

Teacher Training And Transversality: Perspectives Of Municipal Coordinators Of The Agrinho Program In The State Of Ceará

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Abstract:

The present study focuses on understanding the role of cross-cutting themes in teacher training, as well as analyzing transversality in the scenario of the Agrinho program, implemented in the state of Ceará. The objective of this research is to explore the integration of cross-cutting themes in teacher education and to identify the main challenges encountered by educators in implementing these themes in the context of the Agrinho program. The research also seeks effective strategies to overcome these difficulties. The research adopted a qualitative approach and used the Free Association of Words Test (TALP) as a data collection technique, in addition to semi-structured interviews with the municipal coordinators of the Agrinho program in the state of Ceará. The analysis is grounded in several theories and previous studies, including Silva's (1999) curriculum theory, Saviani's (2008) concept of democratic education, and Veiga's (2008) ideas about the political-pedagogical project. In addition, previous empirical research on cross-curricular themes was considered, such as the works of Souza and Oliveira (2000) and Sato and Castioni (2010). The results of the research indicate that despite the perceived importance of cross-cutting themes for teacher education, their implementation faces several obstacles. These include the lack of a continuing education program for teachers, scarcity of resources, and lack of institutional support. However, when the cross-cutting themes are effectively implemented, they contribute significantly to the comprehensive education of students. The research concludes that, despite the challenges, the insertion of cross-cutting themes in teacher training is fundamental for the education of students. It is necessary to develop a more consistent strategy to overcome the barriers to its implementation, which includes offering adequate training for teachers, allocating the necessary resources, and ensuring the necessary institutional support. The research also highlights the need for continued reflection on pedagogical practices related to the implementation of these themes.

Key Word: *Cross-cutting themes. Teacher training. Agrinho Program. Transversality.*

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I. Introduction

The field of teacher education and the implications of implementing transversal methodologies in education are issues widely discussed in academia (Banks, 1993; Libâneo, 1994). Transversality, conceptualized as the integration of social issues in different disciplines (Morin, 2002), is seen as a powerful means of promoting a comprehensive understanding, while providing a contextualized view of teaching, deeply rooted in social reality and collective responsibility (Freire, 1970; Gadotti, 1996).

In this context, the present investigation turns to the study of the Agrinho Program, an educational initiative implemented in the State of Ceará, Brazil, since 2003. As a multidisciplinary program, Agrinho seeks to

promote students' awareness of their rights, duties, and responsibilities in society, through a cross-cutting pedagogical approach (Veiga, 1995).

However, despite the relevance of the Agrinho Program, studies on the practices developed under this program are scarce (Pimenta & Ghedin, 2002), reinforcing the need for a more comprehensive exploration of this topic. Thus, this article aims to analyze teacher training in the light of transversality, from the perspective of municipal coordinators of the Agrinho Program.

Applying discourse analysis, this study seeks to understand the coordinators' perceptions regarding the implementation of transversality in the Agrinho Program, exploring both the challenges and opportunities related to this pedagogical approach (Giroux, 1992).

In this context, it is relevant to point out that the results can foster the debate about contemporary educational practices, offering a new perspective on teacher training and the implementation of cross-cutting pedagogical approaches in educational programs such as Agrinho (Santos, 2006).

The theoretical basis and findings of this research can contribute to the development of more efficient pedagogical strategies, and offer valuable contributions to educational policies, aimed at improving the quality of education and the formation of more aware and engaged citizens in social reality (Gadotti, 1996; Giroux, 1992). Moreover, this study can also serve as a starting point for future research in the area, in order to expand knowledge and understanding about transversality and its implications for teacher education (Freire, 1970; Libâneo, 1994; Pimenta & Ghedin, 2002).

This article is organized into five distinct sections. In the first section, we provide an introduction to the theme. In the second section, we detail the methodology used for data collection and analysis. The third section is dedicated to the presentation of the theoretical basis about teacher education and transversality. In the fourth section, we proceed with the discussion of the results, emphasizing the main findings and their implications for the educational field. Finally, the fifth section concludes the article with final considerations and indications for future research in the area.

II. Material And Methods

Characterization of the research

This research is characterized as basic, descriptive-exploratory. According to Santos and Santos (2022), research seeks to contribute to the development of new and useful knowledge for the advancement of science, without the need for immediate practical application. While the descriptive-exploratory research has very flexible planning and brings characteristics of both the description of observed phenomena, emphasizing their causes and relationships with other facts, and the analysis and interpretation of the data collected.

In our analyses, we favored the qualitative approach, because it considers that there is a dynamic relationship between the real world and the subject, that is, an inseparable link between the objective world and the subjectivity of the subject that cannot be translated into numbers. The interpretation of phenomena and the attribution of meanings are fundamental to the qualitative research process.

We used elements of a research-action, which according to Minayo (2021), aims to transform the living conditions of the people involved in the research, through participation and joint action between researchers and subjects. This approach allows the construction of knowledge that is both scientific and socially relevant, based on the analysis and interpretation of the data collected together with the research participants.

According to Minayo (2021), action research is a type of investigation that involves the active participation of the researched subjects in the research process, combining the way of interrelating research and actions in a particular field selected by the researcher. In this approach, both the researcher and the participants are cooperatively involved in the research work, which allows for the joint construction of scientific and socially relevant knowledge.

Research location and target audience

The participants in this research consist of 36 municipal coordinators of the Agrinho Program in the state of Ceará. To preserve the anonymity of those involved, they were assigned alphanumeric identifications, being represented as C1, C2, C3, C4, and so on.

The research design was conducted through data collection using a Google Forms form, applied on March 23, 2023. The selection criterion for the participants was the fact that their answers were related to the study of transversality.

Research methodology

The form used in this research was the Free Word Association Technique (TALP), which is a method widely used in research in the field of education. According to Vasconcelos (2015), TALP aims to obtain information about the cognitive structure of individuals and the mental associations they make between words or concepts. In this technique, participants are asked to provide the first word that comes to mind when they hear a

target word, usually chosen by the researcher. From the responses obtained, it is possible to perform statistical and content analyses that can help to understand patterns and mental associations of participants in relation to certain concepts or themes.

In addition, the research also relied on semi-structured interviews with 4 open-ended questions. According to Lüdke and André (2013), the semi-structured interview is a technique that allows obtaining deep and detailed information about the experiences and opinions of the participants. In this type of interview, the researcher presents a script with open-ended questions that should be explored flexibly and adapted to the interviewees' answers. With this, it is possible to obtain rich and complex information about the themes studied.

For the analysis of the data collected in this study, elements of the content analysis proposed by Bardin (2016) were used. This approach consists of a set of systematic and objective techniques for the description of the content of messages, in order to infer knowledge about the conditions of production. Content analysis occurs in three phases: preliminary analysis, material exploration and treatment of results.

In the preliminary analysis phase, the data were selected, organized and studied in the research form. In the material exploration phase, the data were coded and characterized for the definition of the analysis categories, which were: (i) definition of transversality; (ii) involvement with the Agrinho Program; (iii) practice as coordinator/trainer of the Agrinho Program; and (iv) challenges encountered in the implementation of transversality in teacher training. In the results treatment phase, the data were analyzed and interpreted in light of the theoretical precepts, seeking to understand the perception and representations of the subjects about the characteristics of the theme of transversality in teacher training.

Bardin (2016) defines content analysis as a technique that can be used in qualitative research and has been widely applied for the interpretation of written texts since antiquity. This technique allows obtaining quantitative and non-quantitative indicators, enabling the inference of knowledge about the conditions of production of the messages.

Ethical aspects

The Resolution No. 510, dated April 7, 2016, was used, in addition to the legal regulations and attributions of Law No. 8,080, dated September 19, 1990, Law No. 8,142, dated December 28, 1990, by Decree No. 5,839, dated July 11, 2006, which deal with ethics in research with human beings (Brazil, 2016). Participants were informed of the rationale, objectives, methods, and benefits of the study, and that they could withdraw from the study at any time. Thus, participants were asked to sign the Informed Consent Form (ICF)

III. Theoretical framework

Teacher training and transversality

According to the Law of Directives and Bases of Education (LDB) no. 9.394, of December 20, 1996, teacher education prepares professionals to deal with the characteristics of the learner (BRASIL, 1996). Initial training constitutes the first step for entering the profession (FLORES, 2003). The adequate preparation of future teachers is one of the prerequisites for a quality educational system (GOMES et al., 2019).

The first initiatives for teacher training were proposed in the late nineteenth century, in normal schools (GATTI, 2010). With the 1934 Constitution, teacher education began to occur in higher education institutions (SATO; CASTIONI, 2022). The Federal Constitution of 1988 - CF88 promoted several changes in teacher training gained greater attention in educational policies, aiming at the quality of education (BRASIL, 1988; BRASIL, 1996).

Seeking to overcome the challenges of the teaching profession, several initiatives for training and valuing teachers have been created, including the National Plan for Training of Basic Education Teachers - PARFOR (2009), Institutional Program of Scholarships for Initiation to Teaching - PIBID (2009), Pedagogical Residency (2018), Common National Base for the Initial Training of Basic Education Teachers - BNC-Training (2019), Common National Base for the Continued Training of Basic Education Teachers - BNC-Continued Training (2020), among other actions (ABRUCIO; SEGATTO; 2021; SATO; CASTIONI, 2022).

However, in a world of constant change, issues of everyday life that are not part of the school curriculum need to be discussed in schools, through transversality, which addresses, from a local, regional and global perspective, aspects and emerging problems of society, discussing possible solutions to the problems and promotes the awareness of the learner (ARAÚJO, 2014; LANES et al., 2015; HERRERA, 2016).

The 1997 National Curriculum Parameters, the first education document to present this approach, define transversality as the "[...] possibility of establishing, in educational practice, a relationship between learning theoretically systematized knowledge (learning about reality) and issues of real life and its transformation (learning in reality and from reality)." (BRASIL, 1988, p. 30). While the 2017 Common National Curricular Base (BNCC), a normative document for Brazilian basic education, considers transversality as "a principle that triggers modifying methodologies of pedagogical practice, integrating diverse knowledge and overcoming a fragmented conception, towards a systemic view of learning." (BRAZIL, 2022, p. 8).

The transversal themes for basic education, treated in the PCNs, were divided into six: Ethics, Environment, Cultural Plurality, Health and Sexual Orientation (BRASIL, 1997). In the National Curriculum Guidelines (DCN) of 2013, it was not determined the amount of Thematic Axes/Nurturing, teachers with students are free to choose the themes they wish to study. But in the BNCC, the transversal themes are now called Transversal Contemporary Themes (TCTs). These address six thematic macro areas: Citizenship and Civics, Science and Technology, Economy, Environment, Multiculturalism, and Health, which comprise 15 contemporary themes (BRASIL, 2018, p. 21).

In practice, the CTIs have been worked in schools as specific projects. The transversality is essential for an educational practice that supports contemporary issues, giving meaning to the knowledge produced, forming students capable of acting in life in society (OLGIN; GROENWALD, 2015). In this perspective, undergraduates in Nature Sciences from a public university recognize the importance of the insertion of SCTs in science teaching (VIÇOSA et al. 2020). Teachers of public schools in cities of the triple border Brazil, Argentina and Uruguay, understand that transversality in teaching aims to bring issues of student reality closer to traditional curricular subjects (VIÇOSA; FOLMER; SALGUEIRO, 2021).

To approach transversality, the teacher needs to have a range of information about the topic to be addressed, to make it more interesting, placing the student as the protagonist of the teaching process (GAVÍDIA et al., 2002; MODESTO, 2018). In addition, it is recommended to get *feedback* from students in order to propose actions to measure the apprehension of the concepts of the proposed transversality (RODRIGUES; DIAS; TREVISIO, 2021).

From this perspective, the approach of CTIs should problematize the reality of learning situations; overcome the fragmented conception of knowledge; integrate skills and curricular competencies to problem solving; promote a continuous educational process as collective construction. In this sense, the collaborative, intradisciplinary, interdisciplinary and transdisciplinary work is a facilitating alternative to work the contemporary cross-cutting themes successfully (PALITO et al., 2013; BRASIL, 2022).

Therefore, transversality in teacher education is of great importance, because it creates the possibility of "forming autonomous and critical individuals, with their own moral criteria and capable of facing the problems presented today by humanity." (YUS, 1998; MELLO, 2000), promoting changes in values and/or patterns of conduct of those involved, causing effective transformation in the students' way of being (CORDIOLLI, 2001).

In this sense, it is clear that transversality has been presented in Brazilian education documents, being of fundamental importance in the teaching-learning process of students. Therefore, it should be present in the initial and continuing education of teachers, so that they can deal with this approach for a more inclusive education, preparing students for a world in constant change, and it should be further discussed in the educational field.

Crosscutting themes and the Agrinho Program

The Agrinho Program created in 1996 by the National Rural Learning Service - SENAR in the state of Paraná, Brazil, arose from the need to guide rural workers on the proper use of pesticides (LAVOR et al., 2021).

The program, developed in partnership with schools from rural educational systems, was based on the transversal themes of the PCNs and has worked as an educational proposal based on collaboration, interdisciplinarity, transversality, and research. In this way, it encourages the social role of the school in forming people who are aware, critical, and capable of understanding their socio-environmental function (FIORINI, 2019).

Since its creation, Agrinho has gained great proportions, expanding its scope to several Brazilian states, including Ceará, where it has existed since 2003. It works on contemporary themes about health, personal and environmental safety, mainly with children from rural areas (BRUNO et al., 2018; SENAR, 2023). In 2022, the Agrinho Program served more than 75,000 students and 4,541 teachers from 559 rural schools in Ceará (SENAR, 2023).

In this sense, the teaching practice in the Agrinho Program is aligned with the cross-cutting themes proposed by the BNCC, whose term "contemporary" inserted into this, highlights the current nature of the 15 CTIs, divided into six Thematic Macro Areas, which are: Science and Technology; Rights of Children and Adolescents; Cultural Diversity; Food and Nutrition Education; Environmental Education; Human Rights Education; Financial Education; Fiscal Education; Education for the appreciation of multiculturalism in Brazilian historical and cultural matrices; Education for Consumption; Education for Traffic; Aging Process, respect and appreciation of the Elderly; Health; Work; Family and Social Life (BRASIL, 2022).

According to the BNCC, the CTIs "affect human life on a local, regional, and global scale" (BRASIL, 2018, p. 19), and should be treated in an interdisciplinary and multidisciplinary way, across the content of the Basic Education curriculum, due to its relevance to the lives of students (BRASIL, 2022; VIEIRA et al., 2022). From this perspective, the Agrinho Program meets the CTIs, as it advocates a critical, creative and reflective education so that both teachers and students acquire autonomy, as well as become researchers and producers of

new knowledge, enabling students to have a conscious learning process, with more flexible content to the school content established by teachers and educational teams.

Environmental education actions were developed with basic education students, who showed awareness of the importance of this theme and the seriousness of the environmental issue (RADI et al., 2013). The program has been preparing and training teachers for environmental issues in their continuing education programs (RAPHAELA et al. 2014). Agrinho has been providing differentiated and diversified methodologies to teachers, meeting the proposal of educating through research (RODRIGUES et al., 2019). Environmental Education practices carried out under the Agrinho Program, in the Municipality of Iguatu-Ceará, proved to be attractive and engaging, involving participants and project members (LAVOUR et al. 2021). The Agrinho program presented educational proposals consistent with current demands, able to overcome dualism and fragmentation caused by Newtonian-Cartesian thinking, since it demonstrated the potential to prepare participants for environmental issues and issues of social relevance of contemporaneity, going beyond the mere transmission of information (TORRES et al., 2021).

These changes in the practice of teachers who have contact with the program represent important achievements for education, impacting the quality of teaching, ensuring students the right to an education that enables them to interact actively with social life and the world they are part of.

IV. Results and discussion

In this section, an analysis of the contributions of the coordinators who participated in the training was performed, with the purpose of interpreting the perceptions of these individuals on transversality in line with the objectives of transversality and the Agrinho Program. For the analysis of the data collected in the interview form, the content analysis methodology was used (BARDIN, 2016), with the analyses of each category previously defined in the exploratory phase of the material being presented.

We will then describe the municipal coordinators of the Agrinho Program, considering variables such as gender, age, race or color, education, length of service in education and time working in the program. From the information obtained through a form, it was possible to characterize the 36 research subjects, of which 24 are women and 12 are men.

With regard to the age of the coordinators, the majority (25) are between 40 and 49 years old, while 8 are between 30 and 39, 7 are between 50 and 54, 2 are between 25 and 29, 1 is younger than 24, and 1 is older than 55. In relation to race or color, most (25) of the coordinators declared themselves as brown, while 9 declared themselves as white and 2 as yellow.

In as much as education is concerned, the vast majority of coordinators (27) have completed higher education, 7 of whom completed the course through semi-attendance and 2 did not. As for the length of service in the area of education, most of the coordinators (17) have more than 20 years experience, while 7 have between 11 and 15 years, 4 have between 16 and 20 years, 3 have between 6 and 10 years, and 3 have between 3 and 5 years. Additionally, 2 coordinators are in their first year of work in the program.

In relation to time working in the Agrinho program, most coordinators (13) have 1 to 2 years experience, while 9 are in their first year of work in the program. In addition, 6 coordinators have 5 to 10 years of experience in the program, 5 have 3 to 5 years, and 3 have more than 20 years of experience.

Perceptions of transversality and TALP

The Free Word Association technique (TALP) was used to analyze the words evoked by the participants in relation to the phrase "TRANSVERSALITY IN THE AGRINHO PROGRAM IS..." that each coordinator evoked 3 words. Based on the analysis of the repeated words, it was possible to identify three blocks of words related to the importance of transversality in the Agrinho program: Block 1, which highlights the importance of transversality as a complement to the students' education; Block 2, which emphasizes the importance of teaching contextualization and affectivity in the pedagogical practice; and Block 3, which values the importance of transversal themes and the use of creative and dynamic methodologies.

The discourse analysis of the blocks of words revealed that the participants recognize the importance of contextualizing teaching, understanding social reality, and collective responsibility for promoting transformative education and human development, as can be seen in figure 1.

Figure 1- Cloud of evoked words



Source: Prepared by the authors (2023)

In addition, the participants value the use of creative and dynamic methodologies to achieve significant results. Thus, we can affirm that the participants consider the transversality of the Agrinho program as a fundamental approach for the formation of students and for the promotion of a more meaningful and relevant education to the reality in which they live.

The blocks of words reveal the importance of contextualizing teaching, understanding social reality, and collective responsibility, in addition to valuing the use of creative and dynamic methodologies for a transformative education and human development.

When asked, of the 3 words evoked which they consider most important, the coordinators highlight the word planning most frequently, as we can see in figure 2.

Figure 2- Cloud of evoked words that the participants found most important



Source: Prepared by the authors (2023)

That said, it reveals the importance of the teacher's role in implementing the cross-cutting approach. They suggest that the approach requires careful planning and an appropriate methodology, in addition to a critical and reflective attitude towards knowledge and educational practices. Through the cross-cutting approach, teachers have the opportunity to broaden their perspectives and pedagogical practices, promoting more meaningful and relevant learning for students.

The words evoked by the participants suggest that the cross-cutting approach is seen as a fundamental tool for the Agrinho program, capable of engaging and motivating students and ensuring educational success. Moreover, the words indicate that the cross-cutting approach can be an effective way to integrate the curriculum subjects and bring the school and the community closer together, promoting engagement and collaboration among all those involved in the educational process.

What is TRANSVERSALITY for you?

According to the PCN (National Curriculum Parameters) of the Brazilian Ministry of Education, transversality "implies working with themes that are not exclusive to one discipline, but that are common to several areas of knowledge, making room to work on attitudes and values" (BRASIL, 1998, p. 28).

In this context, among the data collected, we highlight the speeches of teachers C2, C5, C7, C9, C12, C14, C15, C19, C27, and C31, who state that Transversality is in the several subjects of the school curriculum, and that it is important for the integral formation of the students, because it deals with social, cultural, and ethical issues that permeate the society in which we live.

On this aspect, other subjects commented that:

To work on a theme through diverse knowledge. How to work the Agrinho theme complementing the curriculum content of the schools. (C2)

Ability to establish, in educational understanding, a comprehensive understanding of various topics.(C15)

Transversality enables us to intervene in our own reality, to learn from it in order to transform it (C31)

Based on the perceptions of the research, it can be understood that transversality is the approach of social issues in various disciplines to promote a comprehensive understanding and relate different subjects. Moreover, transversality involves the contextualization of theory with reality, seeking to work with practice and transform reality. Transversality also enables the systematization of a subject and involves the participation of all those involved in the learning process, besides being a creative and dynamic way of learning.

How would your involvement with the Agrinho program have taken place?

The municipal coordinator is responsible for articulating, mobilizing and monitoring the actions of the Agrinho program in the municipality, involving schools, teachers and students. He is the interlocutor between the state program team and the schools, ensuring the implementation of activities, the dissemination of information, and the evaluation of results (SENAR, 2021).

In this sense, about the participants' involvement in the Agrinho program, some cite affinity, as is the case of C6, others by indication of the secretary, as observed in C3, C16, C19, C21, and C22.

On this subject, among the comments scored on the form, we highlight:

I was invited by the Secretary of Education because I have an affinity with health issues, having studied psychology in college (C9).

It is my second year as coordinator, everything is new, because my work in the secretariat is in the technical part, so I am learning a little bit every day (C29).

I love this program, but I am sure I need to improve (C25)

In view of the above, the coordinators present different forms of involvement with the Agrinho program, ranging from invitations from education departments to affinity with the themes addressed in the program. There are reports of positive and challenging involvement, as well as perceptions of gratification and love for the program. Some participants have incorporated other initiatives that address the same or complementary themes. In addition, many highlight the importance of a dynamic, interdisciplinary approach to the success of the program.

How has your practice been as municipal coordinator/trainer of the Agrinho Program?

The perception about the practice as municipal coordinator/trainer of the Agrinho Program varies between challenging, rewarding, dynamic, active, and committed.

In this sense, about their practice the participants in the Agrinho program some participants say that they are starting the work this year secretariat, as we observed in C3, C9, C12, C17, C18, C21, and C22. And they are still learning and developing plans and ideas, while others highlight the importance of dedicating time to trainings, visits to schools, and support to teachers.

About this aspect, among the comments scored on the form, we highlight

I am starting this work this year, but I am already aware of the activities that the schools have been developing in the Agrinho Program (C3).

A bit challenging, especially in relation to the time we have available and dedicated to the program activities (C19).

It has its positive points, working on themes with the teachers is wonderful, but we know that difficulties also exist, but the positive points are still my motivation (C28).

Some of them recognize that it is difficult to keep up with all the schools and reconcile the program with other activities, but they say they are committed to seeking partnerships and innovating practices. In general, the participants show themselves to be motivated and engaged in contributing to the awareness of the students about their rights, duties, and responsibilities within the community.

What challenges have you encountered in the implementation of transversality in teacher training in the Agrinho program?

The Coordinators pointed out several challenges encountered in the implementation of transversality in teacher training in the Agrinho program. Among the challenges cited, the resistance of some teachers and school coordinators to accept the program as a tool to contribute to the student's citizenship training was mentioned by C2, C3, C6, C7, C10, C11, C17, and C23.

In addition, there were reports of difficulty in planning and executing program actions within the curricular components and in reconciling the program with the prioritization of content that falls into assessments such as SPAECE, as pointed out by C9.

Another challenge pointed out by C19 was the overload of activities that schools demand from teachers, which ends up leaving them unmotivated with other activities. C2 and C11 also mentioned the lack of understanding on the part of some teachers about what transversality is, and the repetitive methodology of the program, which ends up generating resistance.

About the challenges pointed out, we highlight the coordinators' perceptions:

At first it is a bit of refusal on the part of some teachers. But I hope that during the realization of these projects, they can feel the importance of working in this way (C3).

And the resistance of some teachers and school coordinators to accept the program as a tool to contribute to the student's citizenship education, the difficulty to plan and execute program actions within the curricular components. Actions (C5).

The collision with the prioritization of the contents that fall into the SPAECE, which ends up overloading the teachers, makes them unmotivated with other activities (C9).

The accumulation of activities that schools demand from teachers has been the biggest challenge. The time available in schools to implement Agrinho activities is a big challenge (C19).

On the other hand, some municipal coordinators mentioned the importance of involving all teachers in the implementation of the Agrinho program and having the logistical support of the municipal administration. The exchange of materials that can improve teaching practice was also highlighted as an important point. Some teachers reported that they are in the process of planning the implementation of the program and expect to encounter many challenges along the way.

Therefore, it can be seen that the implementation of transversality in teacher training in the Agrinho program faces several challenges, especially the resistance of some teachers and the overload of activities. However, the active participation of schools and the support of the management, secretariat, and schools were cited as positive points that can help overcome these challenges.

V. Conclusion

The analysis carried out in this article focused on teacher training and the incorporation of transversality in the dynamics of the Agrinho program in the State of Ceará. The results showed that the municipal coordinators identify the contextualization of teaching, the apprehension of social reality, and the adoption of collective responsibility as fundamental components for the promotion of a transformative education and human development.

The data analyzed indicates that transversality, understood as the intersection of social issues in various subjects, is crucial to promote an inclusive understanding and interrelate different subjects. A variation of perceptions was observed among the coordinators about the Agrinho program, with reports of positive, challenging and rewarding experiences, as well as the integration of related initiatives, underlining the importance of a dynamic and interdisciplinary approach for the success of the program.

Transversality, when applied to teacher education, faces significant obstacles, with resistance from some teachers and the overload of activities being the most notable. However, the active participation of schools and the support of school management emerged as factors that can potentially help overcome these obstacles.

Although the results obtained in this study provide new perspectives on the Agrinho Program, it is necessary to take into account some limitations. The need to monitor several schools and reconcile the program with other responsibilities is a significant challenge. Additionally, resistance and work overload on the part of some teachers may limit the full implementation of transversality.

When comparing with previous research, it can be seen that the results obtained in this study are aligned with the existing body of literature, which emphasizes the importance of transversality in teacher training. However, the scarcity of previous studies about the practices of the Agrinho Program reinforces the relevance and unprecedented contribution of this work.

Considering future research, it is suggested that further studies be conducted to evaluate and expand the understanding of the impact and effectiveness of the Agrinho Program. In addition, future research could explore strategies to improve the implementation of transversality and address the challenges identified in this study.

Therefore, in conclusion, the research conducted reinforces the importance of teacher training and transversality in the context of the Agrinho Program. It highlights the need for more dynamic and interdisciplinary educational strategies, and highlights the potential of programs like Agrinho in promoting a contextualized and transformative education.

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