

Caring for the environment in an inclusive school: The Adiwiyata Green School program in Indonesia

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This research explores the development of environmental caring character through the Adiwiyata Green School program, with particular reference to a school's inclusive provision for students with special needs. This study used the CIPP (context, input, process, product) evaluation model, including semi-structured interviews, observations and document analyses for data collection. The results illustrate that the program succeeded in disseminating motivation and environmental care to both students with special needs and regular students, providing a foundation for sustainable development. This study contributes to the expansion of theoretical discourse and the practice of character development in environmental care by considering the needs and privileges of students.

Introduction

Sheehy, Budiyanto, Kaye and Rofiah (2017) argued that many teachers respond and believe that inclusive schools have stronger social constructions than special and regular schools. However, the optimisation of inclusive schools in Indonesia is struggling to solve problems around teacher's readiness, school infrastructure, lack of government socialisation, managerial skills, and partnerships between schools and private parties (Rasmitadila & Tambunan, 2018). Although inclusive education is progressing, the narrow concept and policy of the government and the community's acceptance of inclusive schools are the actual benchmarks of Indonesian education (Maryono, 2016; Poernomo, 2016). For instance, the task of the government house is the fulfillment of basic and universal rights for ABK (Anak Berkebutuhan Khusus, children with special needs) that have not been touched. Resource constraints and environmental responses are not yet fully responsive and there are still many schools that provide inclusive education that is not appropriate with regard to their educational needs. Inclusive school education must put more emphasis on fairness in providing services for all children, in terms of

curriculum, learning process, assessment, and intervention related to various behaviours and obstacles experienced by special needs children (Rasmitadila, Tambunan & Rachmadtullah, 2018)

Based on the UN's *Sustainable Development Goals* (SDGs) perspective, the green school program is an important implication for the formation of desirable personal qualities in improving knowledge, various norms, and ethics (United Nations, n.d.). Through education in the school environment, the program requires an excellent collaboration between students, teachers, school leaders, and related parties on an ongoing basis (Moore, O'Leary, Sinnott & O'Connor, 2019). This program seeks to foster the school community's awareness of the environment by developing a character responsibility for making an effort to save the environment and promote sustainable development (Lace-Jeruma & Birzina, 2019). Nowadays, most of the community want to achieve a higher standard of living (welfare), but often ignore the wise consumption of natural resources, are less concerned about being environmentally friendly, and fail to think about what will be left for future generations (Parker, Prabawa-Sear & Kustiningsih, 2018). Desfandi, Maryani and Disman (2017) maintained that eco-school or green school programs in the *Adiwiyata* concept require commitment from all school components to attain increases in student eco-literacy. The lack of opportunities and participation for students to be involved in this program is a big challenge (Brodie, 2017), so schools need capable and responsible facilitators to increase the success of environmental education training (Zala-Mezö, Bormann, Strauss & Müller-Kuhn, 2019).

One example of an inclusive school that promotes the SDGs is SMK Negeri 3 Probolinggo (a state vocational school). This school is designed to accommodate all students, including those with special needs, to get an education that matches the student's abilities and needs. For students with special needs, a modified curriculum according to their needs was developed, while regular students use the national curriculum as stated by the *Individuals with Disabilities Education Act* (IDEA). It is essential to provide access to students with special needs to get the same curriculum as regular students, wishing that both will get the same instruction on important concepts (Butler et al., 2003).

In Indonesia, the guarantees for the operation of inclusive schools are made through *Regulation of the Minister of National Education (Permendiknas) Number 70 of 2009* concerning inclusive education for students who have disabilities and have potential intelligence and/or special needs (Minister of National Education, 2009). Articles 6 and 10 emphasise that the state is obliged to ensure the availability of resources, including special assistant teachers, in each inclusive school.

The school also implements a character education program, namely *Adiwiyata Program*, where *Adiwiyata* means green. The green school program is expected to be a laboratory for the practice of environmental care activities to reduce waste such as plastic, conserve energy and conserve water, by promoting a healthy lifestyle, and developing active partnerships with communities (Desfandi, 2015). Thus, students get the opportunity to learn about the values of environmental care so that they can become the development agents who are more oriented towards green sustainability.

In the literature on inclusive schools in Indonesia, few studies have evaluated the pattern of character development, in particular, environmental caring character at inclusive schools (Aini & Siswono, 2014; Al-Anwari, 2014). The central focus of this study is to develop an understanding of strengthening the character of an inclusive school through the implementation of the Adiwiyata eco-school program. The purpose of this study is based on the following research questions.

1. How does the Adiwiyata Program develop an environmental caring character in SMK Negeri 3 inclusive school Probolinggo?
2. To what extent has environmental caring character been developed within the Adiwiyata Program?

Literature review

Character education in Indonesia

Education for Sustainable Development (ESD) is an integral part of the quality of education and the encouragement of sustainable development. Education plays an important role in promoting the SDG program, especially the fourth SDG, namely quality education. The fourth SDG promotes inclusion, quality and equality in education (Sunthonkanokpong & Murphy, 2019). Character education is an educational approach designed to guide and support the younger generation in achieving the three most important goals in life, namely: (1) becoming an individual with adult character, (2) building affectionate relationships and family, and (3) contributing towards society. The purpose of character education is to teach children to become citizens who are disciplined and morally responsible. Character education teaches about the basic values of human life, including the values of honesty, kindness, generosity, courage, freedom, equality and respect. The cultivation of character education can be seen through the personal growth of students and the ability of students to fulfill their social responsibilities as citizens (Abdullah et al., 2019; Peterson, 2020).

Strengthening character education is one of the main education programs in Indonesia. Education and culture implements the strengthening of the character of the next generation of the nation through the *Strengthening Character Education* (PPK) movement, which was introduced in 2016. Character education at the basic education level must get a larger portion of classroom time compared to education that teaches knowledge. The primary school level is 70 percent and the junior secondary school level is 60 percent (Kemendikbud, 2017). Character education is the main foundation of education, because concern for cognitive skills is complemented by encouraging national education to also pay attention to heart (ethics and spirituality), feeling (aesthetics), and sports (kinesthetic). Character education is related to a higher level of love, integrity, compassion, and self-discipline (Jeynes, 2019; Temiz, 2019).

Five main characters come from Pancasila as the development of character education, namely religious, nationalism, integrity, independence and mutual cooperation. The five values do not stand and develop alone but interact with each other, develop dynamically

and form a whole. Religious character values reflect faith in God Almighty. Nationalist character values are a way of thinking, having attitudes, actions that show loyalty, concern, high respect for language, environment, social, culture, economy and national politics, as well as placing the interests of the nation and the state above the interests of themselves and their groups. The value of integrity character is a value that underlies a person's behaviour. Independent character values are attitudes and behaviours that are not dependent on others and use all energy, thoughts, time to realise hopes, dreams and ideals. The character value of mutual cooperation reflects the act of respecting the spirit of cooperation in solving common problems (Meindl, Quirk & Graham, 2018; Saidek Islami & Abdoludin, 2016).

Character education does not change the curriculum structure, but only strengthens the 2013 curriculum, which includes character education. The application of character education slightly modifies the intra-curricular to have more content on character education and adds activities in co-curricular and extracurricular activities, so that the integration of the three is expected to foster character and strengthen positive character for students. Character education encourages three synergies of education centres, namely school, family and community, so that it can form an educational ecosystem (Angraini & Kusniarti, 2016; Suherman et al., 2019).

Environmental caring for student with special needs

Inclusive education is a school approach where students with various types of disabilities and learning needs are educated in classes with non-disabled students. The principle of an inclusive school is to not separate students with disabilities and non-disabled students, so that students with disabilities will get moral support and can spend time with their peers who are not disabled. In Indonesia, integrated education is currently directed at inclusive education as an ideal forum that is expected to be able to accommodate education for all groups (Wahyuni & Mulyadi, 2017).

Inclusive education in Indonesia is (1) a continuous process and effort to find ways to address the various needs of individual children; (2) giving serious attention to methods to overcome barriers to children's learning; (3) providing an understanding that young children are present (in school), participate actively and acquire knowledge that is important for their future life; and (4) designed and directed especially for children who need special education. To build an inclusive education model with full, partial or special classes in ordinary schools, there are several indicators that can be considered, namely (1) the number of children with special needs being served; (2) the types of special needs for each child; (3) the gradation of abnormalities in children with specific needs; (4) availability and readiness of educational personnel; and (5) available facilities (Ediyanto et al., 2017).

Until now, most Indonesian children with special needs such as the blind, deaf, and mentally retarded, have attended special schools for everyone with disabilities (SLB), or in special schools for some people with disabilities (SDLB), whilst only a few regular schools have been willing to accept children with special needs. The pursuit of compulsory

education of nine years of basic education and the government's commitment to UNESCO, namely education for all, is a strategic solution that must be built to overcome the problem of education for children with special needs (Maciver et al., 2019).

There are two forms of environmental concern for children with special needs in Indonesia, namely segregation and integration. Segregated education in Indonesia is known as a special school with its units, while the integrated form of education consists of integrated education (becoming one with non-disabled children and using the general school curriculum) and inclusive education (associating with non-disabled children, using a curriculum according to the needs of students having special needs). Inclusive education will be able to provide opportunities for students with disabilities to attend school, though the limited number of inclusive schools in Indonesia requires increasing. However, several studies have found that there are still many obstacles in running inclusive schools in Indonesia (Budiarti & Sugito, 2018; Efendi, 2018).

Method

Qualitative methods were chosen to investigate the results of implementing the Adiwiyata Program under the educational program evaluation model, CIPP (context, input, process, product). Compared with program evaluation models such as the Kirkpatrick model, the CIPP model is more comprehensive in a broader scale of education (Chinta, Kebritchi & Ellias, 2016), such as for evaluation of teacher teaching and training programs (Gullickson et al., 2019; Shih & Yuan, 2019). This model also helps clarify data collection and classification of each subcategory, qualitatively based on CIPP criteria (Lee et al., 2019). Evaluation indicators include mappings of the effectiveness, efficiency, adequacy, leveling, accuracy, and responsiveness of the Adiwiyata Program (Wahyuningtyas et al., 2013). In the CIPP evaluation model, the indicators will be analysed based on the context, inputs, processes, and products produced by the program (Stufflebeam & Zhang, 2017).

Participants

Three groups, students, teachers and school principals, were involved as informants. SMK Negeri 3 Probolinggo is a vocational school at the middle level which has 5 areas of specialisation, namely hospitality and tourism services, culinary, beauty, fashion, and visual communication design. We used a purposive sampling technique (Tongco, 2007; Boddy, 2016) for data collection that drew upon 912 students, 49 teachers and 20 staff. Students' ages ranged from 15 to 18 years with average age 16 years, and class sizes averaged 30 students. The allocation of time for Adiwiyata activities outside of school hours is 4-5 hours per week. Usually, in school policy, there are student extracurricular activities in making patchwork/recycled materials, and in making and maintaining biopores and growing hydroponic plants.

Data collection

Data collection was carried out during February 2019 to July 2019. Semi-structured and open-ended interviews were conducted at the school, with durations ranging from 60 to

90 minutes. Interview questions for students concerned ecological literacy, environmental attitudes, and their participation in the Adiwiyata Program. Interviews were in Indonesian, with translations into English for the purposes of illustrative quotations being made by the authors.

The researchers made direct observations in the school environment, including teachers' work areas, offices, classrooms, toilets, and the schoolyard. Also, data collection required support from document studies, including photographs of Adiwiyata Program activities, school vision and mission documents, and student journals. The use of various methods in collecting data and informants helps triangulate data to improve the validation of data findings (Denzin, 2009).

Data analysis

The entire data collected was analysed using data coding according to Strauss and Corbin (1990), including the processes of coding, re-reading, and regrouping data findings so that the data group that fits the category is obtained. The researchers transcribed the recorded interviews, followed by reading slowly and carefully to gain full understanding from the informants' point of view. This stage, according to Fraenkel and Wallen (2006), is intended to explore the meaning of the text that has been compiled. Based on data analysis using triangulation, several categories are arranged, from which themes emerge that are then identified, coded inductively (data-driven) from raw qualitative data and deductively (theory-driven) from the results of previous studies (Boyatzis, 1998; Creswell & Creswell, 2017). This study was carried out with an objective of wanting to express the involvement of all informants in the Adiwiyata program.

Results and discussion

Key approaches to build character: Equality and habit-forming

The data showed 22 inclusion students at SMK Negeri 3 Probolinggo, consisting of 9 male students and 13 female students. Their disabilities included deafness and mental retardation in borderline, disabled, autistic and slow learner categories. For students with special needs, there are teachers who are appointed as *Special Accompanying Teachers* (GPK) who have received training from the city, private education offices and the ministry of education and culture. To incorporate the needs of ABK (students with special needs) and the Adiwiyata program, the school has adopted the curriculum and provided supporting infrastructure including availability of a special room for inclusion counseling activities. The school has implemented a policy of scheduling duties for children with special needs to water plants, sweep the yard and care for plants in the school garden. Environmental awareness programs are integrated into lesson planning. For example, the teacher inserts forms of environmental conservation and waste management in the environment around the school into the learning materials.

Three of the best-known aspects of character education include aspects of knowledge (cognitive), affection (feeling), and action. With these three, a person's character will be

formed and developed, while the shortcomings in one aspect may result in character education not being conducted effectively (Komalasari & Sapriya, 2016). Character education that targets civilisation into the environment is often called environmental education. Environmental education aims to build understanding, awareness, attitudes, behaviours, and responsibilities towards natural environment management, and encourage concern for sustainable development (Esa, 2010).

Environmental education should include individual participation in environmental preservation efforts concerning the environment today and in the future (Murtalaksono et al., 2011). The Adiwiyata Program is one of many environmental programs applied in school institutions with environmental education missions (Smith, 2019; Stevenson, 2007). The formation and development of an environmental caring character through environmental education needs to be monitored and evaluated to ensure the achievement of program objectives (Littman-Ovadia & Steger, 2010; Stedje, 2010). In this context, the school has a role as a learning environment that applies the concepts of *green school* and *green curriculum*. The realisation of the two concepts is through habituation and example in applying ecological culture in schools. The environmental caring character can be formed by habituation in students' daily activities (Desfandi et al., 2017). According to Somwaru (2016), both concepts are the basis for implementing the Adiwiyata Program in Indonesia. The principal stated:

The strategy for the success of the Adiwiyata Program is several things ... learning tools integrated with environmental culture. In addition, an increase in the budget allocation [for] green school funds compared to the previous year. All school members have a commitment and sense of responsibility in maintaining and maintaining plants, disposing and sorting trash between organic and inorganic, dry, and wet ... Recycling activities are also used in developing learning practices. (Principal, SMKN 3 Probolinggo)

SMKN 3 Probolinggo has a mission to develop environmental caring characters realised from a series of action programs (Table 1). From the evaluation results of using the CIPP model, it was found that the action programs carried out by this school could be categorised into four types, namely teacher resources, curriculum, facilities and infrastructure, and quality control.

First, the quality of teachers in schools is deeply considered, which can be seen from teacher's competence and task division according to expertise. There is a division of tasks and functions according to the characteristics of an inclusive school so that teachers are divided into class teachers and accompanying teachers. The existence of an accompanying teacher is essential, considering them as individuals who are well-trained to have expertise in developing students with special needs. The importance of the competence and role of the teacher assistant is reinforced by a statement from Mrs B, a teacher who is accompanying children with special needs:

Table 1: Evaluation of the CIPP model on the Adiwiyata Program

Model evaluation	Indicator	Realisation
Context	Background	The target of the Probolinggo city government is to receive the government's most-prestigious clean and green award (<i>Adipura Kencana</i>) by involving school institutions.
	School mission	The school's mission is to carry out healthy behaviours, save energy, care for environmental sustainability that is environmentally sound.
Input	Infrastructure	Facilities for study room, practice rooms, and consulting rooms for students with special needs; Availability of waste banks, fertiliser processing, hydroponics, biodiesel, organic and inorganic trash cans in all rooms.
	Teacher resources	60% of teachers hold a masters degree, and more than 90% are certified; Inclusion teachers graduated from inclusive teacher training; The Adiwiyata teacher team receives workshops from the education office, the environmental office, and the Ministry of Education.
Process	Learning	Special curriculum for students with special needs according to their needs and the national curriculum for regular students; Subject teachers provide more assistance to students with special needs.
	Services for students with special needs	One teacher assists every inclusive student; The counseling teachers monitor the progress of students with special needs.
	Funding	Education funding assistance from the central and provincial governments.
	Monitoring	Monitoring through clean Friday program to evaluate the achievement of independent eco-green targets; There is an appreciation for the class that meets the Adiwiyata standard indicators; Evaluation and follow-up is carried out continuously by the school Adiwiyata team and Health Office.
Product	Waste management	Waste management applies the 3R concept (reduce, reuse, recycle); Making compost from recycling organic waste.
	Economical products	Produced from recycling waste such as patchwork, bags, wallets.
	Environmental competition	Waste/environment day competition, earth day competition, environmental hygiene competition, and others.

With various types of limitations experienced by inclusion students, each student is monitored, observed by one competent teacher, [obtains] training and has a Principal's Decree ... [The accompanying teacher] is tasked with observing the progress of each ABK student both inside and outside the classroom. This becomes the school's effort to deal with them without discrimination with other students. (Accompanying teacher, Mrs B.)

Second, the school applies two different curricula, namely the national curriculum for regular students and a particular curriculum for students with special needs. The curriculum for students with special needs pays extensive attention to the characteristics

and needs of each student who is also monitored by counseling teachers. Furthermore, subject teachers provide approaches, learning models, and evaluations that pay attention to the special needs of each student. For example, a child with special needs, Student SN1 stated:

We are treated the same as other students. But the teacher did not demand and obliged us to participate which was too draining energy and mind. We swept, cleaned the room, cleaned the dust that had stuck to the window, turned off the lights and water faucets, erased the blackboard ... We were monitored ... by our assistant teacher. Teachers often coordinate with parents in terms of students' daily activities. They always ask about our progress. We are also often invited to communicate with other regular students, especially in the classroom, Sir. (Student SN1)

Third, the facilities and infrastructure owned by the school support the implementation of the Adiwiyata Program, namely applying 3R concept (Reuse, Reduce, Recycle) through the waste bank, waste sorting started from different types of bins, as well as recycling the waste to be products with economic value. This last point also gives motivation and independent life skills for students. Fourth, to maintain the sustainability of the Adiwiyata Program, the school made several policies related to quality control of this program. Monitoring is carried out every week to assess the class according to Adiwiyata standards. The school also partners with the local education office to evaluate the implementation of this program so that it can successfully implement a green school independently.

The Adiwiyata Program has four aspects in its implementation, namely aspects of environmentally sound school policies, environment-based school curriculum, management of school's supporting facilities that are environmentally friendly, and participatory-based activities. Compared to other schools, the implementation of the four aspects is characteristic of a school implementing the Adiwiyata Program. Practically, the habituation of environmentally caring behaviour has become self-control, which is conditioned by all of these aspects, for all school members (Fua et al., 2018). Later, the habituation shapes the behaviour of autonomy through the habit of maintaining green sustainability. For example, a teacher, Mrs C. said:

Schools provide socialisation to the community and student guardians regarding the importance of the integration of schools, families, and communities in realising clean and healthy lifestyles. We are also active in competition activities [such as] organised by schools, related agencies, or by the Probolinggo city government. We always participate in green environmental cultural competitions, recycling, and others. Furthermore, the implementation of the Adiwiyata SMKN 3 Probolinggo program also has three foster schools in this district. (Teacher Mrs C.)

First, in administrative documents and curriculum, the government creates a legal basis relating to Adiwiyata which must be carried out by every school. From the perspective of the curriculum concerning school administration in SMKN 3 Probolinggo, environmental culture has been integrated with all subjects. The teachers must put in the environmental-based contents or material in an integrated manner into the syllabus and lesson plan. Although not all subjects had a direct connection with the Adiwiyata Program, this

integration needs to be attempted. For example, in the Fashion Design program, the hidden curriculum containing values of environmental care is indicated by the use of patchwork. The patchwork becomes a raw material to be processed and produced by students so that it has economic value.

Second, from all the elements and indicators of the Adiwiyata schools, the selection and sorting of organic and inorganic waste has become a fundamental activity that must be understood by all school members. Organic waste can be processed into fertiliser, whilst inorganic waste like plastic can be recycled and might be used in the practice process in various expertise program in SMKN 3 Probolinggo. Based on the data obtained through observations, interviews and documentation, though more than 80% of students bring a packed meal from home, the use of plastic is also minimal. The school and student cooperative provide plastic plates, bowls, and cups for their needs. In classrooms, many teachers use information and communication technology (ICT), laptops, and projectors to minimise the use of markers. In addition, assignments and materials are also sent through social media such as *Telegram*, *Whats.App*, *Edmodo*, and others. Compared to writing, many inclusion students are more interested and happy to use a smartphone. They understand the use of ICT in accordance with its capabilities and their needs, though smartphones and laptops can only be used when subject teachers provide direction and requirements for them to use a smartphone or laptop. Hence, the school does not only focus on Adiwiyata Program but also has utilised ICT as an important aspect in supporting the success of the learning process.

Eco-school Adiwiyata: Efforts to build environmental caring character

The effectiveness of the Adiwiyata Program also appears to be seen in several vocational programs. In the fashion design program, cloth waste such as patchwork is used and processed into products such as mats, blankets, bags, and so on. In the culinary art program, students are able to make Katu Leaf Choux Pastry in which the ingredients are gained from the school area. Furthermore, the hospitality accommodation program has a business, namely school laundry. Detergent packaging is recycled into wallets, bags, accessories, and so on. If the packaging is made from plastic, the students process it to become the material for making costumes. Students take advantage of waste and leftovers, such as bottles and paint, which are processed to become various school ornaments, for example flower pots (Figure 1). It shows that the Adiwiyata Program helps develop student's skills in managing their environment.

The school's support in developing the Adiwiyata Program is captured in the allocation for the Adiwiyata Program in budget planning. Of the total school budget for the 2018/2019 academic year, 20% was allocated to facilities and infrastructure, and around 8% for the Adiwiyata Program. One of the budget manifestations is the implementation of "recycling" extracurricular activities for the 2019/2020 academic year. It proves that the school is committed to improving and developing a green culture for all school members. In addition, SMKN 3 Probolinggo also has three impact schools across three different villages, namely Jati, Pilang and Mayangan. The school supports the strengthening of the Adiwiyata Program through the implementation of various types of

environmental competitions, such as an environmental day competition and earth day competition (Figure 2). These activities were carried out through a school partnership with education and health services in Probolinggo city.



Figure 1: Greening the school environment carried out by students



Figure 2: Participation of students in the environmental competition

The internalisation of knowledge has an important function in shaping a student's awareness of green sustainability. In this context, the teacher becomes the centre for information as well as a role model of a pro-environment character. In the initial stage (entry-level variable), the presence of the teacher gives knowledge and motivation to develop student's empathy for the environment. This process is carried out repeatedly and consistently so that students will move to the stage of understanding in depth (ownership variable). Both of these stages have not attained concrete actions unless equipped with skills, confidence, and intention to take action (Hungerford & Volk, 1990). Students must obtain knowledge about ecological principles, a sensitivity and concern for the environment, and actions that can contribute to the sustainability of ecosystems, to achieve ecological literacy (Bruyere, 2008). Eco-literacy is understanding what an ecosystem is, how it functions, and how to regulate it through a system for sustainability (Esposito, 2009). For example, Student SN2 emphasised:

With this Adiwiyata school activity, we are very happy. We are happy because we also practise when at home, such as always throwing trash in its place, turning off the water faucets, TV, fans if not needed. Sorting dry and wet rubbish at home, Sir. We help parents sweep, clean dust, mop the floor on Sundays. We also clean the dust on windows and other places such as tables and chairs. (Student SN2)

In order to creating an ecologically-cultured school environment that is clean, beautiful, and comfortable, the Adiwiyata Program requires the participation of all school members (Warju et al., 2017). From their active participation in the Adiwiyata Program, it can be understood that the development of ecological culture is increasingly easy to do when they are involved and have the freedom to learn and participate (Monaghan & Curthoys, 2005). Schools should support this process by providing adequate infrastructure for the Adiwiyata school program. The involvement of all school members in infrastructure management must be carried out in order to support the Adiwiyata Program (McGinn, 2014). Such involvement also relates to the ability of each member to react, identify, and solve environmental issues (Locke et al., 2013; McBride et al., 2013).

Conclusion

Character development needs to be carried out thoroughly at all levels and types of education, including inclusive schools. One of the qualities that has become mandated in the *Character Education Strengthening Program* (PPK) is a concern for the environment. This study focused on research to explore pro-environmental character development efforts and the effectiveness of the Adiwiyata Program held at SMK Negeri 3 Probolinggo. The Adiwiyata Program in this school successfully provides literacy and skills to students with special needs and regular students in managing the environment. The effectiveness of the program is realised through the optimisation of personnel resources, curriculum, facilities and infrastructure, and a seriousness in maintaining quality control. The results of this study can be an extension of the theoretical discourse and the implementation of character development in environmental care in inclusive schools.

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Appendix: Semi-structured interviews

Student focus group

1. Do you enjoy your school implementing the Adiwiyata Green School program? Why or why not?
2. Are there specific subjects in relation to the Adiwiyata Green School program? (If yes) How does the teacher make you interested in environmental topics?
3. “Our earth is damaged”. Do you agree with this statement? What makes you believe/not?
4. What do you feel if humans are the main factor in environmental damage?
5. Have you had any engagement with environmental protection surrounding your home?
6. Are there extracurricular activities that involve environmental protection at school?
7. Do you think the school has adequate infrastructure to support the Adiwiyata Green School program?
8. Are there appropriate punishments for violating the Adiwiyata Green School’s rules?
9. Comparing regular students and students with special needs, how does the school treat them?
10. Please explain how the school helps students with special needs participate in the Adiwiyata Green School program.

Teacher group and school principal

1. Why this school conducted the Adiwiyata Green School program?
2. How does the school implement the Adiwiyata Green School program? In relation to:
 - a. Curriculum
 - b. Funding
 - c. Infrastructure
 - d. Partnerships

3. Do you feel that the Adiwiyata Green School program is useful for promoting environmental caring character?
4. Does the school involve parents and society in supporting the Adiwiyata Green School program?
5. What are the obstacles to applying the Adiwiyata Green School program?
6. Are there any special treatments for students with special needs?
7. How does the school ensure the sustainability of the Adiwiyata Green School program?

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