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Awareness Raising and Training Teachers on Students with Autism.

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Awareness and Training of Teachers for Students with Autism.

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SUMMARY

This study addresses the importance of raising awareness and training teachers for the inclusion of students with Autism Spectrum Disorder (ASD) in schools. The main objective was to investigate how teacher training can contribute to promoting a more inclusive and effective education for these students. A qualitative methodology was used, with a literature review and analysis of case studies, to understand the pedagogical practices adopted and the challenges faced by teachers in the inclusion of students with ASD. The results showed that continuous teacher training is essential, since the lack of technical and emotional knowledge about autism limits the effectiveness of inclusion. In addition, the study highlighted that, when awareness raising is combined with practical training, teachers are able to adapt their pedagogical practices to the needs of students, promoting a more welcoming and development-friendly environment. It was concluded that teacher training should be continuous and integrated, addressing both theoretical and practical aspects, and that public policies need to ensure the necessary support for inclusion to be carried out effectively. It is suggested that future research explore the impact of innovative training models, with the use of assistive technologies and the participation of families in the educational process.

Keywords:School inclusion, autism, teacher training, inclusive education, professional training.

ABSTRACT

This study addresses the importance of raising awareness and training teachers for the inclusion of students with Autism Spectrum Disorder (ASD) in schools. The main objective was to investigate how teacher training can contribute to promoting a more inclusive and effective education for these students. A qualitative me-

2 practices adopted and the challenges faced by teachers in the inclusion of students with ASD. The results showed that continuous teacher training is essential, since the lack of technical and emotional knowledge about autism limits the effectiveness of inclusion. In addition, the study highlighted that, when raising awareness is combined with practical training, teachers are able to adapt their pedagogical practices to the needs of students, promoting a more welcoming and development-friendly environment. It was concluded that teacher training should be continuous and integrated, addressing both theoretical and practical aspects, and that public policies need to ensure the necessary support for inclusion to be carried out effectively. It is suggested that future research explore the impact of innovative training models, with the use of assistive technologies



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ABSTRACT

This work addresses the importance of raising awareness and training teachers for the inclusion of students with Autistic Spectrum Disorder (ASD) in schools. The main objective was to investigate how teacher training can contribute to promoting a more inclusive and effective education for these students. A qualitative methodology was used, with bibliographic review and analysis of case studies, to understand the pedagogical practices adopted and the challenges that teachers face in the inclusion of students with ASD. The results show that the continuing training of teachers is fundamental, but that the lack of technical and emotional knowledge about autism limits the effectiveness of inclusion. Furthermore, the work highlights that, when awareness is combined with practical training, teachers can adapt their pedagogical practices to the needs of students, promoting a more welcoming and favorable environment for development. It was concluded that teacher training must be continuous and integrated, addressing both theoretical and practical aspects, and that public policies must guarantee the necessary support so that inclusion is carried out effectively. It is suggested that future investigations explore the impact of innovative training models, with the use of assistance technologies and the participation of families in the educational process.

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1 INTRODUCTION

Inclusive education is a central theme in discussions about equity and quality in education, especially with regard to meeting the needs of students with Autism Spectrum Disorder (ASD). The prevalence of autism has been increasing in recent years, which makes it increasingly important to train teachers to understand the specificities of this condition and promote a learning environment that favors inclusion. In this context, awareness-raising and training of teachers emerge as fundamental elements to ensure accessible and welcoming education for all.

The importance of this study lies in the strategic role that teachers play in the educational process and the impact that their pedagogical practices can have on the development and inclusion of students with ASD. Although legislation and public policies recognize the right to inclusive education, there are still significant gaps in the preparation of education professionals. This scenario reinforces the need to investigate existing awareness-raising and training practices, as well as to propose effective strategies to overcome the challenges faced by teachers.

The problem that guides this research can be defined as the following question: how can teacher awareness and training contribute to the effective inclusion of students with autism in the school environment? The hypothesis is that the lack of adequate training and ongoing support for teachers can limit the ability to promote quality inclusive education. To answer this question, this study adopts a qualitative and descriptive approach, using a literature review and case study analysis to understand best practices and propose guidelines for teacher training.

The main objective of this work is to investigate how awareness-raising and teacher training initiatives can impact the inclusion of students with ASD in the school environment. Specific objectives include: analyzing the main difficulties faced by teachers in the inclusion of students with autism; identifying pedagogical practices and methodologies that have proven effective; and proposing recommendations for improving teacher training policies and strategies. Throughout this work, the following will be explored:

how awareness raising contributes to autism awareness and how technical training can enable teachers to adapt pedagogical practices to the individual needs of their students.

2 THEORETICAL FRAMEWORK

The inclusion of students with Autism Spectrum Disorder (ASD) in the school environment is a widely discussed topic in the field of education, requiring deep reflection on pedagogical practices and the role of teachers. According to the Salamanca Declaration (1994) and the National Policy on Special Education from the Perspective of Inclusive Education (2008), it is essential that the school be an accessible environment

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and adapted to all students, respecting their unique characteristics. However, research indicates that teacher training is still insufficient to deal with the specificities of autism, which can compromise the effectiveness of inclusion. As stated by Mantoan (2015), teacher training should include not only curricular and environmental adaptation, but also changes in attitudes towards diversity. This requires ongoing training programs that combine awareness-raising and specialized teaching techniques, such as TEACCH and the ABA model, which stand out in teaching students with ASD. These programs should be supported by an integrative vision, such as Bronfenbrenner's (1979) ecological approach, which involves not only the school environment, but also the student's family and social context.

Vygotsky's (1984) theory on pedagogical mediation is particularly relevant for the inclusion of students with ASD, as it highlights the role of the teacher as a mediator in the learning process, using resources that help overcome cognitive and social barriers. Thus, strategies such as the use of visual tools and the structured organization of the environment can facilitate the learning and socialization of students with autism. Lopes (2020) reinforces that the biggest challenge is not the lack of willingness of teachers, but the lack of adequate training.

Raising awareness and developing empathy are essential for building a truly inclusive school, as pointed out by Mendes (2010). Furthermore, family involvement in the educational process also plays a crucial role, as highlighted by Lopes (2019). Collaboration between school and family allows for the exchange of information and strategies that favor the learning and social development of students with ASD. Thus, school inclusion requires a multidisciplinary approach that considers both the technical training of teachers and the construction of an environment of emotional and cultural support.

3 METHODOLOGY

The inclusion of students with Autism Spectrum Disorder (ASD) in the school environment is one of the major challenges of inclusive education. According to the perspective of contemporary education, based on documents such as the Salamanca Declaration (1994) and the National Policy on Special Education from the Perspective of Inclusive Education (2008), access and retention of students with disabilities must be ensured through adaptations that respect their uniqueness. However, practice reveals that teachers are often not sufficiently prepared to deal with the specificities of autism.

Autism is a neurodevelopmental disorder that primarily impacts communication, social interaction, and behavior. According to specialized literature, such as the studies by Amaral and Dawson (2018), the autistic spectrum is characterized by great variability, both in intensity and in the manifestations of symptoms, which demands highly personalized pedagogical approaches. This fact highlights the need for ongoing training of teachers so that they can better understand the challenges faced by their students and develop effective teaching strategies.

According to Mantoan (2015), "school inclusion requires not only physical and curricular adaptations, but also profound changes in the attitudes of teachers, who must be trained to deal with differences in a positive and proactive manner" (p. 48). This reinforces the importance of programs that combine awareness and technical training, promoting both awareness and the acquisition of practical tools for teaching students with ASD.

Vygotsky's theory (1984), with its concept of pedagogical mediation, is often used as a basis for understanding the role of the teacher in constructing the learning of students with special needs. According to the author, the teacher must act as a mediator, providing resources and strategies that allow the student to overcome learning barriers. In the case of students with autism, this includes the use of visual tools, structured routines and sensory approaches that meet the specific needs of each child.

For Lopes (2020), "the biggest challenge faced by teachers in the inclusion of students with ASD is not the lack of will, but the lack of adequate training that allows them to understand the peculiarities of these students and adapt pedagogical practices" (p. 32). This observation shows that the difficulties faced are not only linked to physical resources, but to the need for more in-depth knowledge about autism and its pedagogical implications.

Another theory relevant to this study is Bronfenbrenner's (1979) ecological approach, which highlights the importance of interactions between the student, school, family and community in human development. In the context of autism, this approach emphasizes that teacher training should consider not only the school environment, but also the student's family and social aspects. Effective training should

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encourage teachers to work in partnership with families and other professionals, such as psychologists and occupational therapists.

Raising awareness among teachers is one of the fundamental pillars for successful inclusion. Studies by Shyman (2016) show that prejudice and lack of information about autism can generate negative attitudes on the part of teachers, hindering the inclusion process. Therefore, it is essential that training programs not only provide technical knowledge, but also address ethical and emotional aspects, promoting greater empathy and understanding.

As Mendes (2010) argues, "teacher training needs to be continuous and dynamic, covering the different dimensions of inclusive teaching, from curricular adaptation to the development of individualized strategies" (p. 75). This perspective reinforces that initial and continuing education must go hand in hand to ensure the success of inclusive practices.

In addition to awareness, technical training is essential. According to studies by Mesibov and Shea (2011), methodologies such as the TEACCH Program (Treatment and Education of Autistic and Communication-related Handicapped Children) and the ABA (Applied Behavior Analysis) model have shown promising results in the education of students with ASD. These approaches highlight the importance of structuring the environment, consistency in routines, and positive reinforcement as effective teaching tools.

However, even with these methodologies, practical application faces challenges. Research by Gombás and Dallacqua (2020) indicates that the lack of pedagogical resources and work overload are frequent barriers reported by teachers. In addition, the lack of support from school teams and management makes it difficult to implement inclusive practices. These challenges reinforce the importance of public policies that guarantee technical and emotional support to teachers.

Another crucial point is the role of the family in the inclusion process. As highlighted by Lopes (2019), family involvement contributes significantly to the development and learning of students with autism. Therefore, teachers must be trained to establish a constructive dialogue with family members, creating a collaborative environment that favors the exchange of information and strategies.

The inclusion of students with Autism Spectrum Disorder (ASD) requires the use of appropriate pedagogical methodologies that meet the specific needs of these students. Several approaches have been developed over the years, each with its own characteristics and practices, which seek to promote an environment that is more favorable to learning and socialization. Structured pedagogical methodologies, such as TEACCH and Applied Behavior Analysis (ABA), have proven effective in organizing the teaching environment and improving the communication and behavior of students with ASD. In addition, practices that involve the development of socioemotional skills also play an important role in the integration of these students into the school environment.

The table below presents some of the main methodologies used in inclusive education for students with autism, describing their characteristics, advantages and the role of the teacher in applying these strategies.



Table 1. Main Pedagogical Methodologies for the Inclusion of Students with Spectrum Disorders

Autistic (ASD)

METHODOLOGY/ APPROACH	DESCRIPTION	ADVANTAGES	ROLE OF THE PRO- TEACHER
TEACHING (Treatment and Education of Autistic and Communicative cation-related Handicapped Children)	Method structured that organizes the learning environment gem in a predictable and visual way.	Reduces anxiety of the student, improves communication and learning.	Organize the environment te, provide instru- visual information and clear supports.
ABA (Applied Behavior Analysis)	Method based on modification of combehaviors through of positive reinforcements.	Promotes the develop- development of ha- social bilities ar academics.	Apply reinforcements positives, monitor the φrogress and adjust strategies.
Education Socioemo- national	Seal in the development ment of the skills- socio-emotional disorders of the student, such as empathy and emotional regulation.	Improves relationships interpersonal and the self-confidence of students.	Foster empathy, promote regulation emotional tion and teamwork.
Floor Time Method	Focus on development skills development social and emotional through interaction at a level of student interest.	It stimulates commucation and spontaneous social interaction.	Engage active- mind in the activity- student's development, creating a supportive environment.
Multisensory Teaching	Approach that use- Lisa multiple feelings of the (vision, hearing, tact) to improve learning.	It facilitates understanding are and content retention.	Adapt materials and methods for engaging see different feelings of the student.

Source: Prepared by the authors themselves (2025)

As shown in the table, each methodology has specific characteristics and objectives, and it is essential that the teacher is well prepared to apply the most appropriate ones to the context and needs of the student with ASD. The TEACCH method, for example, is highly effective in organizing the learning environment and reducing student anxiety, providing a clear and predictable structure. Applied Behavior Analysis (ABA) is indicated to promote behavioral changes in a consistent manner, using positive reinforcement to encourage desirable behaviors. Mantoan (2015) highlights the importance of specific strategies for the inclusion of students with ASD in the school context:

The inclusion of students with Autism Spectrum Disorder (ASD) in schools requires the adoption of pedagogical methods that consider the unique characteristics of these students. Among the most effective approaches are the TEACCH method, which organizes the environment in a structured manner, Applied Behavior Analysis (ABA), which promotes behavioral modification through reinforcement, and multisensory teaching, which uses different sensory channels to enhance learning. These methodologies, when implemented coherently and adapted to the needs of students, favor academic and social development, making the school environment more inclusive and accessible for all. (Mantoan, 2015, p. 132)

Both approaches require ongoing training and rigorous monitoring by teachers, ensuring that the strategies are applied effectively.

On the other hand, approaches such as Social-Emotional Education and the Floor Time Method emphasize the development of social and emotional skills, which are essential for the integration of students with ASD into the school and social context. Multisensory Education, in turn, has proven effective in involving students fully, using different senses to stimulate learning. Adapting these methodologies to everyday school life requires that the teacher develop a deep understanding of the characteristics of the students.

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characteristics of ASD and be willing to modify your teaching practices to create a more inclusive and welcoming environment.

These methodologies illustrate how pedagogical practice, combined with technical and emotional knowledge, can significantly contribute to improving the quality of teaching and promoting the school inclusion of students with autism.

Furthermore, as Silva (2018) states, "an inclusive school is a learning space that only becomes a reality when all agents involved, including teachers, families and managers, are committed to diversity" (p. 54). This view shows that the inclusion of students with ASD does not depend only on technical training, but also on a cultural change that values differences as an essential part of the educational process.

4 RESULTS AND DISCUSSIONS

The results of the research reveal that, despite advances in inclusion policies, there are still major challenges in teaching practices aimed at students with Autism Spectrum Disorder (ASD). Although the theory on inclusion has evolved over the years, the implementation of these strategies in schools faces significant obstacles, such as the lack of continuous and specialized training for teachers. It was observed that, when teachers do not receive adequate training on the specificities of ASD, their teaching practices become limited and often ineffective. In addition, many teachers demonstrate insecurity in dealing with the behaviors and needs of autistic students, which can result in attitudes of exclusion or neglect, affecting the performance and well-being of students. The analysis of teaching methodologies, such as TEACCH and ABA, shows that, when implemented correctly, they contribute significantly to the academic and social development of students, but their application depends on technical preparation and a proactive attitude of teachers.

On the other hand, research has also shown that the integration of personalized pedagogical practices, associated with a collaborative school environment and family involvement, can positively transform the inclusion process. When schools offer ongoing support to teachers, with training programs that encompass both technical and emotional aspects, teachers become more confident and prepared to meet the needs of students with ASD. The partnership with families is another crucial point, as it allows teachers to better understand the particularities of the student outside the school environment and adapt their teaching strategies more effectively. Evidence indicates that, by combining awareness, technical training and a support network involving all educational agents, the inclusion process becomes more efficient and capable of providing a truly inclusive and welcoming school environment for students with Autism Spectrum Disorder.

5 CONCLUSION

This study aimed to investigate the impact of teacher awareness and training on the inclusion of students with Autism Spectrum Disorder (ASD) in schools. Based on the analysis of existing theories and adopted pedagogical practices, it became clear that teacher training is essential to ensure effective inclusive education. The topic proved to be of great relevance, since the lack of specific training for teachers can compromise the effectiveness of inclusion, harming the academic and social development of students with ASD.

During the research, it was possible to conclude that teachers face great challenges when dealing with the inclusion of students with autism, especially due to the lack of theoretical and practical preparation. Approaches that combine awareness and technical training proved to be more effective, as they provide both the understanding ment of students' emotional and social needs as well as appropriate pedagogical strategies for serve them. The methodology adopted, based on a bibliographic review and analysis of case studies, revealed that methodologies such as TEACCH and Applied Behavioral Analysis (ABA) have contributed significantly to the success of inclusion.

The research answered the initial question by confirming that teacher awareness and training are essential for promoting quality inclusive education. Therefore, it is essential that public policies and educational initiatives prioritize the ongoing training of teachers, offering technical, emotional and methodological support. As a suggestion for further research, it would be interesting to investigate the impact of different models of teacher training, with an emphasis on innovative practices that

integrate the use of assistive technologies and the active participation of families.

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