

FEATURES OF PREPARING CHILDREN WITH AN AUTISTIC DISTURBANCE FOR INCLUSIVE LEARNING

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Abstract

The article analyzes the features of preparing children with a spectrum of autistic disturbance for inclusive education. The organizational and pedagogical conditions of inclusive education of elementary schoolchildren with autism spectrum disorders are revealed. Scientific researches concerning development features of the identified category of children are considered.

The article purpose is to theoretically substantiate the specifics of preparing a child with autistic disturbance for school and to experimentally test the readiness of parents of children with autism to actively participate in the educational process. There are proved the main approaches to methodological, systematic correctional and developmental work with such children in the direction of improving the relationships and communication skills.

The main indicators of a child with autism readiness for inclusive education are determined and substantiated. Some diagnostic methods for assessing various areas of development of a child with autism are proposed for their successful inclusion in the educational space of the school. The study used variables that reflect the results on the survey of autistic disturbance children in Ivano-Frankivsk region and the very city (Ukraine) in 2021 and demonstrate the beginning of an age period of their inclusive education.

It is grounded that the success of correctional and developmental work and inclusive education of this nosology group children depends on the attitude of parents and other adults who are included in the child's living space. A survey on the parents' readiness of such children to actively interact with teachers was conducted. It was found that only 13.2% of parents actively cooperate with professionals and interact with other parents. It has been discovered

that an inclusive form of education will be effective for children with autism spectrum, on condition that parents are actively involved in the educational process.

Key words: autistic disturbance; diagnostic techniques; children with early childhood autism; inclusive education; correctional and developmental work; educational environment; training; social interaction.

Articulation of the problem

The organization of the inclusive education for children with autism spectrum disorders (ASD) provides for the creation of a comprehensive system in which a socio-cultural and educational environment that takes into account the capabilities and needs of the child, and at the same time correctional and developmental work aimed at developing higher mental functions, emotional and volitional spheres. Methodological, systematic and correctional work is planned with priority on the correction of communication and social skills, because without them it is impossible to begin the training process of a child with ASD [1]. In addition, it is important to consider that to include each pupil with ASD you need the gradualness to expand the inclusive space.

Organizational and pedagogical conditions of inclusive education of elementary pupils with autism spectrum disorders are provided by solving certain objectives (Fig. 1).

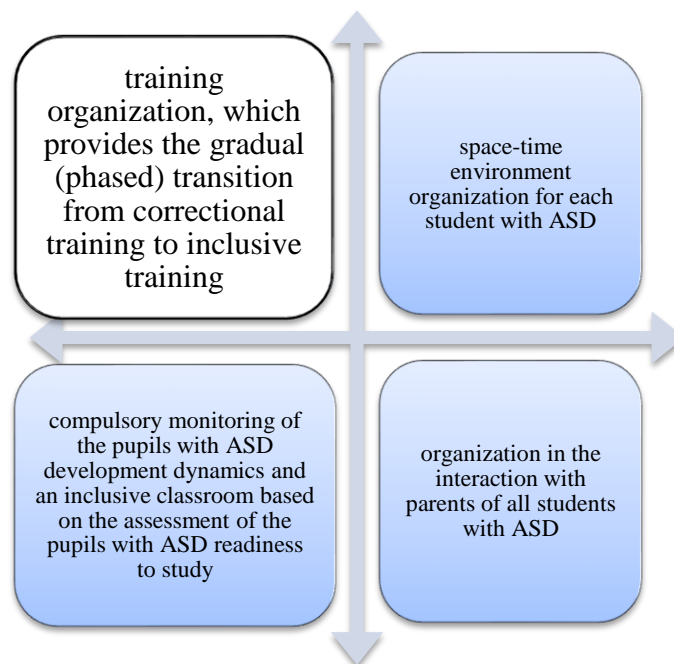


Fig. 1 Organizational and pedagogical conditions of inclusive education for elementary pupils with ASD

The above organizational and pedagogical conditions help to implement a single educational and socio-cultural environment of the school, built on the principles of inclusion and ensure the availability and variability of pupils with ASD education.

Analysis of the recent research and publications

Autism spectrum disorders (ASD) are pervasive disorders [4], so the construction of an educational environment for children of this category requires consideration in a number of interrelated factors, which are determined by the peculiarities of their development (S. Mnukhin, O. Nikolska, E. Ormits, K. Jillberg, N. Bazyma, I. Kostin, O. Romanchuk, V. Sinyov, D. Shulzhenko, S. Cohen, B. Chamberlain, C. Kasari, etc.).

Referring to the scientific conceptual approaches as for the development of children in general, it should be noted that communication with adults in early childhood is a determining source of socio-historical experience gained by previous generations of the mankind (A. Zaporozhets, A. Leontyev, M. Lisina, D. Elkonin). [3]. Thus, communication becomes the most important factor in the overall mental development of each child [1, p.16]. Communication disorders are considered by scientists to be one of the main factors that is the barrier in the development of a child with ASD. It becomes clear that the learning process of such a child is impossible without correctional and developmental work, which practitioners direct precisely to the development of communicative activities [5; 7].

An important aspect in training each child is also the area of his/her immediate development, which is associated with the concept of cooperation [6]. The process of teaching children with ASD should take into account that the opportunities that lie in the area of immediate development can be significant, and the child does not have the ability to cooperate. The result of such development is that it is difficult for a child to identify the area of immediate improvement and properly organize the learning process.

In order to organize work with ASD children, the periods of development and formation of leading activities in this period of a child's life takes an important place. O. Leontiev grounded this approach and he characterizes the emergence of the most important mental neoplasms of a certain age period. The concept of leading activity is associated with the age periodization by D. Elkonin [3], which we will use in the study.

For ASD children with preserved intelligence, there is mostly a delay in play activities in the preschool period, which leads to problems in educational activities, which is associated with mental developmental disorders formation in previous age stages [3; 4].

For instance, in the educational activities of such a child there is a decrease in social motives. As a result, it becomes difficult to select educational tasks and use the standard objectives provided by the curriculum and educational materials, at the same time there is a stereotyping and interests narrowing of such a child.

In this case, the correctional and developmental system influence should be built considering the violation and compensation processes [6, p.252].

L. Vygotsky highlighted the idea of "social dislocation" in all children with developmental disorders, which complicates its "inclusion in culture." All this manifests itself as a violation of interaction with the outside world, with the people around, i.e. the difficulties of social interaction [6]. ASD children with this disorder is the main mark, and therefore the difficulties of social interaction are more globally.

The article purpose theoretically substantiate the specifics of preparing a child with ASD for school and experimentally test the parents of children with autism readiness to actively participate in the educational process.

Presenting main material

According to the identified issues, we can say that correctional work is not just a set of exercises, training and practices that are aimed at developing skills and correcting unformed functions. This work involves a comprehensive psychological and pedagogical impact, taking into account the ontogenesis laws and functioning conditions, the joint activities of teacher and child. Methodological, systematic correctional and developmental work involves the correction of relationships and communication skills.

Modern approaches to inclusive education of children with autism at school substantiate the importance of step-by-step preparatory work in the direction of adaptation and formation of social skills, which will be considered a necessary degree of socialization, without which further development of the child may be somewhat deformed [7].

The theoretical basis of this approach to the childhood autism correction was the study of scientists who confirm the idea of distorted development of a child with ASD (V. Lebedinsky, K. Lebedinskaya, etc.) and consider childhood autism as a systemic disorder in the child's psyche, its affective and cognitive spheres [2]. The affective sphere is considered as a system that organizes the child's behavior in normative and distorted development. This system is formed in interaction with close people and later receives cultural development. Researchers identify a typical combination of two pathogenic factors for children with autism (Fig. 2) [2].

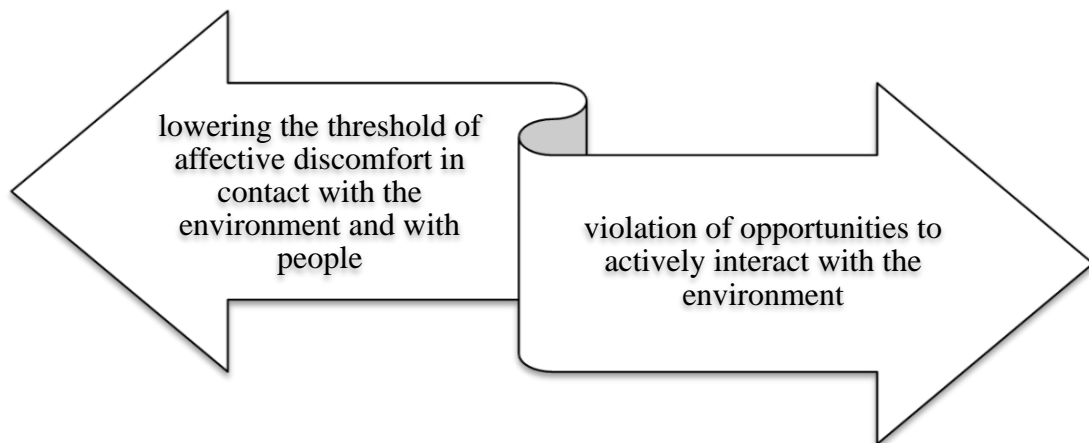


Fig. 2. Pathogenic factors that are typical for children with ASD

Given the experience of practitioners on the degree of developmental disorders, the affiliation of a particular child to a particular nosology group can be detected only after a long period of work during a comprehensive psychological and pedagogical observation [1]. For example, the level of speech disorder in a child with autism is determined only after establishing contact and conducting a targeted diagnostic examination. For the most part, even parents cannot determine the actual level of a child's speech mastery. A typical situation is when relatives believe that the child understands the spoken language, although in fact the perception is focused on the situation or nonverbal cues (familiar gestures, adult voice intonation, etc.), sometimes hidden forms of interaction and understanding of the situation in the family. It is also difficult to conduct a differential analysis of the survey results when cognitive disorder is pronounced. Similar findings have been described in autism research. For the most part, the primary diagnosis of "autism" can be obtained by children with deep sensorimotor allele with a predominance of the sensory component [4, p. 36].

For effective psychological and pedagogical assistance to children with ASD, its early stage (early intervention) is important [10]. Therefore, for the analysis, we used variables that show the age period of study and the number of studying years at school. At the same time, the research did not focus on children who have already gained previous experience in individual and group correctional and developmental classes. The results are shown in Fig. 3.

The majority of children (36.8%) started inclusive education at school between the ages of 7 and 8. Some children (26.3%) started studying a year later - at the age of 8-9 (late beginning of school education is mainly due to the fact that the child showed behavioral characteristics

and unpreparedness for school). At the same time, some of the children entered school later because parents wanted to extend the training period for their child.

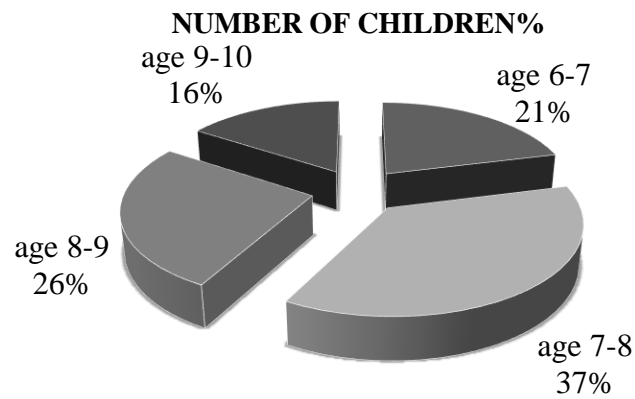


Fig. 3. Distribution of children with ASD by age at the beginning of inclusive education in schools of Ivano-Frankivsk region and city (Ukraine) in 2021

The success of learning and socialization of a student with ASD at school depends on a combination of different factors. Based on the analysis of research and methodological principles, the readiness of a child with autism to study in an inclusive classroom, which we consider appropriate, was assessed based on the distinctive indicators (Fig. 4).

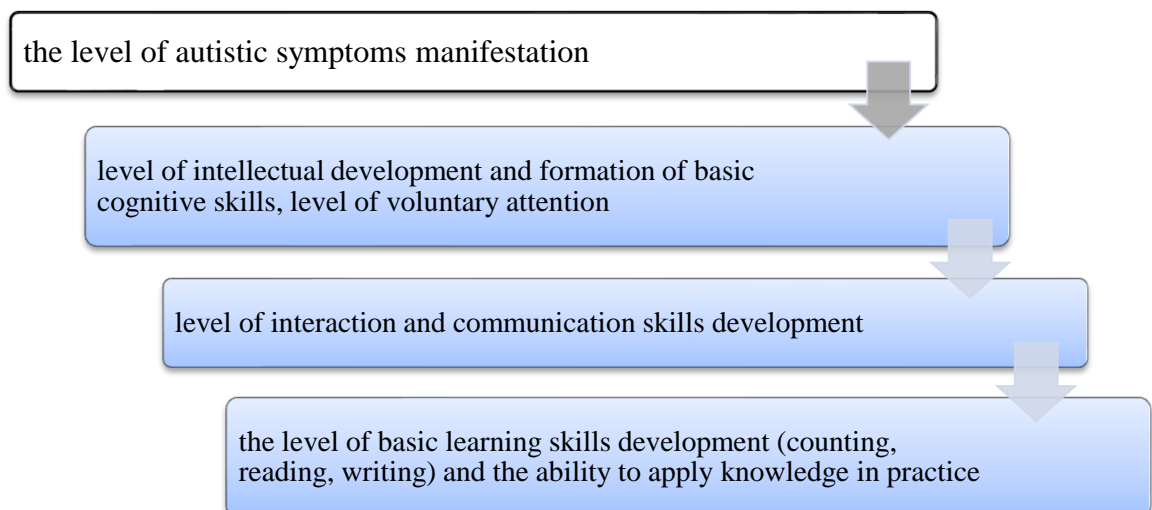


Fig. 4. Indicators of a child with autism readiness for inclusive education

These indicators are important to consider for the analysis of the dynamics and training effectiveness and correctional and developmental impact.

Now we will study some of them more thoroughly. For example, regarding the level of intellectual development and the formation of basic cognitive skills, the level of voluntary attention [2] K. Gilbert and T. Peters [4] argue that IQ is important to determine the level of speech mastery to predict the success of ASD children. According to scientists, most children whose IQ is below 50 during testing belong to the group with low prognostic values. Groups with high prognostic values include children with an IQ level of more than 70 [4; 8].

At the same time, the success of learning is determined by a number of factors, primarily motivation, diligence, discipline, self-control, critical thinking, confidence in teachers [7]. These factors immaturity, even with high intellectual performance, can significantly reduce learning success.

The level of development the interaction and communication skills, i.e. the ability to interact with others is an important factor that also affects the success of children with ASD learning [4; 8].

It is important to keep in mind that even a child with a mild form of autism may not have the skills of social interaction. For example, the actions of a child with ASD, which look like aggression, may be due to the desire to communicate only with other children. In such cases, the task for the teacher is to form a child's experience for positive communication with adults and peers before entering school.

Regarding the level of educational skills improvement, it is the speech development, thinking, mathematical concepts at the level of competence of the senior preschooler and the ability to apply knowledge in practice.

Since a number of indicators that affect the readiness for inclusive education of children with ASD are a discussed scientific problem, the choice of diagnostic methods and indicators for assessment requires justification and discussion within the team of psychological and pedagogical support.

At the same time, the above list cannot cover all areas and be a complete list of indicators that characterize the development of a child with ASD, they should be relied upon during the initial diagnosis, analysis of pupil development dynamics and effectiveness of intervention in the learning process.

Therefore, taking into account the above, some diagnostic methods of indicators assessment in different areas of a child with ASD development are studied (Fig. 5).

In Ukraine, the validity of the CARS scale for diagnosing autism has been confirmed. Teachers, parents / other relatives, the results of the examination and the content of the diagnostic cards, which are filled in by specialists, were observed and interviewed for evaluation.

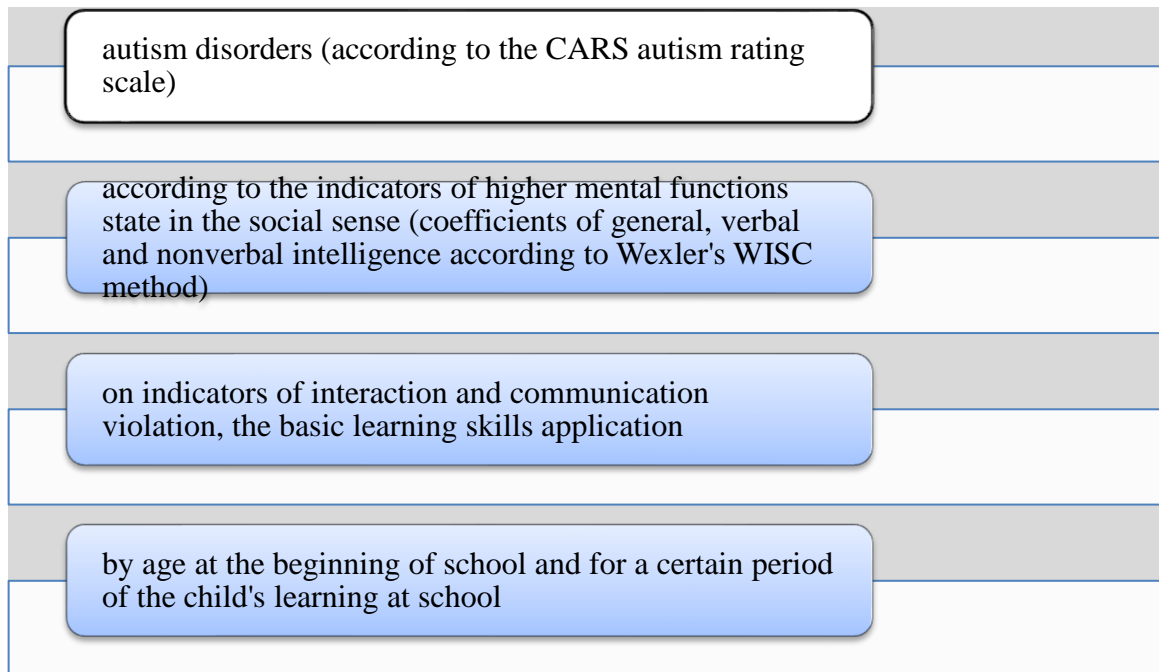


Fig.5 Diagnostic methods of indicators assessment in different areas of a child with ASD development

Taking into account the indicators of the IFF, “activity” was assessed, which involves the performance of a task or a certain action by an individual; “participation” is the involvement of the individual in a life situation; “activity restriction” includes difficulties that arise in an individual during activity; “limitation of opportunities for participation” includes problems that an individual may experience during inclusion in life situations [9].

The proposed process did not involve the assessment of environmental factors, as the task was to evaluate the functioning of children in school, so it can be assumed that these factors are the same for all surveyed children.

In the psychometric sense, children's intelligence is a system of cognitive processes development considering the age norm, which ensures the adaptation of a child in the society [3]. Adaptation in society is characterized as the child's ability to develop and learn among peers, interact with others, in accordance with social norms of behavior [6]. Wexler's WISC test for children aged 5-16 can be successfully used to analyze the dynamics of the ASD

children development. However, it is important to keep in mind that the quantitative measurement will be conditional and indicative, as the probability of testing due to lack of social skills in children with ASD is much lower [4].

It should be stated that the process of using standard tests has certain complications, as in this category of children there are disorders of interaction and communication. For the results to be reliable, it is important to increase the time of the examination, as part of the time may be needed to create the contact with the ASD child. At the same time, it also takes time to level the impact of the child's exhaustion. Testing should be discontinued if fatigue occurs. Also, before testing, there is always preliminary work to establish contact between the teacher and the child. Testing was not performed if it was not possible to interest the child in activities, i.e. test tasks.

Taking into account the results in accordance with the criteria of the CARS test, three groups of children were identified as follows 15-29 have no signs of autism; 30-35 have manifestation of autism from mild to moderate (high-functioning autism or Asperger's syndrome); 36-60 have severe autism.

Using the above techniques, the specialists of the support team, mostly psychologists, analyzed the readiness to study in an inclusive classroom of children from the sample.

Table 1 shows the results of the survey of students with ASD in accordance with the indicators "level of autism".

Table 1.
Indicators of autistic disorders at the beginning of training (Ivano-Frankivsk region and the city of Ivano-Frankivsk (Ukraine))

Points	Number of children	Number of children (%)	Girls	Boys
15-30	2	5,3	-	2
31-36	28	73,6	8	20
37-60	8	21,1	2	6
Total	38	100	10	28

According to the above mentioned results the success of correctional and developmental work and inclusive education of children with ASD, the behavior and attitude of parents and other adults who are included in the child's living space become important. Research of parents' activity and the analysis of ways in their interaction with teachers are resulted in table 2.

Table 2
Participation of parents in the educational process

Parent activity (in points)	Group 1 (mild or moderate autism)		Group 2 (severe autism)		Total	
	persons	%	persons	%	persons	%
0 (opposition)	2	6,7	1	12,5	3	7,9
1 (do not participate)	6	20,0	2	25,0	8	21,1
2 (grandmother or nanny involved)	8	26,6	3	37,5	11	28,9
3 (insufficient participation)	9	30,0	2	25,0	11	28,9
4 (actively interact)	5	16,7	-	-	5	13,2
Total	30	100	8	100	38	100

The results of the observations and parental interviews conducted by teachers at the beginning of the training can be grouped according to common indicators. The following indicators were used for analysis:

0 - There is opposition from parents (do not follow the recommendations, use methods of teaching and education that contradict the principles of education at school (say, corporal punishment, etc.);

1 - Do not participate or formally participate in the interaction (do not participate in the work of parent groups, do not come to parent meetings, avoid discussing current issues of development, education and training of their children);

2 - Grandmother or nanny of the child interact with teachers, whose opinion is not taken into account in the family;

3 - Participation in interaction with specialists is insufficient (take part from time to time, try to minimize their own involvement in homework or preparation for the holiday);

0 4 - Parents actively interact, become partners of the team of psychological and pedagogical support.

Conclusions

Therefore, we can say that within all groups of children there is a high percentage of parents (29.0%), in interaction with which teachers have tension. Sometimes teachers fail (28.9%) to organize interaction with parents due to their employment, a grandmother or nanny

is involved in the child's upbringing. In this case, it was considered that the grandmother / nanny could not make decisions about the education and upbringing of the child. A large number of parents (28.9%) belong to the group “insufficient participation”.

Thus, there is a tendency that parents are mostly not ready to believe in the capabilities of their child (closed to society), unwilling or unable to change their attitude towards the child. And only 13.2% of parents actively cooperate with professionals and interact with other parents.

Thus, the results of the study show that it is important to invite a family psychologist to work with parents in the team of psychological and pedagogical support of a child with ASD.

It is established that the problems of inclusive education of each child with ASD should be decided individually, and inclusion should begin only after the previous stage, preparing for learning in an inclusive classroom. It is stated that an inclusive form of education will be effective if the parents are actively involved in the educational process.

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