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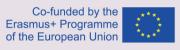


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# TRAINING OF TEACHERS



### **AS INCLUSIVE EDUCATION AMBASSADORS**



Funded by Erasmus+ Programme of the European Union

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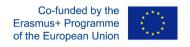














### **INCLUSIVE AMBASSADORS**

### TRAINING OF TEACHERS AS INCLUSIVE EDUCATION AMBASSADORS

Project number: 2018-1-BG01-KA201-047854

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### **INTELLECTUAL OUTPUT 1**

### **GUIDE**

### INCLUSIVE EDUCATION: CONCEPTION AND PRINCIPLES, PRINCIPLES, BELIEFS AND ROLE OF THE INCLUSIVE EDUCATION AMBASSADORS

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### 2018-1-BG01-KA201-047854

#### Introduction

This output will raise the awareness and knowledge of all teachers who would like to become inclusive education ambassadors towards the principles of the inclusive education, the barriers and obstacles that its implementation faced in the 21st century classroom of the inclusive education ambassadors as a mainstreaming and implementation body.

Intellectual output 1 will conclude on the development procedure and methodological approaches in terms of three areas:

- Learning requirements of students with learning difficulties in partners' countries and how these requirements currently being addressed (by traditional or/and innovative approaches and practice);
- The diversity of learning styles of contemporary teachers and school staff working with the students with learning difficulties (at primary school and preschool);
- Pedagogical trends in connection with use of ICT technologies in the education – cases of mobile applications, games, educational robotics and related ICT proving a significant impact on students' learning achievements (goals, engagement, teacher assistance, etc).

### **Expected impact:**

- The manual will be a new training resource for teachers, trainers and school staff who would be encouraged to introduce robotic mediated learning in their classroom activities
- Improvement of the provision of inclusive education in partners' countries
- Recording and sharing innovative practices based on collected and concluded requirements for its pilot implementation.
- Improvement of the teachers/trainers practice by equipping them with new skills and competences to introduce robotic mediated learning into the preschool and school education.

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- Improvement of the level of engagement, motivation for learning, goal achievements of the beneficiaries: students with learning difficulties in partners countries
- Use of the ICT based solutions into the mainstream education process by supporting EU Digital Agenda.

### TRAINING REQUIREMENTS FOR STUDENTS WITH LEARNING DIFFICULTIES

Ivan Trichkov

#### 1.1. Introduction

The inner world of the child, regardless of his affiliation, is complex and delicate. The influence and care of it should be in the spirit of tolerance, positive attitude and humanism. The child is not a minor model of the adult, but an extraordinarily dynamic biopsychosocial system. The child has to go through the first most important periods of the life cycle to reach maturity. On this path to maturation, it goes with its genetic value, but this fact would not be realized without psycho-social stimulation in conditions in which there are risks of harm, deviation, learning, behavioural and emotional difficulties.

Many adolescents suffer from social difficulties and learning difficulties, which in many cases lead to social unacceptability. That is why science has been increasingly focusing on the factors affecting the learning difficulties faced by students, and has also paid attention to certain mandatory conditions and requirements needed to overcome these risky learning difficulties.

### 1.2. Aim and methodology of the project

The main objective of the "INCLUSIVE AMBASSADORS" project is to identify and thoroughly investigate the reasons and requirements for which many Bulgarian students experience learning difficulties in the education system.

The specific task of the conducted research are:

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- 1. To investigate the causes of learning difficulties in children from the point of view of the groups with learning difficulties that are relevant to the problem the children themselves, the parents, school principals, teachers, pedagogical counsellors, social workers, experts, etc.
- 2. Evaluate the effectiveness of existing policies to prevent school drop-out and to keep children in the classroom.
- 3. To make suggestion and recommendations on the prevention policies and measures and to limit the occurrence of learning difficulties for students in Bulgaria.

Research in this direction is realized through a combination of quantitative and qualitative methods. Qualitative methods include a questionnaire evaluating basic skills and knowledge of the difficulties faces by students in Bulgaria.

### Qualitative methods include:

- 1. Discussions in focus groups with teachers and parents of children dropped out of school;
- 2. Description of typical cases of students dropped out of school (case study).

Reasons and requirements for training students with learning difficulties

According to some studies, the empirically identified causes in Bulgaria, which lead to serious difficulties and possible dropping out of school, can be grouped into several main categories – socioeconomic, educational and ethno-cultural.

#### 1.3. Socio-economic reasons

The poor quality of life of certain social strata poses serious obstacles to the education of children and young people in these groups. Low incomes do not allow many families to cover their children's costs for education (for textbooks, notebooks, clothes, food) may be cited as a cause provoking certain difficulties related to the education and literacy of Bulgarian pupils

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According to the data of the National Statistical Institute (NSI) and the Ministry of Education and Science (MES), the attendance of the school, the low status of life and the poverty of certain families in certain strata lead to many difficulties related to the training, respectively dropping out or segregating.

#### 1.4. Educational reasons

The school environment and the organization of the learning process can also cause some of the known learning difficulties of the students in Bulgaria. Substantial difficulties in learning the course materials; low interest in the learning process and the resulting desire/unwillingness to attend school; presence of conflicting relationship with classmates and/or teachers, etc. Educational difficulties are mentioned as the main reason for dropping out of school by many children. They say that did not want to study because it was difficult for them and 22% said that they were not interested in school (according to Ministry of Education and Science and UNICEF).

The availability and effectiveness of pre-school preparation, the quality and complexity of the curriculum, the qualification of the teachers, the problems of training and mixed and incomplete class, etc. can also be attributed to educational reasons leading to certain difficulties related to the training of some students in Bulgaria.

### 1.4.1. The child's ethno-cultural environment has a significant impact.

Ethno-cultural risk factors have the greatest impact when the family lives in a compact group among ethnic groups. The phenomenon is most clearly manifested in urban Roma ghettos, where early marriage, low incomes, poor living standards and living conditions, unemployment, etc. also influence the family (raising children in incomplete families, low educational level of parents, irresponsible parenting, etc.). with the Roma population and low school readiness, learning difficulties, irregular attendance at school,

conflicts with teachers and classmates interfere and place children at a particularly high risk of dropping out of school or serious literacy difficulties <sup>1</sup>

### 1.4.2. Reasons arising from the student's personal attitude. Such may be:

- lack of interest in learning and schooling,
- unwillingness to learn,
- unacceptable behaviour,
- lack of interpersonal communication,
- school dropouts,
- conflicts with pupils and teachers.

### 1.4.3. Other reasons

Poor educational attitude in the family, parents' separation, negative attitude of parents to school and individual teachers, prolonged illness. Other educational reasons can be pedagogical, psychological and methodical mistakes by teachers and various disadvantages in the process of teaching.

In recent years, in view of the fact that many Bulgarian/Turkish students experience learning difficulties in the education system, and are part of the mainstream cases leads to the problem of dropping out of school, preventive policies have been implemented in Bulgaria and Turkey therefore some requirements have been imposed to overcome them and reducing the consequences of this issue. Examples in this attitudes are political instruments such as:

UN

 Integrated plan to implement the UN Convention on the Rights of the Child 2006-2009

Bulgaria:

vyyyyy yitaaha magaarah aam/filaC

www.vitosha-research.com/fileSrc.php?id=2122

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- National program for more comprehensive inclusion of students in the compulsory school age 2005-2008;
- Joint Memorandum on Social Inclusion of the Republic of Bulgaria;
- Strategy for educational integration of children and students from ethnic minorities;
- National plan for the integration of children with SEN and /or with chronic diseases in the system of public education, etc.<sup>2</sup>

### Turkey

- Turkish National Education Law No. 739
- Turkish Primary Education Law No. 222
- Turkish Special education Law Decree No. 573
- Turkish Circular of education applications and inclusion No. 2017/28
- Turkish Ministry of National Education regulation on secondary education level institutions No. 29871
- Turkish Ministry of National Education regulation on preschool education and primary education institutions No. 29872
- Turkish Disability Law No. 5378

Learning difficulties and difficulties in academic tasks may lead to lack of self-esteem, isolation, and behavioural problems, but this should not happen. We can prevent this by building a strong support system for the child and helping him to learn to express himself, to cope with anger and to overcome the challenges. By focusing on the child's growth as a person, not just in acquiring academic skills, you help him build good emotional habits that predict his success in life. The most important thing to remember is that most children with such problems are as smart as everyone else. They just need to be trained in a way that is adapted to their unique learning style. By

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<sup>&</sup>lt;sup>2</sup> www.vitosha-research.com/fileSrc.php?id=2122

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learning more about the learning difficulties in general, you can help a lot to achieve success at school and beyond.

### 1.5. Requirements for achieving better results and better school success

The abstraction of primary school education determines the need to use new forms of work during school hours. Many students experience learning difficulties and the use of the conventional model of teaching further complicates the situation by turning the learning of basic subjects into a monotonous, boring process.

Everyone perceives, processes, stores and reproduces information in a different way. The style of learning expresses the individual's preference for the way the information reaches it. The current generation has a kinetic-visual style of learning that requires classroom dynamics.

In order to create a dynamic atmosphere in the classroom and a model of work that is adequate to the students' needs, a lesson efficiency system can be successfully used, including gaming and teamwork patterns, as well as inclusive tasks that make subject links.

The gameplay and teamwork tasks applied in the work of teachers and students, contribute to the activation of students, to improving the quality of knowledge, skills, habits and relationships; to stimulate the development of critical and self-critical thinking, their creative abilities; to create positive motivation and cognitive interests, positive attitude towards learning and mental function; to stimulate competition among students and/ or groups, to develop skills for cooperative activities; for students' development of self-regulation, self-control and self-assessment; to acquire collectivist skills and habits; to gain responsibility, respect and evaluate the success of the partners. Very often the game motives are more easily transformed into cognitive motives.

The main task of effective learning is the formation of cognitive abilities in the student. They are formed on the basis of

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systematically learned knowledge and ways of solving pedagogical tasks, accompanied by an assessment of the quality of work. It is important not the quantity of knowledge, but whether the students have a mental autonomy that is expressed in how the learners apply them in new situations. It is precisely the interest in cognitive activity, educated at school, and subsequently becomes the basis for the development of his/ her abilities. Opportunities for targeted form of cognitive interests should be well known of teachers as it is cognitive motivation is a requirement for success in school, and in the future professional activity.

Considering the fact that the reasoning of students learning form the basis of their needs and interests (need  $\rightarrow$  interest  $\rightarrow$  motivation), the teacher should direct his/ her efforts to the creation and development of cognitive interests of the students.

If necessary, minimize **the learning content and tasks of students with learning difficulties** and encourage student successes. Separation of tasks into small parts, the principle – graduation and consistency. To go from simple to complex.

The very possibility of adapting the curriculum to the possibilities and potential of each child is an important condition and a requirement for its academic support.

Adaptation of the curriculum can include:

- **Volume** adaptation of the number of topics to be learned or fulfilled;
- **Time** adapting the time allowed for learning, performing tasks or testing;
- **Difficulty** adapting the level of skills, the type of problem or the rules regarding the ways students can approach the task;
- **Answers** adapt the way students are expected to respond to the instructions, tasks and questions that have been asked;
- **Participation** adaptation of the extent and manner in which pupils with disabilities are included in the lesson;

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- **Alternatives** adaptation of goals or expected results using the same material;
- Level of support if necessary, attracting a special educators, assistant or family support for disabled students
- **Introduction** adaptation of how new information or instructions are introduced;
- **Changing the curriculum** using different instructions and materials to meet the students' individual goals. <sup>3</sup>

### 1.6. Increase the number of practical exercises.

Also encourage students to participate in extracurricular forms. The structure of each lesson should provide time for individual work, individualization and differentiation of learning, to assign different exercises and tasks to different groups of students. It is a good idea to make changes to the child's classroom to suit their needs, also by providing special training services and programs that take place inside or outside the classroom of the child; developing a specific plan from the school addressing the educational needs of the particular child; considering the possibility of alternative training that will be better prepared to meet the needs of the child (Levterova, Atanasova, Trichkov, 2016).

In planning the learning activity, the teacher has to build a pedagogically well-grounded system of measures to stimulate lagging students by encouraging their first successes and positive appearances, with a demonstrated desire for successful learning work. He can use oral praise, approval, written praise in notebooks, and notification to parents.

Another important requirement in order to **improve and** facilitate the education of children is to regulate more flexibility and freedom of the curriculum.

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http://priobshti.se/article/priobshtavashta-klasna-staya/adaptirane-na-uchebniya-plan-v-klasovete-v-koito-uchastvat

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The pre-school and school education legal act in Bulgaria seeks to ensure that schools have autonomy to develop curricula for expanded and additional training, thus achieving the freedom of the school to define objectives and results (acquired competencies) at school level based on the needs and interests of the students. At the classes designed to acquire this training, students can study subjects such as entrepreneurship, civic education, health education, and other.<sup>4</sup>

## 1.7. The form teacher and individual teachers maintain a monthly relationship with the parents of students with learning difficulties.

In fact, it turns out that most parents are unaware of some difficulties of their children (especially after a certain age). It has been established that good teacher-parent relationships contribute greatly to the success of the child in school.

It is essential to take measures to reintegrate drop-out students and students with learning difficulties. There is a need to devise targeted drop-out measures aimed at overcoming the educational reasons for dropping out at each stage of the training.

Policies for reintegration and school dropout include some key measures. A key role is to provide a positive climate and good relationship at school. "The positive educational environment is related to a clear definition of the rights, obligations and responsibilities of the participants in the educational process to provide conditions for education that develop the personality of each child and student, as well as improving the interaction in the educational institutions".

One of the strategies that could keep students in school is career guidance and counselling. It "prepares young people for an informed choice, for the practical benefit of the acquired competencies. It also

atta://www.adutachiaurnal.org/ym.aantant/ymlaada/2018/0

 $<sup>^4\</sup> http://www.edutechjournal.org/wp-content/uploads/2018/08/2\_2018\_276-281.pdf$ 

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represents the link between higher education and the possibility of better realization".

### 1.8. Creating support centres for personal development

The aim is to develop and implement cross-sectoral policies and to integrate childcare and student care, to ensure activities, services and programs with care for the development of student's interests and abilities in the community. Children and students are provided with general and additional support for personal development that provides a suitable physical, psychological, and social environment to develop their abilities and skills.

Another important condition and requirement for training for students with difficulties is the availability of specialized pedagogical support for those who are lagging behind and who are threatened with dropping out, using boarding school form of education.

The state educational standard for inclusive education regulates the organizing principles of support for personal development as a general and complementary one.

General support is primarily responsible for the need of prevention and timely recognition of learning difficulties in children and students and the need to recognize children's gifts. At the level of kindergarten and school, general support connects all services that are basic care for physical, mental and social well-being, motivating and interest activities. At the level of the classroom, general support is addressed to those first manifest the learning difficulties, learning and participation of students who can be overcome with little help; or is aimed at early discovery of the gifts.

The additional support builds on the existing practice of inclusive education for children with special educational needs, including support for other specific needs of children. The meaning of additional support to provide additional and different resources and for children who cannot meet the requirements of the curriculum,



learning difficulties, learning and participation in their natural social environment, according to their optimal capabilities.

In the Bulgarian law on pre-school and school education, additional support is targeted at children with special educational needs, children at risk, children with gifts and talents and children with chronic diseases.<sup>5</sup>

### 1.9. Provide a special teacher to assist students who are falling behind.

The main role in inclusive education is played by so-called special educators (special pedagogues). Without them the education of children with difficulties would be unable. They are a new type of teacher who must have a very good professional background to work with a certain category of students. These specialists should also be interested in general education in mainstream school and the special educational needs of children. In fact, the role of those special educators is related to the maximum possible compensation of the damage from disability in the process of socialization. This means, professionally and personally, that the requirement for teamwork with lecturers and specialists is of paramount importance for achieving real results. Such behaviour also requires individual attitudes and specific professional skills, as well as general and special training.

Teamwork for children and students with learning difficulties – Team work on a child or student is a new step in the educational policy aimed at individualizing the training, support and overall care of the student during his or her training period as long as it is necessary. Personality development support teams are also being created at regional centres for support of inclusive education.

Their function is to assess the individual needs of additional support for children and students with special educational needs, facilitate the process of providing support. It should be noted that an

<sup>5</sup> https://www.mon.bg/upload/4148/nrdb\_priobshavashto\_271017.pdf

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important prospect and requirement in the education of children and students with special learning difficulties is the introduction of modern assistive and supportive tools and technologies which facilitating the training.

In recent decades, we have witnessed the introduction of many modern assistive tools and technologies into many countries' education systems. They have opened the doors of education for students with special education needs because they are an alternative that leads to the inclusion and social acceptance of them.

Most assistive devices and technologies are alternative solutions that help and facilitate the writing, reading, communication of children with physical, sensory, cognitive or communicative difficulties. Assistants and technologies range from low-tech (silicone pen holders, adapted scissors, adapted pearls, magnifying glasses, auxiliary ramps, text tracking lines, etc.) to high-tech braille displays, braille keyboards, braille displays, output devices, customized keyboards and adapted mice, electronic speech therapist, FM systems, and other software and hardware products). It is clear that both low-tech and high-technology tools and technologies are involved in the training and rehabilitation of these individuals, but truly it must be recognized that, for objective or subjective reasons, in our country they are not yet widely used (especially the high- and hardware products) (Trichkov, 2015).

### 1.10. Material support for families in need

Many socially disadvantaged families cannot even provide minimal conditions for education of their children. This extremely affects their academic skills and success. That is why free provision of food, clothing and textbooks for some social groups is an important condition and requirement, aimed at reducing some difficulties related to the socio-educational environment.

Providing means for inclusion of students with outstanding talents and students threatened with dropping out of extracurricular

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**forms of school life.** This could include providing extra pay for teachers who are working towards the inclusion of both talented children and students with learning difficulties.

### 1.11. "Summer School" as a specific form of extra education that takes place in out-of-school time

Most often during the summer vacation, aimed at students with outstanding talents or students with learning difficulties.

This could be a very good approach for: **supporting the development of prominent interests and talents of children** /**students** in a specific area – science, art, where the participants build on what they had learned so far. New knowledge is significantly more complex and extends the knowledge and /or skills of the children involved.

Such kind of "summer schools" are organized by schools, community centres, other educational institutions, including universities and the arts academy, language training companies, etc. and most often the participation of children is subject to fees. There are many examples of summer schools — language, art schools, mathematics and programming, literature. The classes in such summer schools are designed to support the development and advancement of talented students and young people, as well as to prepare them for competitions, Olympic Games and other events.

Some of the summer courses of established training institutions also offer opportunities for older students and /or young professionals to take certification exams, for example, for language training in a foreign language.

Support for overcoming deficits in students' knowledge and learning basic content on some or all of the main subjects that is missed during the school year. Such summer schools or kindergartens support students who are fall behind in order to catch up with knowledge and align with the general level in the relevant class, with the requirements for education. As a rule, such forms of additional

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training are free of charge for participants, and costs are provided through donation programs or school resources.

There are also some proven approaches to overcoming learning difficulties.

### 1.12. A multi-sensory approach is important for overcoming reading difficulties

Children learn by receiving information through their senses (eyesight, hearing, taste, smell and touch). The more senses we incorporate into the learning process, the greater the opportunity for children to remember and learn what we teach them. Applied to dyslexic children. Children with difficulties in reading need a richer multisensory stimulation in order to master the spelling. Learning by visualization and tactile sensations could be used to support learning by listening, reading, and writing, which are more difficult for them. A commonly used method is writing words of modelling clay or other materials.

Multisensory learning uses visual, auditory, kinetic and tactile channels to help develop memory and the learning process. For example, when we teach children new words, besides encouraging them to associate the sound of the word with the way we write it, we can help them feel the forms of the letters at the time of writing.

It is good to use different coloured markers for each row, and if there is a lot of written information on the board to highlight the most important with different pens. Writing must be well located on the board – the writing on the board should be long enough – to allow the child to be able quickly and easily write the information.

An extremely important condition that can be presented as a requirement for successful education of students with learning difficulties is the introduction and imposition of a strictly individual approach to work and training. In many European countries (Finland, for example) for each student individual training and development plan is drawn up that is tailored to his potential. Personalization

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affects the content of textbooks, exercises, the number of class and homework tasks, and the time for them, as well as the teaching material. It is also a good option for children to be evaluated at a personal level without comparative models <sup>6</sup>

It is good to think about imposing and introducing a holistic approach to education. When it comes to rethinking the current education system, holistic education provides an exciting alternative. In the last decade, our knowledge of childhood development has expanded and our training methodologies also.

Nowadays, parents and teachers want their children to be more educated. They seek an approach to education that is compatible with the different skills of children and an approach that prepares the child to become a well-balanced adult. Holistic education is based on the idea that children can be trained in a more natural and attractive way. Instead of dividing school subjects, the holistic approach aims to empower children to use their academic backgrounds to support their emotional and social development. Education is no longer based on the learning of tangible and measurable knowledge. Our past educational paradigms rely on "average" measurements and standardization. The children were ready to memorize information and then to go to entrance tests.

Not only is this approach ineffective against children, but it can be psychologically unhealthy to some students, according to a study by Sir Ken Robinson.

Although children need to be prepared for the most important subjects such as mathematics, literature or science, it is also important to learn how to learn.

Holistic education redefines not only what an "important" subject is, but also how children can be trained properly. The greatest advantage of the holistic approach is that it is not just about mental

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https://offnews.bg/nauka/zashto-finlandskoto-obrazovanie-e-sred-naj-dobrite-v-sveta-509635.html

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development but also focuses on the psycho-social and emotional development of children.<sup>7</sup>

It is important to also take into account the social situation and the social status in which the child grows and develops. According to the European Commission, the share of drop-outs and falling behind students in the villages is the highest – over 30 %, in small towns – 15.8% and in the big cities – 2.8%.

### 1.13. Mind maps

The application of "mind maps" as a method of presentation of information is an approach that produces good results at pre-school and school age.

**Mind maps** are a convenient way to portray the process of general thinking as using a scheme. These mind maps used to visualize information (ideas, tasks, goals) linked by a keyword or idea. They can be used to generate, structure, and visualize ideas, as well as a tool for training and organizing information, problem solving, or decision making.

Mind maps are one of the best methods that combines linguistic and visual content, thus enabling both parts of the cortex to work together and "produces a synergistic effect that improves all areas of brain function. Moreover, each brain hemisphere contains much more of the other hemisphere abilities, than previously thought, and every hemisphere is capable of a much more extensive and much clearer spectrum of mental activities".

#### 1.14. Conclusion

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The current guidelines for training and inclusion of children with learning difficulties are to achieve a high quality of their education. There is need for such education to ensure the best possible inclusion and social integration of these children. The importance of

 $<sup>^7\</sup> http://pedagogika.bg/2018/01/08/zashto-holistichnoto-obrazovanie -e-vajno /$ 

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all these priorities and requirements in the process of implementing inclusive education is indisputable. Their effectiveness is significantly greater when they act simultaneously. These are some of the conditions and requirements that children need to grow more successful, more creative, academically grown, more balanced and virtuous, and above all not to live with the idea that they are not part of society and that they are not accepted (by Trichkov in 2015). That is why we as adults need to be able to surround them with the best we can and create such a psychological climate in which they can successfully develop their potential strengths and abilities.

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### DIVERSITY OF LEARNING STYLES OF MODERN TEACHERS AND SCHOOL STAFF, WHO ARE WORKING WITH STUDENTS WITH LEARNING DIFFICULTIES (IN THE PRIMARY SCHOOL AND PRE-SCHOOL)

### Dora Levterova-Gadzhalova, Tsvetelina Ivanova

Learning styles of modern teachers, who are working with students with learning difficulties in inclusive positive education are aimed at developing personal strengths, inner motivation to learn and actively engaging in collaboration to achieve real goals with optimism. Teachers and school staff in positive education focus on the well-being of every child, no matter what difficulties he is facing and what achievements he has so far. It is important to challenge each student to develop their strongest strengths and to maximize them, to set higher goals and to perform them successfully according to their abilities. Positive education avoids standardized measurement, identification and diagnosis. It is extremely important to customize the learning objectives to individual capabilities, to the potential of each student. All participants in the educational process are treated with respect in ethical standards, with optimism, with the formation of dignity and with real hope for the future. In positive models, each student can perform and achieve clear and measurable personal outcomes against his abilities in a safe and supportive learning environment.

The concept of "learning styles" in this guide is constructed according to the individual difficulties and preferences of students and teachers for perceiving and learning of knowledge and information, judgments, decision making and interaction with others.

By using the variety of learning styles to work with students with learning difficulties, "learning is not seen as a competitive

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process but as a process of cooperation in which teachers learn to respect all their students and evaluate them according to achievement on their individual level "(Walker & Crogan, 1998). Positive inclusive education is related not only to the acceptance of each child, regardless of gender, race, and ethnicity, mental and physical health. The positive education model provides academic welfare to each student through flexible use of appropriate learning styles. The fluctuation of learning styles according to the particular difficulties experienced by a learner creates dynamic and personally appropriate learning environments with maximum conditions for perception, awareness and learning of knowledge and information. Appropriate learning environments are those in which a subject is subjected – subjective synergistic pedagogical interactions in the classroom.

The conceptualization of pedagogical interaction in the school community is based on:

- Acceptance of learning as a value towards which forms of communication between sub-communities related to the school organization.
- Adoption of individual sub-communities, such as the student community and teachers' community, which generalize the school community, which is constantly present in the school.
- Adopting individual sub-communities that not represented on a regular daily basis at school, although have a strong influence and indirect presence.

In the school community, seven spaces of pedagogical interaction with different learning styles can be identified:

- between the students themselves
- between the teacher (s) and the pupils
- between students and parents
- between teacher (s) and parent (s)
- between class teachers
- between parents about the class



• between the whole school community and the class community.

Two of these spaces are basic because of the continuous and everyday nature of pedagogical communication: between students themselves and between students and teacher (s). Because of the intensive and everyday communication in these two spaces, the models and the patterns of teaching and learning have a strong influence. There are more objective assessments and a less presented influence of situational models of communication. The other spaces of pedagogical interaction are also important and have a strong influence. but they are less regular and less permanent. Because of the lower intensity of communication in the other five spaces, communicative interactions can be much more strongly influenced by subjective assessments and by situational patterns of communication. In each of the mentioned areas of pedagogical interaction, different styles of learning are applied differently to students with learning difficulties. Undoubtedly, the macro-system of education - ministry, regional education departments, other local and state institutions, as well as microsystems of education such as parent trusts and public councils – also has a strong influence on the functioning of the school community.

The concept of "learning styles" allows the various abilities of each student – with or without learning difficulties. Learning styles can be differentiated as teaching styles and learning styles.

### 2.1. Learning styles

The concept of "learning" encodes the concept of "learning information" and namely the maximum understanding of information by students in the learning process — is a basic objective of each teacher. In this aspect, "learning" can be interpreted as a perception of the information given, understanding the information or learning the information (by repeating or exercising). These processes are based on individual social experience. Undoubtedly, the process of learning is

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focused and structured in separate thematic units which forming sustainable personal qualities such as learning new knowledge, shaping skills and creating relationships, etc. There are different classifications of learning.

The most holistic classification of learning is determined by Bennett (1976) as:

- formal learning learning, which is structured and implemented in educational establishments;
- non-formal learning learning from day-to-day functioning throughout the individual's life.

There are other classifications, the more significant of which are listed in Table 1.

Table 1

	Author	Types of learning
1.	Myers & Briggs (1962, 1978)	According to the typology of Jung's personality, in which people are divided into – extroverts – introverts;  • sensory – intuitive;  • thinking – feeling;  • sensible – receptive.  According to this typology 16 different personal styles of learning are introduced.
2.	Klix F. (1976)	5 Learning styles:  • learning with understanding,  • learning sample – error,  • instrumental learning,  • conditional-reflective learning,  • habituation.

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3.	Kolb (1976)	is based on popular learning theory as a four-stage cyclical process:  • specific experience,  • reflexive observation,  • abstract conceptualization,  • active experimentation as a beginning of a new concrete experience.
4.	Curry (1983, 1987)	bulb pattern – consists of four layers resembling onion flakes. The most internal reflects the dimensions of the personality, the dimensions of the information processing are in the middle, and the outside flake (most susceptible to impact) varies according to the environmental factors.
5.	Gardner (1983)	Over 70 styles of learning, the main ones are:  • visual,  • hearing,  • verbal,  • physically,  • logically,  • externally personalized.
6.	Klaus (1987)	7 style of learning:
7.	Riding & Rayner (1998)	4 styles of learning:  • analytical, • shaped, • verbal, • holistic.



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8.	Riding & Burton, (1998);	learning styles:         • holistic-analytical style – processing of information in parts or as a whole.         • verbal-style – verbal or pictorial processing of the information.
9.	Grasha (1994, 1996)	6 learning styles:
10.	Vester (1998)	4 Learning styles:  • audio / listening and speaking /  • visually / by viewing /  • haptic / by touch and feeling /  • through the intellect.
11.	Kolb (2005)	<ul> <li>4 learning styles according to the learning phases:</li> <li>dreamer: specific experience / observation and reflection;</li> <li>thinker: observation and reflection / abstract thinking;</li> <li>decision-maker: abstract thinking / active experimentation;</li> <li>performer: active experimentation / specific experience.</li> </ul>
12.	Grasha, A. & Yangader - Hicks, N. (2010)	Styles of learning / style of learning and style of teaching / are integrated with instructional technologies.

Gregorc (1979) defines the style of learning as "a characteristic way of cognitive activity that serves as an indicator of how the individual

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is learning and adapting to the environment." This way is characteristic of each student and each of them has an individual style of learning.

Current and very popular are the VAK / visual, auditory and kinetic / VARK (visual, auditory, reading / writing and kinaesthetic) models, according to which the individual student has a certain sensory preference for learning the information. These models are centred on learning styles and teaching styles. There are even created models for developing sensory profiles from Stapleton (2003) and Dunn (2007). These models are based on ideas for the application of neuro-technical discoveries in the educational space. However, the Organization for Economic Co-operation and Development (2002) defines the violent penetration of neurological discoveries into education as "neurotomes" and defines them as "misconceptions created by misunderstanding or misinterpretation of scientifically established facts (through brain exploration) to interpret cases of using brain research in education and other contexts. "In a similar context, Sylvan & Christodoulou, (2010), Pasquinelli (2012) note that the impact of these myths in the classroom is problematic because it spends money, time and effort that could be better spent on developing practices based on evidence.

The targeted sensory profiles are appropriate if the student with learning difficulties has sensory dysfunctions but otherwise is inappropriate. According to a large-scale study by Dekker, Lee, Howard-Jones. & Jolles (2012) concludes that "teachers who are enthusiastic about the possible application of neuroscience results in the classroom often find it difficult to distinguish pseudo-science from scientific facts ... It is encouraging that teachers tend to learn more about the brain and it role of learning.

Although the integration of neuroscience in educational practice remains challenging, the joint efforts of scientists and teachers can show the way for successful cooperation between the two areas. "Such an opinion, in favour of interdisciplinary research applied by Tokuhama-Espinosa (2010), but the application of knowledge from neurological studies and research in educational practice should use non-pseudochance and occasional episodic information also scientifically grounded

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concepts and strategies for the realization of theoretical and methodologically sustainable application of neuro-science in education. According to Tokuhama-Espinosa (2010), "those who work as lecturers and scholars should be aware that information from psychology and neurology will have different methodology, goals, methods and procedures, different from those in education but equally useful to learn how students can learn better. "In this field a new interdisciplinary applied science is needed with new specialists who need to have knowledge, qualifications or competencies in the fields of pedagogy, psychology and neuroscience.

For decades, general education has been gravitated around behavioural paradigms reflecting the contribution of cognitive psychology (Piaget, 1951). Since there is no life without the brain (Goswami, 2004), modern studies of learning processes are inevitably related to neuropedagogy. In this way, teachers face a new dilemma: How to implement the achievements of neuroscience for effective educational theory and practice?

The individual learning style of students with learning difficulties is shaped and presented according to cognitive, emotional, environmental, social factors and experience. It is important for teachers to understand the differences and the individuality of their students' learning styles so that they can choose and apply the most appropriate of their own teaching styles in their daily activities, curricula and assessments. Then, learning styles will be effective in the overall learning process: both in teaching and in learning.

### 2.2. Teaching styles

In turn, the styles of teaching have numerous taxonomies. The most famous are the styles of formal and informally teaching (Bennett, 1976); high-initiative and low-initiative style of teaching (Fontana, 1995). In 2005, Bennett introduced a change in understanding of teaching styles, noting that "research on teaching styles could outline only contemporary practice rather than provide a

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direct test of prescriptions. ... complex learning problems cannot be solved with such simple prescriptions. "According to his, teaching styles are needed that are" more powerful in their explanatory potential that would direct attention to specific processes that could be improved, and that allow for a better understanding of the effects of the process on results. "Provides an approach that uses teaching styles, with regard due to the role of the student in mediating and structuring knowledge, and puts even more stress on computing teachers in terms of themes, pedagogical knowledge and curriculum."

Appropriate for this study is the taxonomisation of Gerdjikov (1999):

- 1. Reproductive style based on the utmost reproduction by the teacher of the teaching content of the training without any personal interpretation or creativity.
- 2. Pedantic style requires the most meticulous teaching of the teacher's knowledge, skills and habits, and their reciprocal learning by the students. Ultimate pedantism leads to dogmatism that is detrimental to the overall learning process.
- 3. Bureaucratic style the subject of teaching strictly observes the statutory requirements of the director, without much interest in the results of his/her activity. The accent falls on formalities, at the expense of the essence.
- 4. Mnemonic style relying more on memory than on thinking. Teaching is organized in such a way that the student is required to memorize, even sometimes mechanically, a certain amount of knowledge values, the associations being the most used.
- 5. "Monitoring" style the teacher primarily observes learning. Monitoring is often associated with motivating, stimulating, correcting, controlling or evaluating learning activity; positive and negative aspects are noted here.
- 6. Dialogue style the basis of this style is the dialogue between the subjects of the didactic contract. Of particular importance here is the quantitative ratio between the teacher's and student's speech

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during the class and the nature and the way that questions are formulated

- 7. "Ex cathedra" style (from Latin "from the department", "officially", "authoritative"). The effectiveness of this style depends mostly on the personality of the teacher, his intellect and authority among the students. It is mainly applied to the different varieties of exposition of the study material, especially if it is very factual. Care must be taken to ensure that the positive personal qualities of the teacher - "credibility" - are not transformed into "authoritarianism" that has a number of negative aspects.
- 8. Authoritative style excessive despotism, narcissism and self-esteem - without adequate coverage of the teacher, negatively affects both the teaching itself and the object of its activity. Unfavourable mental and health consequences for students may occur.
- 9. "Ad hos" style (from Latin for the present case, "for the moment") - teaching or making decisions without any preliminary preparation. The style is mainly used by teachers with high professional qualifications and rich experience, and improvisation is not unknown.
- 10. Creative-heuristic style the subject of teaching not only "transmits" the knowledge-values of learners, but more importantly their subjective "refraction", "experience", which also achieves elements of discovery. Teaching also stimulates learning by turning it into a research activity. This style of teaching is directly linked to the "teacher of a new type", "the teacher of the dynamically changing world".

Styles of teaching are most intensely used by the students and the teaching community through active pedagogical interaction. Interpreted through the prism of the communicative process, the latter has three basic functions:

• Cognitive function associated with admission, information processing and formation of knowledge, information, habits and skills, as well as with the cognitive and emotional formation of the personality of the student and of the teacher;

- Emotional function that is projected into the dimensions of emotional intensity and depth of communication and horizons to form emotional perception and emotional expression;
- Connotative function that demonstrates the person's potential for the formation, development and/or presentation of willpower, persistence and persistence in carrying out certain activities, learning activity.

Undoubtedly, in the process of pedagogical interaction with a variety of learning styles, *the teacher is the leader of the learning environment*. The teacher has significant and defining functions to ensure active student position, but the *student is at the centre of learning*.

The student is at the centre of learning when he / she is:

- personalization of training / reporting of strengths and needs, dreams and problems, necessary assistance and possible activities/
- in case of direct learning by the student,
- creating conditions for the student to study anywhere, anytime,
- where there are clear criteria for success.

# Thus, the student acquires knowledge in pedagogical interactions with teachers, peers, and family members.

Teachers are key figures and leaders in the "teaching-learning" system. In this respect, they must have the qualities of a manager with the students in the school class. According to Tuisk (2012), other roles of the teacher depend on school culture and concern them:

- the teacher as a creator of supportive psycho-climate in the school community;
- the teacher as a supporter of the development of students' creative and independent thinking;
- the teacher as the creator of ways to support the development of responsibility.

The management of the school class is correlated with the quality of the educational process, which is another reason for the teacher's training as a manager. The teacher's leadership role in the

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pedagogical process is also the choice of a strategy by himself to achieve effective results, which should also be prepared.

## 2.3. Learning styles with pupils with learning difficulties in pre-school and primary-school age.

Teaching styles of teachers are often reflection of their own learning style. Undoubtedly, the teacher's own style is not always the best fit for a student with learning difficulties. "From a system standpoint, the face-to-face learning process has seven interconnected countries: two object / environment and learning content / one instrumental – technology, one supportive – resources, two regulatory – objectives and organizations, two subjective – teaching / learning. The last four countries have internal and external expression. Internal / construct / expression is logical and psychological, and external expression is observably behavioural and measurable "(Radev, 2018).

The pre-school and primary school age is best suited for social acceptance of others, "students / pupils with learning difficulties with different determinations / without prejudices and stereotypes, but with appreciation of opportunities and strengths. In this age period, social norms and rules are most intensely dealt with. When norms are related to positive social acceptance of difference, these norms will be preserved throughout life.

The effectiveness of choosing and using a variety of learning and teaching styles depends on several basic constructs:

1. The organisation of a positive classroom is related to the choice of educational technologies and methods by which teachers help to master the knowledge and skills of students and regulate personal behavioural patterns by taking into account the strengths and weaknesses of the students, their preferences and interests.

The organization of a positive classroom includes:

- Behaviour management;
- Productivity of students;
- Instructional design for learning.





Positive classroom rejects stereotypes and prejudices, negative attitudes and prejudices. Every student has rights but also has responsibilities.

2. Emotional support is associated with the support of teachers to develop positive, comfortable, warm, supportive relationships among students in the classroom, learning pleasure, feeling comfortable in the classroom and experiencing an appropriate level of autonomy or independence.

For the realization of emotional support by teachers for students with learning difficulties, the following circumstances can be included:

- Creating a positive climate by creating pleasure from learning process and contacts, an emotional well-intentioned and warm relationship between teachers and students, and maintaining positive mutual interactions;
- Preventing and eliminating the negative climate through disapproval and rejection of pronounced negativity such as anger, hostility or aggression expressed by teachers and/or students in the classroom;
- Measured emotional sensitivity of the teachers demonstrated by the responsiveness of the teachers to the school and emotional needs and achievements of the students;
- Student perspectives the extent to which teacher-student interactions with classroom activities emphasize pupils' interests, motivations, and views (Muntner, 2008).
- Activating positive emotions and neutralizing negative emotions according to the often demonstrated polar emotions (from heart-breaking crying to stormy laughter) to students with learning difficulties.
- The activation of positive emotions is most effectively realized through gameplay practices and taking into account the interests of children in preschool and elementary school age.

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- Giving personally positive attention to the student with learning difficulties by teacher, administrative staff and classmates.
- Creating conditions, support, and realization for social acceptance by the classmates highlighting the strengths of the student with learning difficulties.
- Keeping confidentiality for the personal problems of the student with learning difficulties.
- Keeping confidential to educational leaders, administrative staff and the class community about shared information from the family context.
- 3. The classroom's instructive and versatile design refers to the design application for:
  - Choosing appropriate and relevant instructions for students in relation to the specific situation, content and activities,
  - Daily application of individual programming including the development of instructions, adaptation of the curriculum and the curriculum content, respect for the preferences and interests of school pupils, in family and community contexts.

Support for learning through instructional and universal design refers to educational technologies through which teachers effectively support cognitive and linguistic development of students. It can be noted:

- Concept development use by teachers of discussion and learning activities through different processes which are realized, stimulating the development of the executive functions, mastering knowledge and skills from the students without special focus on the instructions;
- Feedback quality using and maximizing teacher-student collaboration through student feedback;
- Modelling of language use and linguistic pragmatics teachers stimulate, facilitate and encourage the use of a richer and more precise language from students (Muntner, 2008).

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4. Assessment is an important activity in the school community. Usually, the evaluation is related to the results achieved by the students. The learning outcomes reflect students 'achievements, but the assessment is not related only to students' learning achievements.

The evaluation is in an implicit scheme of commitment and the social and life outcomes of the students and of the teachers themselves. As social and life outcomes, the personal well-being of pupils and teachers can be emphasized, their better mental health, the degree of their subjective and objective engagement with learning activities, interactions in the classroom and at school, and beyond (Sanders, Saxton & amp; Horn, 2008).

- 5. Motivation for learning. In studying pedagogical interactions and learning, many studies focus on motivating learning and the ways in which teachers can influence it:
  - Considering motivation to learn as a multi-layered construct,
  - Focusing on enjoyable or inconvenient experiences as the only motivation for learning, effective pedagogical interactions and the choice of appropriate learning styles,
  - Studying the link between motivation for learning by individual subjects and teacher interpersonal behavior with multilevel analysis,
  - Assessment of the nature of the effects of the ex-ante motivation.

When studying motivation, "motivational personality traits should be distinguished in relation to learning as a whole and motivation that is specific to a given situation or topic" (Boekaerts & Simons, 1995).

According to Boekaerts and Simons (1995), motivation to learn and the choice of learning style can be defined as "an organized structure of values, attitudes and concepts that a student has towards a particular subject or a domain of knowledge."



According to Kuhlemeier, van den Bergh & Teunisse (1990), Gardner & MacIntyre (1993), Clément, Dörnyei & Noels (1994) there are four interrelated elements of motivation:

- The pleasure that students experience when learning the lesson on the subject.
- The importance of the topic (for future work or for other subjects).
- Student confidence to learn the subject.
- Efforts made by students of the interest in the topic.

These elements of motivation can explain specific behaviours and help to improve the quality of pedagogical interactions and student achievement as well as the choice of learning style. Sometimes, these four elements overlooked because of the commonly used general scheme of motivation (synchronized four elements), and the influence of other factors associated with the style of teaching in the classroom (Creemers & Scheerens, 1994; Scheerens & Bosker, 1997; Brekelmans, Wubbels, & den Brok, 2002).

Teachers who work with students with learning difficulties are important to conceptualize and report the presence of internal and external motivation. In conceptualization includes learning and understanding of the motivating factors for learning in each student / why students teach, they receive prizes and gifts so they have incentives intrinsic motivation and motivating factors for learning in members family ambitions for success by parents, transferred ambitions of parents towards students, stimulation of the internal motivation of the students, parental support of external motivation of the students, lack of motivation of the parents).

In the period of 3 to 12 years, motivation is created for learning and working with students with learning difficulties in these ages, one should not forget or neglect some of the most important psychological theories:

• humanistic theory of Maslow (1967) the hierarchy of needs – application of theory in school focuses on the teacher to

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highlight the "unacceptable and inappropriate" behaviour and the reasons therefor, and displaying appropriate behaviour according to the needs

- The cognitive theory of motivation of McClelland's (1953) or the so- H-Ash (Need for Achievement) theory refers to the way of thinking about the behaviour, strategies and style of planning used by each person to achieve their goals, including internal and external motivation, awards and reprimands, the need for achievement is related to each person's desire for significant achievement, skill acquisition, control, or high standards. Possible reasons for a high need for achievement are the hopes for success and the fear of failure, but one must maintain self-esteem
- Bandura (1977) theory of self-efficiency self-esteem is the "belief in one's abilities to organize and exact courses of action necessary to manage future situations" or self-effectiveness is own's belief and own ability to succeed in a particular situation. There must be confidence to control their own success and future then self-efficiency is realized;
- The Weiner (1984) attribute theory suggests that when a person experiences a certain sense or emotion, then they usually try to find a reason for that. This is called attribution.

Possible attributes are: internal or external, stable or unstable, controllable or uncontrollable, with different possible combinations.

In a specific plan, compliance with the intended psychological theories states: conducting observations, measuring and encouraging internal motivation for learning, the self-efficacy of each student by knowing his needs.

6. Pedagogical interactions between teachers and students with learning difficulties. The resulting pedagogical interactions in the school community require a holistic approach to teaching and

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learning, including the overall personal and intellectual profile of the student (Tirri & Nokelainen, 2011).

In the process of choosing a learning style in working with students with learning difficulties, a process of cooperation and active communication in the dual process is realized: teacher – student. In this plan, learning styles should be flexible according to the specific situation and specific participants, and there is a variety of pedagogical communication. According to Markova AK (1990) can differentiate three styles of pedagogical communication:

- Democratic style suggests that the child is an equal participant in different types of labour, educational and social activities. This method stimulates self-decision making by students, advises and encourages students' actions.
- The authoritarian style implies the elimination of the student's participation as an equal partner and his evocation as an object to which pedagogical influence is directed.
- By using this style, the teacher usually does not receive professional satisfaction; his main methods of work are teams and orders, which helps to reduce the activity of the children in the classroom.
- Liberal style allows students to take the initiative and the teacher tries to avoid making independent decisions. In this case, the teacher is not the leader of the educational process and the results are usually minimal.

A significant factor in choosing a particular style of education at pre-primary and elementary-school age is the frequency of informal interaction between students and teachers and the administrative staff of the school. The learning outcomes of students with learning difficulties are not directly influenced by informal interactions, but in the presence of more intense informal communication between teachers and/or administrative staff and students, their stronger influence on:

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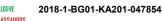
- increasing the motivation to learn the student with learning difficulties.
- positive personality and social development of the student with learning difficulties,
- adaptive choice of learning style by the learner with learning difficulties according to the content and the requirements of the teacher,
- the choice of an acceptable and appreciated by the students with difficulties in the teaching style from the teacher.

Learning styles can also be interpreted through dimensions: the quantity and quality of communicative relationships.

At a higher frequency of interactions, conditions are created for a clearer personality perception and a better understanding of the other teacher / student with learning difficulties, creation and/ or choice of appropriate style of communication and restructuring of formal relational relations with an informal character. The learner with learning difficulties has more positive reactions in the presence of informal interactions, while in formal communication of negative reactions occur.

The choice of learning styles in the school community also depends on the pedagogical experience and the personal characteristics of the teachers.

Undoubtedly, the Bloom Taxonomy (1956) for important domains in learning with cognitive, psychomotor and emotional domains also finds application in pedagogical interactions and to achieve educational goals by choosing certain learning styles. Despite the many revisions of this taxonomy, it continues to be used in many educational contexts (Anderson et al., 2000). The taxonomy envisaged provides opportunities for describing levels of psycho-motor skills and cognitive development that are relevant to different components in each process of performing a particular task, as well as the most elemental to the most complex behavioural act.





Community of the group / class. The group / class community in inclusive education for a student with learning difficulties is often heterogeneous. Children and students meet for the first time with many differences outside the family context.

It is necessary to understand and realize the creation of pedagogical interactions students, with teachers. with administrative staff, with parents of other students, etc. In this age period, the child/student acquires the first models for creating a community that the teacher teaches them. For children and primary school teachers, the challenges are also great. According to Sanders and Rivers (1996), "effective teachers are effective with students with all levels of achievement, regardless of the level of heterogeneity in classrooms. If the teacher is ineffective, the students under the guidance of this teacher will not achieve the desired progress in the academic sphere, no matter how similar or different in terms of their academic achievements "

Clarke (2013) draws out seven dilemmas that the child and primary teacher should allow in the group / class community to have effective learning styles in pedagogical interactions:

- Dilemma 1 Culturally specific categories for intercultural coding (e.g. participation). In the case of merit judgments, whether they are for student achievements or for classroom practical training, the right approach is from the position of the author's culture and the level of "participation" of the students (Clarke 2003).
- Dilemma 2 Inclusion vs. distinction. The use of inclusive categories increases the relevance for different cultures and for the different students
- Dilemma 3 Evaluation Criteria. It is important that the criteria used are not culturally specific but that they can be legitimately applied from one culture to the practice of another culture.

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- **Dilemma 4 Form vs. Function.** Such confusion between form and function occurs when the activity encoded on the basis of the common form is used in different classrooms and has quite different functions (e.g. kikan-shido or inter-class teacher design). Kikan-Shido (Japanese term) has a form that is immediately recognizable in most countries around the world. In Kikan-Shido, the teacher walks into the classroom and the students work alone, in pairs or in small groups. Although Kikan-Shido is directly recognizable to most faculty in its form, it is used in classrooms around the world to perform many different functions.
- Dilemma 5 linguistic advantage. It is important to analyse the pedagogical interaction in a culture, not to use encrypted expectations in classification schemes that reflect the language norms of another culture, since it will misrepresent the studied practices. For example, the Japanese model of implicit communication requires the speaker and the listener to accept the context without explicit statements or remarks or in the Japanese discourse, the speech or action is often hidden and remain ambiguous. In a Japanese mathematical classroom, the teacher often introduces a definition in the intangible sense (Sou Natte Iru = "As it is" or "something is manifesting") as if it is outside the concern of man. Thus, differences in language use pose challenges for analytical analysis and categorization of classroom dialogue.
- **Dilemma 6 Omission**. Misrepresentation by omission of a term or information due to the lack of a suitable term or construction of the phenomenon or activity in the author's culture of the teacher.

Marton and Tsui (2004) suggest that "categories not only express social structure, but also create the need for people to conform to associated behaviour with these categories." The pedagogical interaction with classroom community is mediated by the capacity





possessed to name what is seen and experienced. Speakers in one language have access to terms and therefore to perceptual opportunities that may not be available to those who speak other languages. The terms used should not be unilateral, and especially should not be conducted in the language of only one of them (Stengers, 2011). Many pedagogical terms exist in individual languages (Clarke 2010).

They describe classroom activities that form the basis of a community's pedagogy but are not named and are often absent from the pedagogies of other communities. It is likely that these activities will remain unrecognized in intercultural international studies where the authors' culture of the research report does not have a specific term.

Dilemma 7 – Disconnection. False presentation of concepts or information by exclusion. Whether these are terms such as Japanese gakushu-shido, Dutch "leren" or Bulgarian and Russian "learning", some communities have recognized the interdependence of learning and learning by including both activities in one process and, most of all, within a single word. In English, the classroom practice of teaching or learning was dictomized

From this point of view, the instruction cannot be described as development, but properly organized learning will lead to the intellectual development of the student, will create a whole series of such processes that are not possible without instructions (Hedegaard, 1990).

Similarly, the interruption of public and individual speech in classrooms, as well as continuous speaking or constant listening, have the same effect as the false presentation of facts and information that can be fundamentally interconnected (not only conceptually but also functionally) when introduced into classrooms (Clarke, 2006).

Each of the styles in question represents the personal attitude towards the communicative and social interactions with the partners. Different styles have different levels of dialogue and monologues communication according to situation and interlocutors.

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Selected learning styles and teaching styles determine pedagogical interactions by:

- variation of their application (cognitive, social, emotional, cultural, etc.);
- the specificity of the specific curriculum and learning objectives;
- the personal competences of the teacher and of the administrative staff as well as of the student with learning difficulties;
- The group competencies of teachers, representatives of the administrative staff and the community of the class.

For the elementary school and primary-school age, the variety of learning and teaching styles are best presented through interactive and innovative methods of pedagogical interactions between teacher and student with learning difficulties as a strong and effective synergy of communication and learning activities. Pedagogical interactions are aimed at ensuring the development of the creative potential of the student with learning difficulties.

## 2.4. Interactive, creative and innovative forms of pedagogical interaction

The notion of "interaction" means "interaction and interaction between people in the process of communication" (Desev, 1999). Pedagogical interactions can be presented in different forms:

- *interactive forms* that can be implemented in three levels:

- two-stage or non-interactive interactions;
- reactive or quasi-interactivity;
- fully interactive (Rafaeli, S., 2003).

Interactivity in kindergarten and elementary school most often refers to communication between students and teachers, between pupils and students, between students and learning resources. Through interactive forms of learning, besides acquiring knowledge, conditions are created to develop and form the creative potential, intelligence,

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social competence. At pre-school and primary-school age, interactive forms of pedagogical interaction support the development of executive functions and cognitive processes in students. Through interactivity, students are motivated and encouraged to participate actively in the learning process.

However, interactivity is not a goal or a goal of pedagogical interaction, interactivity is a tool in the overall strategy of the teacher for a more effective and desirable perception, understanding, understanding and learning of the curriculum.

The pedagogical nature of interactivity is demonstrated as a process and as a result. According to Radev (2010), the taxonomy of interactivity can include the following groups: process-oriented interaction, activity centred interaction, information centred interaction, community centred interaction, interaction through participation, and network centred interaction.

- creative forms - Creativity in learning styles presupposes the knowledge and application of cognitions, skills and socio-competence models in the specific situation and educational strategy. The role of the teacher in shaping skills for creative behaviour by children/students during pre-school and elementary-school age is extremely significant. When using different learning styles, it is important to stimulate creative expression in children/students with learning difficulties.

Teachers can use four key competences for creative expression, a presentation by Epstein (2004):

- Expansion of knowledge and skills: purposeful and deliberate acquisition of knowledge and skills beyond the current areas of competence.
- Capture and record new ideas: Save multiple ideas as they appear without being judged or edited.
- Environmental management: circumvention with various and new physical and social incentives.

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• Looking for challenges: constantly striving for challenges and constructive management of failure.

These four core competencies are taxonomized in eight manoeuvrable competencies, usable in every kindergarten and/ or elementary school:

- 1. **Challenges in subordination**: Delivering ambitious and difficult to solve and problem-solving goals, while helping to manage stress.
- 2. **Encourage the extension of competences**: provide training in thematic areas and outside the actual areas of competence of the learners
- 3. **Encouraging capture**: Encourage learners to keep their new ideas and provide tools that make it easier for them to capture such ideas
- 4. **Managing teams appropriately**: creating diverse teams with changing members and using relocation, brainstorming and other techniques to maximize creative output.
- 5. **Models of core competences of creative expression**: showing others that the teacher practices better than the essence of creative expression skills.
- 6. **Provide adequate and appropriate resources**: provide materials, tools and time that are adequate for learners to solve problems or generate new products or methods.
- 7. Providing varied and changing conditions of the physical and social environment: creating various and interesting physical and social conditions of the environment and introducing periodic changes.
- 8. **Providing positive feedback and recognition**: rewards for contributing, presenting and introducing new and valuable ideas (Epstein, 2004).

Creative forms in and through the styles of learning and teaching can be manifested everywhere – from solving a particular task to a meaningful discovery. Creatively communicating teachers and students are not afraid to think openly, to show curiosity and

strong inner motivation, to go beyond the space of comfort and conformism, and to have a positive perspective.

-innovative forms – Innovative forms of learning styles hypothesize knowledge, development and effective application of new educational technologies in communication teacher – learner with learning difficulties to improve the quality of learning. At first glance, it is difficult to talk and think about innovative forms of education in kindergarten and elementary school. But, in the narrow sense of "innovative forms," every teacher in his everyday life applies innovation through the development of pedagogical reality with the challenges he brings. It is not possible to realize innovative forms of pedagogical interaction with choosing a particular style of education without improving the respective educational environment and without results of the functioning subjects and objects, structures and functions. Innovative processes do not arise in a spontaneous and spontaneous way, but mainly in the presence of:

- social innovations
- school mechanisms to support experimental educational interactions and models
- application of the most promising pedagogical innovations in practice
- provoking a creative atmosphere.

Obvious from the analysis of interactive, creative and innovative forms of pedagogical interaction is the choice of a particular style of learning that each of them is substituted both individually and in terms of interdependence and determination. Their overall implicitness brings out the uniqueness and art of the pedagogical interaction of the child and/or primary teacher.

The modern school community uses a variety of learning styles to work with students with learning difficulties.

The determination of the exceptional variety of possible learning styles used has the following constraints:

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- students may experience learning difficulties due to special educational needs due to chronic illnesses or to risk environment, unrequited learning habits due to psychological discomfort due to misunderstanding of learning content due to lack of motivation to learn, etc.;
- teachers may experience difficulties in teaching and training pupils with learning difficulties because of the difficulty of identifying the individual student's problem due to professional rigidity, due to lack of knowledge or non-use of a variety of learning styles;
- each student has different interests, sensory preferences for information perception and interpretive abilities;
- each teacher knows and has a different repertoire of teaching styles and learning styles.

Against the differences, each child and/ or primary teacher may make a flexible choice to apply a particular learning style with students with learning difficulties to the individual learning task, to a particular educational content, or to the individual characteristics of the student.

When a student encounters difficulties in learning, the focus is on the learner in the context of laziness, lack of learning habits, special needs, risky environment, and lack of parental interest. Finding the right solution, the right style of learning depends on finding the problem of learning difficulties.

#### 2.5. Learning patterns and a variety of learning styles

Learning patterns including a variety of learning styles and teaching styles for each student with learning difficulties at preprimary and/ or elementary-school age can be addressed:

• *Universal design for learning*, which involves individual programming including instruction, adaptation of the curriculum and learning content, compliance with the preferences and interests of students in different contexts (school, family, community, etc.). The Universal Design for

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Learning was created by researchers and lecturers from the Center of Applied Special Technology (CAST), the Harvard Graduate School of Education under the guidance of David Rose. Since 1990, they have studied how the curriculum can be deactivated rather than adapt the student, and how the curriculum can be seamlessly mastered by students with special educational needs and by students with learning difficulties. Rose works with colleagues – neuropsychologists at the North Shore Children's Hospital (near Boston) to evaluate students who have low school success. CAST researchers realize that the underlying problem is often not provoked by student learning problems, and the problem is related to the curriculum.

Thus, Rose offers the idea of Universal Design of Learning, which encourages the support of every student in the classroom. Rose created the design of Universal Design for CAST Learning, but the term Universal Design for Learning was inspired by Ron Mace of North Carolina State University in 1980.

According to the universal design of learning, the standard learning environment is no longer productive, and with today's technology it is possible for the learning process to recognize and fully take into account differences among students.

Universal Design for Learning is a proactive design of the curriculum (educational goals, methods, materials and assessment) that is accessible to everyone individually to gain knowledge, skills and learning enthusiasm. Take care for rich support for learning and reducing barriers to the standards of implementation of the curriculum for all students (Rose, 2014).

The universal design is designed for all students, not only for students with learning difficulties, and is designed for products and environments that are usable by all people with the capability of applying no special design and adaptability. The principles of universal design are used to build accessible and usable environment and education, communication and other areas.





To define a particular environment, education, or product as relevant to the universal design, the following conditions need to be met: fair use, ease of use, ease and intuitiveness, perceptible information, error tolerance, minimal physical effort, size and space for approach and use.

Through universal design, students can use different methods, techniques and technologies to access the same learning content and to demonstrate their knowledge and achievements. When defining the universal design, the first analogy is related to universal application, but in a meaningful way, the universal design is quite the opposite. As Rose D. (2014) notes, the goal of universal design is to use different teaching styles to remove all obstacles to learning and give all students equal opportunities for success. Universal design for learning introduces flexibility in the learning process that varies according to the strengths and weaknesses of each student.

Like any model, and universal design is based on certain principles:

- Multiple ways of representation Universal Design for Learning offers information in more than one format. Students are provided with different ways of acquiring information and knowledge. Providing text, audio, video or sign language translation of the learning content provides all students with a chance to access the materials, depending on which one is best suited to their strengths.
- Multiple Expressions and Action Universal Design for Learning provides students with more than one way to interact with the learning material and show what they have learned. Students are provided with alternatives to demonstrate what they know.
- Multiple engagement tools Universal Design for Learning is looking for different ways to motivate students. Appropriate challenges are put forward to increase the motivation for learning according to the pupils' interests. Students can choose

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to solve tasks from a lesson or section of the learning content or tasks related to their life or interest.

In this way, teachers maintain the interest of the students. Other common strategies of universal design include the formation of skills through and as a game.

The universal design presents the information in different ways that adapt to the student instead of having the student adapt to the information. The universal design for learning presents a opportunity for the students to use their strong points to the maximum and to work on overcoming their weak points (Rose, 2014).

These principles of the universal design are applicable for every student in the classroom, according to Rose, because that is the main point of difference between the today's average student and the curriculum. The models for explanation of the universal design for studying, according to Rose and collaborators (2014), are related to the interpretations of the activity of the nervous system, related with the managing of the learning curriculum, as well as to the relation of emotions and the motivation for studying.

By scientific research for the informational process of the brain, CAST has identified three system areas and their role in learning.

- the multiplied meaning of representation ("what" is studied). The focus of this system area is to provide opportunities to present information in different ways.
- the multiplied meaning of action ("how" is studied). The focus of this system area is related to the possibilities for action and expression.
- the multiplied meaning of the engagement ("why" is studied). The focus of this system area is to provide various opportunities for engagement.

In 2008, the Reformalization of the Definition of Universal Design for Learning (HEOA) was introduced in the context of the emergence of the universal design of learning as a scientifically valid framework for the management of educational practice with two domains:

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- care for flexibility for the ways of presenting information, in ways in which students are responsible or demonstrating knowledge and skills, and in ways in which students are engaged:
- reducing barriers through instructions, care accommodation, support and changes, and expectations for high results from every student, including those with special needs and limited achievements

The purpose of the curriculums based on universal design for studying is not just helping the students to format knowledge base or specific set of skills but to help them become masters of their own education – to become experts in studying. Expert students have three main characteristics: strategists, expert and goal-oriented; well informed; purposeful and motivated to learn more.

The designing of the curriculum with the help of the universal design allows teachers to eliminate potential obstacles which could stand in the way of students to reach this particularly important aim.

According to CAST (2008), the universal design for learning includes four highly interrelated components of the curriculum and the learning content: aims, methods, materials and grades.

The key questions for the universal design are connected with the work of the child and/ or primary teacher and getting answers of the questions: How to present the information from the curriculum in a way in which the students will understand it, how to learn this information and how to show this which they have understand and learned? The products of CAST help students for assimilation of the learning content in different ways and give an opportunity for parents and students to create new, personalized leaning materials and learning environments.

Universal Design for Learning is an innovative framework that takes into account individual pupils' characteristics, their interests, their sensory preferences, their strengths and weaknesses both in the learning process and in the process of assessing mastered knowledge. With the capabilities to customize the curriculum, the programme of studies and the learning content for each student, the universal design traces the elegant and prospective pathways of inclusive education for students with learning difficulties. The universal design of learning implies the creation of individual programs, including the development of instructions, the adaptation of the curriculum and the learning content, and the respect of the preferences and interests of the students.

This global model of training design is based on students' interests, readiness and wishes of students, as well as the personal learning profile.

The following strategies are differentiated:

- cognitive strategies that help students develop learning skills and creative gifts and talents.
- meta-cognitive strategies which assist students to build adequate self-assessment, self-effectiveness and self-regulation of the behaviour.

Instructional design covers different types of instructions: differential, direct and systemic/ refer to specific time periods – day, week, month/; strategic instructions / help students to develop self-regulation of their behaviour, motivation and learning /; explicit instructions / students learn how, why, where, and when to use specific strategies to overcome their deficits and control their own resources that are important for the realization of individual activities and outputs. According to the universal and instructional design, designing the individual curriculum is easier.

This element of programming is mainly successful for pupils with special educational needs, but it is also necessary to apply to all students with learning difficulties by setting up activities according to the needs for developing the potential of the individual pupil.

• the inclusive design to work with the family. The work of teachers with pupils with learning difficulties could not be successful if the family context did not engage in partnership. In this aspect, teachers are important to:

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- inform the family context for the problem of the student,
- provide clarification on the problem where parents can take measures to improve the condition of the student with learning difficulties:
- learn about the essence of the difficulties in the student's training so that they can understand better the pupil and his/ her specific needs and this information is constantly exchange with parents;
- to learn to use available resources for the student with learning difficulties and for his/her family;
- offer and, if necessary, to teach parents how to cooperate with the pupil's school community with learning difficulties so as to satisfy their needs in the best possible way;
- consider and realize opportunities for general and additional support and/or alternative training to meet the needs of the learner with learning difficulties.
- an inclusive design to work with the community of students with learning difficulties. In this respect, it is important to work to change community stereotypes and to develop an inclusive environment, to develop volunteering and to engage actively in activities with diverse / exceptional pupils.

Undoubtedly, important aspects of programming for unique students are both compiling and following a plan to apply developed designs in different contexts and in different situations of an inclusive environment.

Although universal and instructional design, as well as family and community design seem easy to pedagogy, they would not work if they were treated with didactic leniency. Each of the four types of design is related to certain methodological requirements and conditions, with a specific sequence and application levels.

Every attempt to program and work with students with learning difficulties without special pedagogical and/or special-psychological



training is an attempt to work with intuition or saltation with an unclear outcome.

To choose the appropriate learning style for students with learning difficulties for teachers it is important to know:

- theoretical and practical models that can explain learning difficulties in:
  - deficits and strengths of the student,
  - different manifestations of creativity, gift or talent,
  - different manifestations of special needs, chronic diseases, risk factors,
  - absence of the above mentioned circumstances.

The art of performing work with students with learning difficulties begins by identifying the strengths of the student, the possible, though occasional manifestations of excellence and/or creativity, continuing with the discovery of opportunities and even the development of opportunities to achieve a prominent gift.

For the kindergarten and/or elementary school, it is important to structure an inclusive classroom as a special design of positive norms and rules, positive stereotypes and positive stigmas introduced and respected in the learning process and in communication between subjects in education in time within and outside the classroom hours in the school space.

Education is more than the school, more than the academic process, and in this sense, the inclusive classroom locates in the space of the classroom itself, but on the other hand, the inclusive classroom reaches every person and organization that is in direct or indirect social contacts with the main educational actors – students, teachers and parents.

DiGiulio R. (1995) considers that a positive, inclusive classroom is a consequence of the mutual influence of four factors: physical dimensions, emotional dimensions, organizational/managerial dimensions and instructional dimensions.

According to Westling-Allodi (2002), the middle of the classroom is a system involving four basic variables: physical networks,

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organizational aspects, teacher characteristics, and student characteristics. The functions of these variables and their interaction form interrelationships that represent the quality of the classroom environment.

Apparently, the adoption of physical dimensions and physical networks, which in pragmatic terms substitutes dynamic spatial design opportunities for the inclusive classroom for students with learning difficulties. If the learner with learning difficulties is over-sensitive to vibrational or tactile stimuli, it is appropriate to take up space in the classroom with back to wall, or if he or she is intolerant to touching or demonstrates hyperactivity, it is necessary to have a greater distance from the classmates or if it is with a autism spectrum disorder is appropriate to study at certain times behind a barrier, but in the classroom along with other students.

The positive inclusive room presents the *positive climate* in the classroom. The good climate in the classroom requires a change in the self-determination of both the teacher and the administrative staff. They can build an inclusive classroom by encouraging continuous self-reflection analysis, critical thinking skills, and eliminating stereotypes and negative stigmas and social norms.

The psychological climate in the kindergarten and/or elementary school can be communicative or cooperative, friendly or hostile, and depends largely on teachers 'attitudes and teachers' opinions.

Moos R. (1979) believes that "key concepts of understanding climate change in the classroom include: organization of social systems; social attitudes; staff and student spirit; power, control, leadership; support and evaluation structures; practices with instructional design and with curricula and programs; expectations for communication; performance; responsibility of everyone; rivalry; clash between key learners and classroom variables; system support, growth and change; discipline and security."

These concepts are grouped into three dimensions:

• relationships – the nature and intensity of personal connections within the environment, the space in which people are

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introduced to the environment, support and assistance between them

- personal development the main directions in which personal growth is taken care of and care for encouragement and motivation.
- system maintenance and change the space in which the environment is organized, pure in expectations, supported by control and responsibility for change."

The climate in the classroom is much more than a product of social interactions between teachers and students and the physical conditions in space. Each teacher is responsible not only for inclusive classroom education, but is also responsible for generating a learning environment in which students are positive, happy, well-behaved, respected and motivated. In the positive classroom, there are fluids of self-esteem, pro-social attitude and behaviour, and empathy against the background of formalized and manifest assertive behaviour. Naturally and logically, an inclusive classroom makes a condition for its existence only in its positive format.

The negative classroom is not inclusive, but rejecting and segregating. If a student with learning difficulties feels presented, accepted, and appreciated in his class and classroom, he will respond to the challenges of the learning process with more peace, and hence the common the atmosphere will remain calm, well-off and supportive. The atmosphere and the environment are lucrative if they create a sense of satisfaction, achieved synergy at the physical, intellectual and emotional level of each person. Well-being is one of the basic needs that motivate development. A subjective sense of wellbeing helps students and teachers to make sense of their actions, a sense of completeness, completeness and achievement. It is a sought after end to every endeavour in human life.

In order to create a positive inclusive climate in the classroom, interactions between: developing and adapting the rules and norms in the class, promoting positive equal relationships and forming positive relationships among all students are of paramount importance.





The inclusive classroom undoubtedly places requirements that some might look formal. But, for the effective existence of an inclusive classroom, space and spatial design and material facilities are important. The place of the classroom cannot always be chosen, but the architectural environment can be made accessible and convenient for students with learning difficulties. Exterior design is not always subject to change, but the interior design is subject to change. The teacher's commitment is to arrange the decor of the classroom after discussion and agreement with students, parents and educational leaders on the design of the classroom.

When the design of the classroom is also discussed with pupils with learning difficulties and with their parents, then the social acceptance of the different pupils is encouraged. All representatives of the school community want the classroom to be friendly, safe and cosy. In the room of the classroom, the choice and structuring of the furniture / chairs, banks, chairs, equipment, etc., colours, temperature and light, it is necessary to take into account the uniqueness of the individual situations of teaching and learning, the offered content, of their pupils and their styles of learning, the competences of the teachers and their styles of teaching, etc. Grouping of classes is important because it offers stimulation of learning through collaboration, building a sense of community of class, and the best use of space. When the bureaus are in a semicircle, in a cluster or in the form of the letter "P", there are ideal conditions for actively engaging all students in the learning process and for cooperative and group work, even for the creation of teams. At the same time, students are heading in the classroom safely and safely. The interior design of the classroom should maximize student training, and the teacher is the one who will understand and choose the environment in which each pupil learns best. Teachers should consider the use of a versatile design for learning through the design of products and environments, which can be used by most students without the need for change or special design (Burgstahler, 2008). Through universal design, it is possible to create and follow class traditions.

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Classroom traditions can help to create positive feelings and a strong connection between the individual student and his class. The beginning of the day can begin with tradition. Bucholz & Sheffler (2009) point to an example of a primary school teacher who repeatedly includes the pronoun "We": "We will cooperate, we will be informed, we will concentrate, we will have a good day without sounding like a mantra such a daily repetition of "we" has a suggestive effect and reinforces the self-determination and affiliation of each student to his class. It is undeniable that there are many models and variants to create traditions, including the creation of a special class tradition initiated by students and in keeping with national-psychological their age and their characteristics.

Traditions can be used throughout the school day. "Teachers can give students time at the end of each day to create a memory of the day. Examples of such activities may be to create a picture of learned information; to a subject, object or object that has created emotionally high tension; notes about what the students have learned this day; or writing a teacher's note with a reference to one thing they learned during the day and one thing that confused, disturbed or disturbed them (Lasater, Johnson, & Fitzgerald, 2002).

According to Bucholz & Sheffler (2009), teachers and pupils can write their own song to sing everyday or poems to recite each day. Indeed, in a similar pattern of co-emotionally dignified cognitive experience, the identity of the class is formed and maintained.

Another important component of an inclusive classroom is the consideration of the methodological aspects of the *adaptation and modification of the curriculum*.

Adaptation reduces the time required for the teacher to plan and develop a multidisciplinary curriculum. When the teacher implements an adaptation process, the curriculum must be exhaustive. Learning communities for students are the same, but goals / expectations, presentations, materials, assists, or the environment may vary and be different. When the teacher implements a curriculum modification, the learning communities are different for each student and identified in

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his/her individual program. The materials used are usually different from other classroom students. When there is a clear understanding of the curriculum and its adaptation, inclusion is a natural process. Using an adaptation to modify the curriculum is a preferred model for creating positive social acceptance and inclusion in the classroom.

In the inclusive classroom in kindergarten and/or elementary school it is necessary to observe certain *rules for inclusion* by all students, teachers and people involved with education. The inclusion rules can be noted:

- full inclusion of all pupils in the classroom activities during the day, both in educational and extra-curricular activities
- resultant and intense levels of communication both in the classroom and in the intervals
- day-to-day organization of the classroom
- flexible adaptation and modification of the curriculum
- individual planning every day
- effective provision of individual support with the resources of general, supplementary and special support
- individual application of assistive devices and assistive technologies
- working together or performing certain activities (including learning / together with "different" pupils
- positive handling of behaviour in extreme situations.

Inclusion rules have a socializing effect and generally relate to complex inclusion processes.

Another important component of an inclusive classroom in kindergarten and/or elementary school is *the rules* used in it. Rules in school bring social norms. Good rules and expectations should be clear and understandable to pupils, provide choice and limitations, and consequences for implementation or non-fulfilment are stated. For compliance is important students to create their own rules – through writing, drawing, social stories, etc., and displays the corresponding restrictions for non-compliance.



However, it is necessary to note two circumstances that the teacher should consider:

- creating rules by students makes them more responsible and more socially representative;
- sometimes students with learning difficulties do not understand the rules set by other students. It is therefore necessary to explain them with examples and, of course, to explain the consequences of non-compliance.
- students with learning difficulties also need to be involved in building up the rules. Very often they derive "different" rules or rules that apply mostly to them, but other students take into account the need for them;
- often students with learning difficulties believe that the rules do not apply to them.

When participating in setting rules and specifying penalties for non-compliance, students with learning difficulties understand and obey the rules more easily.

As DiGiulio R. (1995) notes, when the rules are violated, there are the negative consequences for the positive classroom. Students often offer very detailed rules for the classroom. If students are allowed to generalize and combine proposed and approved by the class rules, students, in addition to learning and assuming responsibility for complying with the generalized rules, further activate their executive functions.

When classifying and adopting class-class rules, it is necessary to monitor their feasibility and behavioural relevance, but with moral values. It is important that the rules are formulated well in a positive aspect. When there is a student with learning difficulties in the class, the rules need not be more than 5-6, they must be clear, concrete and well formulated in a short linguistic construction in a positive tone. It is important for the rules to be able to measure and evaluate individual behaviours as well as to produce consequences. Inclusive classroom rules can be taxonomised as academic, social, procedural, cultural and

personal rules. The rules have a stronger impact on younger students, and for older students the contract can be used.

The inclusive classroom presents itself with "identifying all students as expected and welcome as trusted and important members of the class and the school community. When communicating with students, it is important to hear and listen to what they are talking and talking about. It is very important to give students full and full attention when talking to them "(Kottler & Kottler, 1993).

In communicating with students with learning difficulties it is necessary to show ways and patterns of communication, as they cannot always perceive social experience. Demonstration and training may be needed of active listening, initiation and conversation, ending conversation, non-verbal behaviour towards visual contact, physiological responses and movements of the head, limbs and body may be required. The summary is also important at the end.

Student success in a positive inclusive classroom is better secured by using assistive technologies of a different class even when it is not necessary,

Assistive technologies can be used in the inclusive classroom:

- for training and learning
- for work with computers and mobile devices
- to create written and creative materials
- to facilitate communication and to build communicative skills
- to master and improve reading
- to master mathematical knowledge and to improve mathematical operations
- for mobility formation
- for the development of visual, auditory and tactile gnosis.

Teachers in an inclusive classroom in which positivism hatches and in which learning is liked by students, and in which the well-being of all students is an emblem of the classroom, of the school and of the gravitational communities around it, should follow the following strategies:

- using assistive technologies;
- to present and explain the specific technologies of the whole class:
- to explain why assisting the student with special educational needs is needed;
- explain how all students keep and store technology;
- include assistive technologies in everyday lessons.
- if necessary, seek help and clarification on how to use, maintain and protect assistive technologies.
- include ways and patterns of use of assistive technologies in the individual program.
- work together with the resource teacher, parents and other relatives of the pupil with special educational needs.

Inclusive classroom is influenced by factors such as:

- equal acceptance of all pupils without favouritism;
- in-house teacher competences;
- adaptation and modification of the curriculum and correctness of the individual curricula;
- creating and maintaining communities, both real and virtual.

These factors also determine *criteria* for a positive inclusive classroom:

- positive and effective interaction in teacher-student dialogue and feedback;
- positive and effective interaction in the pupil-teacher-parents triad and feedback;
- the possibility to receive and provide answers to questions of both the content and the real life;
- sufficient time to perform academic tasks;
- meaningful engagements in learning tasks, for example: For excellence, more than 80% of the time is involved in learning, and low scores are obtained when less than 40% of the student's time is engaged in learning tasks;
- corresponding process of the curriculum for skills formation;

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- choice of adequate teaching and learning processes,
- study of learning content for knowledge and evaluation, but also for future practical application;
- correct teaching and assessment within the curriculum;
- evaluate additional / advanced information on a particular topic or section of the curriculum;
- maximizing student success;
- monitoring the classroom for positive interactions;
- reduce students' frustration levels by eliminating all barriers that create frustration and negativity in learning.

The proactive aspects of developing a positive inclusive classroom require special attention to social attitudes and existing stereotypes. The realization of curricula and the delivery of educational content in the inclusive classroom should not only be related to academic learning and the learning content but also to social and emotional learning. The inclusive classroom motivates teachers to be effective with all students, increases learners' inner motivation for learning, and teachers to teach.

#### 2.6. Positive inclusive classroom

The positive inclusive classroom creates a positive synergy of the physical, intellectual, emotional and social environment. In this plan, every child and/or primary teacher who is the creator and manager of the inclusive classroom needs to have a spectrum of:

- specific knowledge: non-formal screening procedures, equal acceptance procedures, knowledge of resources and requirements for use and maintenance of aids and assistive technologies, knowledge of behavioural management techniques and behavioural modification skills, functional knowledge for effective communication and understanding of specific alternative language systems, if necessary, and others.
- understanding of: the complexity of learning in the inclusive classroom, normative aspects of learning for pupils with learning difficulties, different types of disabilities and pupils with special educational needs, the problems of and for pupils with learning

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difficulties and differences from other children, strategies for individual groups of pupils with learning difficulties, the psychological aspects of learning difficulties and their specific manifestations as individual and/or special educational needs, vocabulary learning in traditional dimensions, techniques and training methods as equal leadership group and individual training, understanding of the curriculum for students in relative norm, and for students with individual education plan.

- skills for: measuring students' needs and setting goals, preparing to meet the needs of all children in the class, changing, learning programming, etc. and ways for more efficient models to meet the needs of an inclusive classroom, skills to prepare the class for inclusion and acceptance of the various pupils, appraising the learning of students with learning difficulties, managing the learning environment, training basic and social skills, care for individual learning, leadership skills in the classroom, establishment of effective parent-teacher relations, taking of an initiative for assistive devices and assistive technologies and their use.

Positive inclusive classroom, responding to the interpretations of factors, criteria and conditions:

- created with desire, enthusiasm and strong internal motivation;
- supported by willingness and support of all educational actors and
- preserved with desire, deprived social stereotypes and prejudices and with an innovative and creative attitude towards all students and their family and community context.

According to Tornton (2013), the most effective teachers change their styles according to the nature of the subject, the course phase, and other factors. In this way, they encourage and inspire students to do everything at any time throughout the term. Returns teaching styles in the so-called 3 "D" three spaces:

- direct style the teacher tells the students what to do,
- discussion style the teacher asks questions and listens,
- delegating style the teacher empowers students.

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#### 2.7. Conclusion

The teachers' teaching styles used are related to the presentation of learning content tailored to the learning styles of pupils with learning difficulties. The symbiosis between teacher-style teaching styles and learning styles by the learner with learning difficulties articulates the application of universal design, instructional design, design of the individual curriculum, inclusive family and community design, inclusive classroom, and plan for application of the developed designs in the respective medium contexts.

In summary, the following highlights can be found for each teacher who works with students with learning difficulties:

- Different time for teaching and learning for the individual student,
- Learning with small steps,
- Learning through more practice and introducing elements of project-based learning,
- Learning with emotions,
- Taking into account the student's sensory profile,
- Taking into account the interests of the student,
- Poly-sensory presentation of information,
- The instructions are individual to concentrate the student.
- The size of the instructions is determined by the needs of the children and not by the administrative requirements (length of lessons, consistency, etc.)
- The training materials are graded in complexity.
- Training materials are not relevant features or decorations.
- At each level of difficulty, the skills are absorbed in fluidity before moving to the next level.
- In each level, make a connection between the various elements being mastered and do not add new themes in a general aspect.
- If possible, introducing "preventable errors" learning to increase student motivation.
- Automatic execution is not allowed

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- Additional resources for general motivation and self-control of students should be added to individual programs.
- Students should be oriented towards understanding and considering the respective tasks.
- Observance of routine and rituals.
- To eliminate additional or occasional irritants.
- To make many reps.
- Adjustments are made at the time of errors.
- Explain the adjustments.
- Taking into account the little success.
- Resource support.
- Training should be done in interactive, creative and innovative models,
- Training is required to import game components,
- Training must be safe,
- Use of aids and assistive technologies.
- Inclusion of a family and community context.
- Involvement of volunteers.
- Learning with the use of appropriate aids and assistive technologies.

Ready-made universal recipes and prescriptions for the individual student with learning difficulties in the class are not available, but when the teacher complies with the discussed common models, applies his/her competencies and pedagogical experience, the virtuous use of a variety of appropriate learning styles will be present; the teacher will work with satisfaction with the student with learning difficulties, and the student with learning difficulties will attend the school, will learn with pleasure and the difficulties in the training will be overcome with ease.

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# EDUCATIONAL TRENDS AND CONNECTION WITH THE USE OF ICT IN EDUCATION – MOBILE APPLICATIONS, GAMES, EDUCATIONAL ROBOTICS AND RELATED ICT SIGNIFICANT IMPACT OF STUDENTS' PERFORMANCE (OBJECTIVES, COMMITMENT, HELP FOR TEACHERS, ETC.)

#### Zhana Atanasova

In today's globalized world of technology, education has to prepare the younger generation for rapidly changing information technologies to ensure good professional and personal development. Because knowledge is seen as a strategic resource in the information society and learning as a strategic process.

Changes in the economy affect the formation of the new social order in society, and on the quality of education. That is why the use of information technologies in education provides the new educational priorities related to the inclusions of information and communication technologies in the teaching of the subjects because they are an instrument for increasing the effectiveness of the educational process and lead to an increase of the motivation of the students for participation in education process.

The use of new information technologies in the education process changes the traditional view of education and leads to:

- Improving education management mechanisms based on the use of automated databases of scientific and pedagogical information;
- Improving the methodology and the strategy for selecting content, methods and organizational forms of training,

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corresponding to the tasks of developing the personality of the student in the contemporary conditions of informatisation of society;

- Establishment of methodological training systems aimed at developing the intellectual potential of the student, forming skills for self-acquisition of knowledge, information and training, experimental and research activities;
- Creation and use of computer testing, diagnostics, monitoring and evaluation systems;
- Applying the capabilities of electronic textbooks as a learning tool, subject to training, management and communication tools, information processing tools;

The integration of new information and communication technologies into learning is objectively determined by the need of respond to the educational needs of all students who have grown up in a high-tech environment and in their day-to-day activities are active users of high-tech products and services. The characteristics of their perceptions and thinking, formed in information-saturated, multimedia, interactive environments, require new ways of learning and exploring. They have direct access to digital technologies in every aspect of their lives and it is quite natural that this has a huge impact on their behaviour and their way of thinking. This shows that new technologies offer much more opportunities and at the same time, much more challenges to pedagogical specialists.

The objectives of the new technologies are aimed at the personal development of each participant in the educational process as follow:

- All participants learn through experience through modern technologies;
- Creating an interactive environment that allows freedom of choice and expression of each student;
- Developing skills for working with computer systems and software and communication skills in an environment of active team collaboration;

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- Expanding opportunities for social interaction and cooperative work;
- Respect for individual differences, needs and interests of students.

The use of information and communication technologies increases students' interest in the subject from the educational field, visual presentation of the learning material through multimedia. When working with multimedia programs, feedback is provided, quick search of the required information, time to record multiple calls to hypertext, together with short text, the explanations are accompanied by a demonstration of animation effects and synchronous conversion.

According to the objectives and tasks, the training of computer programs is divided into illustrative, counselling, training programs, working (educational) environment. Some of them are designed to consolidate knowledge and skills, others focus on the acquisition of new concepts. Great opportunities have programs that introduce problem-based training.

Game programs encourage the formation of motivation for learning, stimulate initiative and creative thinking, and develop their ability to work together, subordinate their interests to common goals.

In a computer training program, the following aspects need to be considered:

- psychological how does the program affect the motivation of teaching, the attitude to the subject and will increase or the interest in it;
- pedagogical as far as the program meets the general orientation of school education and how it contributes to the development of the right ideas among students about the world around them;
- *methodically* whether the program contributes to a better study of the teaching material, whether the choice of the tasks offered to the students is correct, whether the material is delivered properly from a methodological point of view;

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• *organizational* – whether lessons are rationally planned using the new information technology, whether students have enough time for independent work.

Educational technologies are a set of didactic methods and techniques used to transmit educational information from its source to the user (student) and depend on the forms of its presentation.

The modern teacher has to use new technologies in his everyday work by expanding the learning environment beyond the classroom.

The school is not just a place where students have access to new technologies, but it is a space where modern pedagogical methods are used and students' key competencies (skills) are developed.

Teachers should have the necessary knowledge and skills in the priority areas of education – new technologies and interactive methods. New technologies in education undoubtedly support the process of mastering knowledge and skills. In pedagogical practice, there is a high level of efficiency when the information is used to combine different types of information – text, static graphics, audio and video.

When using information technology in training, the teacher can apply, in addition to traditional teaching methods and specific methods, to increase their teaching and learning experience, and these are:

- Supporting method. In this method, the technologies are used for increased precision when presenting the work. By using additional programs, it helps to increase the security and confidence of students;
- Method for examination of the control Technology helps the student to explore, experiment and build solutions. Simulation software packages enable students to experiment with virtual environments that represent real life in the learning environment:
- Guiding method the information is presented to the trainee at the appropriate level and time, enabling feedback on progress in learning. New technologies enable students to engage in new

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forms of creative design by combining different means into one product;

- Resource method technologies are used to access information, etc. resources, whether online or online, using CDs and other software. Using technology as an information resource enables students to develop their abilities by asking questions and doing research;
- Linking method technologies are used for communication between students.

The use of these methods by teachers in the educational process can stimulate and maintain the interest of students in modern training, complementing traditional ones with the benefits of computer and new technologies.

In this context, it can be stated that the use of multimedia resources in the training process has some advantages such as:

- easy, interesting and accurate presentation of the content of the course material;
- easy and fast updating of the learning content;
- increasing the possibility for self-employment and group work;
- creating a positive motivation for learners to the learn content;
- targeting learners towards activities that develop thinking, comparing, generalizing, creativity, etc.

It is important to point out that the multimedia educational product must predominantly rely on the activity of the student (the user). The message must be successfully transmitted by provoking an interaction by attracting the attention of the audience (learner). It is good when the information is entertaining. Entertainment generates positive emotions in the learner. So the chance to understand this information is much bigger.

In this aspect it can be said that through computer technology allows for interactive presentation of the material being used in lessons with a different purpose: to new knowledge, summary, exercise, systematization, consolidation. Using this type of technology





can easily and accurately focus on the essentials of the learning material, quickly fill gaps, and build skills and relationships.

Modern educational practice faces the challenge of constantly seeking options for improvement, leading to an increase in the motivation and interest of its participants (children / students). With the development of information and communication technologies, the game acquires new dimensions and features that make it an increasingly important part of the education of children and students. It combines elements of all learning methods, and it also stimulates activity, motivates and entertains. All of these characteristics make it particularly important as a learning tool.

Here is the place to point out that the game's design is used to successfully use the game in the educational process and to achieve the goals. It requires a high level of competence both in the field of pedagogical design and in the design of digital games and software programming in order to achieve a good balance between the elements of learning and entertainment.

When using the game, the teacher must have clearly defined educational goals.

- Select a suitable platform that meets the needs of the target group, the learning content and the plot of the game.
- The environment should be interactive, designed to support active learning so that students can build their knowledge by interacting with information, tools and materials and in cooperation with other students. It should encourage research, problem solving, create the conditions for students to experiment with their ideas, to consolidate what they have learned.
- The environment must provide adequate feedback, which is recommended to be structured not to micro level, but a higher one, to enable learners to gain greater satisfaction for its overall progress in the strategy used for their overall performance

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instead of any specific action or solution during computer game learning.

- The environment should engage learners with explicit and achievable goals, provide a high level of interactivity research, multiple and different ways to achieve success. The game must stimulate students' curiosity and provide an appropriate level of challenge and control over the environment.
- The game should be relevant to the context of learning for which it is intended, the curriculum and the way of evaluation is associated with problems of course, meet the time and comply with the requirements and needs of students for which intended.
- The environment and related activities should support and create conditions for reflection, enable students to understand the game and contextualize their learning.
- The environment should be constructed in a way that provides equal experience for all students, taking into account differences in the level of their available knowledge and experience. The best thing is if the allows personalization and gives equal opportunities for all learners to participate. Where possible, alternative pedagogical approaches should be applied to students, adequate to their individual performance.
- The game should be implement a mechanisms to ensure continuous process of support, from the initial orientation and basic tasks that provide quick success, with the increasing complexity of the tasks, create the feeling that the virtual environment is not limited. The goal of the game experience is to bring players to a high level of competence.
- The game must include an evaluation module that allows data to be collected during each session. These data can be used as an assessment tool, giving a clear picture of the performance of each student

The serious educational games that can be used by the pedagogical staff are:

- **Serious Educational games** they helped the process of perceiving and understanding the knowledge. They are used to increase activity and motivation.
- *Simulations and prototypes* used to analyze knowledge, reinforce and improve skills;
- Case solving and modelling games require more in-depth knowledge and analysis skills; stimulate the creativity of learners;
- Games with aims to win badges and medals these games are usually at levels and have a different level of complexity, stimulating learners to earn more badges, medals and prizes;
- *Teamwork games, virtual worlds* developing world-class skills for working in a group, through collaboration and mutual support. Often these games are related to some type of social networking or virtual world. The environment provides opportunities for joint success. Social skills are being developed here.

The development of technologies and mobile applications in education lead to a qualitative change in the educational process, manly to increase the interest and motivation of the students because they have fast access to the Internet. Mobile learning is seen as a set of approaches, tools, practical parts, custom applications, and knowledge access resources at anytime, anywhere. Mobile technologies (mobile phones, portable and small computers, music and video players) that are everywhere and are part of the pupils' daily life are at their core. In many ways, these technologies improve learning.

#### The benefits of mobile applications are:

- organization of group and team activities, thanks to cloud services;
- organization of individual work and creation of a personal educational space;

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- diagnosis and reporting of the individual characteristics of the trainees;
- the use of educational games;
- developing skills for continuous training;
- Additional technological capabilities (touchscreen, accelerometer, gyroscope, magnetometer, etc.)

Training can use mobile applications such as:

- QR code Added Reality (Augmented Reality -AR) and Smart Textbooks:
- Testing Apps and Forming Apps Plickers, mQlicker;
- Graphic calculators Desmos

Mobile apps are available through the Google Play for Android digital distribution platforms; App Store for iOS, etc., and many of them are free, which is an advantage.

It is important to point out that the choice of technology depends on the teacher, the form of training, the needs of the learners. Technologies can be used alone and in combination with other technologies, i.e. they can be combine.

In recent years, school education has used *educational robotics* as a teaching / learning tool that encourages students to use guided discovery, to place and solve problems. Students get used to working in groups, solving problems, finding solutions and verifying the results. In pedagogical practice, good examples exist in this direction in innovative schools with the application of STEAM training. STEAM training (Science – Technology – Engineering –Art- Mathematics) is the abbreviation of this type of training and is conducted through the methods of science, technology, engineering and mathematics.

A major advantage of STEAM training is the ability to integrate separate learning subjects within a project framework. Combining learning subjects on the one hand, allows children / students to understand the links between the subjects they study at school and on the other to answer questions such as "Why do I need this knowledge or skill"? and "Where will I use in the future what I am studying now"?

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This training is given the opportunity to develop educational robotics with the aim of developing the creativity, critical and creative thinking of students. Children and students are given the opportunity to develop their mathematical, scientific and personal skills through educational robotics. Project-based learning allows different groups of students to develop a number of individual decisions on the same case. Work on solving a particular problem teaches children / students to plan, organize and research. They use the research to create possible solutions to the case and then to make adjustments to the proposed solutions.

Educational trends tend to include children from an early age into creativity, imagination and self-discipline, and this is done through robotics and digital technologies. The aim is to overcome the learning difficulties and raising the level of competence of the students. In school education can be used systems such as: "Lego Mindstorm", "Turtlebot", "Robot NAO", Educational Robots, etc.

The methodological aspect of the study is related to the theoretical and practical use of information and communication technologies in the educational system.

The research problem of the use of modern technologies in the training process requires focus on their practical application – developing the pupil's personal potential, motivation from innovation, participation in all aspects of the educational process with the help of the new technologies.

**The aim** is for pedagogical specialists to build on their knowledge and skills for new information technologies and their influence in the educational process.

#### Tasks for reflection:

- 1. To be explored how information and communication technologies are used at school education.
- 2. To be established educational policies related to the application of new technologies.
- 3. To be provided teacher training for the use of information technologies in the educational process.

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- 4. To be developed a questionnaire to the pedagogical staff related to the information and communication technologies.
  - 5. To be analyzed the survey data.
  - 6. To be drawn conclusions from the study.
  - 7. To be analyzed and interpreted empirical research data.

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#### ANNEX 1

# PRINCIPLES, BELIEFS AND ROLE OF THE AMBASSADORS OF INCLUSIVE EDUCATION GUIDE

#### part of

#### **INTELLECTUAL OUTPUT 1:**

# INCLUSIVE EDUCATION: CONCEPTION AND PRINCIPLES

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https://inclusive-ambassadors.eu

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### PRINCIPLES, BELIEFS AND ROLE OF THE AMBASSADORS OF INCLUSIVE EDUCATION GUIDE

Inclusive education is a continuous and dynamic process, related to self-reflection on the barriers to inclusion of every child, every student, every teacher and every parent through their presence, participation and success in the training and educational processes and socialization.

To outline the problems and successes in the process of inclusive education, within the project "Inclusive Ambassadors" a research was conducted in Bulgaria and Turkey through a survey on the use of ICT in education and two questionnaires: one of the questionnaires is for children / students with learning difficulties, and the other is about learning styles in inclusive education. On a more formal look at the issues raised for the principles, beliefs and the role of the inclusive ambassadors in education the researcher is expected to have a set of specific items for understanding and rationalizing the process of inclusive education. However, such expectations are only fulfilled by separate items in the three research instruments. The design of research instruments follows the logic of the inclusive education process that has begun and covers its strengths. On one hand there is the digitalisation of the educational process and the styles of educating / teaching and learning / in the educational system, and on the other hand, items / statements related to children / students with learning disabilities, are constructed. School difficulties may occur both in children / students in the inclusive education focus groups / with outstanding gifts, at risk, with special educational needs and in severe chronic illness /, and in children / students outside the targeted focus groups. In this ideally structured, unconventional profile of inclusive education, more concretization is drawn from and about practice, more specific models and guidelines for the daily professional functioning of each teacher and each pedagogical specialist, as well as the day-to-day academic functioning of each child / pupil in the school environment.

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In the survey, the total number of participants was 148 pedagogical specialists: teachers teaching at different stages of the school system, resource teachers, speech therapists, psychologists from Bulgaria and 63 pedagogical specialists from Turkey. Answers to questions that are outside the demographic require priority marking of a preferred answer from 'yes', 'closer to yes' 'yes and no', 'closer to no', 'no', 'I cannot decide'.

Regarding the Questionnaire for learning disabilities, the survey was conducted with 145 participants from Bulgaria and 106 participants from Turkey. There are 20 assertions and for each assertion, survey participants can choose between yes or no.

Participants in the study about the learning styles are 148 pedagogical specialists: teachers teaching at different stages of the school system, resource teachers, speech therapists, psychologists from Bulgaria and 63 pedagogical specialists from Turkey. There are 40 assertions and for each assertion, participants in the survey can choose from "yes" or "no".

The full survey was done online through Survey Monkey. Participation is voluntary and anonymous. They participated randomly without pre-selection. The total number of answers for the overall survey "Principles, beliefs and role of the ambassadors of inclusive education", respectively, for the Bulgarian participants in the empirical study, 441 answers to the questions and statements were provided, and for the Turkish participants in the empirical study 232 answers to the questions were provided.



## DEMOGRAPHIC CHARACTERISTICS OF PARTICIPANTS IN THE STUDY

#### Dora Levterova-Gadzhalova

Teachers from the Republic of Bulgaria and the Republic of Turkey participate in the study from primary, middle school, lowersecondary education from 8th to 10th grade, and upper-secondary education from 11th to 12th grade. The analyzed results show that the highest percentage is from teachers from primary schools of the two countries: from Bulgaria – 42.86% and Turkey – 27.27%, as shown in Fig. 1 and Fig. 2. The strong interest of participating in the questionnaires and in the survey is likely to be provoked by the integration of ICTs into the mandatory education and using them as a tool to increase the efficiency of the educational process in primary school, the successful start of the implementation of inclusive education processes and professional curiosity towards innovative models. Another explanatory model could also be drawn in the direction of introducing the subject "computer modeling" into the Bulgarian educational system in the primary school and therefore the demands of the respondents' that self-identified as primary teachers for good practices and concepts for inclusive education with ICT involvement. It should not be overlooked that the ideas and items from research tools can generate ideas or provoke creative thinking to introduce some good practices into the learning process. The group of Bulgarian respondents from high school stage is 34.69%, and the group of Turkish respondents is 21.21%. The percentage of participants in the survey from Bulgaria is relatively smaller from 8th 10th grade - 12, 24% and from 11th 12th grade - 10, 21%. The group of Turkish respondents is respectively: from 8th 10th are 36 36% and 11th to 12th are 15 15%. The

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predominance of respondents from 8th to 10th grade from the Turkish participants is quite apparent. A fact that is associated with different and more serious problems of inclusive education in this educational level, so is the use of ICT in more multidirectional cross-curricular links with increased content in more subjects.

#### Stage of the education system

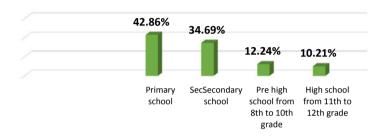


Fig. 1. Group Bulgarian respondents

#### Stage of the education system

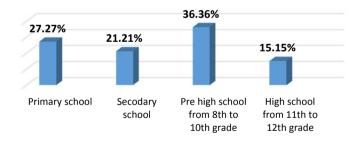


Fig. 2. Group Turkish respondents

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The results obtained by gender are interesting. The gender breakdown of the respondents shows that 86.49% of the Bulgarian participants in the survey are women and the percentage of men is 13.51%. While the results of the Turkish participants indicate that the two genders are balanced in the study. The results are presented in Fig. 3 and Fig. 4 and are a reflection of the feminization of the teaching profession in Bulgaria and the lack of feminization according to the answers given from the Turkish respondents.

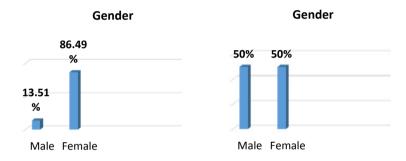


Fig. 3. Group Bulgarian respondents

Fig. 4. Group Turkish respondents

The profile of the respondents is supplemented by the position taken in the structure of the school, stating that the highest percentage of Bulgarian respondents are teachers - 53.10% and most of the Turkish respondents are teachers as well - 63.64%. The senior teachers participating in the survey from both countries are almost equal - 21.38% from Bulgaria and 21.21% from Turkey. The headmasters involved in the survey are a small percentage for both groups of respondents: Bulgarian headmasters are 1.38% and Turkish headmasters are 6.06%. Headmasters, resource teachers methodologists have less representation in the school system and accordingly, both groups of respondents have lower representation than teachers

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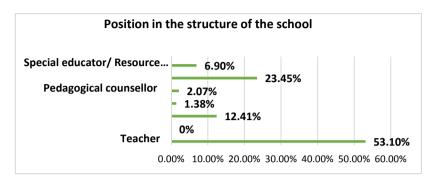


Fig. 5. Group Bulgarian respondents

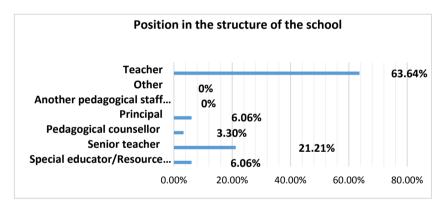


Fig. 6. Group Turkish respondents

Comparatively, it is noteworthy that other pedagogical specialists are not found as participants in the Turkish respondents, while the Bulgarian respondents include 12.41% of other pedagogical specialists. Probably, they are psychologists, speech therapists, hearing professionals, etc., but a strong influence in this context in the profile of the study participants is also the normative base in both countries, which determines which specialists are pedagogical.

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#### DIGITALIZATION OF INCLUSIVE EDUCATION

#### Zhana Atanasova, Gamze Dinsbash, Ibrahim Ball

Inclusive education would not be successful without virtual technology, because education without digitalization does not meet the needs and interests of children and pupils today and of the students tomorrow. Education without digitalization does not meet the needs of teachers and parents today and tomorrow.

When analysing the answers regarding the use of ICT in the educational process, it is found that the school policy in the countries of the respondents that the process is focused on the use of ICT. In their replies, Bulgarian respondents cite 48.94% and Turkish respondents 52.82% that they implement ICT in the educational process. Comparing the focus of school policies towards ICT is clear that there is a similar trend, according to the answers of the two groups of respondents about virtual technologies. Using ICT shows that, the learning process follows the digital interests of the students; the educational content is presented in a more objective, realistic way and with greater opportunities for taking into account the sensory interests of the pupils. The introduction of ICT in the learning process leads to an increase in the quality of education and, consequently, in the quality of inclusive education. The results of the answers of the respondents from the two groups are presented in fig. 7 and fig. 8.

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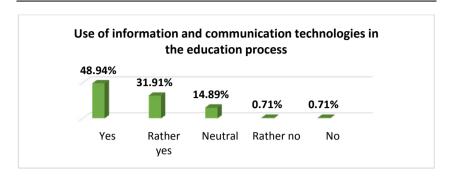


Fig. 7. Group Bulgarian respondents

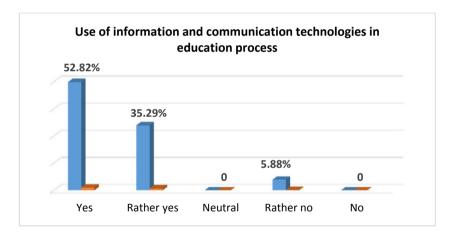


Fig. 8. Group Turkish respondents

Bulgarian respondents rate their knowledge and skills in information technology and their use in school education as very good (39.16%) and good (35.66%) in Bulgaria. Turkish respondents rate their knowledge as very good (23.53%) and good (47.06%). Comparatively, it can be stated that the results obtained by the

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respondents from both groups show that the respondents have good knowledge and skills for ICT, which shows a high self-esteem in the context of the necessary competence that an inclusive teacher must possess in the requirement of digitalisation of the school education. The results are presented in Fig.9 and Fig.10. The self-assessment of Bulgarian respondents is higher than the Turkish respondents, but there are also answers showing insufficient training or lack of knowledge compared to Turkish respondents who have not reported results for lack of training or lack of knowledge about ICT.

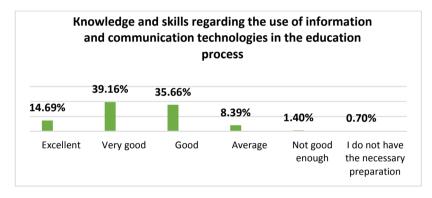


Fig. 9. Group Bulgarian respondents

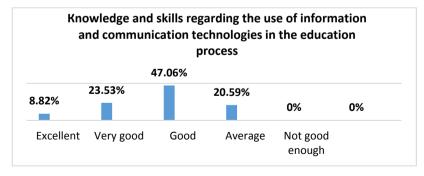


Fig. 10. Group Turkish respondents

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The respondents from both groups of participants in the survey agree that cooperation was established between pedagogical specialists by using informational and communicational technologies in the teaching process. The ascertainment is based on the results, which show that almost half of the Bulgarian respondents answered 'closer to yes' – 41.55% and 30.28% answered 'yes', and more than half – 61.76%, of the Turkish respondents answered 'closer to yes', and 17.65% answered 'yes'. Comparing the results obtained from the answers of the participants from both groups, it is found that the cooperation between the Turkish respondents when using information technologies in the educational process is relatively higher than the cooperation between the Bulgarian respondents. The results are presented in Fig. 11 and Fig. 12.

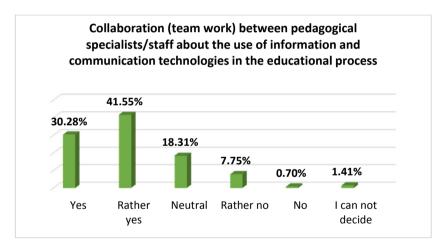


Fig. 11. Group Bulgarian respondents

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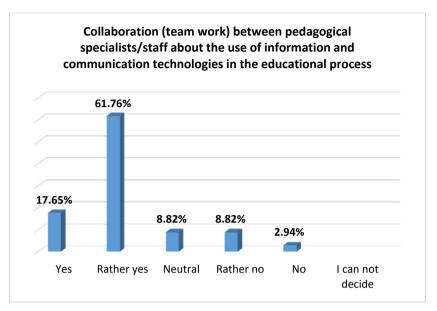


Fig. 12. Group Turkish respondents

In teaching, 39.86% of the Bulgarian respondents use modern information technologies. The results of the Turkish respondents show that 52.94% of them use modern information technologies during teaching, which can be seen from the diagrams in fig. 13 and fig. 14. The results show that the Turkish respondents, compared to the Bulgarian ones, use more modern information and communication technologies in the training process.

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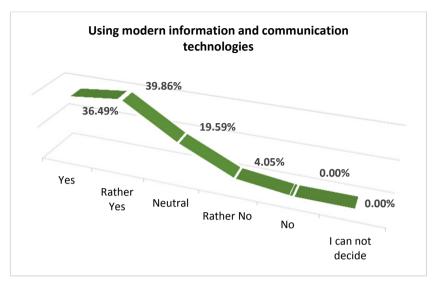


Fig. 13. Group Bulgarian respondents

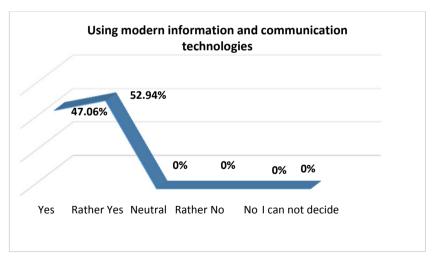


Fig. 14. Group Turkish respondents

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One of the modern, popular and visual approaches of delivering information in the teaching process is multimedia presentation. The analyzed results of the respondents from Bulgaria and Turkey on the use of multimedia presentations shows that they are skillfully used by the pedagogical staff, because developing multimedia presentationbased learning material is one of the important and key points, directly linked to the learning cognition system and making the education interactive. Through multimedia presentations, the pupils gain a more actual view of the facts, objects and of the phenomena being studied, and they understand, comprehend, and memorize the content of the course easier. The percentage difference between the respondents from Bulgaria (56.64%) and Turkey (64.71%) is relatively small when it comes to the use of multimedia presentations in the teaching of the material. The results are presented in Fig.15 and Fig.16.

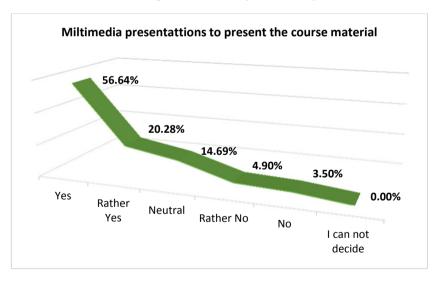


Fig. 15. Group Bulgarian respondents

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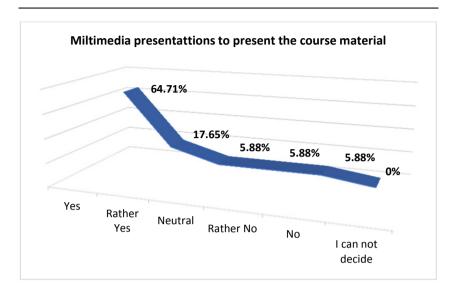


Fig. 16. Group Turkish respondents

E-learning resources are used in the teaching process, and from the answers of the respondents from both groups it is confirmed, that half (50.00%) of the Bulgarian respondents use e-learning resources in the teaching process, and only 26.47% of the Turkish respondents indicate that they are using e-learning resources in the teaching process. In comparison, the Bulgarian teachers use about twice as much e-learning resources as their Turkish colleagues. The result may look for an explanatory model in the context of the provision of facilities, traditions in training and qualification of respondents. E-learning resources, as a universal tool for organizing the technological education in the new information environment among Bulgarian respondents, is also used efficiently for the processes of realizing inclusive education. The results are presented in fig. 17 and fig. 18.

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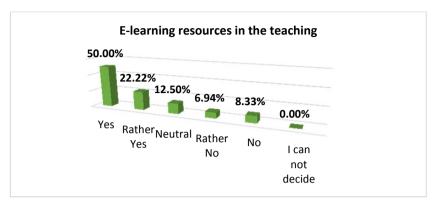


Fig. 17. Group Bulgarian respondents

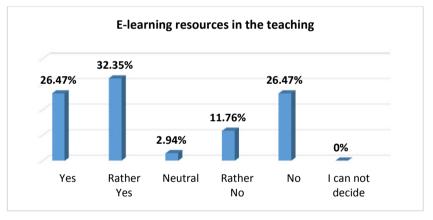


Fig. 18. Group Turkish respondents

Analyzing and comparing the answers of Bulgarian and Turkish respondents to the impact of electronic resources in the learning process of students, it is found that the results obtained by the two groups of respondents show that 72.22% of the Bulgarian respondents use electronic resources in the teaching process, while only 58.82% of the Turkish ones use electronic resources. In both groups, more than

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half of them use digitalization of education, this result points to providing opportunities for inclusive education.

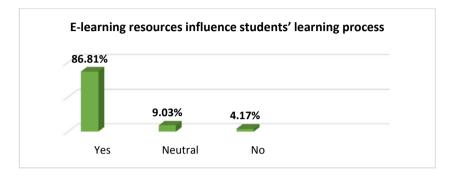


Fig. 19. Group Bulgarian respondents

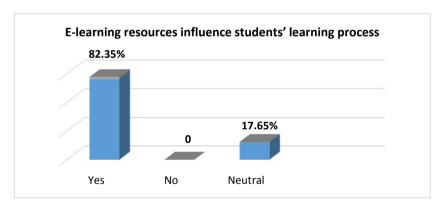


Fig. 20. Group Turkish respondents

From the answers to the question "Do you think the use of ICT in education motivates students?" can be concluded, that the respondents from both groups indicate that the use of ICT in the learning process motivates the pupils with increased engagement in learning process, higher self-esteem of the achievements and positive

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influence on the personal satisfaction of the achievements. Comparing the results, we can point out that the percentage of Turkish respondents is relatively higher (82.35%) than the Bulgarian (42.36%) regarding the motivation of the pupils in their education through the use of ICT. The results are presented graphically in fig. 21 and fig. 22.

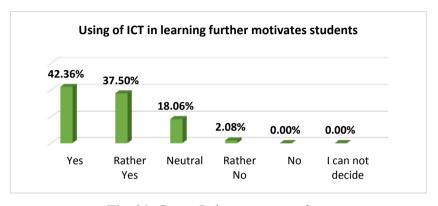


Fig. 21. Group Bulgarian respondents

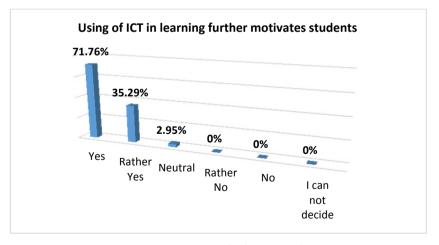


Fig. 22. Group Turkish respondents

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52.90% and half of Turkey – 52.94% use educational games in the learning process because they are one of the successful forms of application of information and communication technologies in the learning process. The results are presented in fig. 23 and fig. 24.

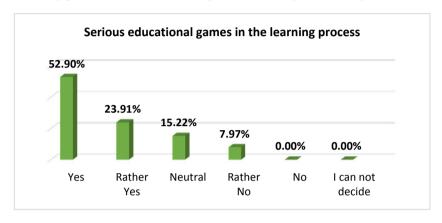


Fig. 23. Group Bulgarian respondents

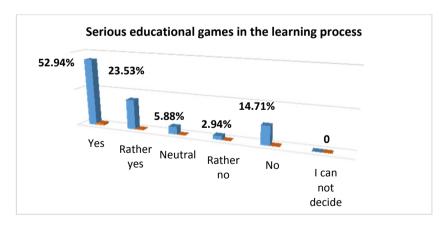


Fig. 24. Group Turkish respondents

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The analyzed and compared data from both countries on the question of what technological tools and resources you use in your teaching, it is found that the respondents indicate different technological tools, namely: the highest is the percentage of Bulgarian teachers (65.99%) that have indicated they use the computer while they teach, the highest percentage of Turkish teachers indicates that they use an interactive whiteboard (61.76%) in their teaching. Multimedia in the learning process is used by 12.24% of Bulgarian teachers, and 8.16% of them use an interactive whiteboard and video tutorials. Only 20.59% of Turkish teachers use the computer in their teaching process and 8.82% use video tutorials. These results indicate that the respondents from both countries use different technological tools in their teaching. The results are presented in Fig. 25 and fig. 26.

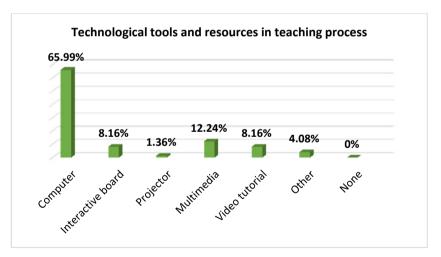


Fig. 25. Group Bulgarian respondents

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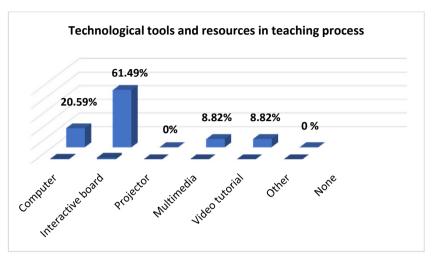


Fig. 26. Group Turkish respondents

The results of the question: "Do you think educational games are effective in the learning process?" show that educational games are useful in the learning process for the respondents from both countries. Comparing the results we can say that the percentage of Turkish teachers (82.35%) is higher than that of Bulgarian teachers (50.00%) regarding the usefulness and effectiveness of educational games in the learning process, because through them the learning is enjoyable, fun and motivating. Educational games increase the students' self-esteem and their confidence in their own knowledge and capabilities. The results are presented in fig. 29 and fig. 30.

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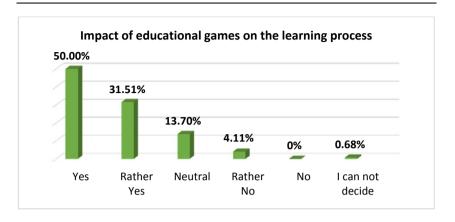


Fig. 27. Group Bulgarian respondents

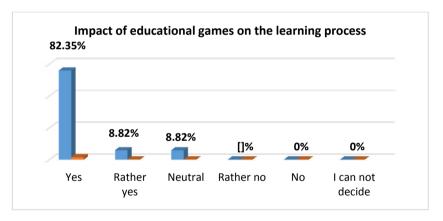


Fig. 28. Group Turkish respondents

Responding to the question: "Do you use mobile applications in the learning process?", it is stated that only 20% of the respondents from both countries indicate that they use mobile applications in the learning process. According to them, teaching and learning today are heavily influenced by digital technology, which has led to an increase

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in the quality of education and social integration. Based on the comparison, we can point out that the Turkish respondents (41.18%) use slightly more mobile applications than the Bulgarian ones (19.44%) in the teaching process.

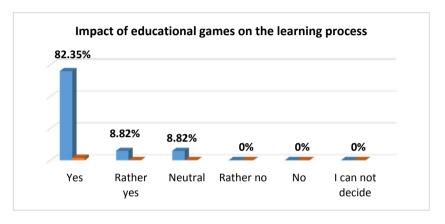


Fig. 29. Group Bulgarian respondents

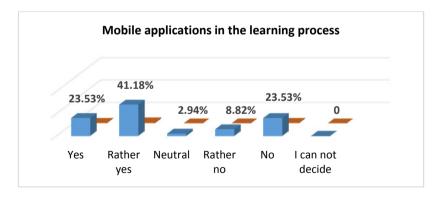


Fig. 30. Group Turkish respondents

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The analysis of the responses of teachers from Bulgaria and Turkey regarding the integration of subjects with modern technologies shows that the percentage of Turkish respondents (67.65%) is higher, which indicates that modern technologies can be integrated within the subjects, compared to the Bulgarian ones (42.86%), as shown in fig. 31 and fig. 32, this integration leads to easier assimilation of the content and improvement of the academic achievements of the students.

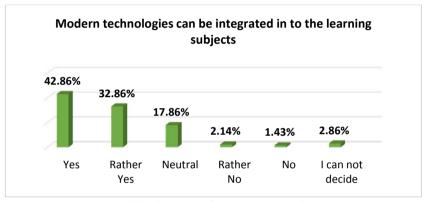


Fig. 31. Group Bulgarian respondents

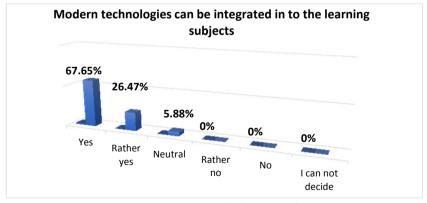


Fig. 32. Group Turkish respondents

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The low results obtained in our opinion are due to the insufficient knowledge of educational robotics by all pedagogical specialists, and that at this stage in education there are few schools and only some of the innovative schools use educational robotics in the pedagogical practice. The results are presented in fig. 33 and fig. 34.

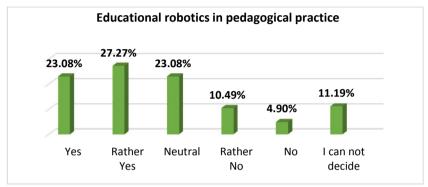


Fig. 33. Group Bulgarian respondents

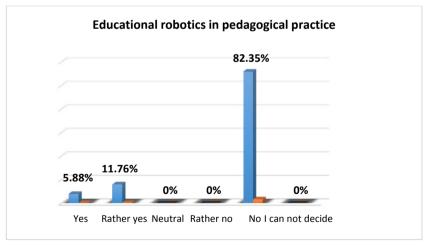
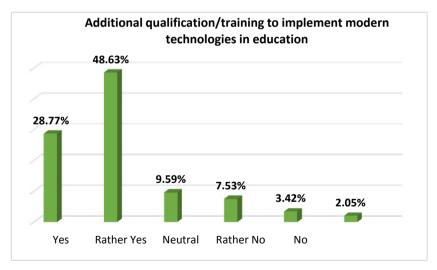


Fig. 34. Group Turkish respondents

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From the analysis and comparison of the answers to the question "Do you need additional qualification for the implementation of modern information technologies in education?" it is found that half of the respondents from Bulgaria answered (48.63%) that they need additional qualification for the implementation of modern information technologies in education. Surprising is the result of the Turkish respondents who (82.35%) indicated that they did not need additional knowledge and skills about modern technologies. In this respect, it is necessary to point out that an important factor for the professional and career development of today's teachers is the constant updating of their specialized knowledge and technological competences in order to keep up with the innovations and continuously improve their qualification. When comparing the results of the respondents from the two groups, one can clearly see the need and/or desires for additional professional qualification.



*Fig. 35. Group Bulgarian respondents* 

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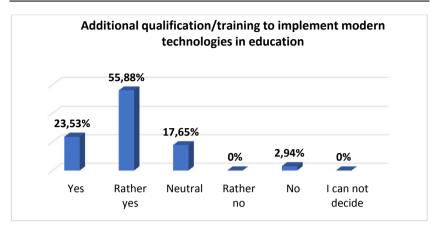


Fig. 36. Group Turkish respondents

Based on the results of the survey from both countries on the use of ICT in the learning process it can be concluded that, according to respondents, the use of modern technologies in the learning process leads to a quality transformation of the teaching and learning process by providing a modern and better education. Innovative technologies create an interactive educational environment that meets the needs and requirements of modern pupils and of education in general, because digital technologies are aimed at the personal development of each participant in the educational process. The integration of information and communication technologies in the teaching process complements and enriches some of the basic functions of the teacher, making him a strong motivating factor for the fulfillment of the didactic goals. In this respect, it can be said that the pedagogical professionals need to constantly improve their knowledge and skills about modern technologies, because rapidly developing ICTs are part of the daily functioning of a person and place the school in need of a new type of training, and the implementation of new strategies of teaching. The effective use of modern technologies in all levels of education and training is subdued to teachers, and it depends on their knowledge and

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belief in the usefulness of using new technologies in the teaching process. On the other hand, the use of digital tools in the learning process always develops students' digital skills directly or indirectly. The formation of digital skills, the knowledge about digital technologies, the attitude towards the digitalisation in school education is a new challenge for the teachers. The digital knowledge, skills and relations present key competences which are in line with the European Qualifications Framework for Key Competences.

However, building digital competence is not enough to enable pedagogical professionals to work effectively in and for the inclusive education process. The predictors of students' learning difficulties and their interventions need to be known.



## LEARNING DIFFICULTIES

## Ivan Trichkov, Gamze Dinsbash, Ibrahim Ball

Learning difficulties among pupils create problems at different levels – academic level and at the level of social acceptance and social support. The degree of social acceptance shows the attitude of pupils, teachers and parents towards segregation and the discriminatory patterns in community living, and also shows our attitude towards the integration and socialization of children with problems. In this context, a study on learning difficulties was conducted according to the principles, beliefs and the role of the teacher in inclusive education.

The study was conducted with a questionnaire about learning difficulties with 145 participants from Bulgaria and 106 participants from Turkey. There are 20 statements, and for each statement, the survey participants can choose between yes or no.

From the research, it is clear that for almost all the subjects surveyed (Fig.37a and Fig. 37b), learning difficulties and the accompanying difficulties in pupils' academic activities can lead to a lack of self-esteem, isolation and behavioral problems. Behavioral and personality problems that accompany learning disabilities can be prevented by building a strong pupil support system and by supporting learning about self-expression, coping with anger and overcoming challenges. Focusing on the child's growth as a person, and not just acquiring academic skills, can help the pupils build good emotional habits that determine his or her success in life

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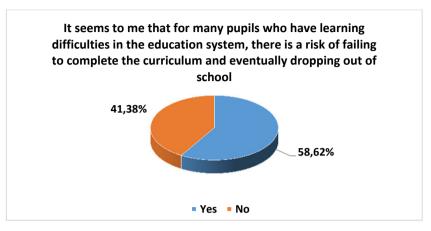


Fig. 37a. Group Bulgarian respondents

Turkish respondents rate a high probability (70.75%) of the risk of dropping out of school. This result is related to the problems that the pupils with learning difficulties experience difficulties not only at cognitive but also at emotional and social level. These problems are likely to create barriers not only for educational but also for social inclusion.

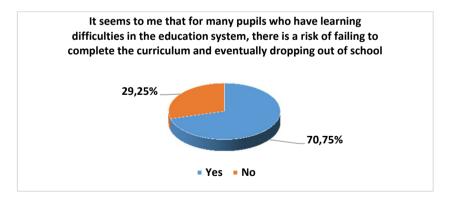


Fig. 37b. Group Turkish respondents

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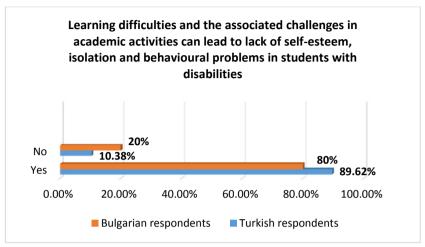


Fig. 38

The participants in the study from both groups agree that "learning difficulties and the accompanying academic difficulties can lead to a lack of self-esteem, isolation and behavioral problems in many children" (fig. 38). Children/pupils with learning difficulties have different academic life in each class. Each class operates with variable characteristics that include certain roles and types of behavior. Cohesion is formed both through group and team activities, through competition and rivalry, that derive a particular social status for each child / pupil. The individual class sets common goals with system-forming functions. The described characteristics of the class develop regulatory norms for social and academic relations and the ongoing social processes between pupils. Given these characteristics, children/pupils with learning difficulties often fall into the group of academic outsiders. Their academic failures reflect their social acceptance in class, which is not high. Thus, pupils with learning difficulties, finding social neglect and isolation from class, begin to self-determination as underperforming and unsuccessful children/pupils. Following this path of regulation of the social role of

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children/pupils with learning difficulties leads to the formation of low self-esteem and low self-efficiency. A boomerang effect is obtained. The low academic achievements lead to low self-esteem, and the low self-esteem leads to low academic achievements. In this context, respondents take into account the following effect – in the school life, it is important for the success of children/pupils to work in the field of raising their self-esteem (for example, for other activities where they have strengths) and enhancing their self-efficacy.

Respondents are almost unanimous that the most important thing to remember is that most students with similar problems are as smart as everybody else (fig. 39). The conclusion that can be drawn from these answers is that these children simply need to be trained in a way that is suited to their unique learning style. The chosen term "smart" in the item is unifying in terms of the abilities and capabilities of pupils with learning difficulties. The used term does not reflect on the level of intellectual development of the pupil, measured according to certain psychological scales and methodologies. The term is popular with parents and teachers, it has a reputation and carries the charge of the pupils' potential for higher academic achievements.

The results from the statement "The important thing to remember is that most children with learning difficulties are as smart as everyone else" demonstrate the positive attitude of the respondents about the education and socialization of the children/students with learning difficulties. A higher positive result is presented by the respondents from Turkey (91.51%) compared to the result of the Bulgarian respondents (75.86%). The high scores recorded by the respondents from both groups indicate that the respondents not only express a positive attitude towards the children/pupils, but may strive to identify the strengths of each child / pupil, whether or not they have learning disabilities.

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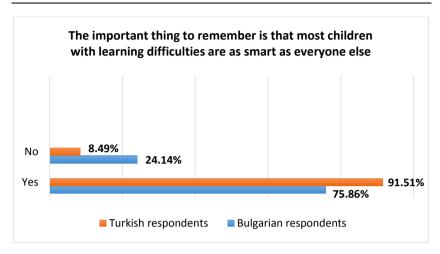


Fig. 39

The conclusion that can be made about the high percentage is that the game methods and team tasks applied in the joint activities of the teacher with the pupils is related to a universal strategy for stimulating the development of critical and self-critical thinking, of the creative abilities (fig. 40). The respondents from both groups demonstrated a high score (the Turkish respondents gave peak results), showing the importance of game methods and teamwork in the teaching process. Both game methods and team assignments can successfully involve any child / pupil in the implementation of academic activities. Team activities and play methods in the learning process increase the interest and positive emotions in the pupils' learning process.

Often, pupils fail because of a misunderstanding of the abstract content of the curriculum, and this fact is reflected in the respondents' answers. However, when technologies and techniques from projectbased approaches are applied, then understanding is brought to a practical level of perception, comprehension and understanding. It is displayed to the practical level of implementation and learning.

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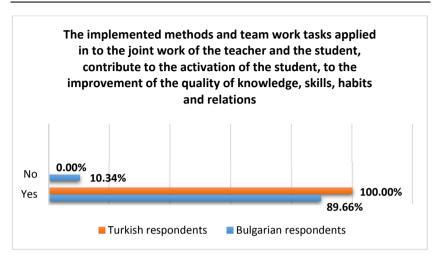


Fig. 40

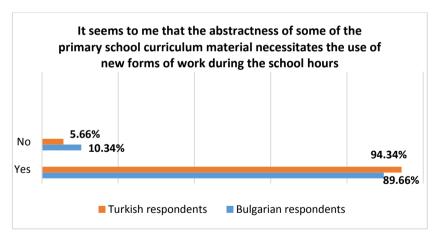
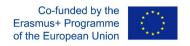


Fig. 41

Game methods and team tasks have the function of forming positive motivation and cognitive interests of a positive attitude

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towards learning and mental work, a function to stimulate competition between pupils and/or groups of pupils, to develop teamwork skills. This may be due to the fact that very often game motives are easier to transform into cognitive models (fig. 40). When the student is being taught "how to learn", i.e. cognitive skills are created, mastering the learning material does not create problems and the learning difficulties are minimized. The cognitive skills are associated with understanding the phenomena, events, objects and relationships in the world around them and their own actions. Solving every problem, every task, regardless of its type and rank, is related to cognitive skills. In this context, the cognitive skills present a way of perceiving, understanding and comprehending, memorizing every information. When the child/pupil has mastered the mechanism of cognitive skills, school difficulties reduce and disappear.

The results of the respondents' answers clearly show that the possibility of adapting the educational content to the capabilities and potential of each child is an important condition and requirement for their academic support (fig. 42).

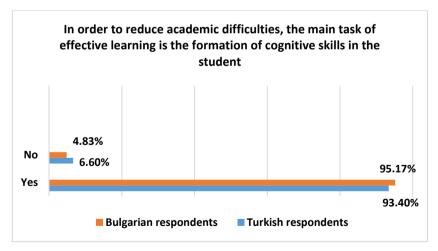


Fig. 42

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Adaptation of the learning content is providing accessibility to it. Adaptation of the input involves changing the way it is presented, changing the design of exercises, changing the preparation for different forms of testing, changing the place of learning, changing the learning time, changing the timetable, changing the teaching styles, learning styles, etc. While adapting the content, the teacher works with the whole class, but changes the educational environment by making it accessible and positive for each pupil, using aids and/or supporting technologies for pupils with SEN and/or for every pupil. The educator teaches in the same way all of the pupils, including the ones with SEN according to individual needs, using:

- computer or mobile application software for all of the pupils and for the pupils with SEN,
- sign language translation for pupils with hearing impairments,
- Larger letters and bolted worksheets for pupils with low vision or learning disabilities,
- worksheets with a different font, such as Ariel, Helvetic, Verdana – for pupils with specific learning difficulties and for pupils with learning difficulties,
- more worksheets with fewer objects on them for pupils with intellectual disabilities, with autism spectrum disorders and for pupils with learning disabilities, etc.

This suggests that, when necessary, the content of the input should be minimized and the tasks for the pupils with learning disabilities should be adapted, to encourage even the small successes of these children and to divide the tasks into small parts, on the principle of gradualness and consistency.

According to Ebeling, Deschenes, & Sprague (1994), 9 types of content input can be identified:

- Introduction. An adaptation of the instruction method is provided to the student.
- Product. Adaptation to how the pupil can respond to the instruction.

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- Time. Adaptation of the designated time allowed for studying, and completing a task or test.
- *Difficulty*. Adaptation of the level of skill, the type of problem or rules on how the student can handle the job.
- Level of support. Motivating the pupils to help themselves.
- Size. Adapt the number of subjects the pupil is expected to learn.
- Degree of participation. Adjusting the degree to which the student is actively involved in the task.
- Alternative goals. Adapting the goals or the expectations for the results using the same materials.
- Modification of the curriculum. Providing various instruction and materials to meet each student's individual goals.

Unlike other components of adaptation of the curriculum, modification is a component of adaptation of the curriculum, which refers to changes in the curriculum that result in either lower expectations or lower standards (Levterova, Mineva, 2019).

Adaptation of the curriculum is included in the resource help. But adapting the curriculum is an innovation. Indeed, with no direct economic value added, but with emphatically added indirect economic value. Because the pupil who has succeeded in adapting the curriculum to gain knowledge and skills, to form relations and attitudes towards independent living, will continue his higher education and will be on the labor market with dignity and fairness, without indignation and paternalism.

Like any other innovation, adapting the curriculum requires knowledge, experience, acceptance, time, energy and enthusiasm from the teachers. Adaptation of the curriculum is possible to be effectively implemented / and many teachers are successful / and all efforts are worthwhile, especially when the success of the students with learning disabilities is clear and visible (Levterova, Mineva, 2019).

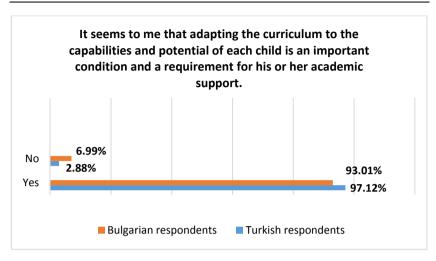


Fig. 43

Academic support for children/pupils with learning difficulties is connected to the implementation of the learning process in the direction of:

- from simple to complex;
- using brief and consistent, direct, systemic and/or explanatory instructions;
- teaching and learning by small steps;
- teaching and learning through emotionally positive models;
- teaching and learning through practice, through doing (handson approach);
- teaching and learning in groups;
- teaching and learning through a model: peers educating peers
- teaching and learning according to the pupils' sensory preferences;
- teaching and learning according to the interests of the pupils, etc. (fig.44 and fig. 45)

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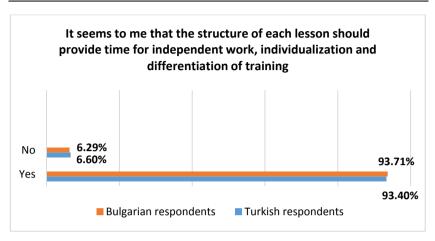


Fig. 44

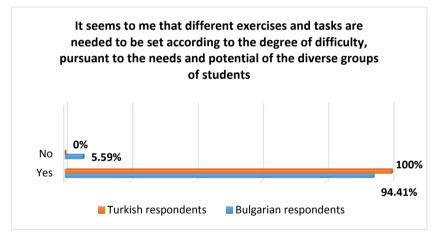


Fig. 45

Individual work requires the pupil to concentrate on the curriculum by developing autonomy, creativity against the background of the acquired knowledge and skills. Peak performance turns out to be a

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demanding statement "It seems to me that different exercises and tasks are needed to be set according to the degree of difficulty, pursuant to the needs and potential of the diverse groups of pupils" as 100% of the respondents confirmed it. This result tells us that the respondents understand and accept the philosophy of inclusive education.

In the structure of each lesson time for independent work, individualization and differentiation of education should be provided, different exercises and tasks to different groups of pupils in terms of difficulty should be assigned.

While planning a learning activity, the teacher needs to come up with criteria for assessment, encouragement and stimulation of the children/pupils with learning difficulties. With clear criteria and rules for success, the motivation for success in learning increases in the children/pupils.

It can be seen from the results in fig. 46, the respondents from both groups highly value the planning of encouragements and performance criteria. In the answers to this statement, the respondents demonstrate professional competence and/or pedagogical intuition that are relevant to the realization of inclusive education.

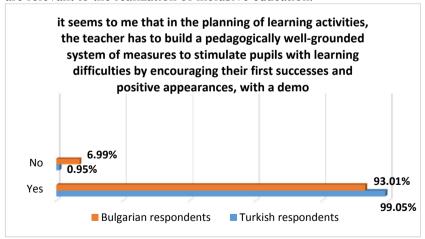


Fig. 46

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It is desirable to make changes in the child's/pupil's classroom to suit his/her needs. It is important to provide special training services and programs that take place inside or outside the child's classroom.

effective model for facilitating the teaching children/pupils with learning disabilities is the introduction of greater flexibility and freedom of the curricula. When there is a pupil with learning difficulties in the classroom and the teacher can modify the thematic distribution of the curriculum in time according to the pupil's needs, the results would be much better.

The high score in both groups of respondents on the adoption of clear performance criteria reflects the need for teacher freedom in the distribution of thematic content, monitoring and timing of education (fig. 47).

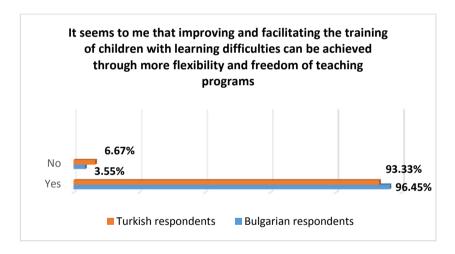


Fig. 47

The conclusions that can be drawn from everything said so far are related to the fact that the teachers' beliefs about the capability and capacity of a child with learning difficulties and the difficulties they experience in dealing with it can determine the degree to which they

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are prepared to adapt their teaching and learning methods and/or to make the organization of the classroom inclusive.

The respondents think (Fig. 48) that a permanent teacher-parent relationship is extremely important. Some parents are not always aware of their child's learning difficulties (especially after a certain age), they cannot identify the learning difficulties and do not agree with the teachers' opinion. Undoubtedly, parents have the primary responsibility for their children, but sometimes they do not know the basic aspects of parenting and refer to random virtual guidelines. Teachers are more familiar with the particular age group in which they teach. Teachers are more familiar with the psychological, personality, behavioral characteristics of pupils and, most of all, the diverse learning styles of the pupils.

Creating a good parent-teacher relationship assists the pupils knowledge to find the most effective parenting and learning models for the pupil, helps the pupil feel good and comfortable in school, to be successful in school and to enjoy learning. By involving parents as partners in the educational process, the pupil understands that they can trust their teacher and their family, that learning is a value and that achievements require effort and effort is rewarded.

The parent-teacher relationship is important because it comprehensively takes care of the pupil's academic achievement, upbringing and socialization. The teacher-parent relationship is important for every pupil, whether the pupil has learning disabilities or not. The parent-teacher relationship is important because it reflects the perspective of each pupil, each teacher and each parent. When parents become equal partners in the educational process, the learning outcomes are higher and more achievable.

Good pedagogical interactions between the school and the family community determine the pupil's academic success. The family and the school communities play an important role in the development of the pupil. These roles are not interchangeable or quite different, but rather complementary and reinforcing. Role positions in the partnership model support mutual efforts towards a common goal. The

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family and the school have close, even identical goals regarding the pupil's personal, intellectual and social development. The school prepares pupils for life by forming social skills and socially appropriate behaviors, realizes patriotic upbringing and preserving folk-psychological and cultural traditions. The family is the first and most important social agent for children and pupils (fig. 48).

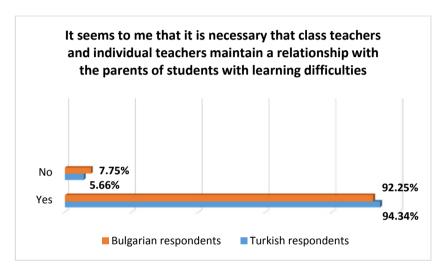


Fig. 48

When communicating with the school community, parents often use conventional strategies, although there are different situations. The most traditional is the communication strategy. This strategy applies to all children/pupils. If parent-teacher interactions are related to the child's/pupil's learning disabilities, common family context behavior is demonstrated as elimination or non-recognition of the teacher's opinion, or as overexposed communication with teachers, or as a disinterest in the life of the child / pupil at school. Sometimes parents do not know or suspect what the right behavior model towards the child/students with learning disabilities is, towards the teacher or the

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school. Therefore, teachers are often required in individual and community meetings to support the parenting of a child/ studentsl with learning difficulties in order to have mutual support, shared decision making, and to encourage the child/students to learn. It is extremely important that parents and teachers are on the same page about the child/students with learning difficulties, in front of the child/students with learning disabilities, and towards the child/students with learning disabilities. The teacher is an ambassador for inclusive education because the two-way pedagogical interaction is connected with the mutual allowance of freedom and autonomy, awareness of interdependence and common goals. These are the foundations on which it is possible to build a partnership culture in collaboration between school and family communities.

Effective communication needs to be created not only by the parents. Teamwork with all those who interact with the child/pupil with learning difficulties is important to support the child/students 's progress.

The high marks of the respondents from both groups on specialized educational support for pupils with learning difficulties and teamwork related to their education is impressive (fig. 49 and fig. 50).



Fig. 49

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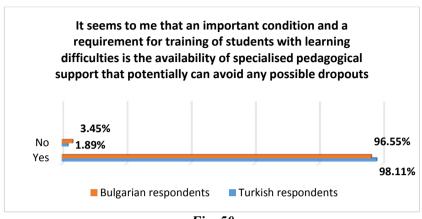


Fig. 50

The conceptualization of the pedagogical interaction in the school community and the team work for the specialized pedagogical support for pupils with learning difficulties is derived according to:

- accepting learning as a value towards which forms of communication between sub-communities are realized.
- Accepting the individual sub-communities such as the pupils and the teachers community, which generalize the school community, which has a constant daily presence in the school.
- accepting the individual sub-communities, which, although are not represented with a constant daily school attendance, have a strong influence and indirect presence.

The results show that there is a clear need for additional and different resources for children/pupils who cannot meet the curriculum requirements. This resource must be tailored to their optimal capabilities and potential. Such pupils should be in a position not only of academic but also of social inclusion. Teamwork is crucial in this process. If general education teachers experience difficulties in dealing with "different" children, the teams of pedagogical specialists should

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play the role of qualified help in this direction. It must be remembered that the resource teacher has three main functions: supporting the integrated student, assisting his / hers parents, but also, of course, assisting the general education teacher. He has a special role – his task is to ensure all stages of socialization of the child in the class in the mainstream school, and is able to provide to the pupil and his teachers in the given subjects maximum assistance. This is also his role, exactly the maximum reparation for the difficulties in the process of education, upbringing and socialization. But, the resource teacher does not teach every subject. He should not work solely with the students with learning difficulties and should not make adaptation of the curriculum in every subject. Every teacher, every educator needs to know the materials and resources, to use teaching methods and techniques for students with learning difficulties.

The respondents show almost complete unanimity about providing means of inclusion for both pupils with outstanding gifts and pupils with learning difficulties (fig. 51). Social support should also have other dimensions, such as economic, life, financial, professional, etc. This could include providing additional payment for teachers working to integrate both children with talents, falling behind and as well as pupils with difficulties.

Most respondents also agree on the idea of implementing some universal approaches for working with pupils with learning difficulties such as the holistic approach (fig. 51 and fig. 52). Applying a holistic approach leads to the creation of successful strategies that are useful for the general education teacher who wants to create successful social integration and inclusion, influencing the attitudes of these pupils and pupils without difficulty. Knowing the profile and learning style of the pupils (with and without learning disabilities) is important in pursuing a holistic approach. "The learning profile is information about the individual pupil's learning according to the model, experience, mode and style of learning, sensory preferences and preferences for the learning environment. If, the learning profile is in synergy with the pupil's interests, the pupil's motivation for learning increases.

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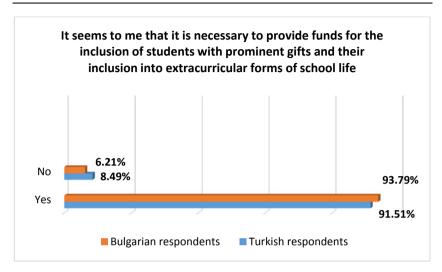


Fig. 51

The learning style is formed in accordance with the individual preferences and the accumulated experience for perception and processing of information and is a sustainable model of individual behavior.

The teaching styles are mostly used by the pupil and the teaching community through active pedagogical interaction, which through the lens of the communication process has three basic functions:

- cognitive function, which is related to the reception, information processing and formation of knowledge, information, habits and skills, as well as the cognitiveemotional formation of the personality of the pupil as well as the teacher:
- emotional function that is projected into the dimensions of emotional intensity and depth of communication and the levels of forming an emotional perception and emotional expression;
- connotative function that demonstrates the personality's potential for forming, developing and/or presenting the will,

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of persistence and perseverance in carrying out certain activities, e.g. learning activity." (Levterova, Mineva, 2019).

Some of the strategies of the holistic approach include the use of cooperative methods for learning and developing social skills in order to improve the social acceptance of pupils with learning difficulties.

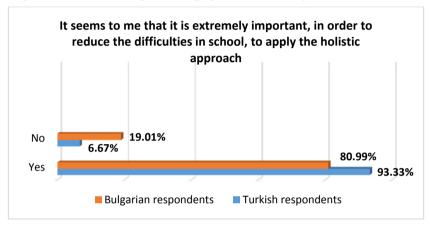


Fig. 52

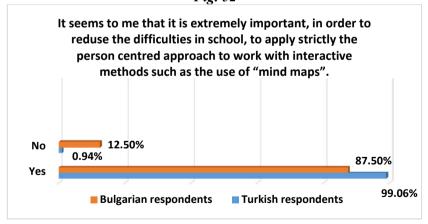


Fig. 53

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Education, which guarantees the best possible inclusion of children/pupils with learning difficulties is required. The introduction of such inclusive processes and pedagogically specialized teams are a positive change in the educational system. These are necessary indicators that should be present in order to discuss the quality of education for children and pupils with learning difficulties.

In the discussed aspects of inclusive education, personal and social acceptance are valid constructs not only for pupils, but also for professionals working with pupils with learning difficuties and society in general.

When teachers take into account the interpreted details of their work at school, they can find even more effective solutions for the academic achievements of children/pupils with learning difficulties. The easiest and most professional way for any teacher to achieve this is by implementing flexibility in their teaching style, alternating it in accordance to the interests and strengths of the pupils, thus creating a learning environment based on those aspects.



## LEARNING STYLES

## Dora Levterova-Gadzhalova, Tsvetelina Ivanova, Gamze Dinsbash. Ibrahim Ball

The Learning Styles Ouestionnaire is structured to analyze the educational methods used by pedagogical specialists in the school organization to carry out the process of inclusive education. These analyses provide the means to pinpoint the problematic aspects of a teacher's work on inclusive education that occurs within the school organization. Participants in the study on learning styles are 148 pedagogical specialists: teachers teaching at different stages of the school system, resource teachers, and speech therapists, psychologists from Bulgaria and 63 pedagogical specialists from Turkey. There are 40 statements to which the respondents answer "yes" or "no". The questionnaire covers various aspects of the day-to-day functioning of each teacher in the given school and country.

Individual items target teachers' educational methods, while other items point out information about the learning styles that teachers direct pupils through assigned exercise tasks, new knowledge, knowledge validation, and assessment models.

An important emphasis in learning styles is the teacher's requirements for the classroom atmosphere while teaching a new lesson. The results obtained demonstrate that teachers maintain requirements for discipline during teaching, while also being able to ignore noise during that process.

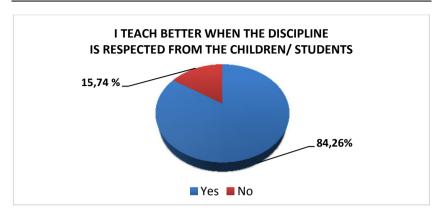
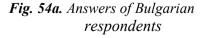


Fig. 54. Class Discipline

At the same time, there are differences in the responses of the Bulgarian and Turkish participants in the study. While only 6.08% of the Bulgarian pedagogical specialists respond, that they do not teach better when discipline is kept by the pupils, in only 25.40% of the Turkish pedagogical specialists, the lack discipline of the pupils impedes the educational process (fig. 54a and fig. 54b).





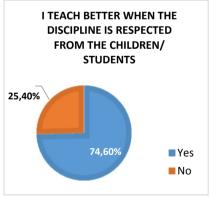


Fig. 54b. Answers of Turkish respondents

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The results from the statement "I teach better when the discipline is respected from the children/students" show that the respondents set the requirements for adherence to discipline in order to teach more effectively. The discipline in the classroom creates conditions for pupils to pay attention, understand and memorize the course material. Keeping the discipline in tact during class is mostly related in the teachers' ability to maintain the attention of the pupils, thus when the pupils are focused on the task at hand, understanding and memorization are achieved at higher levels. At the same time, teachers show that they can ignore noise during the educational process. When presented with new information, children/pupils often make creative noises with questions and comments, as well as by showing emotion and interest. Such creative noise helps to comprehend new information and is often linked to drawing analogies, associations and interpretations to already mastered knowledge. It can be observed that the participants in the study are capable of keeping the discipline in tact during the presentation of new information.



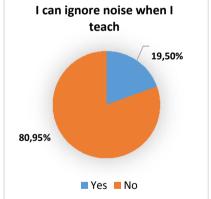


Fig. 55a. Respondents from Bulgaria

Fig. 55b. Respondents from Turkey

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Significant differences are noted in the participating groups in regards to the teacher's ability to ignore noise during the educational process. While Bulgarian participants have noted that 47.30% of them could ignore noise during the educational process, only 19.05% of Turkish participants have confirmed this possibility.

It is evident to the participants that even creative noise from the pupils can be an obstacle to achieve positive results during the learning process. Such an obstacle can result in a more authoritarian teaching style. The difference in the results can find an explanation in the contrast between the educational systems of the two countries; there is insufficient elaboration on the noise, which is causing the interference of the learning process; as well as the differentiation of the participants' answers in regards to the level of the education system and the subject they teach. That being said, with the implementation of the inclusive education, the requirement by the teacher for absolute silence during class is viewed as an obstacle. 92.57% of the study participants, indicated that they could work with pupils with SEN (fig. 56a u fig. 56b). Teachers can utilize educational methods, which they are familiar with and can apply to children/pupils with SEN. Obviously, they have a positive attitude to work with children/pupils with SEN, as the result is very high. In fact, in Bulgarian education, children/pupils with SEN have been studying in mainstream education institutions for more than 15 years, all teachers have studied in their university education subjects related to work with children/pupils with SEN, and working teachers have completed additional training courses qualification for work with children/pupils with SEN. These conditions have led to the social and educational acceptance of children/ pupils with SEN from the teaching community, and knowledge of methods and technologies for working with them.

The results presented for self-assessment for knowledge, skills, relations in regards to work with children/pupils with SEN show that teachers have professional competence, with almost no difference between the two groups of participants. The results of the statement "I can work with children/pupils with learning difficulties" are indicators

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of the teacher's successful work with this focus group on inclusive education.

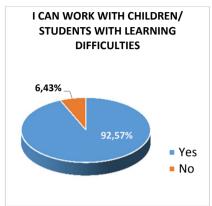
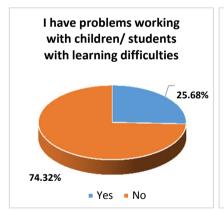
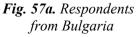




Fig. 56a. Respondents from Bulgaria

Fig. 56b. Respondents from Turkey





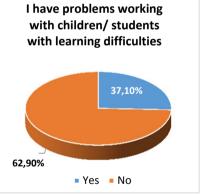


Fig. 57b. Respondents from Turkey

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Despite the opinion of the respondents that they can work with children/pupils with SEN, a significant part of the respondents (fig. 57a 25.68% and fig. 57b – 37.10%) are experiencing difficulties in their work with children/pupils with SEN. Comparison of the two results (fig. 56a, 56b and fig. 57a, 57b) speak eloquently that teachers need to master strategies, receive guidance and recommendations, as well as additional training in regards to working with children/pupils with SEN in order to be true ambassadors of inclusive education. It is important for inclusive education that teachers have the confidence to successfully work and use learning styles with children/pupils with SEN, even though they are experiencing difficulties in working with children and pupils with SEN. and openly share those difficulties. Most often, participants' issues are manifested in the complications of educating pupils with learning difficulties due to the struggle of identifying the problem of the individual pupil, as well as professional rigidness, inability or non-use of various learning styles. When openly expressing such a position, teachers are ready to adopt new proven models and learning styles for working with children/pupils with SEN in order to successfully implement inclusive education. The likelihood of problems arising due to the high criteria from the participants in relation to the achievements of the children/pupils should not be neglected.



Fig. 58. Respondents from Bulgaria



Fig. 59. Respondents from Turkey

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In this context, 92.11% of all teachers surveyed indicated that they needed clear strategies for working with SEN pupils (fig. 58 and fig. 59). Rather, this need is an expression of the aspirations of teachers (82.43%) to raise their level of awareness of current and innovative models for dealing with individual cases of SEN, not of inability or lack of knowledge and skills. The results show that participants have a desire to create their own strategies. Their strategies for working with children/pupils with SEN can be created and work effectively when they are based on scientifically and practically proven strategies and when the cognitive, motivational and emotional features of the children/pupils are known to the teacher. With that in mind, the contradictory results of the claims for clear and accurate strategies, as well as the aspirations to create their own plan of action by the participants from the study could be explained at first glance. The results clearly highlight the key components for continuing lifelong education as well as educating the participants about working with children/pupils with SEN.

At the same time, there are differences between the participants from the two groups. While 85.81% of the Bulgarian respondents indicate requests for clear and accurate strategies for working with children/pupils with SEN, but 82.43% of them wish for creating their own strategies for work, in 98.41% of the Turkish respondents were asked for clear and accurate strategies, and 95.24% expressed ambitions to create their own. Although there is a difference of about 10% between the respondents from the two groups, the ratio between the requirements for finished, effective and individually created practices and strategies in the two groups is minimal – 3.38% and 3.17% respectively. The participants in the study showed desire to know more precise strategies for working with children/pupil with SEN in order to be able to make choices according to the specific situation or child/pupil, but also to be able to stimulate their own creativity according to all circumstances and peculiarities of the classroom, in which they are leaders.

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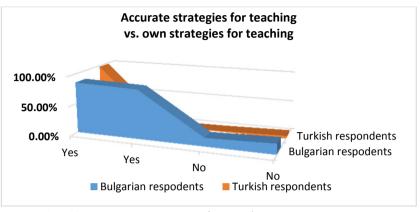


Fig. 60. Accurate strategies for teaching vs. own strategies for teaching

The keen interest towards innovations, creating and creative thinking among children and pupils, as well as the creativity of all of the participants in the survey is evident from the summarized results for the two groups of respondents shown in Fig. 61 and in Fig. 62.

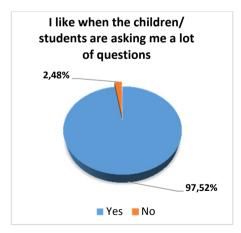


Fig. 61

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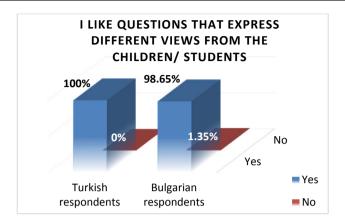


Fig. 62

The respondents allow, accept and approve of pupils' questions and opinions that are different than theirs. This way, teachers create the conditions to support a positive psycho-climate in the school community and to support the development of pupils' creative and independent thinking. When children/pupils have the opportunity to ask questions and express their different opinions, they not only express their uniqueness, but also demonstrate differences. Each teacher, who tolerates in his or her class a display of independent thinking and an individual reasonable position of the children/students, facilitates and makes more effective any process of inclusion.

The respondents understand the uniqueness of each child and each pupil, and the need for an individual approach towards shown difference. The individual approach requires the inclusive teacher's creative attitude and flexibility of communication, training and behavior. Because knowledge and skills without creativity cannot manage well the extreme situations and behavioral diversities of children/students. Creativity and understanding of creative ideas are the keys to managing inclusive education, the essence of the competencies of an effective inclusive teacher.

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Individual work with students with learning difficulties is preferred by the respondents because it clearly shows the progress of the children / students and the satisfaction of the teacher is stronger professionally. In this respect, the results obtained for the two groups of respondents on the preferred individual work of teachers and the need to adapt the content of the school are not surprising (fig. 63 and fig. 64).

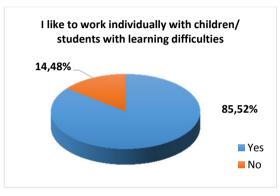


Fig. 63

Adaptation of the learning content involves changing the way the content is presented, changing the way of doing exercises, changing the preparation for different forms of testing, changing the place of teaching, changing the teaching time, changing the timetable, changing teaching and learning styles, etc. When adapting the curriculum, the teacher works with the whole class, but changes the educational environment by making it accessible and positive for each pupil, using aids and/or assistive technology for pupils with learning difficulties or for everyone, and can also work individually, or implement group activities with the class. Like any other innovation, adapting the curriculum requires knowledge, experience, acceptance, time, energy and enthusiasm from the teachers. It is possible the adaptation of the curriculum to be effectively implemented / and many teachers successfully implemented it / and all efforts are worthwhile, especially when the success of the pupils with SEN is visible.

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Both groups of respondents use adaptation of the curriculum for working with children/students with learning difficulties (Fig. 61a and Fig. 61b). With a clear understanding of the curriculum and its adaptation, the inclusion of every child/students becomes a natural process.

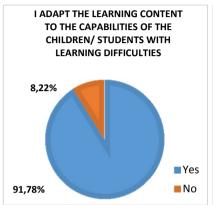


Fig. 64a. Group of Bulgarian respondents

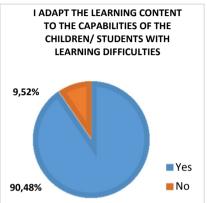


Fig. 64b. Group of Turkish respondents

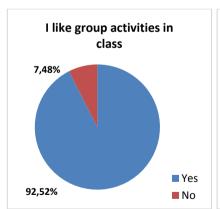


Fig. 65a. Group of Bulgarian respondents

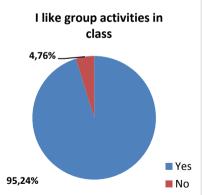


Fig. 65b. Group of Turkish respondents

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The results show that teachers also prefer group activities in classroom work. Working in groups makes peer learning easier, allows more effective support for the weaknesses and needs of the individual child/students l from another child/student and undoubtedly each child/students not only attends the lesson but can participate in the learning activities according to his/her capabilities and abilities to succeed. It is important for the teacher to properly form the groups and/or direct their formation from the pupils and to distribute and/or direct the distribution of tasks according to the capabilities of each child/student.

When learning through group activities, it is possible to accomplish learning by doing, by practicing individual tasks and by movement (fig. 66a and fig. 66b).

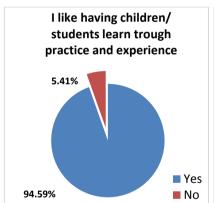


Fig. 66a. Group of Bulgarian respondents

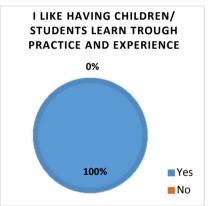


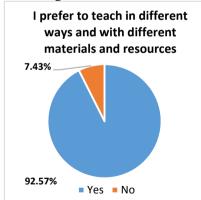
Fig. 66b. Group of Turkish respondents

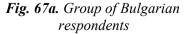
According to the presented results, the respondents from both groups liked and approved the "learning by doing" method; even the group of Turkish respondents gave a peak performance 100% result. The percentage of respondents from Bulgaria is 5.41%. The obtained results are beyond doubt social desirability in the answers, since there

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are many and many models in school practice for defining the content of the curriculum and for learning new knowledge by doing. Learning through hands-on activities and experience is liked by both teachers and pupils. Parents willingly become partners in the educational process when developing project-based activities.

Learning by doing and by movement makes the conditions for each child/pupil to present their potential and develop their creativity. Effective and creative teachers like these learning styles from their pupils because they can introduce project-based technologies and educational challenges into their learning styles and can provide their pupils with space to manifest and develop their strengths. Similar to the teaching styles of the teacher and the learning styles of the pupils is to support learning in different ways and with different materials and resources. The interviewed teachers highly evaluate the usefulness of the various teaching methods, materials and resources (Fig. 67a and Fig. 67b) and express preferences for their use. The perceived preferences of the respondents from both groups outline another strategy of inclusive education – teaching (teaching and learning) with flexible use of ways, styles, methods, materials and resources according to the needs of each child/pupil.





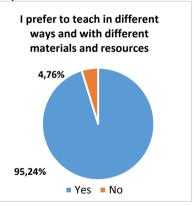


Fig. 67b. Group of Turkish respondents

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At the same time, research participants note that they do not often use the project-oriented approach in the classroom. Only 65.44% of the Bulgarian respondents (fig. 68a) and 50.79% of the Turkish respondents use it (fig. 68b).

Project-based learning approaches pave the way for inclusive education because they create the conditions for each teacher, for each child/student and for each parent to use their potential, knowledge, skills and attitudes to the curriculum and to the individual knowledge for recreating what has been learned with skill and experience. An explanatory model may be Gardner's theory of multiple intelligences. The teacher, as well as the parent, through project-based learning approaches, can identify the strengths and weaknesses of the child/student and can enhance the intelligence inherent to the child/student. Often, project-based training approaches reveal the practical and/or kinaesthetic intelligence of the child/student, which may go unnoticed at regular hours. Project-based training does not only involve the design of a single object or a separate subject. In order to get the finished look of the object, the relevant child/student goes through a cognitive scheme for the object its creation includes knowledge from other disciplines, knowledge of the interests and activities of the child/student in extracurricular activities/, of the relevant material, the process of elaboration, assessment of achievement /self-assessment and evaluation by others – teachers, classmates, etc. Throughout the projectproduct development cycle the child/student forms and develops fine motor skills, language and communication skills, combinative thinking, trains the work memory (through it the short-term and long-term memory) realizes encoding and decoding of information, develops adequate self-assessment and self-efficacy, learns to work in a group and/or in a team with different classmates, etc.

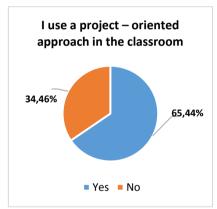
Through project-based learning approaches, training is specified for the child/student distinction and is one of the feasible models of inclusive education.

Sometimes teachers, based on their professional knowledge, skills, attitudes, and pedagogical intuition, apply individual techniques

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and approaches in the classroom, even if they are not fully aware of the theoretical rationale for an approach, in the particular situation of a project-oriented approach. The opposite situation can be seen, they have knowledge, they have the skills and attitudes, but they do not apply them in their school practice. Supporting of the statement above and the results of teaching according to the interests and sensory preferences of the pupils, are the results of the assessment and the psycho-climate in the classroom.

The following charts (figs. 66a and 66b, and figs. 67a and 67b) clearly show the gap of knowledge on the interests of the children/students and the implementation of teaching styles accordingly to the interests of the children/students.



I use a project – oriented approach in the classroom

49,21%

Yes No

Fig. 68a. Group of Bulgarian respondents

Fig. 68b. Group of Turkish respondents

Respondents' answers clearly show the difference between the two groups, but a more significant fact for inclusive education is the strongly expressed position of 94.59% and 88.89% of the respondents from both groups, for knowing the interests of children/students. When the inclusive teacher knows the interests of the children/students, it is easier to develop a positive attitude, to provoke successful performances by them, and to realize creative models of

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teaching and learning, and of the behaviour of the children/students with differences in the mental physical and academic functioning. Learning styles, teaching materials and resources can fluctuate according to the interests of the children/students and the inclusive teacher manages this variability (fig. 69a and fig. 69b).

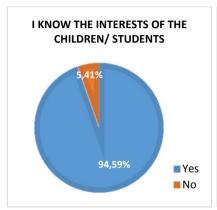


Fig. 69a. Group of Bulgarian respondents

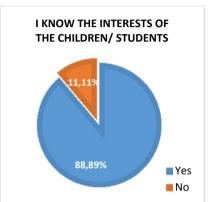


Fig. 69b. Group of Turkish respondents

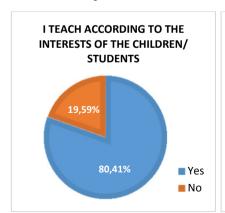


Fig. 70a. Group of Bulgarian respondents

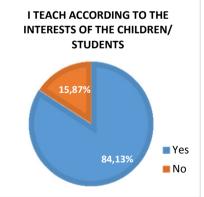


Fig. 70b. Group of Turkish respondents

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Similar results are shown in terms of the pupils' sensory preferences. Teachers surveyed noted that they know the sensory preferences of children/students who they teach (fig. 71a and 71b) however, far fewer of them use in their teaching the sensory preferences of the children / students.

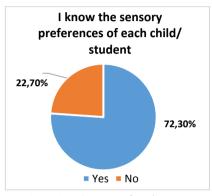
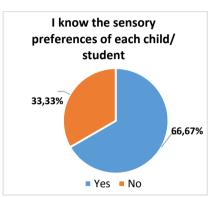


Fig. 71a. Group of Bulgarian respondents



**Fig. 71b.** Group of Turkish respondents

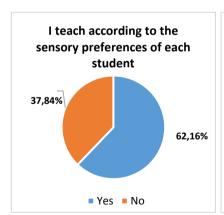


Fig. 72a. Group of Bulgarian respondents

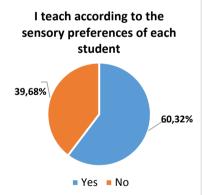


Fig. 72b. Group of Turkish respondents

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The charts show (figs. 71a, 71b, 72a and 72b.) that the respondents are not able to introduce learning styles to the sensory preferences of the children/students. In both groups these differences are observed. Explanatory models can be displayed in the direction of the routine of teaching and the insufficient knowledge of teaching styles that are adjusted to the sensory preferences of the children/students. Without favouring the sensory learning preferences of the children/ students, they also have variations like any other difference and the compliance of the teaching styles to them would enhance not only the success of the children/pupils, but also the processes of inclusion.

In a similar context, are the results regarding the assessment of knowledge of the children/students. Despite the opportunities for teachers to assess the mastered curriculum through a variety of products from the activities of the children/students (fig. 73a and 73b) a different assessment is used mainly for children/students with learning difficulties (fig. 74a and 74b) and not for all children/pupils. Inclusive education is for every child/student and evaluation through different products from the activity of the children / students should apply to everyone.

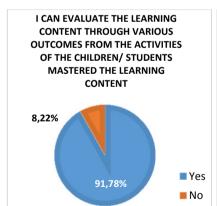


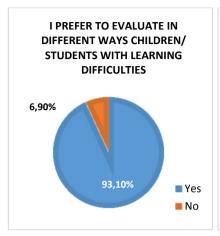
Fig. 73a. Group of Bulgarian respondents



Fig. 73b. Group of Turkish respondents

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I PREFER TO EVALUATE IN **DIFFERENT WAYS CHILDREN/** STUDENTS WITH LEARNING **DIFFICULTIES** 6.45% 93.55% Yes ■ No

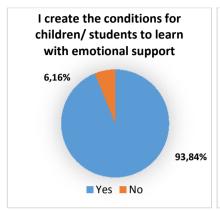
Fig. 74a. Group of Bulgarian respondents

Fig. 74b. Group of Turkish respondents

The results show that the respondents appreciate the importance of the positive learning environment and create the conditions for the children/students to learn with emotional support (fig. 75a and 75b, fig. 76a and 76b) and to have tolerant relations in class. Tolerance and warm connections between teachers and pupils, between the pupils, as well as supporting positive interactions in the learning environment increase pupils' enjoyment of learning, enables them to comfortable in the classroom and to develop autonomy independence according to their potential.

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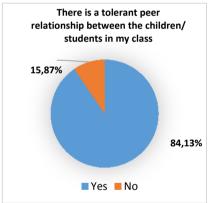
I create the conditions for children/ students to learn with emotional support

15,87%

84,13%

Fig. 75a. Group of Bulgarian respondents

Fig. 75b. Group of Turkish respondents



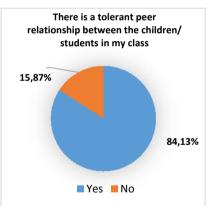


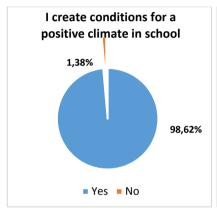
Fig. 76a. Group of Bulgarian respondents

Fig. 76b. Group of Turkish respondents

Respondents appreciate their contribution to creating a positive learning environment, including taking into account the role of clear teaching rules. The rules in the classroom are important because they

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create a routine, they create the conditions for discipline, and often children / students with SEN believe that there are no rules for them. However, when children / students participate in the creation of rules and they themselves set the restrictions on their non-compliance, they follow the rules much more strictly. In this context, the positive environment and clear learning rules pave the way for effective teaching and easy and emotional positive learning.



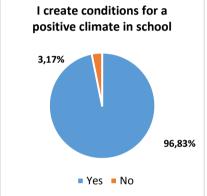


Fig. 77a. Group of Bulgarian respondents

Fig. 77b. Group of Turkish respondents

The inclusive teacher can build an inclusive positive classroom by constantly promoting self-reflective analysis, critical thinking skills, and by eliminating stereotypes and negative stigmas and social norms.

If the child feels presented, accepted and appreciated in his or her class and in his/her classroom, he / she will respond to the challenges of the learning process with more peace of mind, and from there the overall atmosphere will remain calm, prosperous and supportive. If the school atmosphere, the psycho-climate, the spatial and the social environment create a sense of satisfaction, the achieved synergy on a physical, intellectual and emotional level for each person, then the children/pupils are in conditions of well-being. Well-

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being motivates development. The sense of well-being helps children / students and teachers to make sense of their actions, to gain confidence and to motivate their achievements. It is the sought after positive end of every undertaking in life.



There are clear training rules established in the classroom 7.94 % 92.06% ■ Yes ■ No

Fig. 78a. Group of Bulgarian respondents

Fig. 78b. Group of Turkish respondents

The classroom rules include rules for working with children / students with learning disabilities (fig. 78a and fig. 78b). The differences in the answers of the two groups of respondents are minimal, but for both groups the requirement for compliance with the rules in the classroom is evident. Classroom rules have a socializing effect and generally relate to the complex processes of inclusion.

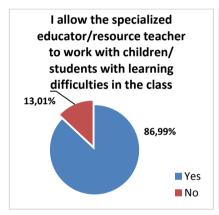
Boundaries in the school are recognized, understood and expressed through rules. The rules are not just for primary school, they apply to the whole period of schooling. When the rules for the children/pupils are clear, they regulate the behaviour and communication. When violated the consequences are clear. Rules work best when pupils have a say in structuring them and have a choice – whether they are aware of, understand and respected or not, whether they can bear the consequences or not. The rules in the

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inclusive classroom have their own peculiarities: correct / incorrect / formulated, specificity / academic, social, procedural, socio-cultural, personal, etc. /, quantity / general and detailed / related to the formation of responsibility, confidence, teamwork, supporting mental functioning and development / further activate executive functions /.

Survey participants note that they almost as a rule allow the resource teacher to work with children/pupils with SEN in the classroom. When a resource teacher works with a child/student in the classroom, then the child / pupil participates with all children / students in his/her group / class in the learning process and in the processes of social and educational inclusion are realized more imperceptibly and more adequately.



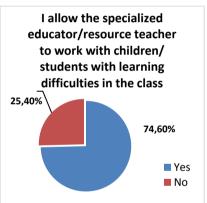


Fig. 79a. Group of Bulgarian respondents

Fig. 79b. Group of Turkish respondents

Similarly, the respondents noted that parents, as a rule, become involved as active participants in the educational process (fig. 80a and 80b).

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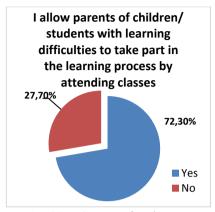


Fig. 80a. Group of Bulgarian respondents

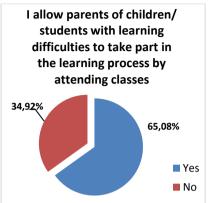


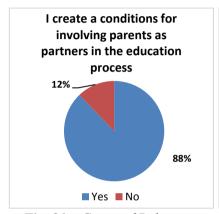
Fig. 80b. Group of Turkish respondents

Comparatively, it can be seen that the respondents from both groups trust parents more as participants in the educational process than resource teachers for working with children / students with learning difficulties. This fact can be explained by the double psychological effect of parental involvement in the learning process in the classroom. On the one hand, the family member is calm for the child / student's education in the classroom, he sees and can compare his achievements, behaviour and social acceptance with the other pupils. On the other hand, teachers / including the resource teacher / can use teaching styles according to the child's / student's potential more effectively, because parents are able to respond in extreme situations according to the peculiarities of the disability, the reason for the special needs, and the personal characteristics of the child adequate and in time so the learning process in the classroom is not disturbed.

Involving parents in the learning process enables them to observe it through the teaching styles of the teacher and through the learning styles of the whole group / class and the styles of their own child. Personal impressions are stronger and more categorical for evaluating the learning environment than any given fact and/or

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presentation made by teachers. In this context, the study participants noted that they create the conditions for parents' involvement in the educational process – not only in the scholastic process but also in activities related to education and socialization (fig. 81a and 81b).



I create a conditions for involving parents as partners in the education process

27%

Yes No

Fig. 81a. Group of Bulgarian respondents

Fig. 81b. Group of Turkish respondents

In this regard, respondents' results show minimal levels of parenting problems (fig. 79). The involvement of the parents in the educational process as equal partners engages them not only with attendance but also with responsibilities and obligations, with empathy and with prosocial behaviour. These patterns of social inclusion tend to become a sustainable model of behaviour for school communities on the parents part.

At the same time, involving the parents in the educational process, although in partner positions, does not take away the teacher's leadership position in the classroom. The parents are responsible for their children. The parents make the most important decisions about health, the choice of school, even the teacher (s) and the well-being of their children. But, the teacher is the leader in the classroom,

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regardless of the presence and involvement of the parents. The teacher manages:

- the teaching and learning styles of each child / student;
- the temporal and spatial organization of the classroom;
- pedagogical interactions with all school communities and with the family;
- the psycho-climate in the classroom;
- the formation and observance of the rules of training. behaviour in the day-to-day functioning of the class.

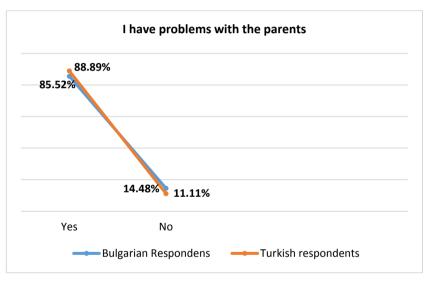


Fig. 82. Problems with the parents

The results of the surveyed teachers show that the leadership role of the teacher in the classroom is realized (fig. 83). The respondents from both groups answered affirmatively approximately three / quarters of the total number of statements: "In the classroom, I am the leader."

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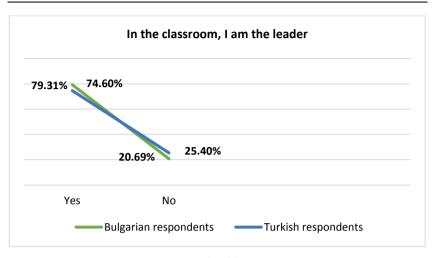


Fig. 83

Undoubtedly, like any profession, teaching is also related to stressful situations. The results that demonstrate such stressful patterns are derived from the circumstances in which the teaching context most often articulates complaints in society:

- work with children/students with learning difficulties (fig. 84)
- problems with formal school leaders and/or education administration (fig. 85)

The diagrams (fig. 84 and fig. 85) clearly show the answers of the respondents from both groups, the lack of problems in working with children/students with learning difficulties and problems with the school administration and/or the principal. It is obvious that the societal problems discussed above are a reflection of the information shared by the respondents – teachers. It is logical for teachers to share difficulties in school and outside school settings that they have in their day-to-day professional functioning but do not regard them as problems. They are likely to be seen as challenges of inclusive education that, despite the difficulties and emotional commitment, they cope with or at least attempt.

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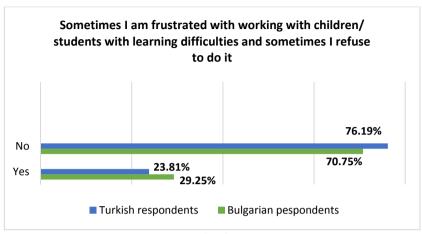


Fig. 84

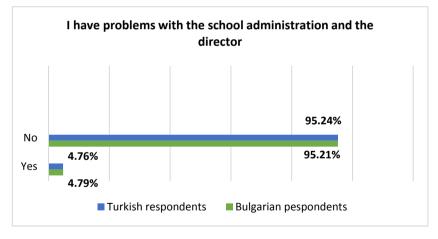


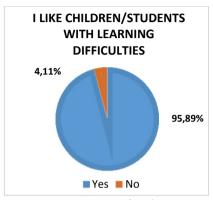
Fig. 85

The results show that the surveyed teachers like children / students with SEN (fig. 86a and fig. 86b), and the students like them

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(fig. 87a and fig. 87b), and one of the reasons for that is the presence of clear criteria for success (fig. 88a and fig. 88b).



**Fig. 86a.** Group of Bulgarian respondents

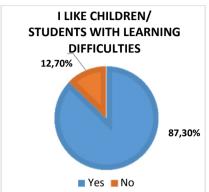


Fig. 86b. Group of Turkish respondents

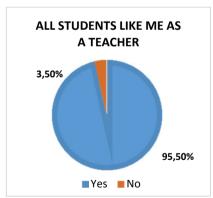
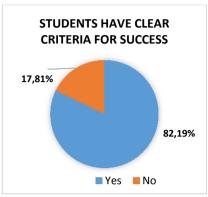


Fig. 87a. Group of Bulgarian respondents



Fig. 87b. Group of Turkish respondents

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STUDENTS HAVE CLEAR CRITERIA FOR SUCCESS

33,33%
66,67%

Fig. 88a. Group of Bulgarian respondents

Fig. 88b. Group of Turkish respondents

Very significant for the importance of the profession, for the responsibility, the professional enthusiasm and personal addiction to work are the reflected results in Fig. 89 and Fig. 90.

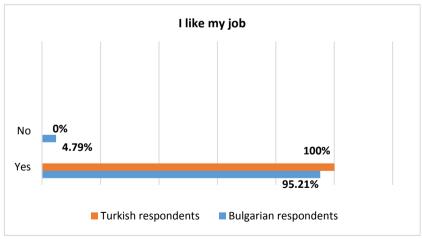


Fig. 89

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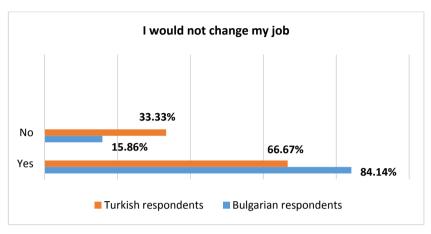


Fig. 90

Respondents do not approve the isolation of different children, even in the context of that only special educators will work with them, and this is evident from the results of the statement "Specialists need to work with different "children". The overall result of the responses of the two groups of respondents is reflected in fig. 91.

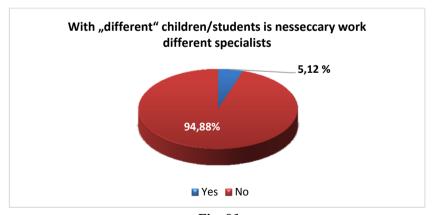
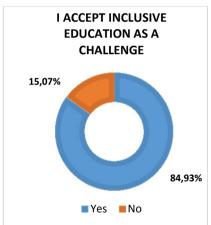


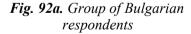
Fig. 91

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The interpretations of the results noted above point to basic interpretations of outcomes for learning styles in inclusive education. The respondents show the following results:

- accept inclusive education as a personal and professional challenge that motivates them for excellence (fig. 92a and 92b)
- note that educational inclusion is a possible mission because it takes actual account of its receiving in their classes (fig. 93a and 93b)
- the teacher is an ambassador for inclusive education (fig. 94a and 94b).





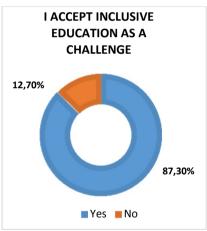
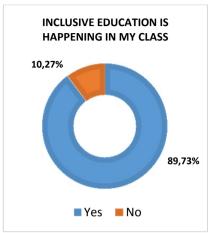


Fig. 92b. Group of Turkish respondents

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INCLUSIVE EDUCATION IS HAPPENING IN MY CLASS

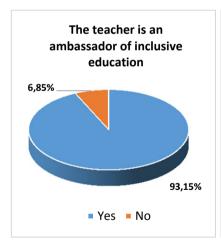
11,11%

88,89%

Yes No

Fig. 93a. Group Bulgarian respondents

Fig. 93b. Group Turkish respondents



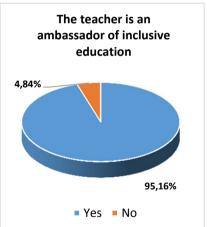


Fig. 94a. Group Bulgarian respondents

Fig. 94b. Group Turkish respondents

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The last three results for both groups of participants are not only significant for the work of the individual teacher in inclusive education, but they also underscore the need for a teacher who is the most effective and unique ambassador for inclusive education. The teacher as an ambassador for inclusive education can provide help and assist:

- other teachers to be able to work competently and effectively with different children/pupils, including children/pupils with learning difficulties.
- with the family context to parent their different students (including those with learning difficulties) as each child – with love and understanding.
- with the neighbourhood context to achieve social acceptance and social inclusion of children/pupils with learning difficulties
- to make society inclusive after adopting inclusive education.

The teacher as an ambassador of inclusive education is the leader in that aspect to ensure the general well-being of every child/pupil. General well-being in inclusive education manifests the opportunity for each child/pupil to unlock their potential, acquire new information and capabilities, as well as to experience subjective mental well-being in the cognitive, affective and emotional aspects of their lives. The cognitive component of school is brought to life and satisfaction as new information is mastered. Life satisfaction for children with SEN and their families is inevitably linked to education. The affective component of school is focused on the sense of happiness, the frequency of positive and negative experiences. The motivational component of school is related to motivation for work, career development and personal life.

Another significant leadership position of the teacher as an ambassador for inclusive education is to bring out the social construction of distinction to each child. Undoubtedly, the physical and physiological state and health, as well as mental health, influence the general well-being, but in the case of children with disabilities their self-determination is not focused on their condition as much as it

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is with adults with disabilities. The child/pupil defines themselves as a child/ student rather than as a child/pupil with disability, and in the process of self-determination lies the supporting role of the teacher as an ambassador of inclusive education. The conceptual structuring in question is not only marked in the context of the knowledge and tradition of self-determination of people with disabilities, but it is much more important that it reflects the effect of distinction on the attitude in regards to children/ students with disabilities.

In this context, aspects of the teacher's ambassadorial role for inclusive education related to changing educational environments (infrastructure, teacher attitudes and additional qualifications) may be discussed. Individual activities and working with children/students with learning difficulties require implementation of:

- an accessible architectural environment;
- resources;
- changing (supplementing) the qualification of teaching staff and different (or new) professional experience;
- integrating new subject about children/pupils with disabilities in the training of future teachers;
- the introduction of new general subjects in which common and citizen positions are displayed for children/ students with disabilities;

Indeed, such models are used to overcome stereotypes and prejudice, but in the case of inept school management, paternalistic leniency toward children/students with disabilities may be provoked.

The innovative aspects of the requirements for new competences and qualifications for the leadership role of the teacher as an ambassador for inclusive education need to be addressed not only to children/pupils with difficulties and their family context, but also to classmates, teachers, neighbours, etc., with whom all children/pupils interact, for the whole ecological system (in correlation with Bronfenbrenner theory).

It is in these new understandings and attitudes towards children/pupils with disabilities that the idea of 'inclusion' and the

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general well-being of these children children/ students lies. To change not only children / students, but the society in which they live as well. A continuous change to its psychology, culture and politics in order to respond in a humane and civilized manner to the needs of children/pupils with disabilities.

## Styles of learning used by the participants

The following learning styled of the participants can be constructed based on interpretations of the results from the study:

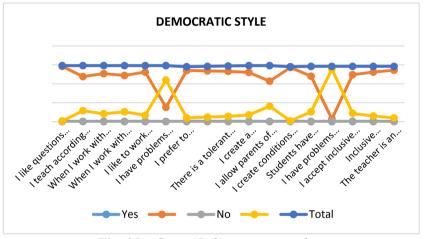


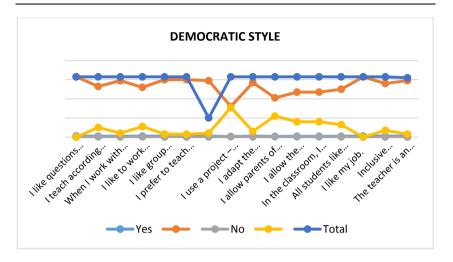
Fig. 95a. Group Bulgarian respondents

On the diagram shown on fig. 95a we can observe that the democratic style of the Bulgarian respondents is violated in the presence of problems with the school administration and/or principal, and with problems in the work with children/pupils with learning difficulties

There are also some difficulties in the implementation of the democratic style when involving parents in the educational process.

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Фиг. 95b. Group Turkish respondents

The democratic style of the Turkish participants is mostly violated when using project based educational methods children/pupils with learning difficulties, as well as when involving parents in the educational process.

In conclusion, it may be noted that the teacher as an ambassador for inclusive education is tasked with working with parents regarding their participation in the classroom and introducing project-based educational approaches for all children/students, which can support the teaching and assessment of children/pupils with learning difficulties.

The results obtained regarding the democratic style of learning are interesting. The strongest influence is the claim related to the use of a project-oriented approach. Obviously, the participants do not use this approach permanently and to its full extent, but only some of its elements depending on the learning situations. Parents of children/ students in the educational process as partners also have an adverse effect.

Obviously, the participants agreed that parental involvement limits their children's independence and activity. That is where the

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claim arises that the teacher is the leader in the classroom for this style of teaching is logical, because the democratic style that they use provides guidance and encouragement. In a democratic style of education, the child/ student is an equal participant in the various activities in the school and family community. The democratic style of education stimulates the pupils 'self-decision making, and also advises and encourages their actions.

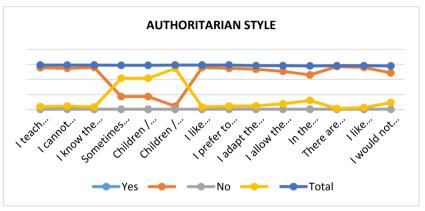


Fig. 96a. Group Bulgarian respondents

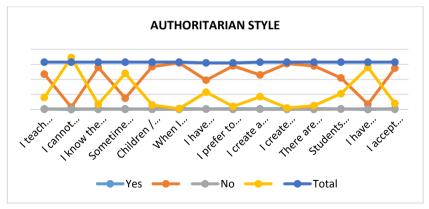


Fig. 96b. Group Turkish respondents

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Authoritarian style puts the child/ student as the object of pedagogical influence. This style of teaching is scholastic-centered and contradicts the realization of inclusive education because it neglects the pupil's involvement as a person and puts him in the periphery of learning.

When using the authoritarian teaching style, the teacher does not usually receive professional satisfaction, but simply boosts his own ego; His main methods of work are direct instructions and orders, which reduce and do not stimulate the independence and activity of children/students in the classroom.

The diagram shows the manifestation of problems, frustration and stress patterns, mainly when working with pupils with learning difficulties and communicating with their parents. These circumstances are expected of an authoritarian style because they require flexible decisions with a high level of respect, trust and respect for the differences between pupils with learning disabilities and their parents. Less developed situation that prove to be an obstacle for the authoritarian style are teaching according to the interests of pupils, involving parents as partners in the educational process, and the requirement for clear strategies to work with children/pupils with learning disabilities. The impact of these authoritarian-style items is no surprise. This style does not allow for the creativity and flexibility of the teacher. A logical result is shown when accepting inclusive education not just as a challenge, but a challenge with resistance and a reluctance to accept and overcome. In this context, the authoritarian teaching style of the teacher is incompatible with the processes of inclusive education.



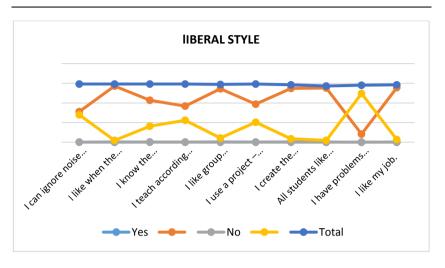


Fig. 97a. Group Bulgarian respondents

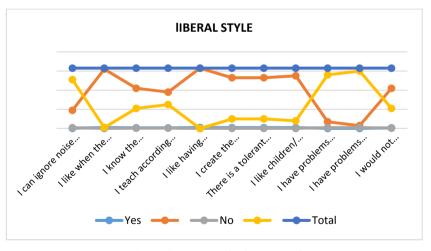


Fig. 97b. Group Turkish respondents

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In a liberal style, pupils take the initiative and the teacher tries to avoid making independent decisions. The teacher is not the leader of the educational process and the academic achievement is usually not high. The chart shows that the biggest resistance to the liberal style is the issue associated with problems with the school administration and the headmaster. It is logical for a teacher who leaves the initiative and activity to his pupils to disobey the rules and regulations, and at low academic achievement of the students to have problems with the principal and the school administration. In a similar way, a liberal-style teacher is expected and usually has problems with parents.

The proactive aspects of developing a positive inclusive classroom require attention to social attitudes, the implementation of curriculum and teaching content not only to promote academic learning but also social and emotional learning, to motivate teachers to be effective with all students, and enhance the self-motivation of pupils to learn and teachers to teach.

With that in mind, every inclusive teacher who is the creator and processor of inclusive education needs to have competencies in the aspects of:

- specific knowledge of: informal screening procedures; equal acceptance of children/students; resources and requirements for the use and maintenance of assistive devices and technologies; knowledge of behavioural management techniques and skills to modify the that of children/ students with and without learning difficulties; effective communication and understanding of specific language systems, etc.
- acquiring skills for: preparing a class for inclusion and acceptance of children/students with disabilities; measuring the physical, psychological, emotional, social and academic needs of children/pupils and setting achievable goals; preparation in order to meet the needs of all children/students in the classroom; change and individual programming of learning, etc..; leadership skills in the classroom; establishing effective

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- parent-teacher relationships; take initiative for assistive devices and technologies and their use
- understanding and attitude(values and point of view) of: the complexity of education in the inclusive classroom; the regulatory aspects of teaching children/pupils with disabilities; different disabilities and the children/students with disabilities; the various occurrences of emotional and behavioural problems; giving notice to remarkable talents or abilities.

An inclusive education, which meets the interpretable factors, criteria and conditions is created with desire, enthusiasm and self-motivation when done through an inclusive classroom; it is maintained with the desire and support of all educational figure (where the teacher has the leading one), as well as removed social stereotypes and prejudice, and an innovative and creative attitude towards children/pupils with learning difficulties.

#### Conclusion

The symbiosis between the teaching styles of the teacher and the learning styles of the pupil with learning difficulties articulates the application of the universal learning design, the instructional design, the design of the individual curriculum, the inclusive design for work with the family and the community, the inclusive classroom, and the plan to apply the developed designs to the relevant environmental contexts.

The teacher as a leading role in positive inclusive education can trace a favourable perspective for each child/pupil by effectively applying the psychological and pedagogical programs that they have mastered in the course of their qualification and additional experience.

The inclusive teacher is more than a teacher. They determine the future of their pupils with both positivism and leadership skills involved in the formation of a confident personality in each child.

Every teacher is an inclusive teacher and they are the most significant ambassador of inclusive education because they seek, find





and achieve harmony in the differences between children / students, teachers and parents.

Every teacher is an inclusive teacher and they are the most significant ambassador of inclusive education because they detect and accept differences as a valuable resource.

Every teacher is an inclusive teacher and they are the most significant ambassador of inclusive education, because through inclusive education in knowledge and learning they generally trace the path of inclusive society.



#### **ANNEX 2**

### INCLUSIVE EDUCATION FROM DISTANCE IN THE CONTEXT OF COVID-19

# part of Intellectual Output 1:

## INCLUSIVE EDUCATION: CONCEPTION AND PRINCIPLES, PRINCIPLES, BELIEFS AND ROLE OF THE INCLUSIVE EDUCATION AMBASSADORS

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## INCLUSIVE EDUCATION FROM DISTANCE IN THE CONTEXT OF COVID-19

#### Dora Levterova-Gadzhalova

#### Introduction

The COVID-19 pandemic restructured the core of socio-cultural and socio-economic realities in everyday life and in education around the world. New challenges are posed to the daily functioning of the whole world, including the modern educational system. All over the world, education has moved to distance learning. Both of them involved in school systems: educational leaders, teachers, students, parents, trade unions, NGOs, and a significant part of the public are interested in distance education. Distance learning is discussed at all levels and by all participants in education systems, by all gravitating communities and politically engaged institutions and individuals. Even the family communities of 3rd and 4th rank (grandparents, etc.), the neighboring communities, the media discuss it and the term has entered into wide civic usability. According to Google search engine, when searching for the term "distance learning" in Bulgarian language, there appear the following results: 9,500,000 results (08.05.2020 - 0.36 sec.); 10 000 000 results (09.05.2020 20.00 h. -0.47 sec.), 14 000 000 results (10.05.2020 at 20.00 h - 0.33 sec.), 12 600 000 results (11.05.2020 20.00 h. - 0.35 sec.), 13 500 000 results (12.05.2020 20.00 h. – 0.38 sec.).

As can be seen from the data, the interest in distance learning has not only grown exponentially, but also tends to keep on increasing. Although in a short period of time only for 5 days, the data show that interest in distance learning fluctuates in a time interval of

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0.47 sec. up to 0.32 sec. For example, on 12.05.2020. 294,000,000 results (0.45 seconds) appear for education and 207,000,000 results (0.48 seconds) for training. Demand for distance education is visibly higher than demand for live education and training, although there are fewer resources for the former. Without proper discussion remains the question about the historical time of existence of the three concepts – concepts, because the results themselves speak eloquently in favor of distance learning.

According to Saba (2003), distance education can be defined as a complex, hierarchical, non-linear, dynamic, purposeful and self-organizing system of teaching and learning.

In the age of COVID-19, with physical distancing and social exclusion, online tools are used to conduct training to ensure high quality inclusive education and to strengthen tolerance and equity in education. The basic questions for interpretation of distance education are related not only to the specifics of distance learning, but also to the search for evidence that distance education provides conditions for effective implementation of the process of inclusive education, that distance education can function as inclusive education and derivation of concept of inclusive distance education.

#### Main body

For those who are biased and skeptical of the concepts of inclusive education, the issue will immediately provoke many claims of skepticism:

- inclusive education realized from distance is not possible and very difficult to achieve in normal conditions and without physical distance imposed by the COVID – 19 pandemic;
- there is a semantic contradiction in the terms "social isolation" and "inclusion in education";
- the popular and incorrect term 'social isolation' most clearly rejects inclusive education, which has dichotomous

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principles: for 'social acceptance', for the presence and synergistic participation of all students, the school and other communities, and so on.

However, for all those who accept the theoretical, philosophical and practically-applied conceptions and paradigms of inclusive education, its realization as distance education, is another global opportunity, which has not been developed on a large enough scale so far. Social isolation during a coronavirus pandemic is only in terms of:

- the body-kinesthetic scheme, as the handshake, hugging, touching even of one's own face are recommended to be eliminated:
- physical contacts are limited, with guidelines and restrictions for physically present models of distance communication;
- non-verbal aspects of communication have changed, especially in the field of proxemics (distance and place), social distance is the new norm and prohibits intimate and close distance communication outside the close family circle, even grandparents can not realize the most desired social contacts with grandchildren in proxemically standard models at intimate and close distances and with hugs;
- the pragmatics of communication has changed with the requirements, which are also self-requirements to master new virtual tools for communication, etc.

However, the conditions for effective communication are present in distance communication and distance education.

Moore, Dickson-Deane, Galyen & Chen (2014) note that there are different designs of e-learning, distance and online learning. After their study, they concluded that there was a "lack of consistency in terminology". A new model of education has emerged for the pedagogical, student and family community — education in an electronic environment. A similar opinion was expressed by Totkov, Denev (2006): "there are no generally accepted definitions of the terms 'e-learning' and 'distance learning'". The reason is the one-sided consideration of the problem depending on the professional



orientation of the respective authors (technological or humanitarian). "According to Keegan (1996), distance education includes concepts such as correspondence learning, home study, independent learning, external learning, distance instruction and distance teaching, although the terms are not synonymous.

But for the purposes of inclusive education, the term distance education is more appropriate, because in distance learning pedagogical interactions are realized between and within the school community, between school and family communities, between school and other communities interested in education (social partners, media, etc.) from distance – digitally, all components of the educational process are provided (basic goals and tasks, educational content, methods, organizational forms, means for training, education and socialization).

Digital mediation is realized through information technology or other means that provide interactive communication in the pedagogical interaction of teacher and students.

Many of the courses, programs, lessons and classes in distance education rely on the support of adults: teachers and parents. In this context, the reciprocal interaction of the teacher, student and parent communities in distance education is very important. "Distance education today plays a key role in establishing an emerging global information-oriented society" (UNESCO, 2004). In order not to enter into terminological discussions on IT issues, the broader term "e-learning" has been adopted in most countries, but citizenship has gained the term "distance learning".

Most definitions emphasize the goals, content and types of pedagogical interactions, but take into account the lack of planning, implementation and management of the learning process and organization of accompanying activities and resources. Moreover, there is a clear misunderstanding of distance learning in cases where teachers accept distance learning as traditional, but by teaching a lesson in front of the monitor with the same duration and with a very didactic style.

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Fortunately, these teachers are not many, and they quickly realized that distance learning has a different planning, organization and management. If the time for traditional training is 3-4 hours, then the distance learning is conducted in a time interval of 30-40 minutes, with pre-set topics, tasks or questions, with pedagogical interactions with a lot of interactivity. In this aspect, distance learning can involve students for whom the lessons are very long and fail to concentrate, retain their interest and realize motivation to learn or succeed throughout the school day in traditional education.

Distance learning can overcome the shortage of teachers, provide access to education for all students and can be implemented in models suitable for all students. In this context, a synergy of distance and inclusive education can be noted, although rather distance inclusive education is a component of inclusive education similar to traditional inclusive education.

There are two main models for organizing, conducting and managing the learning process, conditionally called traditional / conventional, closed / and open learning. Open learning is realized in different forms: flexible, resource-based, continuous, distant. Along with distance learning, the terms online learning, e-learning, e-education are often used. Final theoretical as well as a practical application discusses U-Learning (ubiquitous learning).

Weiser, M. (1993), introduced the terms "ubiquitous computing" and "ubiquitous learning" in the late 1980s, which refers to the process of seamlessly integrating computers into the physical world. According to the specialist, technology fits into people's daily lives, and its widespread use leads to their presence in the background, as a background and as an accepted necessity. Ubiquitous computing includes personal computers and computer technology embedded in microprocessors, mobile phones, digital cameras and other devices. The ubiquitous computing process creates many relationships between a computer and a person. In the evolving ubiquitous age of digitalization, a connection is being made with the concept of learning. Each student carries out pedagogical, but also technical and

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social interactions with other people, both from the school community and outside it, and with built-in devices. In U-learning or in the ubiquitous classroom, students move around u-space and interact with various devices and other social partners. This invisibility of computer technology in all aspects of life, Weiser (1993) refers to as "quiet technology". No fantasy or futuristic thoughts. Technologies such as telephone, television, computers, smartphones, Internet, mobile phones, smart devices for controlling household appliances, etc. have been implemented in people's lives.

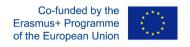
The future belongs to "smart" systems, "smart" institutions, "smart" cities, and so on. According to Weiser (1993), ubiquitous technology in education is the future of education. In fact, this view turned out to be prophetic and was demonstrated during the COVOD-19 pandemic. The ubiquitous learning environment that Weiser (1993) talks about, in which students are entirely in the learning process, is realized through mobile phones, tablets, television, computers, etc. (everywhere), in learning and in the environment with or without parents (depending on the age of the students and their educational needs). Ubiquitous learning actually brings about effective and inclusive education.

Indeed, there is a way to get to the final idea of Weiser (1993), in which education will happen all around the student, even if the student does not realize that they are in the process of learning, they just have to be present. but may not even be aware of the learning process. The output is present in the embedded objects and students do not have to do anything to learn. They just have to be there. Again, there is a resemblance to inclusive education, which requires the presence and participation of the student in the learning environment.

Ten years later, Jones, V. & Jo, J. (2004), analyzed the adaptation of the educational environment in the direction of ubiquitous learning environment (Ubiquitous Learning environment – ULE). They found that with built-in microprocessors in objects or devices and the use of wireless and mobile technology, educational functionality became easy and accessible. The ubiquitous learning environment (ULE) can provide

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the devices and incentives for easy promotion of student learning, without requiring the active attention of the student. The authors also provide interpretations of the advantages of the attitude towards two models of a ubiquitous learning environment with one name "many to one". A "many-to-one" model notes the possibility of a ubiquitous learning environment (ULE) to be implemented by many devices and to serve an unlimited number of people at once. In the other many-to-one model, an ubiquitous learning environment exists for each of the students in the specific school environment. In fact, the principles of inclusive education are quite similar for students in its focus groups and for all students. In distance learning, in the ubiquitous learning environment are included all students who are enrolled in Bulgarian schools. In this sense, distance learning is inclusive, because it, like inclusive education, is for every student. At the same time, in distance learning (as well as in inclusive) there are focus groups for inclusion. The 4 focus groups of inclusive education can include students with special educational needs; at risk; with gifts and talents and with chronic or severe diseases.

The ubiquitous learning environment in both many-to-one models creates opportunities to educate all students at the same time, as well as students who are different in an individual but inclusive way.

In a similar aspect, Casey, D. (2005) derives the famous formula: U-Learning = E-Learning + M-Learning, because every student, every teacher and every parent is involved in learning according to the devices they have, the availability and speed of Internet access and their motivation to learn, teach and support.

The inclusion of all is tolerance for education, i.e. the correlation with inclusive education is visible again. Here, however, the question of fairness to progress, which is an indispensable condition for inclusive education, arises. Casey, D. (2005) seems to know the principles and paradigms of inclusive education that can be applied to the proposed learning environments, the general architecture and the expansion of the existing e-learning environment

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in order to form an operational learning environment (Walkabout u-Learning).

Undoubtedly, so far are derived only the similarities between distance and ubiquitous education and inclusive education, which all depend on technological solutions. Inclusive education refers to all students, for all students to be attending school, receiving access to quality education and support both for their education and for their personal development and life functioning.

For some students, for example students in the focus groups of inclusive education:

- with special educational needs;
- with chronic or severe diseases:
- at risk;
- with outstanding gifts

barriers may arise in the education system that distance and ubiquitous education cannot solve. Barriers in the education system can appear to any student.

The most common barriers include problems related to social communication, social acceptance and the qualification of pedagogical specialists:

- negative attitudes or stereotypes towards "different" students;
- ignorance of the typological and individual features of the individual focus groups and/or students;
- ignorance or non-acceptance of students' strengths;
- didactic or inappropriate teaching style;
- conservative curriculum or rigidity in the implementation of the curriculum by the teacher;
- ignorance of students' learning style;
- non-acceptance or insufficient experience in co-teaching with a resource teacher for students with special educational needs, especially in a distance format;
- insufficient or inappropriate communication with "different" students:

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- insufficient provision of accessible, safe and comfortable environment in the virtual classrooms;
- ignorance of the individual aspects of resource support at a distance level for example, adaptation of learning content in the virtual classroom;
- transfer of responsibility for the achievements of students with special educational achievements to resource teachers;
- non-admission or non-acceptance of the participation of the parents as partners in the educational process;
- insufficient training of pedagogical specialists to work with special needs students;
- ignorance of the possibilities of students with special educational needs or of students at risk for inclusion in distance learning, etc.

For example, in most cases, for students with special educational needs, inclusion in a virtual classroom is difficult to achieve. Each student with special educational needs has specific manifestations of cognitive, emotional and social development and unpredictable behavior in the visual and auditory perception of the teacher and classmates on the monitor, unpredictable emotional reactions, etc. These characteristics of students with special educational needs often lead to the transfer of the teacher's responsibility for learning to the responsibility of the resource teacher only. The rules of conduct in the virtual classroom are not clearly defined and characterized, and often students with special educational needs cannot understand them, both in classroom and in individual learning.

For students with special educational needs, the transition from one type of education to another type of education is as difficult as the transition from one activity to another activity in everyday life. It is extremely difficult to create a new routine and move from one routine to another

Often, students with special educational needs do not take the class seriously enough because they have a routine of using

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computers, tablets and phones for entertainment purposes only. In the interest of correctness, after a certain period of time (two – three weeks), students with special educational needs stop expressing desires for games when they meet the teachers on Skype, Viber, or in the virtual classroom and manage to accept training in the new remote format. The adoption of distance learning is especially effective when the support from parents and the family is strong and when classmates also participate in the support for virtual learning.

Often, students with special educational needs have a comorbidity of possessive impairment with anxiety disorders or rapidly increased anxiety, aggression, and self-aggression. On the other hand, for each of the students with special educational needs there is a structured individual curriculum or personal curriculum, and teachers cannot always adapt a virtual curriculum for a short time – sometimes in one night or in a day, so that the respective lesson corresponds both to the educational goals and the student with special educational needs.

For some students with special educational needs, as well as for a large number of students at risk, barriers can be removed in terms of lack of distance learning devices, internet connectivity or lack of motivation to learn, even if there are opportunities for m-learning (mobile learning). A significant part of the target groups and their family context do not accept learning as a valuable resource and reject even the available opportunities for distance learning via Viber, WhatsApp or by using a mobile phone to enter conferences. For the two noted focus groups, although quite heterogeneous, distance and universal education is difficult to achieve in a coronavirus pandemic without additional activities to increase the learning motivation of both students and their family context. Although distance and universal education are still in development and do provide correct and variable solutions with combinations of architecture, structure and opportunities, the problems with motivation to learn remain insufficiently solved.

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There are high expectations towards the future development of distance and universal education. Such with clearly formulated rules, ability to increase the motivation for learning of students with special educational needs and students at risk, and increase the synergy of traditional and distance learning in unrestricted conditions due to a pandemic.

Teachers and parents of students with special educational needs or students at risk with an everyday situation of academic, behavioral and social survival in distance or universal education, teachers and parents of students from the focus groups of inclusive education, as well as all students who accept learning as a value, master new digital competencies, achieve heroic achievements, make incredible efforts and manage to learn with their children and support the process of training and inclusive education.

Distance inclusive education emerges as a terminology and as a content in the context of the COVID-19 pandemic. Understanding distance inclusive education is related to the use of digital technologies for the purposes of the educational process. In this context, a specific aspect of inclusive education is realized from a distance – distance inclusive education. Distance inclusive education can be realized in a digital model or in the traditional paper model, in three options:

- synchronous, presented as digital education, which follows the use of electronic environment: computer, laptop, mobile phone, tablet, smartphone, etc. electronic devices, as well as on various virtual platforms for training and communication, TV channels with educational programs, mobile applications, educational games, social networks, etc.;
- asynchronously, which follows the use in paper format of textbooks, teacher's instructions, materials (most often worksheets, flash cards), received by students solving the tasks of the worksheets and returning them to the teachers. It relies on the independent work of students, their responsibility, their motivation to learn and

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hybrid – combined between the first two options.

In the three options, inclusive education is realized effectively by distance only if it follows the characteristics for accessibility and quality of inclusive education for each student.

Many criticisms have emerged regarding asynchronous learning, almost as unfulfilled distance education, especially with regard to students with special educational needs and students at risk. But asynchronous learning is not the opposite of synchronous learning, nor is asynchronous learning less effective. On the contrary, asynchronous learning requires more resources and more time to prepare the lesson, resources, materials such as worksheets and flashcards, etc., as well as a more complex organization to ensure students have access to them in the COVID – 19 pandemic. As noted by (Birnbaum, 2001), asynchronous distance learning "provides a multimodal instruction based on a web page that can be viewed by the student at any time. This type of distance learning allows students to have access to materials, lectures, instructions, etc. from anywhere and at any time, unlike synchronous distance learning."

Teachers, resource teachers, and all pedagogical specialists who know the discussed features, very flexibly and quickly orient themselves to the asynchronous learning of students with special educational needs and students at risk.

Distance education is realized in the Internet network and through lessons on TV channels. In Bulgaria, these are the TV channels BNT 2, BNT 4, "Bulgaria On Air", which provide their air time for educational programs and specifically for teaching lessons in individual subjects. Teachers enter a completely new role of TV presenters and train not only students but also all stakeholders: colleagues – teachers, experts, parents, and casual viewers of these TV channels. Entering this situation, teachers display publicity of their professional activity everywhere. There is hardly any other profession that brings its professional activities to such a wide public display in the context of the COVID – 19 pandemic.





E-learning has become ubiquitous since Google and Microsoft allowed free access to their education platforms.

In Bulgaria, the Ministry of Education has established an official partnership with Microsoft Office 365 Teams with a free ProPlus license (Office 365 Education E1 plan) for use by pupils, students, teachers and university professors and has created accounts for all pupils and teachers. Moreover, it created sites for registration in the platform and for training with special instructions for using the platform. New videos are constantly appearing on YouTube and social networks, which freely provide instructions and directions on how to work on different platforms.

Each school made a free choice of platform on which to conduct training. The fact is that before e-learning became an absolute necessity in the state of emergency, many schools had platforms in place, teachers had been trained and were ready for distance learning. Cloud technologies were not an exotic model of education in the context of the COVID-19 pandemic, as many schools have previously implemented cloud education projects. Many schools before the pandemic used a hybrid model of education in an electronic environment: real education in schools and G-suite for education. Under the necessary circumstances for education in an electronic environment, the Ministry of Education and school principals make their choice for learning platforms. Many trainings for teachers have been made on the selected platforms by Google, Microsoft, Shkolo. Education in an electronic environment is also supported by the opening of many libraries, museums, community centers, etc. with free access, which can be used by teachers, students and parents for both educational and entertainment purposes.

Due to the need for WI-FI for the actual implementation of virtual technologies in the educational process, Internet connectivity has increased in some villages and in regions where this problem was present. Electronic devices are provided for students, many of whom are in the focus groups of inclusive education.





A National Electronic Library has been created, in which each teacher can upload their lesson, their presentation and good practices in the system. Resources are freely available. Any interested teacher, student or parent can use the resources for their activities and can make a comparison of their own educational efforts and achievements, position and progress.

Management and administrative models of distance education have been implemented. This different side of distance education (management and administration) also has its own explanatory models. Holmberg B. (2003) developed a theory of distance learning by emphasizing three constructs: teaching, learning, and administration. In summary, theoretical interpretations of distance education can be summarized in three aspects of education, which:

- serves students in case of impossibility or unwillingness for physical face-to-face training;
- uses, guides and maintains through pre-prepared teaching materials and mediated communication between students and the school responsible for developing courses, instructive student-teacher interactions, consulting and administering the teaching and learning process including student-student interaction arrangements. Distance education is open to behavioral, cognitive, constructivist and other ways of learning. It can inspire the use of metacognitive approaches;
- focuses on personal relationships between stakeholders, studying student satisfaction and empathy, and school management. Sense of empathy and belonging encourage students' motivation to learn and have a positive effect on learning. Positive emotional states are encouraged by clear instructions; tasks; problem-oriented solutions; presentations; discussions; friendly mediation and interaction between students, teachers, school management; and by liberal organizational and administrative structures and processes. Factors that support the learning process include short

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deadlines for assignments and other communications between students and the school, an appropriate frequency of homework assignments, and ongoing counseling by teachers and counselors (Holmberg, 2003).

The three aspects are also specific, applicable and required for inclusive education.

Distance inclusive education is aimed at all students and hopes to:

- provide access to training and learning;
- provide opportunities for participation of each student, teacher and parent;
- removes barriers related to differences among students;
- individualize the education according to the needs of each student.

So far, any teacher would have noted that these are principles of inclusive education, and he will be correct. Therefore, the model of distance inclusive education is derived, because distance education is inclusive, and inclusive education can be realized remotely.

This finding is also evident in the various theories of distance education, which can be categorized into the following groups (according to Keegan, 1996; Saba, 2003).

theories of autonomy and independence that put the student in the focus of the educational system, and the system itself needs to meet ten conditions. These conditions are related to the capacity and responsibility to operate from the different roles of students and teachers; more options for choosing courses, format, methodology; mixing and efficiency of virtual platforms; opportunities for adaptation to the individual differences of the students; assessing students by overcoming barriers to the place, degree, methods, or frequency of student participation; providing opportunities for students to start, stop and realize learning is convenient from their own place. Requirements are set out for each teaching and learning scenario, which include teacher, student (s), communication system and information to be

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- learned, the student takes responsibility for the pace of his/her own progress. (Wedemeyer, 1981; Hanson et al, 1997; Keegan, 1996; Saba, 2003; Holmberg, 2003).
- a theory of industrialization that emphasizes the organization and functioning of the environment and the impact of structural problems such as the industrialization of teaching and learning processes (Peters, 1994; Anderson, & Garrison, 1988; Keegan, 1996; Saba, 2003). interaction and communication theories that emphasize the constructs of interaction and communication as important factors in distance education (Keegan, 1996; Daniel, 1998; Holmberg, 2003; Stewart, Hong, & Strudler, 2004).

In the noted theories it is evident that all mentioned have aspects of positivising the process of inclusive education, although nowhere is the concept of inclusive education mentioned, and it appears not to be necessary.

As Saba (2003) notes, in order for distance learning to be considered an educational paradigm, distance education theories must provide explanations for all education, not just explanations of when student and teacher are separated in time and space.

To continue on this line of thinking, distance education should explain how technology supports teaching and learning approaches, and digital tools / computer and mobile technologies and applications, the capabilities of the Learning and Entertainment Network / provide opportunities for all participants in the educational process to establish social contacts and effective communication, to implement joint activities, to cooperate in learning and in activities that are related to their preferences, experiences and interests.

The web or cyberspace provides opportunities for distance inclusive education. Provides a general learning environment that is preferred by students. Indeed, "placement in a common learning environment has a positive effect on changing public attitudes, but does not automatically lead to student inclusion. Social transformation



is necessary, but it should not happen at the expense of the individual student (Sivakova, 2012).

In this context, there is a long way to go to achieve fully effective distance inclusive education. But, the beginning has been set and the first sure steps have been taken. The first benefits of inclusive distance education can also be noted. The following aspects can be noted as basics for the benefits of inclusive education in distance format:

- realized by and for all members of the school community;
- learning opportunities are provided anywhere and anytime;
- it is useful for all students:
- new social networks, connections and activities are maintained and created;
- new models for academic, behavioral and social competencies are created:
- Preserves and even increases access to learning content and its interpretation in a wider community context: school and family communities, with more active involvement of the parent community, neighborhood communities, social partner communities, NGO communities, state and community communities of local government, etc.;
- Creates new digital resources and repositories, with opportunities for active participation of users, ie. each user has the opportunity to upload their resource on the respective platform (usually with access allowed), and not just read or download content. This actually encourages the active participation and success of every student, parent and teacher in education, which already has the characteristics of inclusive education.
- Assessment of the school achievements of the students by both the teacher and the classmates, but also by the parents;
- Change and improve the creation of digital competencies of all participants in distance inclusive education;

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- Opportunities are created and used in a common learning environment for:
  - formation of new professional competencies of teachers and pedagogical specialists regarding the methods, means and styles of teaching;
  - personal development of students through the use of digital tools and instruments;
  - formation of competencies of parents and the family community for parenting through and with the use of digitalization;
- Increasing the effective models of communication and cooperation / individually and in groups / between students, teachers and parents in video conferences, online chat rooms, online discussion forums and groups on social networks, which leads to the creation of a new inclusive community and enrichment of the inclusive school community;
- Creating new Internet communities based on interests, preferences and experience, which encourages communication, but also provokes the acceptance of differences without stereotypes and prejudices;
- Increasing the appreciation and acceptance of the diversity and individual differences of students, but also of teachers and educational leaders;
- Preparing students for their adult lives through distance learning opportunities for an inclusive society.
- "Creating new opportunities for students to self-assess and take control of their learning and access to their own personalized information, resources, tools and services;
- Facilitating more collaborative ways of learning, working, dialogue and sharing knowledge, of creating communities;
- Attracting authentic audiences in educational processes "(Becta, 2008).



#### Inclusive education from distance and the Web

Inclusive education in distance format, during the COVID-19 pandemic, is already emerging from Web 2.0., associated mainly with active interactions and communication. With the active participation of teachers and pedagogical specialists working to implement the process of inclusive education, distance inclusive education is actively moving to Web 3.0. or to the semantic completion of the network. Many lessons, resources, materials, classroom work of teachers and students, independent work of students are already on the Web. For many of them there is free access in different virtual platforms or in different social networks. But, even for those materials and resources for which access is limited, they semantically fill the Web.

The transition to Web 4.0 is also underway. The network needed to adapt to its mobile environment. Web 4.0 connects all devices in the real and virtual world in real time and during training, and during activities of interest, preference and experience.

There is even a transition to Web 5.0. – Open, connected and intelligent Web = Emotional network. Web 5.0 presents the emotional interaction between people and technology. By engaging in virtual classrooms, video conferencing or conference calls and discussions, the emotional network is enriched and developed with facial images of users with their emotional states and emotional reactions. Indeed, the qualities of devices, the resolutions of information transmission, even the speed of Internet connectivity are important. But, Web 5.0. develops and improves thanks to distance learning. The development of Web 1.0. to Web 5.0., and future generations of the Web increase the knowledge and practices of and about inclusive education and inclusive society.

According to Trichkov (2015): "Inclusive education will lead to a radical change in the way our society thinks of and accepts all people. Through the right policy, we can change stereotypes and social norms towards children with special educational needs.





When this goal is achieved, then it can be argued that society accepts the different and focuses on what people can do, not on what they cannot. "Distance inclusive education also has this goal, to show and develop opportunities, not to explain problems and inadequacies.

With distance learning, inclusive education is realized more and more actively in the dynamics of transition from partial to full inclusive education. Each teacher teaches differently or with changes in the learning environment through digital devices and in a virtual environment and this is an inclusive distance education. Every teacher on the Web teaches, sets learning and social tasks, and evaluates according to the abilities and potential of the individual student and the whole class, and this is an inclusive distance education.

Teachers of different generations are no longer in the comfort zone of a professional routine in front of the blackboard, but they are creating competencies for teaching in an electronic environment. Teachers are revolutionizing education. Teachers are the characters in an electronic environment, and not with chalk (very archaic), with a whiteboard marker (until recently relevant), but with a mouse and keyboard or with a touch signal. The quality requirements of distance learning are increasing, although no clear quality criteria have been introduced. The understanding and realization of distance learning is already accepted with a critical note, in which the teachers in the videoconferencing with the students make attempts to reproduce the lessons as in the classroom. This model exists, although individual school principals and parents set requirements for adapting teaching methods to the modern educational environment by including more interactive methods, with methods and techniques that motivate students to learn more, to think critically, to come up with original ideas and discover. One cannot and should not ignore the fact that more and more teachers:

 conduct with the students and they themselves participate in webinars for inclusive practices, inclusive environment and inclusive processes;

- use and master various models of distance education and through mastering more and more functionalities of the virtual platforms, they apply use those for realizing inclusive processes for all students;
- acquire and increase their professional competencies for inclusive education in electronic environment and at a distance;
- increase their professional qualification in the field of inclusive practices, inclusive cultures and inclusive policies, implemented and with a perspective for implementation in traditional and remote format.

#### STRATEGIES FOR DISTANCE INCLUSIVE EDUCATION

The general understanding of inclusive education is related to ensuring access to quality education for all students, to structuring an inclusive educational environment, to the presence and participation of all students in school, extracurricular activities, to respectfully and supportively meet the diverse needs of the students .

Extremely important aspects for the implementation of distance inclusive education are flexible educational policies and their permanent interpretation in accordance with changing social situations. As Tsokov (2017) notes: "Making the most optimal decisions in the development of educational policy is supported by a specific expert activity called" analysis of educational policy. This analysis is aimed at measuring, by determining the methods of success or failure of the educational changes undertaken. The analysis of education policy is closely related to measuring the impact of public policies in individual schools (organizational features, form and content of education, teacher qualification, etc.). In a similar aspect, Atanasova (2015) notes that "educational policy affirms the main priorities of the further development of education – quality, accessibility, variability of educational innovation. services.

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personality orientation, taking into account the individual needs and interests of each participant in the process of distance inclusive education.

Educational policies in the field of inclusion are related to good inclusive practices in education and the formation of an inclusive culture in traditional and virtual formats.

The support of the structuring of educational policies is also realized by the derivation of strategies for separate activities in the school and in the family communities.

Distance inclusive education sets out relatively specific strategies for teachers of different students, for all students and for their parents:

- providing access to quality inclusive distance education;
- recognition of the value of each student;
- providing opportunities for each student to participate in distance learning with their classmates, including providing access to the virtual classroom for students with special educational needs;
- providing a supportive virtual environment for each student;
- creating a positive virtual environment for each student;
- structuring clear rules for attendance and participation in distance inclusive learning;
- identifying and informing students and parents to assess the school achievements of all students;
- realization of general and additional support for personal development in virtual format;
- providing the possible components of the resource support in a digital environment;
- adaptation of the curriculum for presentation in distance learning;
- adapting the curriculum for students with special educational needs and for all students for virtual presentation;





- ensuring the active participation of all students, including different students in videoconferencing discussions, conversations and online discussions and online chats;
- minimizing and removing barriers to the education, upbringing and socialization of all students;
- participation training for work with separate tools and applications of the Network;
- conducting training or giving instructions for distance learning to all students;
- selection of appropriate formats and models of distance learning according to the capabilities and potential of students;
- selection of academic and social content aimed at accepting the differences among students as a valuable resource and advantage for life and professional functioning;
- increasing the participation of all students in school, extracurricular activities in a virtual format;
- creating student communities according to the interests of students, to increase school performance, to develop creative thinking and creative behavior;
- encouraging the interactions and the effective communication between the objects and the subjects in the educational system;
- creating and maintaining web-based learning and information resources, including in alternative formats for students with special educational needs and for all students;
- use of electronic resources and technological solutions and applications for creating interdisciplinary connections and relationships;
- creating high expectations for the achievements of all students in distance education;
- implementation of joint teaching for students with special educational needs with a resource teacher in distance learning;
- involving parents as partners in distance inclusive education, especially for students with special needs;





- seeking support from an educational mediator if necessary;
- structuring clear rules for attendance and participation in distance learning;
- involving all students in overcoming barriers to inclusive distance education;
- stimulating the creation and maintenance of friendships of students from the focus groups of inclusive education with their peers;
- formation of school identity and identity to their class for all students;
- bringing students into a formal but leadership roles from the focus groups of inclusive education in traditional and virtual environments;
- creating conditions for all students to only determine themselves in a virtual learning environment;
- creating conditions for peer-to-peer training and distance learning;
- stimulating the creation of virtual discussions, conversations and joint learning and joint activities (voluntary, humanitarian, etc.):
- output of technology-based instructions;
- application of educational models of the "inverted classroom" type;
- support from parents in understanding individual instructions and tasks for independent work of their children;
- discussion of the learning tasks for the day and reporting on the performance of the students by their parents;
- monitoring the participation and success of students by their parents;
- informing all students about the models of assessment of their school achievements and about the achieved school achievements;

- fair assessment of the efforts that all students make to master the knowledge and skills in the process of distance inclusive education;
- informing parents about the school achievements of their children in distance inclusive education;
- increasing the motivation for learning in distance inclusive education by teachers and parents;
- providing information to all students about the applications of knowledge in real life;
- creating good inclusive distance practices to overcome the chaos in the design and use of digital tools and applications for students with special educational needs;
- inclusion of virtual programs and applications in the individual educational programs and in the educational and therapeutic content for students with special educational needs;
- compliance with folk-psychological models and cultural peculiarities and the globalization of the content in the digital applications;
- rejection of inappropriate or unsuccessful design, which is too abstract in some applications or has too conventional and even boring images or is age-inappropriate;
- prevention of overdue performances by students with special educational needs and addiction to computer and/or mobile technologies;
- taking into account the fact that students with special educational needs may be hypersensitive to certain stimuli, movements of characters, individual virtual applications;
- creating an opportunity for realization of creative approaches by students with special educational needs;
- providing connectivity at the same convenient time for students with special educational needs;
- compliance with the spontaneity and situationality of the use of individual digital technologies and applications;

- application of the competence approach in inclusive education in distance format;
- showing responsibility for raising the qualification for distance inclusive education;
- support of all students for life functioning in an inclusive society in physically present and in virtual social situations and environment and others

#### Conclusion

Distance inclusive education is inclusive education from a distance. It is feasible. Undoubtedly there are problems to solve, but there are also amazingly creative solutions. According to the European Agency for Special Needs and Inclusive Education (2020): "Comprehensive policies that focus on equity and inclusion can improve the overall effectiveness of education systems and the individual outcomes of learners. Increasing the inclusion of the educational system can lead to success for all students."

In conclusion, it could be noted that the support for each student with inclusive education needs to be realized on many layers – individually / both with the individual child and with the individual student given his abilities, preferences and interests / and as a team / in a group, with the class., with communities /, during every school hour and every hour of everyday life, by every member of the family, school and other communities, traditionally and remotely. The processes of distance inclusive education inevitably lead to the creation of an inclusive society that uses and will use distance models for communication in the everyday, educational, professional and social space. Inclusive education can and is realized remotely. Distance inclusive education facilitates inclusive development, including in an electronic environment, which will be a goal in which a supportive inclusive and digital environment is so virtually present that it will not even need to be discussed

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#### **INTELLECTUAL OUTPUT 2**

## INCLUSIVE EDUCATION: SUPPORT BETWEEN SCHOOLS

# GUIDE "HOW TO STRENGTHEN THE IMPLEMENTATION OF THE INCLUSIVE EDUCATION AT MAINSTREAM SCHOOLS?"

#### Authors:

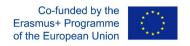
National Association of Professionals Working with People with Disabilities, Bulgaria

Maria Goranova Andrean Lazarov

PhoenixKM BVBA, Belgium

Karel Van Isacker

#### https://inclusive-ambassadors.eu



# HOW TO STRENGTHEN THE IMPLEMENTATION OF THE INCLUSIVE EDUCATION AT MAINSTREAM SCHOOLS?

# Maria Goranova, Andrean Lazarov, Karel Van Isacker

This handbook equips the inclusive education ambassadors with the necessarily knowledge, resources and strategies to enable them to mainstream and support the implementation of inclusive education practices.

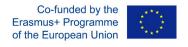
All participants in this training are encouraged to share their experiences and good practices, focusing on the abilities and strengths of learners with special educational needs (SEN). We aim to improve the existing system of individual support, by introducing good practices from other countries in order to reduce the risk of failure and to prevent potential students' drop out. We will prepare you how to create effective and motivating teaching materials, addressing the individual needs of each student, which we expect will lead to a greater success.

You may use the project and its intellectual outputs as a resource for long-term development of mainstream schools.

Benefits for those, who will use the handbook:

- They will increase their motivation to recognize and support students' individual needs.
- They will acquire new knowledge, skills and competences to implement inclusive educational strategies.
- They will be trained as ambassadors of inclusive education, who will continue their missionary work beyond the end of the project as a sustainability action.

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#### "Inclusive education is an investment for the future"

#### The inclusive education ambassadors should have:

- Specialised skills for active work in opening schools as institutions to inclusive education practices
- Knowledge and skills in managing diversity.
- Ability to suggest strategies to promote inclusive practices at mainstream schools
- Ability to create a learning community in which everyone staff, students, parents are involved and valued for their input-to promote the inclusion and integration of all students

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no matter what their origin, previous experience, abilities and social skills are.

• Ability to support teachers and schools staff in dealing with diversified groups of learners.

# Inclusive educator/teacher:<sup>8</sup> Profile of the inclusive ambassador



- 1. Ability to evaluate students 'different abilities to accept students' differences as a resource and a valuable learning asset.
- 2. Ability to provide support for all students teachers should have realistic expectations for the achievements of all students.
- 3. Ability to work in a team collaboration and teamwork are key approaches for all teachers.
- 4. Personal development teaching is also a learning process and teachers are responsible for learning throughout their lives.)<sup>9</sup>

-

<sup>&</sup>lt;sup>8</sup> Source: NARHU.

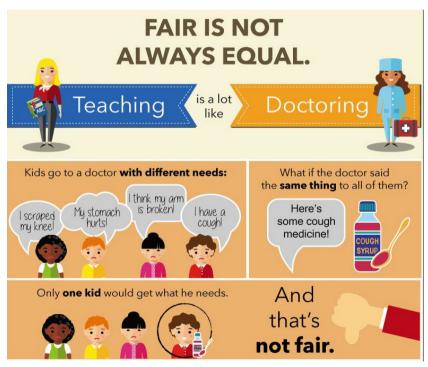
<sup>&</sup>lt;sup>9</sup> Source: European Agency for Special Needs and Inclusive Education (2012).

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#### "Education is an investment for the future"







# In the context of this project we understand the inclusive education as:

- Inclusive education does not refer to the way to educate the child with disadvantages (disabilities, learning difficulties, refugee, migrants etc.) but rather the way to educate every one.
- Inclusion means the process in which students with special needs are captivated into the mainstream education and it focuses to the inclusion of all students in the classroom.
- Ensuring inclusive and equitable education and promote lifelong learning opportunities for all will be the core aim of this proposal.10
- Inclusive education places demands on the environmental context of the children and the students.
- These requirements are related to the removal of negative attitudes and stereotypes about disabilities, special needs, differences in ethnicity, religion, gender and more.
- The requirements are to recognize the opportunities and achievements of all children and students.
- Inclusion and inclusive education are unthinkable without tolerance and justice. Justice and tolerance are not just concepts in social, philosophical, educational and other contexts. Justice and tolerance are models of life behavior in which there are manners, approaches and attitudes of support, understanding and non-discrimination against marginalized groups of all kinds.
- Justice and tolerance are not a social effect of "charity" or "indulgence". Tolerance is respect for the other, accepting the other as unique and in this sense valuable. Justice is the acceptance and recognition of the other's capabilities, regardless of one's own aspirations and ambitions. (Levterova, 2019).

For further reference: www.ec.europa.eu/education/sites/education/files/investing-vouth-school-factsheet en.pdf

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# It's the same thing in a classroom.



- Inclusion helps educational structures, systems and methodologies meet the needs of all children and students.
- It is a flexible and dynamic process that is constantly evolving depending on the culture, social climate and context of social life.



Development of an inclusive society (according to Stubbs, 2008)

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- Inclusion is a life functioning with others and free selfdetermination. Inclusion is not a life through and thanks to others, who impose a particular model of social determination.
- Inclusion determines equal human rights in life with differences and paradoxes, and posits a quality standard and an independent way of life for everyone. (Levterova, 2019).

## **Inclusion focuses on four key elements:**

- inclusion is a process;
- inclusion is the discovery and removal of barriers;
- inclusion is a presence, participation and success for all students;
- inclusion places particular emphasis on those groups of learners who are at risk of exclusion, who are excluded from education, or who have insufficient learning outcomes. (Dakar's Framework, 2000).

## **World Education Forum Declaration (2015)**

The World Educational Forum Declaration (2015) held in Incheon (Korea) noted that "inclusion and equity in and through education are a keystone of the agenda of transformative education, and therefore we are committed to opposing all forms of exclusion. and marginalization, inconsistencies and inequalities in access, participation and learning outcomes. No educational goal should be considered to be achieved if not achieved by all.<sup>11</sup>

#### **Inclusion Index**

The Inclusion Index is a model for the implementation of inclusive education in the school environment, with methods and methods for collecting, analyzing and processing information about inclusion. The Inclusion Index refines inclusive education to learning

11 https://unesdoc.unesco.org/ark:/48223/pf0000243724

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and teaching styles, namely – what is taught in school, how it is taught, and how students' knowledge and skills are assessed.

The Inclusion Index includes three main spaces with metrics and questions:

- developing inclusive policies
- introduction of inclusive practices
- creating inclusive cultures (Booth & Ainscow, 2011).

# Four key questions that might help during the development of an inclusive practice in lesson preparation:

1. How to make a lesson plan?

While planning a lesson, ask students what are the basic knowledge, skills or understanding that all students need to achieve as a result of the lesson

2. How do your students learn best?

Consider learning styles. Most students can study in a visual, auditory, tactile, proprioceptive, olfactory, gustatory, vestibular, kinesthetic or multisensory way – some of them have preferences and you should know them well. Consider the interests of the students and their learning experiences.

3. What changes to the lesson plan would allow more students to study more effectively in the classroom?

All teachers are used to changing their lessons' plan in order to increase the students' knowledge.

4. How will my students show what they have learned?

Ask students to respond in a way they can handle. Assess them through their strengths, not through their weaknesses.

## Reasonable Adjustments: Key Factors

- Vision and values based on an inclusive ethos
- A 'can do' attitude from all staff
- A pro-active approach to identifying barriers and finding practical solutions
- Strong collaborative relationships with pupils and parents
- Strong collaborative relationships with parents and school

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- A meaningful voice for pupils
- A positive approach to managing behaviour

### **Key factors**

- Strong leadership by senior management and governors
- Effective staff training and development towards inclusion
- The acceptance of use of expertise from outside the school
- A sensitive approach to meet the impairment specific needs of pupils
- Regular critical review and evaluation
- The availability of role models and positive images of disability

## Acting on the principle of Sticordi

- 'Sticordi' is an acronym that refers to various measures to avoid learning disabilities in children with disabilities or learning disabilities.
- The Sticordi measures allow pupils with special educational needs to enjoy education at the same level as their classmates.
- A teacher does not need permission to be stimulating, compensatory; to apply differentiating or remedial measures.
   For dispensing measures the approval of the accompanying class council is required.
- Encourage: encourage students and, above all, emphasize what succeeds. E.g. making progress visible with scorecards, product portfolio; appropriate place in the classroom; starting from the world of specific pupils .; more feed-up; students regularly indications about timing; individual learning results individually; ...
- <u>Compensating:</u> allowing technical aids; e.g. (front) reading software, word processing program, spelling corrector, speech recognition software; dictionary, adapted furniture provided, teacher gives board diagrams and mind maps; shorter keys; read aloud reading by silent reading; pupils use formula cards, ...

- Remedying: offering individual learning aid to eliminate problems: tutor (student roll-out), which is individually discussed with the student beforehand or afterwards; deal with essential faults first, relieve pressure by avoiding reading work; do not compare with other pupils; give points for the most important: ...
- <u>Dispensing:</u> abandoning / replacing learning objectives / final objectives with deeper objectives: exempting dictation in language courses; fewer exercises; do not require that the students explain on the board; replace group assignments with individual assignments; exempt from swimming; ignore spelling mistakes in dyslexic students.

#### **Stimulate/Encourage examples:**

- Be aware of the problem of the student and to take it into account
- Do not evaluate individual results in the classroom in a confrontational way
- Checking of notes and agenda are duly completed of the student
- Guide when starting new subjects
- Communicating to whom and how the student can ask for help
- Try to move around the pupil's environment
- Strive for quality over quantity
- Assess the content not the hand writing
- Reward the student quickly, when it has done something good so that the link between the desired behaviour and positive feedback is clear to the student.

## **Compensate examples:**

- Provide more time for large tasks/tests /exams
- If needed read questions during tests/exams
- Allow tools in the classroom: calculator/times tables/tables/formulas/step-by-step plans/solution cards/dictionary...
- Customize Layout of the activity: clear font, wide line spacing

- Adjustments for book reviews: film instead of book review/allow easier reading/large textbook...
- Allow the parents of the student to have access to the whole subject matter
- Put the student in a strategically good position
- Allow ear protection
- Make a list of the material that the student has to bring with him every day
- Use a verse or a song
- Teacher can use an instruction list, for example in the classroom: I am sitting right on my chair, I am quiet, I listen to the teacher, I look at the board.

### Remedying examples:

- Adjust expectations to the level of the child
- Raise the pupil to a higher level through adapted activities
- Request information from parents about social behaviour in non-school situations
- Identify the causes of weaker performance in order to better attune the guidance
- Request information (or further research) in connection with sensory abnormalities and developmental disorders
- Breathing exercises (stress-reducing)
- Physical awareness-raising activity; for example, yoga, individual. practice forms
- Repeat often (recognisability, safety)
- Use flash cards and word rows
- Systematic imprinting of stumbling words, spelling rules and strategies.

# **Dispensing examples:**

- Giving up patience
- Stress and tolerance-reducing measures
- Let them work individually

- Allow controlled flight behaviour: pupil is allowed to stand aside
- Exemption from spelling errors in all other subjects
- Never allow students to perform at the front of a class (dictation, preliminaries, ...)
- Exemption of execution from memory
- Permanent/temporary/partial/complete exemption provided for certain final objectives
- Exemption of certain questions at test or exam: multiple choice/.

# CONSIDER THE FOLLOWING TIPS AND STRATEGIES WHEN YOU PREPARE YOUR LESSON PLAN:

## 1. Pre-planning information

- Have you been given information on the nature and degree of impairment and the access needs of the pupils with disabilities in the class?
- Have you been shown or do you know how to adapt material and classroom for the new student with disability?
- How to seek for advice/information and by whom?

# 2. What preparation have you made with the class/group for:

- Peer support
- Knowledge of the strengths of each classmate
- Rules in the classroom
- Positive spatial design
- Close team with other colleagues
- Facilitate group work
- Guaranteeing mutual respect in the classroom



# 3. Lesson planning: how will you support the needs of all learners?

- Consider:
  - Timing
  - Variation of activities
  - Types of activities (concrete/abstract)
  - Reinforcement of key ideas
  - Extension work
  - Recall of previous work
  - Links to future work
  - Clear instructions
  - Motivators

- Will the content of the lesson engage all pupils from the beginning?
- Are you able to access specially adapted equipment for some pupils to enable them to participate fully? If not, can an alternative way be found?
- Will the diversified and differentiated work allow all pupils to experience success at their optimum level?

## 4. What different teaching styles are you going to use?

- *Visual* photos, interactive whiteboards, computer games, mobile applications, mind maps, maps and charts, photos, videos, wall displays and more.
- *Hearing* telling stories, discussions, effective questions, problem solving, music, singing and more.
- *Kinesthetic* movement, role play, artifacts, use the environment ...
- *Proprioceptive* movements, posture and facial changes, etc.
- *Vestibular* change of posture and position of the body.
- Odor objects with a certain smell, games of «smell search» –
  what is the smell of genes, what is the smell of carbon, of
  wood, of ....
- Taste some objects taste good and can taste eg. Cake with periodic table and element N tastes like... K tastes like... Na tastes like... Which foods contain potassium, etc., games of "search for taste" what is the taste of sea, river and lake water? but does it taste like cloud / steam and what it is / for development and for imagination and creativity / ...

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- Tactile to touch an object, object or part of it, or its layout
- *Multisensory* combinations of previous ones

#### 5. Preparation of materials

- Adjust materials to expectations to the level of the child or the same for the whole classroom?
- Are written materials accessible to all: formats; readability; length; content?
- Scaffolding [practical materials] e.g. writing frames, pictograms, sounds, pictures, objects, artefacts, word lists, number lines, etc., are they accessible to all?
- Appropriate use of augmented communication and ICT for all?
- Ask students to prepare materials as they wish and according to their interests.

#### 6. Specific situations

- Have you thought about how you will: react to situations of stress, humour, seriousness, embarrassing questions, offer encouragement to all, challenge the behaviour not the pupil?
- Contest the behavior, not the student!
- Respond to the situation and to the participants in it!
- Are all the pupils aware that you might approach the behaviour of some students in a different manner to the rest of the class?
- How will you use your voice in the lesson, e.g. volume, tone, and make sure all children are understanding you?
- Where will you position yourself in the classroom and when?
- How you question the pupils in different ways?

# 7. Use of support by other staff

 Have you communicated with the whole school staff about the pupils you might need help with in your class, to build up awareness?

- Have you met with or at least communicated with support staff before the lesson?
- Does their use allow all pupils to be equally included in the class activities?
- If you are using support staff for withdrawal, how do you know the pupils are gaining from this?
- If you are using withdrawal, how are the groups organised?
- How together are you working with the resource teacher for better development of the pupil?

### 8. Classroom organisation

- Is seating carefully planned and/or the activity accessible for students with:
- Is there enough space to turn, stand height, etc.?
- Is there enough vision to read lips / no glare, no shadows?
- Do you produce correct articulation / no smear, no articulation
- Have you envisioned better positioning for students with visual impairments? Is there enough light?
- Have they provided for those who need a lot of support, such as sitting down with classmates to help them?
- Have you foreseen a scatter free zone?

## 8.1. Environmental design of the classroom

- In the classroom, is it possible to change the interior design movable and adjustable tables? Is interior design flexible?
- Is there an unconventional layout of interior design U-shaped, T-shaped, block layout of the tables /chairs in the classroom?
- Is there a physical / architectural barrier for students with ADHD or for students with Autistic Spectrum Disorders?
- Are there any relaxation areas?
- Are there areas for sensor integration, sounding, art technology, secluded games (incl. serious educational and virtual games)



#### 8.2. Use of the time in the classroom

- Is there time for different instructions differential, direct, system and explicit?
- How are the individual instructions included in the classroom and extracurricular work?
- Is there enough time to complete the exercises?
- Is there sufficient time for oral and test trials?
- Do students know in advance about tests and classwork?

#### 8.3. Climate in the classroom

- Is the classroom a positive supportive climate? How?
- Do students have a cooperative and/or communicative climate?
- Do inclusive education students have a friendly or hostile climate?
- Does the school have teachers' positive or negative attitudes towards students from the focus groups of inclusive education? What are the attitudes?
- Are teachers willing to compromise on the assessment of knowledge and skills, behavior and absenteeism of highachieving students or outstanding talents?
- Are teachers willing to compromise on the assessment of knowledge and skills, behavior and absences of students with SEN?
- Are teachers inclined to compromise on the assessment of knowledge and skills, behavior and absence of students with chronic illnesses?
- Are you willing to compromise on the assessment of knowledge and skills, behaviors and absences of at-risk / special-status students, foster care, single-parent families, adopted, those of different ethnicities, of different faiths, etc.

# 9. How will you organise and group pupils in lessons?

- Friendship groupings?
- Mixed gender/same gender groupings?

- Mixed ability/same ability groupings?
- Disabled and non-disabled students
- Specific pairs of pupils working together:

for example: stronger reading / weaker reading? Does the configuration of lower-achieving students and/or problem behaviors change with high-achieving students and socially normalized behavior? Or is the configuration permanent? Are students with excellence and "exemplary" behavior included in this attachment system or willing to respect the authority of the teacher?

What will you base on to chose what pupils to work with each other?

## 10. How will you deal with unexpected incidents?

Are you aware of the systems for dealing with unexpected incidents, e.g.:

- Evacuation
- · Fainting or fits,
- Psychotic incidents
- Breakdowns
- Stimming
- Arguments
- Incontinence
- Medical emergencies

- Hyperactivity
- Shouting
- Bullying
- Provoked by students
- · Provoked by colleagues
- Provoked by parents
- Provoked by non-teaching staff
- With representatives of other institutions and organizations – Police, Social workers, NGOs and others.

# 11. How will you ensure that all pupils feel equally valued through their experiences of:

- To be listened to / paid attention to
- To be respected HOW is respect for a classmate and/or student, teacher, parent in the class displayed?
- Make their achievements visible how do you advertise the achievements of individual students to the class, to parents, to the student community of the relevant class and/or from the

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whole school, on the school website, on social networks, media, etc.

- Ensure optimum active participation How do you motivate students to participate?
- Ensure Peer Engagement How do you ensure effective peer engagement?
- Ensure that violence is non-existent How?
- Do not allow forms of aggression verbal, physical, instrumental. How?

#### 12. How will you assess the outcomes?

- Do you have a scheme for assessing the achievements of all pupils?
- Do you change your assessment methods? Do your students think you are a fair teacher? What is the opinion of the parents?
- Have you looked at alternative forms of assessment? e.g. video recording progress, peer evaluation, self evaluation, daily agenda report?
- How will you involve pupils in assessing their progress and their peer's progress? Do you evaluate by result, product and process?
- Will you ask the resource teacher to work with you the assess outcomes of the pupil with disability?
- Do you rate by group? Do you include "different" students in assessment groups?

#### The indicators that each school team can monitor are:

- The school has a written, shared vision and mission, with a clear focus on building an inclusive, accessible and supportive school / adult environment for all children / students and adults.
- The school devotes dedicated resources and time to building a culture of tolerance, equity, teamwork and participation,





focused on achieving progress and success for each child / student

• The school has an effective qualification program aimed at enhancing the capacity, effectiveness and confidence of teachers to recognize and support the different educational needs of children / students in the classroom

#### The indicators that each school team can monitor are:

- The school has put in place policies and programs aimed at prevention and early identification of school difficulties for all students.
- The school provides additional support and mental health care for those teachers who would like to benefit from it, enabling them to be included in formats run by external school specialists (if the format requires specific expertise) or from a resource available in the school itself.
- Teachers recognize school challenges in a timely manner and identify the strengths and weaknesses of each child/student using different tools and approaches approved by the state authorities
- Teachers apply traditional, multi-sensory, interactive and innovative teaching methods based on pre-collected information for each student to meet the diverse needs of students.
- Teachers work actively, with all students (including students with needs for additional support), adapt the content as needed, take into account the feedback of each student and have high expectations for the individual progress of each child.
- Teachers work actively, with all students (including students with special needs), adapt the content as needed, take into account the feedback of each student and have high expectations for the individual progress of each child.

- Teachers are leaders in the classroom and children / students are at the center of education.
- Teachers use differentiated approaches to evaluate outcomes and match them to each child's learning styles; teachers share with the students and parents in advance the assessment criteria and their expectations.
- Teachers work in a team on a regular basis when making decisions and planning their work with students who need additional support.
- Teachers arrange classrooms in a way that responds to the diverse learning styles of all students (including students with school disabilities) and to specific teaching methods.
- Teachers encourage the creation and maintenance of a positive atmosphere, tolerance, justice and team spirit in their classrooms.
- Teachers hold focused (for a clear purpose) individual conversations with parents, who may have different goals, whenever necessary, at a frequency that would facilitate the achievement of the goal.
- A school is an environment that creates equal opportunities for parental involvement, regardless of their ethnicity, religion, social status, or other characteristics
- The school is an environment that creates opportunities for parents to be involved in various initiatives, events, clubs and other formats.

Annex 1: Exemplary scenarios of organizing and conducting inclusive teaching practices

#### Conclusion

- Inclusive education is not an extra, but an essential necessity.
- It is our duty to place all children / students, including the most vulnerable groups, at the center of our actions for a better life for all.

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- Inclusive education is not another current complex concept, it is not a new "program" or another "reform".
- Inclusive education is life itself in its most human dimension, and it is not always easily realized, because of diversity, but it is necessary for every person and for the rights of every person.
- In the process of realizing inclusion, which addresses all differences in people, labels such as "inclusive child/student / person" are not allowed. All people need inclusion, but at different levels according to their physical, mental and social status.



## **ANNEX 1**

# INCLUSIVE PEDAGOGICAL PRACTICES FOR THE DEVELOPMENT OF CREATIVITY OF STUDENTS WITH SPECIAL EDUCATIONAL NEEDS

# part of

# **Intellectual Output 2:**

# INCLUSIVE EDUCATION: SUPPORT BETWEEN SCHOOLS

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# SPECIFIC STRATEGIES FOR INCLUSIVE PEDAGOGICAL PRACTICES

# Tsvetelina Ivanova, Rostislav Gadzhalov, Dora Levterova-Gadzhalova

Inclusive pedagogical practices are realized in various aspects of organization and management of the classroom, of teaching and learning, of education and socialization, of creating conditions for expression and development of creative achievements and even talents in students with SEN. Inclusive pedagogical practices are based on an educational process focused on the interests and preferences of students with SEN, on the activity principle of making, on problem solving / not on reproduction of facts and phenomena /, on formation of different competencies and intellectual and personal reflection learning as a valuable resource. Inclusive pedagogical practices may include:

#### ORGANIZATIONAL PRACTICES

# 1. Creating a comfortable environment for communication and creativity:

## 1.1. Time organization:

- providing a routine in the sequence of performing certain activities as the time may vary;
- giving the student enough time to process the taught information;
- calm waiting for answers;

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- showing patterns of behavior in which it is shown that the rules apply, ie. sanctions are enforced in violation of the rules;
- asking questions that do not involve an unambiguous answer;
- using a positive approach in teaching and feedback;
- compliance with the psycho-physical and emotional state of the student;
- providing time for proper response.

#### 1.2. Spatial organization:

- providing a place to work, to study according to the student's preferences
  - individually, in pairs, in a group;
  - on rank, on buffet table, etc.
  - upright, sitting or moving, even on the floor / mostly at home /;
  - learning in silence or ignoring noise;
- providing a place to work, to study according to the individual needs of the student and according to the impact of the disability, the disorder:
  - to the window for students with sensory difficulties;
  - with the back to the wall for students with autism spectrum disorder;
  - with enough space on the left side of the desk, the desk for students who write with the left hand;
  - with enough space for more voluminous aids / communicator, braille machine, etc./;
  - to a student with excellent school achievements or to a student demonstrating strong empathic responses / according to the system "peers teach peers" /;
- providing a place of work that is secluded, permanent for each lesson / lesson without unnecessary sound or light stimuli;

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providing a specific place for relaxation and rest;

#### 1.3. Rules and communication:

- organizing communication and activities at school and at home with rules;
- a requirement to be involved in drafting the rules;
- a requirement to propose sanctions for non-compliance with the rules;
- explanation of each rule and its consequences;
- showing patterns of behavior in which it is shown that the rules apply, ie. sanctions are enforced in violation of the rules;
- asking questions that do not involve an unambiguous answer;
- using a positive approach in teaching and feedback;
- realization of a style of communication related to the rule "calming is the basis for encouragement, and impatience leads to discouragement";
- preventing or eliminating heated disputes and discussions;
- ensuring communication with respect and tolerance, fairness in evaluation and self-evaluation, empathy and situations of prosocial behavior.

## 1.4. Supportive sensory or motor environment

- providing a place and objects that soothe a favorite subject of the student, materials with different textures and volume / pillow, pouf or barbaron, weighted vest /, etc.;
- providing access to a sensor room or sensor devices;
- using a positive approach in teaching and learning feedback;
- preventing or eliminating sensory, emotional or cognitive stimuli;
- preventing or eliminating a high emotional level of learning situations for the student;

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- creating conditions for learning by doing and learning through movements of the whole body;
- use of pastel colors for worksheets and study materials.

#### 1.5. Planning

- The teacher's plans to include co-teaching for students with SEN, especially in activities related to opportunities for creative achievement;
- planning should be based on research strategies for teaching and learning;
- planning to include specific instructions related to opportunities for developing original ideas of students, for teaching the curriculum, for exercises and for assessing the mastery of knowledge and skills, and the individual progress of the student with SEN.
- the teacher's plans to include resource support in all its aspects;
- the planning should be realized for additional support, for extracurricular activities, for activities of interest and for students with SEN;
- The teacher's plans include long-term goals and the student's small goals.
- planning to include the use of computer and mobile technologies, educational software, educational games, educational robotics, assistive technologies and aids for students with SEN according to the capabilities of the educational organization and the capabilities of students with SEN.
- planning most of the time for repetition and practice exercises;
- planning with predetermined student success to increase motivation to learn;



# 1.6. Implementation of the daily and weekly program

- the daily and weekly program to be visualized and visualized pictorially / if possible and if necessary and audibly / through diagrams, tables, maps, etc.;
- the daily and weekly program to be observed, taking into account the progress for each day and for each week;
- flexible use of learning and creative tasks and activities;
- every day to give the student the opportunity to engage in an activity or perform a task that gives him pleasure to achieve a balance between compulsory and voluntary part of mastering learning content or mastering individual knowledge, skills or even competence;
- to monitor and self-monitor the implementation.
- 2. Providing conditions and challenges for activity of the student with SEN for formation of independence and initiative, for creation and study, and implementation of own plans.
- 3. Providing alternative programs according to the interests, achievements and talents of students with SEN through self-assessment, implementation of desired activities and motivation to implement new activities.
- 4. Supporting any initiative and entrepreneurship of the student with SEN, which could reveal and lead to high achievements or outstanding talent.
- 5. Promoting the achievements of students with SEN among students with SEN and among all students, teachers, parents.



# **ANNEX 2**

# PERSONALIZED LEARNING IN INCLUSIVE EDUCATION

# part of Intellectual Output 2:

# INCLUSIVE EDUCATION: SUPPORT BETWEEN SCHOOLS

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# PERSONALIZED TRAINING AND TEACHING STRATEGIES WITH STUDENTS WITH SEN

Dora Levterova-Gadzhalova, Tsvetelina Ivanova, Rostislav Gadzhalov, Katya Stoilova, Maria Goranova, Andrean Lazarov, Karel Van Isacker

Although teaching strategies differ for individual students with SEN according to the individual characteristics of the student, according to the type and degree of disability, disorder or disorder, according to the potential for student development, according to the supportive environment, etc., it can be noted some more general strategies that can be used in co-teaching, in teaching all students and for teaching that stimulates creativity in students with SEN. The competency approach should be applied for and with students with SEN and should be taught for mastering knowledge, for forming skills and for creating relationships /values and attitudes/. It is important not to allow the formation of identity with the disability, the disorder, with the special educational needs and self-determination as use labels such as SEN-che, SOP-adjivche in bulgarian which is the same as sweet SEN or as a disabled student. Allowing the formation of such self-determination of the student with SEN is a negative self-stigmatization and affects and will negatively affect the future of personal development.

The following strategies for teaching students with SEN can be noted:

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- use simple instructions with as few familiar words as possible.
- following the instruction with a short command;
- demonstrating the performance of the task instead of relying on explanations;
- using the multi-sensory approach to introduce or practice a concept, rather than restricting instruction in a particular learning style visual, auditory, or motor;
- tasks should be given in small steps, only the first step is said.
   After completing the first task, the next task is set. Thus, the student with SEN does not overload, does not miss tasks or does not change the algorithm of tasks and gains experience in achieving success. Achieving success, albeit small, increases confidence in one's own achievements;
- the tasks: educational and social to be set according to the potential and interests of the students;
- assign tasks to students with short, clear and understandable instructions;
- written tasks for students with SEN to be provided on a sheet with "landscape orientation", font Ariel, Verdana, Helvetic or Open Dyslecic / separate access required /, with Bolt and line spacing at least 1.5 2, size at least 16 18.
- the texts and the tasks / study or test / should not contain additional decorations and ornaments, too many colors, which can provoke sensory oversaturation and refusal to work and perform the tasks.



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 the texts and tasks should be presented in an understandable language, as for the students with SEN and deficit in education they have a clearly understandable wording and requirements for implementation.

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# PERSONALIZED LEARNING AND PRACTICES RELATED TO STRATEGIES FOR CREATIVE **ACTIVITIES WITH STUDENTS WITH SEN**

Dora Levterova-Gadzhalova, Tsvetelina Ivanova, Rostislav Gadzhalov, Katva Stoilova, Gergana Kolchakova, Maria Goranova, Andrean Lazarov, Karel Van Isacker

Creative activities with students with SEN are most often in the field of certain aspects of art, but creative achievements in the field of science are not excluded. Strategic models can include:

Use of the universal language of art. Creative activities related to art with students with SEN are easy for them to understand because it is easier to achieve clarity about the expected result, which is perceived in a clear pattern and is most often related to familiar objects or phenomena, or favorite situations or events.

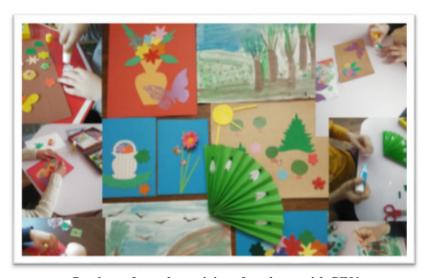
The performance demonstration needs to be introductory. explanatory and followed by a supporting one during the performance itself.

- 1. The materials are easy to get to know or are familiar. They are recommended to be light and with a different texture, and working with them involves a different way of gripping or reaching with one or two hands. By using different materials for drawing, application, etc. the opportunity is provided for:
  - tactile stimulation of individual fingers, palms, wrists;
  - different pressure with fingers, palms and wrists;
  - performing various movements on and with fingers, palms and wrists: non-gripping and gripping, grabbing (cylindrical,

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spherical, fist, hook type), top (top and palmar), side grips (key grip, scissor grip).



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2. Using the power of colors as a strong and multifaceted irritant. Despite the fact that you work with a certain color, it can vary in the shades of the material as a factory workmanship or according to the reflection of light at different positions and places in which it is located. Colors create emotional sensations. If the creative process is combined in which materials of different colors are used with musical background, accompaniment or performance (for example singing), then when choosing colors for work, the student's choice of a certain color material or means of writing / drawing will depend on the music. According to Palmer et al (2013), listening to fast music leads to a choice of more saturated and light, yellowish tones, while slow minor music leads to a choice of the opposite palette of colors – more unsaturated, dark and

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bluish. There are scientific studies that link colors to taste and smell perception, for example. Spence et al, (2015) believe that black and purple / violet create the feeling of something bitter, salty is associated with white, and sometimes with blue. Sour looks like yellow or green, and sweet in turn is associated with pink or red. After conducting research in different cultural communities, Levitan et all (2014) found that the fruity aroma is associated with pink or red again, while the smell of stale and moldy is more associated with brown or orange.

3. Gnosis. There are more sensory stimuli in practical and art activities, which helps to identify and discriminate against them. Visual perception is facilitated in the process of performing a creative task and the detection and differentiation of movement, colors, contours, localization becomes easier due to the presence of supportive emotional stimuli. Sensory stimuli are more flexible and are related to real activity and presence in the life aspect and the student with SEN more effectively focuses attention on their relevant features, which supports the processes of generalization, classification and categorization. Rhythmic gnosis is more effectively brought into a position of construction - melody, tempo, beat patterns, rhythm are more effectively discriminated when there is a performance of a musical instrument, a song, a rhythmic structure in application, drawing, choral performance and thus supports rhythmicity in verbal and nonverbal production. As a logical consequence, auditory comprehension and reading are improving.



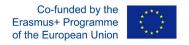






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4. Fine motor skills and praxis. Each practical-applied creative activity is connected with the development of fine finger motility. because it requires precision, precision and coordination of the movements of the fingers and wrists. Students under the influence of the positive emotion of creation imperceptibly perform movements through which they overcome the limitations in the development of manipulative and manual movements, especially the leading hand, arrhythmic movements, problems with balance and/or spatial coordination and orientation, problems in bilateral / simultaneous use of arms and legs / and cross-lateral / opposition of arm and leg at the same time / movements





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5. Memory. Longer stimulation of the sensor memory is needed, i.e. provide sensory stimuli for observation for a longer period of time to ensure immediate memorization of the correct position of visual, auditory or other stimuli, especially in sequence or sequence. Memorization is easier when associated with the interests and preferences of students with SEN, so learning tasks need to be related to them. Working memory is extremely important and in practical terms is supported by multiple repetitions of individual tasks and activities. For more efficient realization of the working memory, as well as of the short-term and long-term memory, the multisensory repetitions and the provision of positive emotions are important.



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6. Attention. It is often noted that students with SEN have problems with concentration, distribution and volume of attention. It is necessary to give the tasks with a reduced volume, to alternate learning with more frequent breaks. Also to achieve synergy of the learning tasks with the interests of the students and to create a positive emotional background, as well as a connection of the studied learning material with the real life. When students with SEN see the application of the learning material in life, they are more motivated to learn. When students with SEN see an appreciation of the efforts they have made, they are more motivated to both learn and be active in creative activities and even creative excellence.



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7. Thinking. Students with SEN have many explanations to understand the logical connections and relationships / for opposition, opposition, similarity and difference /, in the formation of concepts and the need to support the development of logical thinking and in creating relationships of language functioning and abstract thinking. Especially the verbal material is interpreted and interpreted problematically, so alternative explanations and adaptation of the learning content are needed.

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8. Executive functions or the ability to effectively implement strategies and approaches to solve a problem, the development of ideas and strategies to solve it are in fact the regulatory and controlling functions of the prefrontal cortex, which depend on the integrity of other brain functions, such as the limbic system.

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According to Davis (2011), autism spectrum disorders, hyperactivity, and others have deficits in executive function, with children with autism, even high-functioning ones, having significant gaps in their ability to analyze their thinking, self-reflection, and adaptive thinking. Children with attention deficit hyperactivity disorder show other difficulties in executive functions such as problems with internal impulse retention and concentration. They also find it difficult to think in perspective and do not know how to foresee the consequences of their actions. In practical terms, it is necessary to learn to analyze every fact, every phenomenon and every behavior, to observe themselves and their own behavior, to take into account factors of communication and environment to react flexibly and by assessing the consequences of their behavior.







### 2018-1-BG01-KA201-047854

### скъпоценно вижу



#### RNIYAX 3 ATUGAY



# Products from the activity of students with SEN from RCSPIE Plovdiv

9. In the realization of creative activities in the field of applied arts, students with SEN not only create products that are often of high artistic value, but imperceptibly, with positive emotions form cognitive, emotional and social development.



### **FINE ARTS**









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PAPER WORK





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### THEMATIC CREATIVITY







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# Products from the activity of students with SEN from RCSPIE Plovdiv

### APPLIED ARTS



Products from the activity of students with SEN from RCSPIE Plovdiv







Drawings by V. Hr. and IK from 4th grade in the primary school "St. St. Cyril and Methodius", village of Trud from their participation in the event organized by RCPPPO Plovdiv, on the occasion of Easter in the Diocesan Hall in the church "St. Petka", Plovdiv





# Products from the activity of students with SEN from RCSPIE Plovdiv

### CREATIVE WORKS MADE WITH MANY LOVE







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#### 2018-1-BG01-KA201-047854



Carefully made works and lovingly given to my mother by St. K. – PG6, in DG "Biser", village of Trud

### HUMOR / THE MOST INTELLIGENT FORM OF CREATIVITY / FROM STUDENTS WITH SOP



# Products from the activity of students with SEN from RCSPIE Plovdiv

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## HOME AND FAMILY – A CREATIVE LOOK FROM STUDENTS WITH SEN















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### **INTELLECTUAL OUTPUT 3**

### INCLUSIVE EDUCATION: IMPLEMENTATION IN SCHOOLS

# GUIDE FOR SETTING UP AND DELIVERY OF CROSS-SCHOOL PEER SUPPORT

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# GUIDE FOR SETTING UP AND DELIVERY OF CROSS-SCHOOL PEER SUPPORT

Silva Ekimova, Nina Grudeva

The aim of this handbook is to enable peer support between teachers at different schools.

We will provide the opportunity for a continuous exploitation and mainstreaming of the tangible results developed under IO1 and IO2 with an easy use of IO4 as a training facilitations mediator.

Furthermore the guide will provide simple tips and strategies that will enable cooperation, exchange of strategies, approaches, ideas and communication between inclusive ambassadors.

#### Content

- Section 1: Defining peer support between teachers (ambassadors)
- Section 2: Benefits of peer support on capacity building of schools
- Section 3: Roles and responsibilities of all involved participants in the peer support
- Section 4: Conducting peer support programme
- Section 5: Supervision guidelines
- Section 6: Gathering and analyzing the impact of the conducted peer support relationship

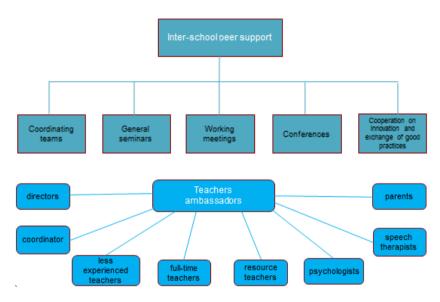


### Aim

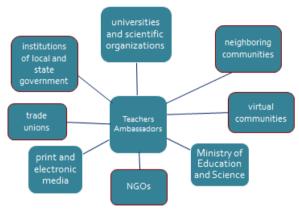
• Establishment and delivery of inter-school peer support between teachers and specialists working disabled children.

### **Inter-school Peer Support:**

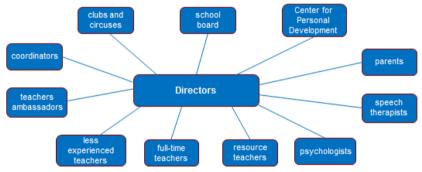
• Coordinating Support Personal Development Teams, including: a coordinator, directors, class supervisors/teachers, full-time teachers, resource teachers, speech therapists, psychologists, parents.



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Interaction between the Teachers Ambassadors in the school with other organizations and institutions



- General seminars the trained teachers with more experience share their approaches, principles and methods of work by passing them on to the younger ones and discussing whether there is a result from the pupil's progress.
- Meetings of pedagogues and specialists working with children with disabilities under the motto "Good Practices" at school, inter-school and regional level, organized as visits and discussion meetings for sharing experience that has given positive results.

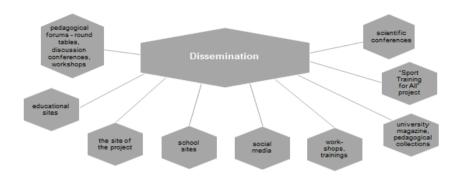
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- Participation in regional and national conferences:
- 5<sup>th</sup> Regional Conference of Primary Teachers from the region of Plovdiv "The School a Place for Children",
- "Inclusive educational practices in school and kindergarten"
   2019 teachers, directors and specialists share their inspiring and successful practices,
- 6th International Extra-Curricular and Out-of-School Activities Competition /concerning interests/ Sustainable Quality Education, Development and Socialization of Children and Students 2019.

### Participation in international conferences:

- International Conference "Creating better quality of life for children and persons with heavy intellectual and multinational disabilities", 17 10 June 2019, Plovdiv with 3 articles;
- 5<sup>th</sup> Anniversary International Scientific and Practical Conference
- "Science Education Profession: Systematic personal developmental approach", 8 – 11 July, Moscow – 1 scientific article;
- XIX International scientific practice conference "Intervention of teacher and student in the conditions of university education:
   Theories, Technologies, Management", 2 6 September 2019,
   Kiten with 5 scientific articles;
- Other future conferences in the area of Inclusive education.



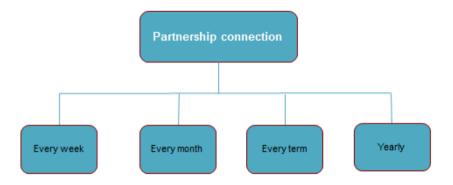
### Dissemination:

- articles in educational sites and social media "Learning in Plovdiv" an innovative educational portal;
- news on the project site;
- in partners' school sites "St. Paisii Hilendarski" Secondary School Plovdiv, "St. St. Cyril and Methodius" Secondary School village of Markovo, "Otets Paisii" Primary School village of Iskra, "St. Chernorizets Hrabar" Secondary School Plovdiv and other schools in Plovdiv area and in the country;
- through workshops and trainings;
- electronic collection book of the IVth Regional Conference of Primary Teachers of Plovdiv region of the Regional Inspectorate of Education /RIE/, Plovdiv;
- collection book of the XIIIth National Pedagogical Reading "My Pedagogical Everyday Life – Through Difficulties to Success" of the Ministry of Education and Science (MES), the Regional Education Management in Lovech and the National Centre for Human Pedagogy;
- university magazine of Plovdiv University /PU/ "Paisii Hilendarski";
- teachers ambassadors of "Sport Training for All" project of the Erasmus+ program;
- research work with students future teachers;

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• research work with PhD students in the field of pedagogy and inclusive education.



### Making relationship connection:

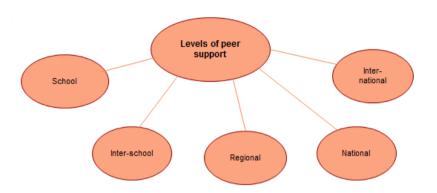
The periodicity of the meetings is within the school year -15 September to 30 May.

- Weekly a working meeting with the director, gathering of the methodological groups by grades;
- *Monthly* trainings, open lessons, methodological groupings at Primary School, pedagogical council;
- *Every term* –parent meetings, personal development support meetings of the respective team;
- *Yearly* conferences, pedagogical readings.

### **Content of Intellectual Output 3:**

Section 1: Defining peer support between teachers (ambassadors) – Teachers with more professional experience, working with children with disabilities, help their young colleagues or those without experience by sharing good practices.

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### Levels of support:

#### 1.1. School level:

- Sharing mandatory documentation when working with children with special educational needs;
- Consultations and teamwork among the members of the personal development support team;
- Training on "Typology and Types of Disabilities of Children and Students":
- Acquaintance with principles, approaches and methods of work, contributing to the progress of the student;
- Ways of integrating into the class and the school community appropriate topics during the class of the teacher, thematic parent meetings, trainings with the pedagogical counsellor;
- Structure of lessons with differentiated work with students with disabilities and in working with the whole class;
- Worksheets and materials for individual and control work;
- Didactic aids for learning;
- Use of alternative training and assessment methods for "different" students:
- Use of different teaching styles and learning styles with a whole class and with "different" students:

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- Forms of work in Music, Physical Education and Sports, Arts, Home Lifestyle and Technique classes, forming social and technical skills;
- Organization of the day in the full time training group (FTTG) self-training lessons, activities of interest and organized sport and recreation;
- Suitable extracurricular and out-of-school forms for self-knowledge and development.

#### 1.2 Inter-school level:

- Creation of rules of joint voluntary cooperation;
- Working environment attended by guests for one class or day;
- Role play and inclusion in appropriate projects;
- Interactive working techniques;
- Ideas and practices for building a supportive positive classroom;
- Organized workshops for presenting students' achievements;
- Methods for attracting parents as partners in the teaching and educational process;
- Means of control and evaluation of the results;
- Specialized useful sites with developing educational games, auxiliary and interactive tools in the training.

### 1.3. Regional and national level:

- Trainings and open lessons;
- National programs for raising the qualification of the pedagogical staff;
- Good practices from regional and national conferences of teachers and special pedagogues;
- International research conferences the articles;
- Organized workshops for presenting good practices and students' achievement;

• Organized information meetings for presenting good practices and students' achievement;

### **Section 2:** Benefits of peer support on capacity building of schools.

### 2.1. Disabled children:

- Identifying the child's strength and potential for inclusion and participation in the educational process;
- Ensuring children's participation in real situations with behavioural requirements and skills realization;
- Learning of functional skills through play and alternative methods;
- Avoiding dependence on permanent support.

### 2.2. Teachers with less pedagogical experience:

- Tracking the dynamics in the development and the cognitive processes, the personality and the achievements in the educational process of the students with disabilities;
- Enriching and improving the pedagogical work with new approaches and methods;
- Facilitating corrective relationships and constructive cooperation between pupils and children with disabilities;
- Development of criteria for evaluating the learnt content by the student, according to the age and the individual characteristics.

# 2.3. Specialists – speech therapists, psychologists, resource teachers:

- Organizing the adaptation of the space in the classroom to the needs of the student;
- Organizing the timing in the classroom to the needs of the student:
- Incorporating sensory integration elements and other therapeutic techniques into working with the entire class;

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- Providing special strategies, approaches and ideas for working with children with disabilities;
- Targeting through special exercises to improve and develop fine motoring;
- Motivating for learning by including developing games.

#### 2.4 Directors:

- Improving the organizational and managerial skills of the Director:
- Flexible management and distribution of the financial resources to the needs and education of children with disabilities;
- Providing qualified and trained staff to work with such students;
- Qualification of directors to work in inclusive pedagogical practices in own institution.

#### 2.5. Parents:

- Building mutual trust and partnership between teacher, student and parent;
- Guiding in the daily preparation of lessons and homework;
- Communication about the needs, the emotional state and the behaviour of the student;
- Support in the implementation of tasks when doing project work.

# **Section 3:** Roles and responsibilities of all involved participants in the peer support:

- Coordinator conducts inter-school working meetings to support the education of children with disabilities; organizes joint trainings and workshops;
- *Director* provides resource support by setting up support and personal development teams, finances the equipment of a resource room and a classroom with supporting didactic

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materials; assists in the organization of working meetings with the partners; participates in programs and projects for inclusive education:

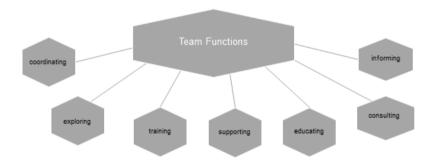
- Teacher/s/ draws up an individual curriculum on subjects with deficiencies and traces its implementation; participates in qualification courses for enriching the pedagogical experience; exchanges positive practices with colleagues and professionals involved in the peer support; jointly organizes workshops to present students' work;
- *Psychologist* participates in the assessment of the educational needs and follows the dynamics of the student's development; in relation to these, he/she consults the members of the team; participates in trainings to improve their work;
- Speech therapist participates in the assessment of the educational needs, the support plan and the activities carried out under it; monitors the student's development dynamics and consults the partners in the peer support;
- Resource Teacher provides additional support; participates in the assessment of the educational needs, the support plan and the activities carried out under it; tracks the student's development dynamics by providing feedback to the members of the support and personal development teams; assists teachers in using special approaches and working methods; his/her activity is consultative and maintains contact with parents;
- Teacher /full time training group/ organizes the work in the full time training group, supervises the implementation of the assigned tasks in close connection with the teachers; works in a differentiated way with the student and follows his/her dynamics of development; consults with the team of specialists;
- Parent a partner in the educational and training process; he/she has a coordinating and supportive function;
- Personal development centre provides rehabilitation programs for improvement and development of the general



physical condition of children with deficits; organizes and conducts cultural programs for self-expression and socialization of the personality; advises participants in peer support;

- School board financially supports the participation of students in different cultural activities; participates in pedagogical councils and in making decisions;
- Clubs and circles in schools working with children with disabilities develop creative abilities in children with disabilities; provide opportunities for working on inter-school projects and organize joint exhibitions; reveal innovative approaches, applicable in teachers' classes;
- *Teachers Ambassadors* a role model of a trainer who can persuade, enthuse, motivate and integrate such pupils; promote the introduction of innovative methods and approaches to successful work with children with disabilities; mediators and co-ordinators in the pedagogical work.

### 3.1. Team function between schools



- Coordinating conducting meetings between the partner schools;
- *Exploring* getting acquainted with the number of the educated children and the types of disabilities;

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- Training based on individual educational programs for the respective year, monitoring the dynamics in the development of the students through their implementation at the end of each school term; conducting trainings and seminars;
- Supporting provides additional and methodological support;
- *Educational* contributing to the development of a safe classroom, adapted to the pupil with disabilities and the needs of all students;
- *Consulting* counselling the pupils of the class in which the child is integrated, the teachers and the parents;
- *Informing* informing parents of the continuing education and the possibility of acquiring professional qualification of disabled students.

### 3.2. Cooperation code of conduct:

- Participation is voluntary.
- Keeping good etiquette of promoting good and successful peer support.
- Respecting the different opinion of the other people.
- Correctly offering alternative views and positive feedback.
- Keeping confidentiality.
- Respecting and following the principles of collegiality and cooperation.
- Improving the personal knowledge and skills of the participants and sharing them with the team members.
- Each participant fulfils their obligations, aiming to increase the effectiveness of the peer support.
- Following the principles of teamwork.
- Respecting the rules of copyright protection.



### **Section 4:** Conducting peer support programme.

### 4.1. Aims:

- Supporting the work of teachers and specialists in the teams in adapting, targeting and integrating children with disabilities;
- Providing strategies for the inclusion of the class and the school community towards the student with disabilities;
- Assistance in the organization of a positive classroom, tailored to the needs of the child and students with disabilities, to their talent, chronical diseases and to children and students in risk and to all students;
- Consulting and motivating the partner teams in the joint educational work;
- Facilitating teachers and specialists in assessing the success rate of children with disabilities:
- Exchanging professional experience through organized trainings, workshops and conferences.

### 4.2. Tasks:

- Through the exchange of ideas to build a safe, organized, comfortable and interesting environment that is inclusive of the school community;
- Each partner school to create on its site the "Didactic materials for working with children with disabilities";
- Sharing good practices through media, participation in conferences and projects;
- Motivating through demonstrations the practical work in the classes – role plays, laboratory exercises, observations in the nature, excursions;
- Organizing and supporting training through the use of appropriate learning games with application of information computer technology (ICT) and interactive learning models;
- Demonstrating the use of mobile phone applications in the lesson as a resource of education:

- Carrying out open lessons, using thought cards, group and team work aiming to overcome learning difficulties for children with disabilities;
- Building a positive school-parents relationship and attracting parents as partners in the school life through their participation in it:
- Preparing mentor teachers to train their colleagues how to effectively apply inclusive education at school;
- Organizing training seminars and trainings for teachers and specialists teaching children with disabilities.

### 4.3. Expected results:

- Improving the work of the modern teacher and occupying the position of a leader and a class manager;
- Successful integration of children with disabilities into mainstream schools and their inclusion in the class;
- Applying successful pedagogical practices from the international exchange of the implemented peer support;
- Making the school a place for children in a positive environment, a place for self-knowledge, self-improvement and realization;
- Raising the success rate of children with disabilities through inter-school cooperation;
- Creating trust and partnership with parents in the pupils' educational process.

### 4.4. A peer support plan:

 Establishing a partner network by organizing and conducting workshops between the following schools: "St. Paisii Hilendarski" Secondary School – city of Plovdiv, "St. Chernorizets Hrabar" Secondary School – city of Plovdiv, "St. Cyril and Methodius" Secondary School – the village of



Markovo and "Otets Paisii" Secondary School – the village of Iskra and other schools in the country.

- "St. Paisii Hilendarski" Secondary School, Plovdiv organizes training seminars with teachers and specialists from "St. Chernorizets Hrabar" Secondary School, Plovdiv;
- "St. Chernorizets Hrabar" Secondary School, Plovdiv is hosting the" Guest for a Day" initiative together with "St. Paisii Hilendarski" Secondary School, Plovdiv;
- Trained teachers and specialists from "St. Chernorizets Hrabar" Secondary School, Plovdiv organize trainings with their colleagues from "St. Cyril and Methodius" Secondary School – the village of Markovo;
- "St. Paisii Hilendarski" Secondary School, Plovdiv hosts training seminars with teachers and specialists from "Otets Paisii" Primaty School the village of Iskra.
- The schools "St. Cyril and Methodius" Secondary School the village of Markovo and "Otets Paisii" Primaty School the village of Iskra organize and hold joint exhibitions and workshops.
- University of Plovdiv "Paisii Hilendarski" organizes training seminars with teachers and specialists from other schools in Plovdiv region and in the country.
- Suluova organizes training seminars with teachers and specialists from other schools in Turkey.

**Section 5:** Supervision guidelines – the implementation is on the base of shared practices:

- Exchange of trained teachers;
- Jointly organized exhibitions and workshops;
- Sharing didactic materials for working with children with disabilities;
- Visits under the title "Guest for a Day";

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- Participation of teachers ambassadors from "Sport Training for All" project;
- Working meetings under the motto "Good Practices" at regional level;
- Participation in conferences.

# **Section 6:** Gathering and analyzing the impact of the conducted peer support relationship.

- Creation, dissemination and completion of a feedback questionnaire at the end of the year by teachers and specialists;
- Collecting feedback from parents about the work done and analyzing the dominant opinions.
- The questions are open-ended and will be completed in electronic form via a link. They are exemplary and anonymous. The answers should be according to the way the interviewee thinks and according to their point of view. Responses will be used to help statistics and improve inter-partner support.

### Questionnaire

- 1. How many students have you worked with during the school year?
- 2. What target groups are they from: children with disabilities, children from ethnic groups, from remote areas, disadvantaged children?
- 3. What do you think are they fully, partially or not integrated in the class and in the school community?
- 4. Have you learned anything new and useful in your work on inclusive education?
- 5. Would you apply some techniques and methods in any specific lessons?
- 6. In which lessons? (If the answer of Question 5 is yes).
- 7. Do you use teamwork, ICT and project-based training during the school year in your classes?





- 8. How does this improve your work? (if the answer of Question 7 is yes).
- 9. Have the meetings with mentoring teachers been useful for the children from different target groups?
- 10. In theoretical or practical view? What exactly was useful? (if the answer of Question 9 is yes).
- 11. Do you find interesting and motivating the meetings under the motto "Good Practices?
- 12. How do you feel after such a meeting?
- 13. Do you believe that the confidence and incentive for learning in these children is achieved by developing and promoting their strengths?
- 14. Do you think that the praising method, prizes and participation in exhibitions and workshops will help you?
- 15. What do you think about teamwork between teachers and professionals working with children from different target groups?
- 16. Did this teamwork help you in your practical work?
- 17. 17. How specifically did it help you? (If the answer of Question 16 is yes).
- 18. What is the level you rate your partnership with parents (without change, improved)?
- 19. Have you managed to build mutual trust and support between you and your students' parents?
- 20. Do you think that successful international practices in dealing with disabled students are realizable in your school?
- 21. What specifically needs to be changed in your work to integrate totally children and students from different target groups into school?



#### REFERENCE

- 1. Presentations from "Training pedagogical specialists from kindergartens and schools for working with children with special educational needs" course on "Qualification of pedagogical specialists" project with the assistance of the Ministry of Education and Science, Operational Program "Human Resource Development" and European Social Fund of the European Union:
  - Multidisciplinary teams in the integrational process.
  - The role of the educator in the integrational process aiming, motivating, socializing functions.
  - Pedagogical technologies for working with children with special educational needs.
- 2. Sites which could be helpful when working with children and students with special educational needs:
  - http://www.alterco.bg/ tools that help in education
  - https://www.cie.bg/ Inclusive Educational Centre
  - http://priobshti.se/ a virtual centre for inclusive education
  - http://www.pu-sk.com/ Special Educational Support Centre
  - http://rcplovdiv.com/ Regional Centre Plovdiv for supporting the process of inclusive education
  - http://rcsf.bg/ Center for Support of the Inclusive Educational Process Sofia city
  - https://slovum.com/ Bulgarian language handbook
  - http://umeia.com/ A site for games, helping the development of children
  - Implementation of good pedagogical practices in teaching and their role for successful inclusion and development of students with disabilities at "St. Paisii Hilendarski" Secondary School, Plovdiv
  - Sharing didactic materials for working with children with disabilities:

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- worksheets with graded tasks;
- writing a text in dotted lines;
- pictures for verbally composing a story, using the unfinished sentence method;
- visual aids, interactive games and simulators for adding and subtracting;
- nature observation maps, 360 degree images, natural and thought maps, laboratory lessons;
- historical and contour maps, projects for significant personalities, museum lessons, flash card games for studying the history of Bulgaria and the world;
- ideas for scenarios and theatrical roles in themed class events.
- Sharing is very important for supporting the work of young teachers and enriching their experience. This way, the attention of the students with difficulties is engaged, the lessons are interesting and they challenge the creativity of the children.
- "St. Paisii Hilendarski" Secondary School suggests some good practices with positive outcomes that all project partners can use or adapt to their school, organization or institution, according to their particularities, conditions and capabilities.

### Internal teacher exchange for a specific class:

- In the form of open lessons for school teachers and guest students for joint learning activities.
- It is used to illustrate the practical work of a chosen class in order to facilitate the learning, the search of innovative ideas and their implementation in the lesson.
- The emotional empathy recharges everyone with positive feelings and the pursuit of self-improvement.



# Teachers – ambassadors of "Sport Training for All" project in Physical Education and Sports classes

- They participate as partners, supporting the process of inclusion of children with disabilities in the school.
- Bulgarian folk dances are applied as a wealth of the nation at the opening of the school year under the slogan "Challenge me!".
- Students and teachers correctly follow the steps of the folk dance.
- A safe walk on a designated playground is held during the last lesson of the day, in order to recall the rules for safe crossing of the streets.
- On the Sports Day of the School, the ambassador teachers assist in the implementation of a variety of sports games "Cycling or Jumping Rope", "Sprint", "Save the Cone", "Target Ball Shooting", "Walking on a Rope" and "Fire, Air and Water". The games develop students' motor activity, improve their attention and memory, create a need for mutual understanding and mutual assistance, equalize and involve all participants in the sport.

"Merry Album" – project-oriented training in day-to-day organization of the first grade school day – it is a personal unconventional album with drawings of the children of the class and their families, positive messages that they send to each other and brief works about the family and the dream profession. The idea is:

- to support the literacy process;
- to educate of a tolerant and positive attitude towards students;
- to improve teamwork skills and create class friendships;
- to maintain a good partnership with parents;
- as a result, the album was used in the classes to develop communication and speaking skills at the beginning of the second grade and to create a sense of personal significance.

"Little Writers" – a technology for developing communication and speaking skills and encouraging second-grade students' reading activity. "Little Writers" is a booklet with authors' work of collected poems, songs, stories, tales, riddles and student pearls. The purpose for the students is through it:

- to enrich their vocabulary;
- to develop their creative skills and encourage their ideas;
- to create love and affection for the book.
- The achieved results are:
- a booklet successfully used in extra-curricular reading classes at the beginning of third grade;
- an output in the student portfolio;
- interest in writing and reading.

"The First Kingdom of Bulgaria through the Years of Fourth Graders" – project-based teaching as a factor for active learning. Through their participation in the project, the students are acquainted with:

- the contribution of distinguished khans and kings from the First Bulgarian Kingdom through independent learning;
- following the timeline of historical events in collaboration;
- realize themselves as motivated personalities, heirs of Paisii.
- Achieved results:
- students use different information sources and are able to extract information;
- propose and discuss ideas;
- design a book, working on instructions alone or in a team;
- show organizational and theatrical skills;
- create author's text with their active position;
- to make a real self-assessment of the work done;
- recognize themselves as a significant part of national identity.



### As a result, they create:

- a Chronicle Book of the First Bulgarian Kingdom as a study exhibit at the School Museum;
- participate in a class celebration and present the project to their parents;
- participate in literary competitions;
- build patriotic self-awareness.

### Conclusion

- The suggested pedagogical practices follow the school model of teaching by exchanging creative and innovative ideas, that have given positive feedback and results in the education and the inclusion of students with and without disabilities at "St. Paisii Hilendarski" Secondary School.
- Everything, shared from our practice, teaches and inspires us mutually, makes us flexible in making decisions, discovering new opportunities, resources and directions for new endeavours.



### **INTELLECTUAL OUTPUT 4**

### THE MOBILE APPLICATION FOR BLENDED LEARNING AND INTER-SCHOOL NETWORK AND COMMUNICATION

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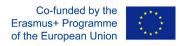
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### THE MOBILE APPLICATION FOR BLENDED LEARNING AND INTER-SCHOOL NETWORK AND COMMUNICATION

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The mobile application for blended learning and interschool network and communication is published in GooglePlay.

#### Can be found at URL:

https://plav.google.com/store/apps/details?id=com.inclusiveam bassadors.mobile



https://inclusive-ambassadors.eu

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