

The Contribution of Active Citizenship Actions to the Cultivation of Environmental Awareness of Preschool Students According to the Views of Teachers

Christou Pinelopi¹ & Bakopoulou Athanasia²

¹ postgraduate student, MSc, Headmaster of the 3rd Kindergarten of Xylokaastro, Greece

² EDIP, Teaching and Pedagogy of Geosciences, University of Geology, EKPA, Greece

Correspondence: Christou Pinelopi, postgraduate student, MSc, Headmaster of the 3rd Kindergarten of Xylokaastro, Greece.

Received: July 17, 2026

Accepted: August 15, 2026

Published: August 20, 2026

doi:10.65343/erd.v2i3.122

URL: <https://doi.org/10.65343/erd.v2i3.122>

Abstract

This qualitative research examines the implementation of the Active Citizen Actions in the 2025-2026 school year, in Greek Primary schools. Its aim was to investigate the views of 21 kindergarten teachers from 14 public Kindergartens in the prefecture of Corinth regarding the contribution of these actions to the formation and cultivation of students' environmental awareness. The results show that the Active Citizen Actions contribute positively to environmental awareness, the development of skills and the inclusion of vulnerable students. However, difficulties such as insufficient training, bureaucracy, increased administrative burden, limited time and technical problems are highlighted. Teachers suggest in-depth training, with examples, the reduction of bureaucracy through digital tools, the creation of a repository of good educational practices for the dissemination of knowledge and the strengthening of cooperation between school, family, and agencies. Overall, it is generally agreed that the actions had a positive impact on the all-round development of students and the cultivation of their skills.

Keywords: active citizen actions, educational innovation, environmental education, active citizenship, sustainability

1. Import

Addressing contemporary environmental issues makes it necessary to strengthen environmental education from preschool age, with the aim of cultivating responsible attitudes and sustainable behaviors. In this context, Active Citizen Actions constitute a modern pedagogical approach that promotes participation, cooperation and the development of critical thinking. Their implementation in Kindergarten contributes substantially to raising children's awareness of environmental issues through experiential learning experiences. This article explores the contribution of Active Citizen Actions to the development of environmental awareness in toddlers, highlighting the crucial role of active participation in the learning process.

2. Main Part

From the 2024–2025 school year, the "Active Citizenship Actions" Curriculum (Ministry of Education 130372/CD4/01-11-2024, Government Gazette 6048/B'/1-11-2024, IEP 67/21-11-2024) will be implemented at all levels of Primary and Secondary Education. The program incorporates the 17 Sustainable Development Goals of the United Nations (2015) and aims to cultivate skills that allow students to understand and address contemporary social, environmental and economic challenges, such as poverty, health and well-being, quality education, gender equality, sustainable development and environmental protection.

The program is based on the 17 Sustainable Development Goals of the United Nations (2015) and seeks to develop knowledge, skills and attitudes that will allow students to understand and manage contemporary social, environmental and economic challenges, such as the eradication of poverty, the promotion of health and well-being, ensuring quality education, gender equality, sustainable development and the protection of the natural environment.

In Kindergarten, the implementation of three actions per school year is foreseen, which can be integrated into the Skills Workshops and other educational activities. Each action is developed in five stages (investigation,

planning, implementation, dissemination of results and reflection), while it is recorded on the “my School” platform and can be optionally documented through an electronic portfolio (e-portfolio). (Government gazette 6048/B'/1-11-2024).

The implementation of such actions in the school environment is expected to contribute to the development of social and environmental skills, to the strengthening of cooperation between members of the school community and to the awareness of students towards sustainability issues.

Particularly in preschool education, the cultivation of environmental awareness through experiential activities can function as an important factor in shaping environmentally friendly attitudes and behaviors and active citizens with ecological and social awareness.

Despite the importance of the above initiatives, the investigation of their implementation and the experiences of the teachers who implement them remains particularly important for the evaluation of their effectiveness and the improvement of educational practice.

In this context, the present study aspires to contribute to the scientific dialogue on education for active citizenship and sustainable development, while highlighting proposals that can enhance the effective implementation of the relevant actions in the school environment.

The purpose of the research was “to study the views of primary school teachers in the prefecture of Corinth on the impact of Active Citizen Actions on the formation of environmental awareness of preschool students”.

The qualitative interview method was used to explore the views of 21 kindergarten teachers from 14 public schools in the prefecture of Corinth, such as the 1st, 2nd, 3rd Kindergarten of Xylokastro, the Kindergarten of Derveni, Pitsa, Lykorporia, Kato Diminio, Lechaio, Archaia Kleonae, 3rd Agii Theodoroi, 3rd Loutraki, 1st Korinthos, 13th Korinthos and 6th Kiato, and the research questions were formulated.

1st research question: What are the perceptions of kindergarten teachers regarding the contribution of Active Citizenship Actions to the cultivation of students' environmental awareness?

2nd research question: What are the Pedagogical Approaches, Practices and Activities that kindergarten teachers apply in the classroom when implementing Active Citizenship Actions?

3rd research question: What are the Difficulties and Obstacles that kindergarten teachers encounter in implementing Active Citizenship Actions?

4th research question: What are the teachers' suggestions for the most effective implementation of Active Citizenship Actions with the aim of cultivating students' environmental awareness?

Based on the research questions, the questions that framed the interview questionnaire were formulated, in combination with the theoretical elaboration of the work, followed by the extraction of the results, their interpretation and the formulation of the conclusions.

3. Research Methodology

The research was based on a qualitative methodology, utilizing semi-structured interviews with kindergarten teachers to explore their opinions and experiences. The interview is considered an effective tool for interpreting human behavior, as it allows for in-depth exploration through friendly and free communication (Kedra, 2008).

The participants were selected based on eligibility criteria using the website of the Primary Education of Corinth, “dipe.kor.sch.gr” and their interviews were conducted with the respect of their personal data, namely anonymity and confidentiality (Chand, 2025; Braun & Clarke, 2022).

The existence of validity and reliability in qualitative research was ensured through the process of collecting, processing and analyzing research data (Cohen, Manion & Morrison, 2018). Clarity of questions, honesty of answers, and thorough analysis of findings were required, with the researcher avoiding arbitrary generalizations (Kedra, 2008).

From the beginning, a consent form was signed by all participants in the research and the principles of the interview contract were set (Kedra, 2008). Three pilot online interviews were conducted beforehand in order to check whether the questions were understandable and whether the respondents responded to the interview questionnaire. The formulation of the questions was determined by the study of the bibliography regarding the implementation of active citizenship actions in various countries.

In its first part, the questionnaire included the Demographic data of the sample defined by age, specialty, position of responsibility, experience, scientific background, gender, training and school unit of service of the

teachers and in the second part there were 23 open-ended questions. The kindergarten teachers answered all the questions.

After the positive response of the interviewees was established, and the researcher knew that the questions were clear and understandable, the next 21 semi-structured interviews, lasting from 25 to 50 minutes, were conducted between 29-9-25 and 2-11-25, 7 by phone and 14 via WebEx, on line. This was followed by their transcription, categorization and classification of their responses per research question and per thematic axis with the aim of interpreting them and drawing conclusions from the research (Kedra, 2008).

3.1 Analysis of the Demographic Data of the Sample

After analyzing the research findings, it appears that 21 female kindergarten teachers participated in this study. Their age ranged from 32 to 60 years. Specifically, 2 individuals were aged 22-35 years, 6 individuals were between 36 and 50, and 13 individuals were over 50 years. Regarding their educational level, all of them had a degree in educational sciences and pedagogical departments of kindergarten teachers (10 individuals), a 2nd degree (1 individual), a postgraduate degree (10 individuals), a 2nd postgraduate degree (1 individual) and a doctoral degree (1 individual). Another 1 individual had a degree equivalency.

Regarding the position of responsibility, it was found that 11 exercised administrative and teaching work, 1 was a deputy head and 9 exercised only teaching work. Then, the research revealed that all of them had attended training activities related to various issues such as school bullying, credit-bearing seminars on special education, school psychology, educational programs, intercultural education, training from the IEP, the preschool education consultant, from the University of the Aegean, the National University of Athens, and the University of Patras.

They also mentioned their training in new technologies at the A' and B' levels, in green and digital skills, in annual seminars at Panteion University of Athens, but also in 400 and 450 hour seminars. Based on these, the participating teachers presented increased qualifications and were interested in their professional development on the one hand, and in the cultivation of their social and communication skills on the other.

Subsequently, their experience in public and private Kindergartens ranged from 1 to 10 years (4 people), from 11-20 years (6 people), from 21-30 years (11 people). The results of the survey, combined with excerpts from the teachers' opinions, their interpretation and the drawing of conclusions, follow.

4. Results

The qualitative research revealed that the Active Citizen Actions contributed to the cultivation of environmental awareness among students from preschool age and were linked to skills workshops and environmental education programs. The following are indicative excerpts describing the experiences of teachers. The letter «S», Corresponds to the interview number.

S4: "Preschool age is the basis of a child's development... at this age, children acquire values, attitudes, cultivate their skills, acquire responsibility and learn to protect the environment and become responsible citizens"

S1: "We made a program about water and a poster... one side of the poster had the clean sea and the other a sea full of garbage... We also discussed protecting the forest from fire, when it rained we talked about how not to waste water, we took care of indoor plants and saw how they grow and finally they brought real insects to class, they learned to respect them and not be afraid of them because they are also part of the food chain..."

S5: "Recycling, water, the forest, the schoolyard, my place, our neighborhood park, all of these are topics that spark interest and appeal to preschool children..."

S7: "We made an action the toolkit, the suitcase that we should all have organized in our home, for cases of dealing with natural disasters..."

S16: "We wanted to raise awareness among children about people with disabilities, with the parents we painted the ramp of our school..."

S18: "The little meteorologists who studied the weather and the effects of weather that affect climate change..."

Then, the Kindergartens, within the framework of the implementation of the Active Citizen Actions, engaged in various educational voluntary actions in order to acquire environmentally friendly behaviors. Following are excerpts with the opinions of the teachers.

S10: "We are enrolled in ecological schools, it was the school garden, waste management, we collect lids and gave them to the disabled association to build wheelchairs..."

S2: “We had participated in the “Archelon” organization, we had collaborated and adopted a turtle, the children gave money so that it could have food and save it, the children felt the joy of offering something and doing good to an animal...”

S6: “Our school took part in an eTwinning program, on the theme of cultural heritage...”

S7: “We made an intervention in our yard and are organizing the vegetable garden.”

S9: “With WWF, we have also offered financial assistance.”

S10: “We participated in the “global action days”, which are international networks related to the environment, ...”

S15: “We have been collaborating with “make a wish” for years, every year we also contribute as much as we can”

S17: “We offered long-lasting food and clothes to the organization “child’s smile...”

S19: “We participated in the national network, KEPEA Thessaloniki...”

S21: “We went to the forest in Xylokastro and talked in a limited space about its importance in human life and cleaned it up a bit.”

It was evident that the students cultivated environmental awareness skills, empathy, and stimulated their creativity through their participation in the schools’ voluntary actions. The following are indicative excerpts from their experiences in the school environment.

S11: “We planted trees, they came into contact with the environment, the plant kingdom, we spoke in detail about plants, their life cycle, we shot videos and talked about ways that we can adopt for children so that they do not destroy the environment...”

S16: “Awareness of environmental issues, green, recycling, not wasting water...”

S17: “With voluntary actions we come to the place of another person who does not experience the best conditions and what we are trying to promote through the Kindergarten is empathy to put ourselves in the shoes of another person and for the students to be able to understand them.”

S21: “Respect the trees, don’t start fires...”

The following are excerpts that describe the difficulties that teachers encountered in implementing the Active Citizen Actions.

S1: “In the first year, what made it difficult for me was the contact with the Municipality and the local community... I don’t know exactly how to do it,...”

S5: “We don’t have a good network and the children get frustrated waiting,...”

S8: “We don’t have any agencies. And the lack of time puts us under unimaginable pressure. Workshops, active citizenship, action plans, everyday life, internal regulations...”

S20: “Children who need some kind of supportive framework, whether parallel support or an integration section, are usually the ones who spoil the formation of the group...”

S7: Unclear training... minimal time was allocated, which I believe has a significant impact, something was done on the spot, the majority of teachers were isolated, since only the heads were invited to participate, while in reality there should have been more meetings in which the entire sector would participate, even if it were to hold a workshop outside of school hours at the Kindergarten for something that was done for the first time. An experiential workshop could have been held.”

S14: “The bureaucracy and the time that we are running to catch up with all the programs along with everything we want to do and the problem with the internet...”

S15: “The school principal trained us but I am very confused...”

S18: “I have not been trained”

S15: “I did not understand how many actions I have to do and whether I should do them as a department or as a school, joint actions...”

S20: “For Kindergarten, it has been isolated, almost nothing and some actions, most of which are for Secondary education in the IEP”

S6: “The difficulties have to do with the entire school program. There will always be children and groups that have difficulty following limits and rules. Whether they have learning difficulties or very low social skills...”

The teachers made suggestions for the more effective implementation of the actions and the following are characteristic excerpts from their views.

S6: “I believe that the most important thing in the implementation of the Active Citizen Actions is the cooperation of the school and the family and the wider society. Only in this way will children become ambassadors of change and lifestyle...”

S9: “...I would like us to have more time to involve more bodies and to open the school to society...”

S5: “More clarification is needed on the Active Citizen Actions. How can these be done in preschool classes. I would like the IEP platform to be organized a little better. Why are they excluding us when it comes to preschool education.”

S15: “Better response from the Municipality, reduction of bureaucracy and better training to solve questions...”

S4: “Some days could be green and we could dedicate them to the environment, create works of art with paper pulp, from recyclable materials, and student awareness campaigns...”

S19: “We can all do it together. Schools should be twinned, and there should be cooperation between cities and societies with common cultural and historical elements.”

S12: We should use the school yard more to do the lesson and bring children more in contact with nature...”

S18: “Participatory and informative actions should be held with the participation of parents and experiential workshops for students to prevent natural disasters...”

S10: “...I would say that emphasis should be placed on the logistical infrastructure and a provision for more hours, a little more flexible working hours, let it be one action per year but let it be done without pressure...”

5. Discussion

From the analysis of the research results and the study of the bibliography, it follows that the Actions of the Active Citizen had a positive effect on the cultivation of students' skills, critical thinking, cooperation, imagination, creativity, as well as on the cooperation of schools, the coexistence of cultures and the dialogue of peoples (Sotiropoulou et al., 2022).

Through environmental awareness activities, students cultivated their love for nature and contributed to the management and protection of the environment, and this can also be observed in the research of Elmersjo et al., 2022, De sainz Molestina et al., 2023, Tome et al., 2019. The schools collaborated with organizations, with scientists, with the parents' association and the school was opened to society.

Furthermore, respect for diversity, the prevention and response to natural disasters, and the digital literacy of students were cultivated through active citizenship actions and this emerges from the study of the literature (Sotiropoulou et al., 2022; Nakano et al., 2020; Ranta, 2023).

Subsequently, the students made use of new technologies, had access to the electronic equipment of the classroom and used the interactive whiteboard, the projector, the tablets, the tobot beebot bee as learning tools in their everyday lives.

A variety of electronic games, educational videos, software such as I move around safely in the city, canva, storyjumper, chatgpt, wordwill, wordart, kahoot, learning app, wordwall, Phototree in the context of interactive and interactive learning were mentioned. (Tome et al., 2019).

The research found that the most effective teaching method was experiential, gamified and outdoor learning, a common finding of the research by Tome et al., 2019, Monte & Reis, 2021, Sotiropoulou et al., 2022, Keith et al., 2022, Mousavi et al., 2024.

The lack of time, bureaucracy, insufficient digital equipment, financial hardship and handling students with special abilities made it difficult for teachers to implement the actions. They proposed the collaboration of the school with organizations and the family, the organization of in-school training with an environmental background, training with examples outside of school hours, and the creation of an electronic platform of good educational practices with the aim of disseminating knowledge.

6. Conclusions

In summary, Active Citizenship Actions constitute an essential pedagogical tool for cultivating students' environmental awareness from preschool age (Sotiropoulou et al., 2022; Monte & Reis, 2021). Through

experiential and participatory processes, children develop values, attitudes and skills that lead them to a responsible, active and friendly attitude towards the environment and society (Elmersjo et al., 2022; Wood et al., 2018; Sotiropoulou et al., 2022).

Environmental education school activity programs and skills workshop topics were mentioned that had to do with recycling, proper water and energy management, school cleaning, school participation in voluntary actions and environmental organizations (Mousavi et al., 2024; De Saint Molestina et al., 2023; Ranta, 2023).

Furthermore, the students learned to reduce their ecological footprint to protect the environment. They became aware of environmental issues such as global warming, floods, climate change, earthquakes, tsunamis (Elmersjo et al., 2022; Sotiropoulou et al., 2022).

They implemented action plans that had as their theme the forest, the sea, insects, growing a plant, reusing materials and clothes, protecting marine animals, creating a school garden, a vegetable garden and a herb garden, as well as painting the school ramp to protect students with special abilities (Tome et al., 2019; Sotiropoulou et al., 2022; Monte & Reis, 2021).

Some schools reported on the “little meteorologists” program, the use of toolkits for protection against natural disasters, volunteering, cleaning up parts of the city, the neighborhood park and beaches (Keith et al., 2022). Children acquired environmentally friendly habits, stimulated their creativity by improving school spaces and transforming them into attractive learning and entertainment centers (Cordiano et al., 2019; Makuch & Acrel, 2020; Hu, 2022).

The aim of the Active Citizen Actions was to improve school infrastructure and open the school to society and the family through collaborations with parents, with institutions, with organizations and with the Municipality (Nakano et al., 2020; Tome et al., 2019; Monte & Reis, 2021), with the fire brigade, with KEPEA, with an agronomist, with a geologist, with a special Kindergarten, with grandparents, with environmental education centers, with environmental organizations, with an environmental museum (Nakano et al., 2020; Tome et al., 2019; Monte & Reis, 2021).

The creation of these partnerships had a positive impact in terms of boosting trust in parent-teacher relationships, financial support for the school and its communication with society. The students engaged in original educational activities such as collecting batteries and caps to purchase a wheelchair, to support associations for children with special needs. They also learned to care for an animal, as demonstrated by the adoption and care of a turtle by the “Archelon” organization. Then they reused materials and clothes and made a doll from recyclable materials (Ampartzaki et al., 2021). They used leftover paper pulp and created artifacts and works of art using their imagination.

They also made use of new technologies and recorded their actions on the school blog, which hosted their artifacts, videos, and photos from action plans developed in class with respect for their personal data. They used the robot bee bot for the water cycle, for sea animals, and for the evolution of a plant. The students learned to program its movement and came into contact with educational robotics.

The research revealed that the students worked collaboratively, with toddlers assisting preschoolers, in mixed groups, and the roles alternated, with one taking photos, another cutting, another gluing, and someone else representing the group. The kindergarten teacher had a coordinating and supportive role in the formation of the groups (Nakano et al., 2020; Tome et al., 2019; Akhwani & Wahyudi, 2020; Ampartzaki et al., 2021; Cordiano et al., 2019).

The difficulties faced by teachers are summarized in the inadequate logistical infrastructure, problematic internet connection, lack of technical support, bureaucracy, unclear training and administrative burden. They also sought more experiential educational activities and contact with scientific personnel who would come and speak in schools about environmental issues (Hu, 2022; De Sainz Molestina, 2023; Heggen et al., 2019).

Another teacher suggested organizing green days for the environment with artwork and student awareness campaigns. Collaboration with ecological schools and green schools was also proposed, with the aim of cultivating students' social skills. A kindergarten teacher approached the cultivation of students' environmental awareness through creative writing and the development of students' skills.

The research showed that symbolic play, the collaborative teaching method, differentiated and inclusive education, the use of new technologies, and the classroom contract, assisted in student collaboration and participation in the activities (Tome et al., 2019; Nakano et al., 2020; Akhwani & Wahyudi, 2020; Ampartzaki et al., 2021).

Then the teachers followed some pedagogical practices in managing the students such as carrying out simple and interesting activities, creating a team spirit and assisting the pre-kindergarteners by the toddlers.

The research revealed the need for in-depth training of kindergarten teachers with examples of good educational practices in order to inform and understand the importance of Active Citizenship Actions in shaping the environmental awareness of Kindergarten students.

There is also a need to create a repository of active citizenship action plans which is enriched annually with new activities related to preschool education so that preschool teachers can apply them in their classrooms.

Proper planning and design of actions, cooperation between kindergarten teachers, the school and the family will assist in raising students' awareness of environmental issues and in solving real-world problems.

Furthermore, improving the logistical infrastructure of Kindergartens, strengthening their digital equipment and promoting e-learning will enhance the digital skills of students and teachers in order to make teaching and learning more attractive and for the computer to become a tool for knowledge, learning and entertainment in everyday educational practice.

It would also be useful for the school to collaborate with kindergarten teachers for parallel support in order to inform students about environmental issues and to include students with learning difficulties. Differentiated pedagogy is a means of socialization and balanced development of the inclinations, talents and abilities of all students (Nakano et al, 2020; Sotiropoulou et al, 2022).

Subsequently, providing more time for understanding and implementing the actions and reducing bureaucracy and administrative burden would have a positive impact on the effective implementation of the Active Citizen Actions. More information and training activities could be organized in schools to cultivate environmental awareness skills among students and parents.

The contribution of educational leadership to creating a climate of teamwork, camaraderie and cooperation among all those involved in the educational process and in opening the school to the world is also crucial (Nakano et al., 2020). It would be useful to provide psychological support to parents with students with disabilities to adopt an inclusive policy in schools whenever possible.

A future quantitative study in a larger range of schools may shed light on the field of Active Citizenship Actions and their contribution to the all-round development of students (Edmonds & Kennedy, 2024), since the conclusions of the present study cannot be generalized due to the limited sample, the subjectivity of the interpretations of the results by the researcher and the duration of the research, which does not allow for the long-term effects of Active Citizenship Actions on the formation of students' environmental awareness.

In conclusion, these proposals highlight the need for further systematic and multidimensional research, which will strengthen scientific knowledge about environmental education and the role of active citizenship in Kindergarten.

In conclusion, this paper, as a stimulus for thought and reflection, underlines that the cultivation of environmental awareness and active citizenship is not a fragmentary educational practice, but a long-term pedagogical process that begins from the first years of a child's life.

Strengthening Active Citizenship Actions in Kindergarten can contribute to the formation of tomorrow's citizens with environmental responsibility, social sensitivity and active participation in public life, elements necessary for addressing contemporary environmental and social challenges.

References

- Akhwani, & Wahyudi, A. (2020). Building students' eco-citizenship through engaging the *Green Youth* community in Wonosalam, Jombang. *Education and Human Development Journal*, 5(2), 98-118. <https://doi.org/10.33086/ehdj.v5i2.1779>
- Ampartzaki, M., Kalogiannakis, M., & Papadakis, S. (2021). Deepening our knowledge about sustainability education in the early years: Lessons from a water project. *Education Sciences*, 11(6), Article 251. <https://doi.org/10.3390/educsci11060251>
- Braun, V., & Clarke, V. (2022). *Thematic analysis: A practical guide*. SAGE.

- Chand, S. P. (2025). Methods of data collection in qualitative research: Interviews, focus groups, observations, and document analysis. *Advances in Educational Research and Evaluation*, 6(1), 303-317. <https://doi.org/10.25082/AERE.2025.01.001>
- Cohen, L., Manion, L., & Morrison, K. (2018). *Research methods in education* (8th ed.). Routledge.
- Cordiano, T. S., Lee, A., Wilt, J., Elszasz, A., Damour, L. K., & Russ, S. W. (2019). Nature-based education and kindergarten readiness: Nature-based and traditional preschoolers are equally prepared for kindergarten. *International Journal of Early Childhood Environmental Education*, 6(3), 18-36.
- De Sainz Molestina, D., Galluzzo, L., Rizzo, F., & Spallazzo, D. (Eds.). (2023). *Proceedings of IASDR 2023: Life-changing design* (9–13 October 2023, Milan, Italy). Design Research Society. <https://doi.org/10.21606/iasdr.2023.899>
- Edmonds, W. A., & Kennedy, T. D. (2024). *An applied guide to research designs: Quantitative, qualitative, and mixed methods* (2nd ed.). SAGE.
- Elmersjö, M., Koziel, S., Hultman, L., Bertilsdotter Rosqvist, H., Hallqvist, J., & Johansson, S. (2022). Swedish citizenship through multicultural parenting: Parental support as a learning practice for migrant parents in Sweden. *European Journal of Social Work*, 25(2), 329-340. <https://doi.org/10.1080/13691457.2020.1820451>
- Heggen, M. P., Sægrov, B. M., Goga, N., Grindheim, L. T., Bergan, V., Krempig, I. W., Utsi, T. A., & Lynngård, A. M. (2019). Children as eco-citizens?, *Nordina*, 15(3). <https://doi.org/10.5617/nordina.6186>
- Hu, H. (2022). Rethinking nature journaling in the kindergarten program: Action research in learning and teaching. *Journal of Outdoor and Environmental Education*, 25, 159-179. <https://doi.org/10.1007/s42322-022-00095-0>
- Kedra, K. (2008). *Interview methodology*. Retrieved from <https://www.adulteduc.gr>
- Keith, R. J., Given, L. M., Martin, J. M., & Hochuli, D. F. (2022). Environmental self-identity partially mediates the effects of exposure and connection to nature on urban children's conservation behaviours. *Current Research in Ecological and Social Psychology*, 3, Article 100066. <https://doi.org/10.1016/j.cresp.2022.100066>
- Makuch, K. E., & Aczel, M. R. (2020). Eco-citizen science for social good: Promoting child well-being, environmental justice, and inclusion. *Research on Social Work Practice*, 30(2), 219-232. <https://doi.org/10.1177/1049731519890404>
- Monte, T., & Reis, P. (2021). Design of a pedagogical model of education for environmental citizenship in primary education. *Sustainability*, 13(11), Article 6000. <https://doi.org/10.3390/su13116000>
- Mousavi, N., Ahmadi, S., Sani, M. S., Irandoost, S. F., Charengani, M. A. M., & Abdolhai, Z. (2024). Identifying environmental education strategies for children with an emphasis on children under four years old: A qualitative study in Iran. *Heliyon*, 10, Article e37161. <https://doi.org/10.1016/j.heliyon.2024.e37161>
- Nakano, G., Yamori, K., Miyashita, T., Urra, L., Mas, E., & Koshimura, S. (2020). Combination of school evacuation drill with tsunami inundation simulation: Consensus-making between disaster experts and citizens on an evacuation strategy. *International Journal of Disaster Risk Reduction*, 51, Article 101803. <https://doi.org/10.1016/j.ijdrr.2020.101803>
- Ranta, M. (2023). Can we see our voices? Young children's own contributions to authentic child participation as a pillar for sustainability under the United Nations Convention on the Rights of the Child (UNCRC). *European Early Childhood Education Research Journal*, 31(6), 914-931. <https://doi.org/10.1080/1350293X.2023.2214716>
- Sotiropoulou, E., Moysiadou, E., & Tsioumis, K. (2022). Global citizenship, solidarity and diversity in preschool age: An educational action research. *International Journal of Education*, 14(3), 73-88. <https://doi.org/10.5296/IJE.V14I3.20172>
- Tomé, V., Lopes, P., Reis, B., & Dias, C. P. (2019). Active citizenship and participation through the media: A community project focused on pre-school and primary school children. *Comunicação e Sociedade*, 36, 101-120. [https://doi.org/10.17231/comsoc.36\(2019\).2347](https://doi.org/10.17231/comsoc.36(2019).2347)
- Wood, B. E., Taylor, R., Atkins, R., & Johnston, M. (2018). Pedagogies for active citizenship: Learning through affective and cognitive domains for deeper democratic engagement. *Teaching and Teacher Education*, 75, 259-267. <https://doi.org/10.1016/j.tate.2018.07.007>

Copyrights

The journal retains exclusive first publication rights to this original, unpublished manuscript, which remains the authors' intellectual property. As an open-access journal, it permits non-commercial sharing with attribution under the Creative Commons Attribution 4.0 International License (CC BY 4.0), complying with COPE (Committee on Publication Ethics) guidelines. All content is archived in public repositories to ensure transparency and accessibility.