines that can complement and improve the natural studies students' intercultural professional communicative competence. The most effective technology based communication to develop students' professional orientation and foreign language acquisition is considered to be methodology with the application of a case study. It is not new, but we've tried to make some changes into the instruction, organization and the usage of the case study technology based communication during the teaching.

As it is known, the case study technology based communication is widely used to prepare students at universities and high schools all around the world. This methodology allows them to develop a whole range of essential skills and abilities (analytical, practical, creative, communicative, introspection and reflection), as well as personality traits such as communicative competence, social responsibility, the desire for knowledge and self-improvement (Nurullina et al., 2018). The report "Recommendations for Using the Case Study Method in International Research" also notes its great potential in the educational process (Eraslan et al., 2019). It is indicated that it helps to reveal and establish relationships between objects, teaches to understand the causes of events, presents a description of the existing production problem situation in a "live" interesting language, which leads to a deeper understanding of this situation.

According to researchers, case study technology based communication based communication also helps to solve the main tasks of professional foreign language education: familiarizing students with the conditions of practical production activities; training professionals oriented towards success; encouraging analytical and critical thinking; familiarization of students with the practical activities of enterprises; students gaining practical skills and developing leadership and communication skills; building up and activating human, intellectual and social capital; the formation of a system of professional, universal, moral, cultural and other values (Bello, et al., 2020).

All in all, the term "case study" is defined as follows according to Ariyan M.A. (2017): "it is an active, problem-based teaching method focused on the description and analysis of real-life events (situations) from the work in companies, aimed at the successful socialization of the individual, improving communication and professional skills through the creation and immersion of students in the context of processes"(Karaca, 2020).

So, everybody knows that while working with cases students usually follow the algorithm: they get to know the situation, analyze the provided data, look for solutions while discussing the advantages and disadvantages of each of the proposed options, decide based on the assessment of alternatives, present the decision made, evaluate the work of the participants, summarize the work with the case (Kumoro, et al., 2020).

In our research we'd like to offer using more complex type of the case study as communicative-cognitive cases with different algorithm. According to Ariyan M.A. (2017) communicative-cognitive cases are dynamically organized, professionally oriented foreign language educational texts, which, on the one hand, contain a set of communicative and cognitive tasks selected considering the competencies being formed, and on the other hand, present algorithms and various options for solving the most typical production problems. The purpose of communicative-cognitive cases is to develop motivation and the ability to systematically, independently acquire new knowledge and skills, to enrich their professional and linguistic competence.

## **2. Method**

In this study, a qualitative research approach was adopted in order to analyze the attitudes of natural sciences students towards professional foreign language education and the use of case technology-based communication in lessons. As it is known, qualitative research focuses more on what is happening in the process. In this study, a mixed approach was used with the help of interview and observation. The most basic feature of this case studies is to investigate one or a few situations in depth. In other words, the factors related to the situation (environment, individuals, events, processes, etc.) are handled with a holistic approach and the focus is on how they affect the relevant situation and how they are affected by the relevant situation (Başkale, 2006).

### **2.1 Working group**

22 volunteer students from the faculty of natural sciences were interviewed to collect data. The purpose of the interview was to determine the students' attitudes towards professional foreign language and the use of communicative-cognitive cases in the educational process. Additionally, the results of the study were evaluated as classroom observations.

### **2.2 Data Collection and Analysis**

The data were designed according to the answers received from 22 students by using the observation ability in order to design from the analyzes used in the qualitative method. Rather than analyzing the data according to pre-arranged categories, the data is categorized after it is obtained. The data analyzed with continuous comparative data analysis are coded as a category and at the same time, they are continuously compared with the data being analyzed (Altun et al., 2013).

## **3. Results**

During the study students were interviewed, so they had to answer the following questions in the table 1 to analyze their attitude to the intercultural professional foreign language education and technologies that is used during the class

Table 1 – Interview questions with students’ answers

Interview questions	Answers with percentages			
1. Is professional foreign language education important for future natural studies specialists?	Vitally important <b>7 (31.8%)</b>	Very important <b>13 (59.1%)</b>	Not important <b>2 (9.1%)</b>	
2. Does learning professional foreign language improve your career opportunities?	Yes, of course <b>22 (100%)</b>		No <b>0</b>	
3. How would you rate your professional foreign language level?	I can read and understand the whole idea of what is said, but I hardly communicate. <b>59.1%</b>	I can only read, but I can't speak English well because of my grammar mistakes <b>18.2%</b>	Perfect, I can easily use English in any sphere <b>13.6%</b>	I can use English for solving profession-oriented tasks <b>9.1%</b>
4. What's the reason of your poor professional communication skills?	Usage of traditional methods and technologies <b>12 (54.5%)</b>	Lack of professional lexis <b>10 (45.5%)</b>	Boring material <b>10 (45.5%)</b>	Lazy me <b>6 (27.3%)</b>
5. Which of the following emotions do you often feel during the class?	Demotivated <b>45.5%</b>	Motivated <b>40.9%</b>	Happy <b>9.1%</b>	
6. Which type of technology-based communication do you think effective?	Case study <b>50%</b>	Game based methods <b>18.2%</b>	Problem situations <b>13.6%</b>	Project work <b>13.6%</b>
7. Which type of technology-based communication help to improve your communicative skills more?	Speaking activities, games <b>10 (45.5%)</b>	Solving problem situations <b>7 (31.8%)</b>	Working with case studies <b>6 (27.3%)</b>	Discussions, debates <b>5 (22.7%)</b>
8. Have you ever worked with cases? How helpful are they?	Very <b>18 (81.8%)</b>	Slightly <b>4 (18.2%)</b>	Not much <b>1 (4.5%)</b>	

Overall, 22 students from the 2nd year of study took part in this interview. According to the results about 60% of the students admit that professional foreign language education is very important for their future profession. They are all very confident that professional foreign language will improve their career opportunities. However, 13 (59,1%) students out of 22 have troubles in speaking foreign language even if they can read and understand the speech. The main reason for this was the usage of the traditional methods and technologies (54,5%), then the boring material that is presented by the teacher (45.5%) and students’ lack of professional lexis (45.5%).

Consequently, 45.5% of the students felt demotivated during the lesson, whereas 40.9% felt motivated and others felt happy. During the interview students had to say the most effective type of technology-based communication according to their mind and 50% of them chose case study technology-based communication, 18.2% preferred using game-based method and others mentioned problem situations and project method.

But, surprisingly, 10 students said that speaking activities and games mostly improve their professional communication skills, whereas 7 students chose solving problem situations and 6 students chose working with case studies. And finally, for the question to what extent cases are helpful, 18 students, that is 81.8% answered positively about this technology-based communication. The whole results of the interview are presented on the following Figures 1-4:

How would you rate your professional foreign language level?

22 responses

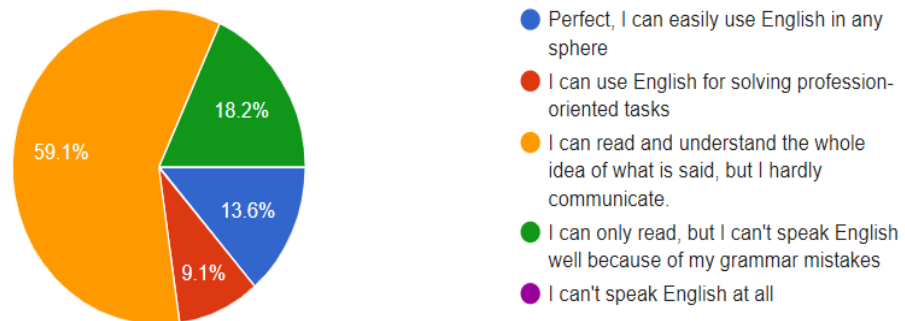


Figure-1

Does learning professional foreign language improve your career opportunities?

0 / 22 correct responses

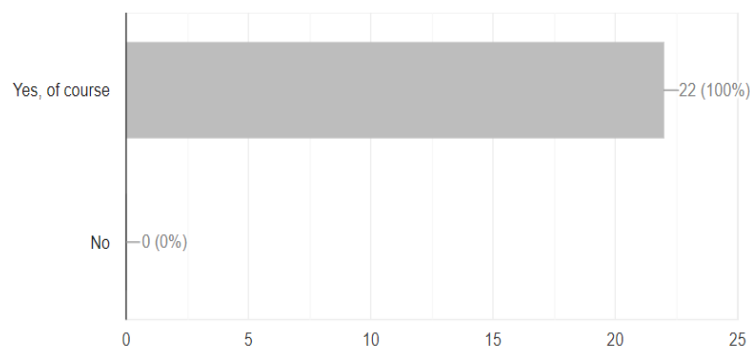


Figure-2

### Which type of technology do you think effective?

22 responses

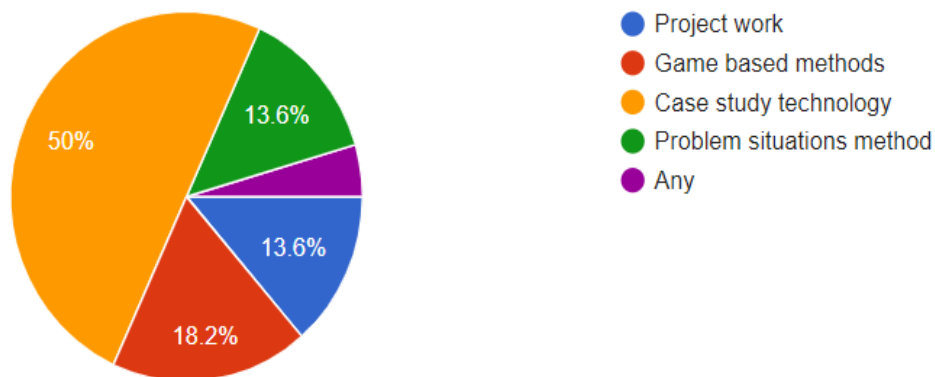


Figure-3

### Which type of technology help to improve your communicative skills more?

22 responses

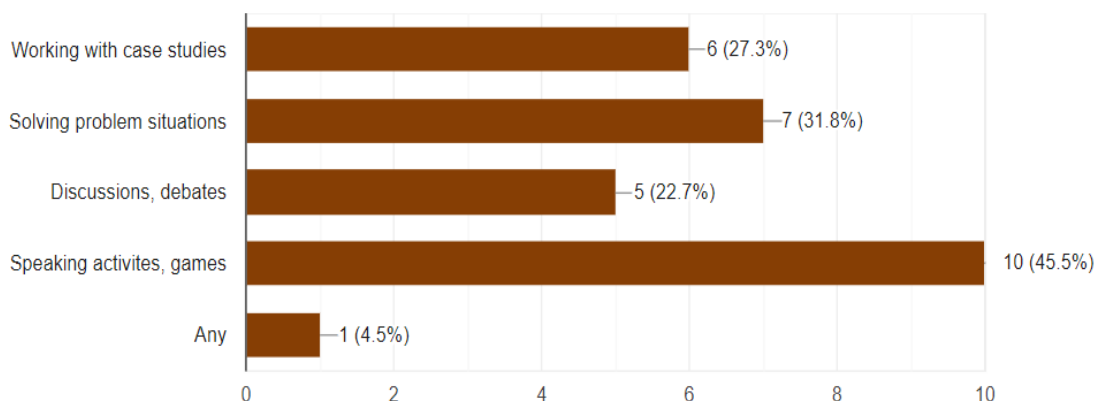


Figure-4

## 4 Discussion

From the interview it's clear that professional foreign language education has become vitally important for students these days. Over the past couple of decades most universities have been paying special attention to the acquisition of the foreign language for any specialty because of the radical changes in social development, political conditions in our society. Therefore, these circumstances have led universities to prepare specialists being able to foster international relations and establish contacts with representatives of different nationalities in the economic, social and political spheres at different levels.

So, students also realized that in this globalized world it's not enough to know the language and have special education, it became significant to have personal intellectual abilities, critical thinking skills, professional communication skills that is necessary for understanding cultural diversity in order to cooperate with representatives of various multinational organizations. Despite the fact that

students are aware of modern requirements for the specialists and the possibilities in building a career today, they still struggle reaching proper level of professional foreign language.

According to the results taken from the interview most of them rated their level of foreign language as poor, they can read and understand what is said, but they hardly communicate. The reason for that was mostly using traditional methods and technologies in the class rather than modern ones, presenting boring material and students of natural studies poor professional language skills. Therefore, most of the students felt demotivated and according to the interview the best solution for the improvement of the English classes would be using case study technology based communication and game-based method according to students' responses. So, we'd suggest using more case study situations in combination with other methods like method of key words, brainstorming, role playing activities, situational role plays, interactive games, etc.

In this regard, Vasbieva D.G. and Kalugina O.A. suggest almost the same learning strategy claiming that most universities should implement competence-based approach including meetings, role-plays, case studies, psychological and other training. It follows that different methods and technologies in combination with each other arise students' interests to the presented material and strengthen their theoretical knowledge and practical application (Vasbieva, et al., 2016).

With the reference to the research made by Raimbekova G.S., Sadykova A.A. the case study has the following stages: The first stage is familiarization with the situation, its features; The second stage is the identification of the main problem (main problems), the identification of factors and personalities that can really affect; The third step is to suggest concepts or topics for brainstorming; The fourth stage is the analysis of the consequences of making this or that decision; The fifth stage is solving the case, proposing one or more options (sequence of actions), indicating the possible occurrence of problems, mechanisms for their prevention and solution. According to their recommendation the cases must be meaningful in order to keep students interested. This will be facilitated by the tension of the situation, conflict or drama, which will make it possible to make a quick, timely and correct decision. The case should be written in a language understandable to the student, without unnecessary terminology (Raimbekova et al., 2020).

Looking through the researches made around the communicative-cognitive case study we consider this technology based communication very complex, but one of the effective ways of increasing the quality of the professional foreign language of the students of NS. So, we'd like to suggest the following algorithm of solving the case:

1. Read the case and making a list of keywords. The teacher has to find authentic case situations with a relevant content for NS students. After reading the case students should write down the keywords.
2. Identify the words informants and the words concretizes from the collected list of keywords. Make the communicative cluster. According to Ladyzhenskaya T.A. there is a method of key words where she also points out the words concretizes (concrete terms, concepts, usually nouns) and the words informants (the words that link concretizes and complement the meaning).
3. Retell the case situation by using your communicative cluster.
4. Find several situations that occurred in the case and making a scheme for them.
5. Think up about these situations and cognitively gain some more information around this situation.
6. Suggest some possible solutions to the case situation.
7. Act out\role play the case situation.



As it is known, cases are being used especially successfully only in combination with other methods of teaching foreign languages, so, in our algorithm of work we use method of key words, communicative clusters, role play. Method of key words is very helpful in learning and using terms, due to this method, students get to know and understand the terms and concepts concerning their profession more effectively and easily. While resolving case situations students mainly will be more concentrated on the case itself, not on their speech and the usage of these words. Communicative clusters provide the learners systematically prepare the speech in order to form various types of sentences and develop the ability to publicly present their work in a foreign language. And thus, working with the communicative-cognitive cases expected to be very useful and engaging for students. But the teachers also must keep in mind that the way of presenting the material should be different and motivating. The cases must be comprehensive, holistic and functional, multilevel and multilateral and should meet the requirements of modern life. The teachers can also use other additional materials as graphs, charts, figures, information of an economic, social, historical nature according to the theme in order to vary the teaching process.

So, case studies spark lively classroom discussion and provide real-world management lessons that students can put into practice in their professional lives. In other words, students discuss real-world business situations in an artificially created professional environment. Many students are more inductive than deductive reasoners, which means that they learn better from examples than from logical development starting with basic principles. The use of case studies can therefore be a very effective classroom technique (Kunakova et al., 2020).

Kunakova and Assanova (2020) in her works also emphasizes the benefit of this technology based communication assuming that case study allows to consider the professional training of students, interests, developed style of thinking and behavior, which makes it possible to widely use it for teaching the language of the future profession. They involve real parties with real problems and therefore tend to stimulate students more than do textbooks with only hypothetical problems (Kalugina et al., 2016).

This technology based communication also allows teachers to simultaneously solve several problems. The most important is that it allows to learn the course material and to include the motivational sphere of the student into the educational process; it also develops creative abilities, the capacity for further self-development and self-education, communicative skills; helps to establish the emotional contacts between students; implement educational objectives, as it accustoms students to work in a team, to listen to their group mates. The use of case study-based technology based communication in developing professional communicative competence relieves students' nervous tension; it gives the possibility to change the form of their activities, to focus the attention on the key issues (Namaziandost et al., 2019).

## **5 Conclusion.**

In this research paper we have analyzed the necessity of the intercultural professional communicative competence of students of NS and the technology based communication that is used to achieve it. It became obvious that professional foreign language education is really important for this specialty in the modern world. During the study students' attitude towards case study technology based communication is identified with the help of the interview and this technology based communication was supported to be used in the class by the majority of students. So, it should be noted once again that the case-study provides students with an excellent opportunity to creatively apply the learned language material on the basis of their professional knowledge and allows students to adapt to real



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and potentially possible situations. As an interactive teaching tool, it wins a positive attitude from students who see it as an opportunity to take initiative, to feel independent in mastering theoretical knowledge and mastering practical skills. That's why we consider case study as an effective technology based communication of active training of NS students of second courses on the basis of real professional situations. For the further research we'd like to analyze supplementary technologies that is used together with the case study technology based communication. In addition to this, examples of the cognitive-communicative cases will be presented and evaluated.

## References

- Altun, T , Sancak, H . (2013). A qualitative study of teacher opinions and qualifications for the use of information technologies in course activities. *Sakarya university faculty of education journal*, 0 (19), 170-195. Retrieved from <https://dergipark.org.tr/en/pub/sakaefd/issue/11215/133944>
- Ariyan, M.A. & Klyueva, M.I.. (2017). Communicative-cognitive case-method in teaching English to students: didactic potential. *Yazyk i kul'tura*. 135-153. 10.17223/19996195/40/11  
[http://journals.tsu.ru//language/&journal\\_page=archive&id=1679&article\\_id=37144](http://journals.tsu.ru//language/&journal_page=archive&id=1679&article_id=37144)
- Başkale, H. (2016). Determination of validity, reliability and sample size in qualitative research. <http://acikerisim.pau.edu.tr:8080/xmlui/handle/11499/27221>
- Bello, H. S., Idris, S. U., & Bappayo, A. (2020). Media and educational technology in Nigeria: Managing the broadcast programmes of Radio Nigeria Globe FM towards girl child education. *International Journal of Innovative Research in Education*, 7(1), 16–25. <https://doi.org/10.18844/ijire.v7i1.4715>
- Charupash, R. (2019). Learning outcome of the Thai qualification's framework for higher education (2009) by PBL. *International Journal of Learning and Teaching*, 11(2), 42–48. <https://doi.org/10.18844/ijlt.v11i2.101>
- Eraslan, L., & Kukuoglu, A. (2019). Social relations in virtual world and social media aggression. *World Journal on Educational Technology: Current Issues*, 11(2), 140–149. <https://doi.org/10.18844/wjet.v11i2.4145>
- G.S., Sadykova A.A.(2020). Case Method - study as a modern technology. *Weekly.ru, Scientific and Practical Research*. 3-1 (26). <https://evolkov.net/case/case.study.html>
- Kalugina, O. A. (2016). Development of students' professional communicative competence in an economic higher school. *XLinguae*, 9(4), 37. DOI: 10.18355/XL.2016.09.04.37-45
- Karaca, A. (2020). Connection of architectural education with the technological world in Northern Cyprus. *International Journal of New Trends in Social Sciences*, 4(1), 36–50. <https://doi.org/10.18844/ijntss.v4i1.5138>
- Kumoro, J., Kusuma, C. S. D., Kistiananingsih, I., & Hanafi, M. (2020). The effectiveness of e-government media by the special region of Yogyakarta's provincial government. *Global Journal*

Mikhailova, T., Duisenkova, K., Orazakynkyzy, F., Beysembaeva, G. & Issabekova, S. (2021). The evaluation of intercultural professional .technology-based communicative competence formation for students. *World Journal on Educational Technology: Current Issues*, 13(2), 272-287. <https://doi.org/10.18844/wjet.v13i2.5700>

*of Information Technology: Emerging Technologies*, 10(2), 158–168.  
<https://doi.org/10.18844/gjit.v10i2.5125>

Kunakova K.U., Assanova A. (2020). Features of formation of foreign language professionally-oriented competence of law students on the basis of case study. BULLETIN of Ablai Khan KazUIRandWL, Series “PEDAGOGICAL SCIENCES” № 3 (58).  
<https://www.ablaikhan.kz/images/obyav>

Namaziandost, E., Hashemifardnia, A., & Hosseini, S. E. (2019). Investigating speech acts in Iranian junior high school English textbooks. *Global Journal of Foreign Language Teaching*, 9(2), 82–90.  
<https://doi.org/10.18844/gjflt.v9i2.4215>

Nurullina, G. M., Muraviyov, A. F., Martyanova, A. A., & Yarmakeev, I. E. (2018). Project technology in the development of communicative competence in schoolchildren: Extracurricular classes of Russian language. *Cypriot Journal of Educational Sciences*, 13(4), 461–468.  
<https://doi.org/10.18844/cjes.v13i4.3897>

Seree, M. A. A., Mohamed, M. I., & Mustafa, M. E. D. (2021). Progressive computer test capabilities of the candidates proposed for the post of physical education teacher. *Contemporary Educational Researches Journal*, 11(1), 09–17. <https://doi.org/10.18844/cej.v11i1.4729>

Vasbieva, D. G., & Kalugina, O. A. (2016). An analysis of students' intercultural competence levels in a non-linguistic higher school. *XLinguae*, 9(3), 58-69. [Hyperlink](#)