



Supporting Partner:



Submission Form of 2020 SEAMEO-Japan ESD Award Theme: Addressing Plastic Problems for Transforming Communities

The deadline for submission is now extended to: <u>30 September 2020</u> www.seameo.org

- To participate in the 2020 SEAMEO-Japan ESD Award, please submit the information of your school's project/programme on "Addressing Plastic Problems for Transforming Communities" by using this template of Submission Form before 30 September 2020.
- The **digital format of this Submission Form** can be downloaded from the following link or requested by sending an email to: seameojapan.award@seameo.org.

link.seameo.org/2020SubmissionFormESDAward

- The guidelines for submission of entries and the judging criteria are detailed in page 9-12 of this document.
- How to Submit the Entry: Schools can submit the completed "Submission Form of 2020 SEAMEO-Japan ESD Award" and maximum of 5 supporting documents/materials to the following SEAMEO Secretariat's email address:

Email: seameojapan.award@seameo.org

- Important Note: To align with the ESD practices and to save the environment and energy, the Committee will not accept the entry in hard copies.
- More information, please visit:

www.seameo.org link.seameo.org/2020SEAMEOJapanESDAward

or contact the SEAMEO Secretariat, Bangkok: Email: seameojapan.award@seameo.org or Tel. +66-2391-0144.

PART I: Details of Your School

- 1. Name of your school: Sekolah Alam Palembang
- 2. Full address: Jl. Gub H A Bastari Lrg. Harapan Rt. 26 Rw. 06 Kelurahan Silaberanti Kecamatan Jakabaring Palembang South Sumatera
- 3. Postcode: 30252
- 4. Country: Indonesia
- 5. School's telephone number (country code+city code+telephone number): +6281222581884
- 6. School's fax number (country code+city code+fax number): -
- 7. School's email Address: sekolahalamplg@gmail.com
- 8. Name of the School Director: Ana Apriani, S.Pd.
- 9. Name of the Teacher Coordinator: Siti Aisyah Cinthia Indah Anggraini, S.Pi.
- 10. Email address of the Coordinator: sitiaisyahciasapa@gmail.com
- 11. School website (if available): www.sekolahalampalembang.com
- 12. Educational level (Such as Kindergarten 1 to Grade/Year 9): Playgroup to Grade 12
- 13. Total number of teachers in your school: 25
- 14. Approximately number of teachers participated in this programme: 25
- 15. Total number of students in your school: 150
- 16. Approximate number of students participated in this programme: 150

PART II: Information about the School's Programme

The information of part II from no.1 to 13 should be no longer than nine (9) pages long of A4 in total. The information should be written in Times New Roman font, 11-12 point size.

1. Title of the school's programme

BUBAKA

(Bring yoUr own Bottle And container for Kindness Acts)

2. Summary of the programme (one half to 1 page of A4 sheet size)

Sekolah Alam Palembang is one of the private schools in Palembang, the capital city of South Sumatra Indonesia, which is located in a densely populated area in the middle of the city. The core curriculum consists of: Character Building, Science Logic, Leadership and Entrepreneurship. Sekolah Alam Palembang is one of the schools that concern in saving the environment for better future by giving learning approach alongside with the nature. Since 2018, Sekolah Alam Palembang has held the BUBAKA program that is concentrating for saving the environment, especially in reducing plastic waste. This activity is held by school residents together with the surrounding local communities.

BUBAKA is adapted from traditional language of Ogan Komering Ulu, one of the large regions in South Sumatra. BUBAKA consists of the word "BU" means "ber" or "use" and "BAKA" means "container". Therefore, BUBAKA means using a container. The BUBAKA activity has a philosophy and meaning that attract and encourage us to bring our own containers such as lunch boxes, drink bottles and shopping bags at any time for the good purpose of reducing the use of plastic packaging or bags.

Currently, the impact of plastic waste on the environment is a negative result that must be borne by nature. Therefore, this program objective is to reduce excessive use of plastics because plastic waste is not derived from biological compounds, it is non-biodegradable. Plastic waste takes estimation of 100 to 500 years to completely decompose. In addition to that, plastic waste can pollute the soil, water, sea, and even the air. Hence, Sekolah Alam Palembang applies the concept of "no plastic waste" in the school area.

The BUBAKA program is implemented to all students, teachers, parents and the surrounding local communities. The strategy of introducing BUBAKA in the school environment starts from getting students and teachers to bring their own lunch packed and also personal supplies from home such as their own drink bottles, lunch boxes and own cutleries that can be used when buying food or drink at Eco Canteen. As in our Eco Canteen and BUBAKA bulkstore are not providing any plastic food and drink packing also plastic bag as their main regulation. This is one of the school's strategy of introducing BUBAKA to get teachers and students familiar to use own personal supplies at the school's area and hoping that they will continues the positive habits outside the school too.

Sekolah Alam Palembang also has allocated one place for recycled waste called "Recycled Garden and Waste Bank", the main activity is the teachers will introduce and encourage students to re-use or re-make products from recycled waste such as plastic packaging, plastic bottles, paper and cardboard, can, and etc. With this concept, students will be creatively creating something useful from the waste to support their learning activity, additional teaching materials, class displays, art and craft, and student projects so that no waste is left at the Garbage area or Waste Bank. By doing that, it can reduce cost for teaching and learning activities in schools. School also introducing to the students how to recycle waste and reduce the amount of waste production. Meanwhile, the strategy to introduce BUBAKA to the community by holding an event called the Pasar Zero Waste, that has similar regulation as Eco Canteen and Bulkstore that not providing any plastic packaging and bags. In that market, we are encouraging people to bring their own container and bag from home. As a continuous reminder, the community is suggested to shop at

Bulkstore. Other event of Sekolah Alam Palembang is also hosting The Science Project Fair once a year on Earth Day Celebration on 22nd April for kindergarten until 12th grade students, to stimulate students' science fiction thinking and students' interest towards the environment to SAVE THE EARTH thus supporting the BUBAKA program.

The main objective of the BUBAKA program is to save the world from environmental damage caused by plastic waste by educating people with good habits. This starts with yourself by reducing the use of plastic packaging, simple by bringing your own container. After 2 years of running this program, plastic waste has been reduced by 80% in school's area and household waste by 60% at home. We are positively hoping that this program will continues implemented and addressed Plastic waste issues by transforming communities' mindset to care about the environment and better future, from small communities to larger communities and even the world.

3. Background information or reasons why the school created this programme

The amount of waste in Palembang, South Sumatra that is growing excessively is a serious problem for the sustainability of the universe. Currently, statistic data shows that Palembang is the largest waste producer in South Sumatra, which is around 1,400 tons per day, which 70% pile up without being managed. The accumulation of garbage not only ruin the beauty of the city and affect the health, but also harming the environment and life. Moreover, 70% of the waste is plastic waste, which is difficult to decompose for thousands of years. This can cause contamination of the soil and reduce soil fertility. Hence, with this fact we have more than enough to be wiser on using plastic in our daily life and avoid littering plastic waste.

The impact of plastic waste, such as:

- 1. Groundwater, soil and living things in the soil will be polluted.
- 2. Chemical compounds from plastics that enter the soil will kill decomposing animals such as worms.
- 3.Polychlorinated biphenyl (PCB) will not decompose even though it has been consumed by animals and other organisms, this substance will be a chain poison.
- 4. The piled of plastic waste will prevent the absorption of water into the ground.
- 5. Plastics reduce soil space movement and air circulation that caused reduction of soil fertility.
- 6. Plastic waste that pollutes the oceans will be eaten by sea animals and can caused death of these animals.
- 7. Dumping garbage to the river will clog and cause silting, which will cause flooding at the surrounding area near the river.
- 8.Burning plastic waste will cause air pollution. The smoke contains dioxins, when inhaled can cause the respiratory system problem, cancer, disorders of the nerves system and swelling of the liver.
- 9. Water quality will be contaminated by plastic waste which contains many chemicals such as bisphenol A. For all of above reasons, the BUBAKA program is held to give awareness to the public that plastic waste is very dangerous and change people's habits in reducing the use of plastic in their daily life.

4. Objectives/goals of the programme

The Objectives of this programs are:

- 4.1. Change habits starting from yourself to always carry your own personal supplies such as drinking bottles, lunch boxes, and shopping bags
- 4.2. Reducing the use of plastic in daily life
- 4.3. Providing awareness to all levels of society that plastic waste is very dangerous for all living things and the elements on earth
- 4.4. Creating creativity in utilizing plastic waste into a product that has a high selling value.
- 4.5. Creating innovations with technology to create something that can replace the usage of plastic materials.
- 4.6. Save the earth and love the earth

5. Period of the time when the programme was/has been started

This program started from January 2018 until present.

6. Key knowledge, skills, attitudes/values and behaviors that the school expects to develop from this programme.

6.1. Key Knowledge

Educating students and the public regarding the dangers of plastic waste for environmental pollution and health problem, the important of our role in reducing the use of plastic by decreasing the amount of plastic waste and its impact on sustainable development, and giving knowledge about how to recycle waste.

6.2. Skills

This activity will trigger the creativity and skills of students and the community in creating something useful from recycling plastic waste and using it as the main material that has high selling value and creating something that can replace the usage of plastic for daily used.

6.3. Attitudes/values

Bad habits that have been ingrained since childhood are indeed difficult to change, but this program is able to change bad habits into good habits in reducing plastic usage in daily activities starting from home, school environment, community environment, even the world environment.

6.4. Behaviors

One of the main behaviors expected by schools is to develop self-awareness to love the earth more and save the earth.

7. Activities (Strategies/activities of implementation)

This part is important – please clearly explain all related strategies and activities that the school has implemented and brief information of each activity). Details of each activity can be attached as a part of supporting documents.

7.1. BUBAKA

BUBAKA which stands for **B**ring yo**U**r own **B**ottle **A**nd container for **K**indness **A**cts is an initial strategy implemented at Sekolah Alam Palembang in changing students' habits in bringing or buying food / drinks in plastic packaging. This strategy has been implemented since January 2018 until now. All students and teachers are required to bring drink bottles and lunch boxes along with their utensils and are not allowed to bring or buy food and drinks in plastic packaging. This activity is not too difficult for students and teachers to obey and is well supported by parents. This is very influential in reducing the amount of waste production in schools.

7.2. Eco Canteen

Eco Canteen is a school canteen that provides healthy food and drinks without preservatives and does not provide plastic packaging. This regulation at Eco Canteen has been carried out since January 2018 in order to support the BUBAKA program in the school environment so that children are encouraged to bringing their own container when shopping at Eco Canteen. At Eco Canteen also provides environment friendly plates and cups that can be used as containers for eating and drinking for students, teachers or parents who does not or forget to bring a container on the condition that they

have to wash it after using it. This solution activity also greatly affects the reduction of waste production in schools and students have good habits in reducing plastic usage.

7.3. Bulkstore

Bulkstore provides daily necessities without plastic packaging and every customer have to bring their own container or bag from home. Activities at store are carried out in order to support the BUBAKA program in the school environment and the surrounding community. Bulkstore sells daily necessities in small amount or as per request in ml or ounce by the customer and pack in their own container due to the store did not pre pack most of the products sold. Of course, the store can assist students, parents, and even the community to change their habits and familiar in using plastic packing. BUBAKA bulkstore is the first and only bulk store in South Sumatra Province.

7.4. Recycled Garden

Recycled Garden is a school gardening and playground made from recycled waste. Activities at the Recycled Garden are to support the BUBAKA program participate by all students at Sekolah Alam Palembang starting from Playgroup to 12^{th} Grade. The activities such as planting crops: planting vegetables using used materials as plant pots for student of playgroup – 6^{th} grades or making vertical garden from used buckets for student of $7^{th} - 12^{th}$ grades. In additional to that, at Recycled Garden there are also educational games made of used materials that made by students of $7^{th} - 12^{th}$ grades. The activities at Recycled Garden has giving big impact in reducing plastic waste by recycling it.

7.5. Waste Bank

The Waste Bank is a place to collect inorganic waste that can be recycled in the school environment. Garbage collection activity is held on every Monday by students who collaborate with parents in sorting and cleaning trash in their respective homes. Most of the clean inorganic waste is used for teaching and learning activities at schools and some of it is sold to Recycled waste collectors and the money will be used for other learning activities. This activity is very effective in reducing inorganic waste in students' homes.

7.6. Pasar Zero Waste (The Zero Waste Market)

Pasar Zero Waste is an activity initiated by Sekolah Alam Palembang to reduce the community's habit of using plastic waste through buying and selling activities like common traditional markets, but at this Pasar Zero Waste, the regulation that not allowing seller to provide plastic packaging or plastic bags and buyers are required to bring their own containers and bags from home, in order to introduce the BUBAKA program to the community. This Pasar zero waste activity participate by students and parents. In this activity, each student and parent are asked to prepare products that will be sold, ranging from traditional food and drinks, modern food, daily staples, as well as natural body care products made by students such as: dish soap, deodorant, bath soap, and body lotion. This activity received a tremendous positive feedback from the surrounding local communities, even Palembang city residents and Non-governmental organization who care about the environment, so School invite them to work together. This activity also received appreciation from one of the national television stations and was covered in various electronic media.

7.7. Science Project Fair

This activity is held once a year as one of the science fiction curriculums at Sekolah Alam Palembang. The themes will be different every year but still related to environmental problems, such as: climate change, global warming, alternative energy, waste, etc. Science projects can take the form of observational research or in the form of products. Students of Kindergarten - 6th grades are assisted by their parents, while students of grades 7th -12th will do it by themselves. Each student is required to present the results of his project in front of reviewers consisting of academics and environmental

observers. This activity aims to increase self-confidence, hone the logic of critical thinking of the environment and become a problem solver. This activity is quite effective in providing knowledge about environmental concern to students and parents. Some of these student Science projects have been participated in the 2018 Caretakers of The Environmental International (CEI) conference in Austria.

7.8. Sorting Trash

This activity is held as a strategy to support the running of the BUBAKA program. Apart from being held in schools, this activity is also held in local community's houses as one of the targets for making changes. From this activity, plastic waste at home will be distributed to waste banks at schools, while organic waste at home will be processed into household compost. This activity of course has proven to be able to reduce the amount of plastic waste in the school environment and the surrounding local communities because there has been a reduction in the amount of plastic waste by 80% at schools and 60% at home.

7.9. Earth Festival (Festival Bumi)

One of the strategic plans to spread the message of The Bubaka Program is helding an event such as Earth Festival of Sekolah Alam Palembang celebrates Earth Day on 22nd April. In this Earth Festival, parents and students compete to make a project using plastic waste to turn it into an object that has a high selling value. Like a Fashion Show with clothes made of plastic waste, Art Craft from used goods, even playing music from used goods. Of course this event can contribute to spread the messages effectively to the public regarding The Bubaka Program.

8. Teaching and learning approaches/strategies that the school has integrated for this school programme.

8.1. Basic Activity

This activity is supported by kindergarten and elementary school students (kindergarten - 6th grade) at the end of each class theme. In the basic activity, students are expected to make a project related to the current class theme. The project can be made using of various types of waste, from plastic to paper waste. So that automatically, students have reduced waste into something useful. This activity is included in the science and entrepreneurship logic curriculum.

8.2. Class Project

Middle and high school students ($7^{th} - 12^{th}$ grade) must have a class project at the end of each semester. This class project is carried out according to the theme studied each semester. In each class project, have to be related to several subjects such as biology, physics, mathematics, languages, and business. Class projects that are carried out can create such as kinetic energy props, water pollution measurement kit, metal detectors, and vertical gardens. All class projects are made using plastic waste and are related to subjects included in the school curriculum, namely morals, scientific logic, leadership, and entrepreneurship.

8.3. Public Service

This activity is held by middle and high school students by introducing class projects that are created and implemented in schools to public and surrounding local communities. They has introduced Eco Brick to the surrounding local communities as a solution to reduce plastic packaging waste that is used daily. This activity's objective to educate the surrounding local communities to be more concerned about the environment and start from ourselves and then do it continuously.

9. A) Participation with the community (How the school and community work together in planning and implementing the school's programme)

This program is run by all community members, including the school community, parent community, surrounding local communities, and communities outside the school environment. Every students' parent does this program based on self-awareness to change the bad habit of using plastic in every day's life. One of the actions taken by parents at home is to sort the waste, collect and throw the waste to the waste bank in the school. After the garbage is collected according to its categories, such as plastic, cardboard, and organic waste, the waste will be distributed to the place that collect and will do the necessities with the waste accordingly. For plastic waste, schools will distribute the plastic waste to the waste bank community, they will transform plastic waste into something useful that can be marketed and used by the public. The community around the school was introduced to sort waste at home so that it could be distributed to the waste bank in the school. Therefore, the function of school's waste bank to distribute waste to needed places.

B) Engagement of partners in community and their roles/contribution into the school's programme (Please provide the name of your partners in this programme and their roles/contributions)

Name of Partners	Roles and Contributions
Gerakan Bumiku Sayang	Gerakan Bumiku Sayang is a Non-Governmental Organization
	that concern about the earth sustainability, which requires
	awareness and care, both from individuals and groups. This NGO
	also conducts the BUBAKA program as one of their regular
	programs, one of the programs is to get people used to bring
	personal plastic container all the time for any purposes,
	including when they have to pack something from traditional
	market, minimarkets, and even supermarkets. This NGO also
	collaborates with Sekolah Alam Palembang in one of the
	BUBAKA programs, Pasar zero waste.
Bank sampah 2 ilir	This community is an organization that collects plastic waste and
	transform plastic waste into a product that has high selling
	value. They also participate to supply some of their products at
	BUBAKA groceries store of Sekolah Alam Palembang.
Morefun store	One of the online stores that provide environmentally friendly
	goods and collaborate with bulkstore of Sekolah Alam
	Palembang
Sehat Qifa Store	A shop that provides organic food ingredients and collaborate
	with Bulkstore of Sekolah Alam Palembang.
PT. Unilever Indonesia	Prestige company that is working together to supply home basic
	needs (without packaging) at Bulkstore of Sekolah Alam
	Palembang.
CEI 2018	CEI is an International Network of secondary schools that are
	active in Environmental Education. It is a non-governmental,
	non-profit organization that organizes conferences for students
	and teachers related to environmental issues in the context of
	education. The CEI 2018 conference hopes to accommodate
	200-250 international delegates. Sekolah Alam Palembang was
	one of the delegations for CEI 2018.

10. Transformation to the community and ecosystem (Brief information of activities that the school, students, and teachers have contributed for the improvement of community/ecosystem.)

The BUBAKA program has been implemented in the school since 2018 has given very positive impact on increasing self-awareness and is even has been influenced others. The ecosystem at the school environment has been better because of the reduction of plastic waste that is produced every day. Likewise, the surrounding local communities has been given education on how to reduce plastic waste and how to make good use of plastic waste. The new habits have started to be well practiced so that the environment becomes cleaner and healthier and improving the ecosystem.

11. Programme for monitoring and evaluation mechanisms and summary of results

Monitoring and evaluation mechanisms:

After this program is implemented, we monitor and evaluate the programs using the following three things:

- 1. Observation, regular checking and note all the progress at the school environment and the surrounding local communities by seeing the amount of plastic waste.
- 2. Questionnaires are given to all parents and local residents to find out whether they have implementing the BUBAKA program within their household and surrounding environment.
- 3. Interviews were conducted with Organizations that collaborate with Sekolah Alam Palembang after they conducted this program and showed the results obtained after the program started.

Summary of results:

This BUBAKA program will keep reminding each and every individual and the environment surround it to be more concerned about the environment sustainability. Starting from yourself, changing bad habits into good habits such as using your own container, can reduce plastic waste so that it can save the earth from extreme climate change.

12. Resources used for programme implementation

There are two resources that can be used to support the implementation of this program, namely:

- 1. Human resources consisting of students, parents, teachers, and local communities' members who will working together to run this program on daily basis.
- 2 School facilities that support this program to run successfully such as eco canteen, groceries store, and waste bank.
- 13. Benefits/Impacts/ positive outcomes of the programme to **students**, **teachers**, **parents and school**. Please include evidence of achievements.
 - (How the school's programme has transformed the behavior of students, teachers, and parents to improve the school's environment in reducing plastic usage and wastage.?)

For students, this program will change their habits to reduce plastic waste that is used every day. As well as triggering enthusiasm and motivation for students to love the earth and save the earth starting from themselves.

For teachers, this program also will change them to have better habits, especially in using plastic waste. In addition to that, teachers are becoming more creative and imaginative in using plastic waste as an additional tool and material for supporting their learning methods in school.

For the students' parents, this program is also able to change the habit at home to sort household waste and also helping to spread the awareness to their families and relatives.

For schools, this program is very useful for reducing waste in schools and making the school environment cleaner, tidier, healthier and maintaining the sustainability of the ecosystem in schools. In addition, schools can minimize expenses by utilizing plastic waste as a learning medium.

14. Benefits/Impacts/ positive outcomes of the programme to people in community, and ecosystem. Please include evidence of achievements.

(How the school's programme has transformed the behavior of people in the community in reducing the plastic usage and wastage and improve the ecosystem of the community?)

The benefits obtained from this BUBAKA program absolutely to make it easier for schools to get community members to convey education about reducing plastic waste. In addition to that, each collaborating NGO and communities also has the same vision and mission to convey education to the public in Palembang so that they can improve the environmental ecosystem for the better earth.

15. Plan for sustainability and plan for scaling-up/expansion

Plan for sustainability:

The next plan of this sustainability program to establish a "Kampung Zero Waste" as a place to facilitate to give education to citizen of Palembang. Kampung Zero Waste will be established as a place that provides an example and inspiration to love the earth more by reducing the use of plastic packaging.

Plan for scaling-up/expansion:

To expand the BUBAKA program, in the future we will provide opportunities for students of Sekolah Alam Palembang to volunteer in providing education about the BUBAKA program in other schools in Palembang specifically and South Sumatra Province in general. In addition to that, the BUBAKA program will be conveyed to the wider community by using mass media as a medium to provide education to people in Indonesia.

16. Interrelationship of the school programme with other Sustainable Development Goals (SDGs) (Please refer to page 2 in the Information Note or https://sustainabledevelopment.un.org/sdgs)

The BUBAKA program which is adapted from a philosophy which means "using a container" is expected to inspire everyone to love the earth starting from themselves and then transmitting it to others. The main objective of this program is related to the Sustainable Development Goals (SDGs) Goal 13, namely climate action because this program takes urgent action to combat climate change and its impact. Hopefully with this program running smooth, all communities involved in this program can convey the objectives of the SDGs Goal 13 message not only in the school environment but throughout the world.

17. List of supporting documents such as a copy of the school operational plan or school management plan, action plan, learning/ teaching materials, lesson plans, samples of student worksheet, manuals, etc. If the supporting documents are in the local language, please provide a brief description in English language. Maximum of 5 supporting documents can be submitted with this Submission Form.

Document 1) Folder Bubaka Program

Document 2) Folder Lesson Plan

Document 3) Folder Student Presentation

Document 4) Folder Student Project

Document 5) Folder Student Worksheet

Photo1



Several activities that support the BUBAKA program at Sekolah Alam Palembang





Public service activities carried out to introduce the BUBAKA program.

Photo 3



Activities to utilize plastic waste in the school environment as a learning media.

Photo 4



All students of Sekolah Alam Palembang make it a habit to bring their own drink bottles and lunch boxes every day.

Photo 5



One of the science projects for processing plastic waste carried out by students of the Sekolah Alam Palembang at the 2018 CEI event in Austria.