



Jayprakash Education Society's

## DR. BABASAHEB AMBEDKAR MAHAVIDYALAYA

Barrister Tatyasaheb Mane Vidyanagar, Peth Vadgaon - 416112. Dist. Kolhapur (Maharashtra) Ph.Office: 0230-2471086





Chairman: Shri. Satish S. Mane M.A., M.Phil



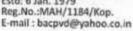


Principal: Dr. S. D. Disale
M.Sc. Ph.D

### 7.1.3

# Quality audits on environment and energy regularly undertaken by the Institution.

Sr. No.	Particulars	Year
1.	Green audit/ environment audit	2021-22 to 2017-18
2.	Energy audit	2021-22 to 2017-18
3.	Clean and green campus initiatives	2021-22 to 2017-18
4.	Beyond the campus environmental promotion activities	2021-22 to 2017-18

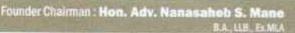




UGC (2 f & 12 B) dt. 23 June 2006 Perm. Affi.No.Affi/T.2/SGB/10780 dt.16 Feb.2005 Jr.College Index No.23-06-004 J

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(Affiliated to Shivaji University, Kolhapur)



Chairman: Shri. Satish S. Mane



Principal: Dr. S. D.

# Green and Environmental **Audit Report**

# 2021-22

# GREEN AND ENVIRONMENTAL AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2021-22
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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#### ACKNOWLEDGEMENT

We appreciate the interest and participation of Honorable Management and Principal and Faculty in carrying out the energy audit at Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur. Our special thanks to Technicians and Staff involved for college who have extended their co-operation and courtesy to the energy audit team during the audit.



# Green And Environmental Audit

Team Member

Dr. H.T. Jadhav

Certified Energy Auditor

Bureau of Energy Efficiency

Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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3	Conclusion and General Recommendations of the Audit	23



#### 1. GREEN AUDIT

Green audit was initiated with the beginning of 1970s with the motive of inspecting the work conducted within the organizations whose exercises can cause risk to the health of inhabitants and the environment. It exposes the authenticity of the proclamations made by multinational companies, armies and national governments with the concern of health issues as the consequences of environmental pollution. It is the duty of organizations to carry out the Green Audits of their ongoing processes for various reasons such as; to make sure whether they are performing in accordance with relevant rules and regulations, to improve the procedures and ability of materials, to analysis the potential duties and to determine a way which can lower the cost and add to the revenue. Through Green Audit, one gets a direction as how to improve the condition of environment and there are various factors that have determined the growth of carrying out Green Audit. Some of the incidents like Bhopal Gas Tragedy (Bhopal; 1984), Chernobyl Catastrophe (Ukraine; 1986) and Exxon-Valdez Oil Spill (Alaska; 1989) have cautioned the industries that setting corporate strategies for environmental security elements have no meaning until they are implemented.

Green Audit is assigned to the Criteria 7 of NAAC, National Assessment and Accreditation Council which is a self-governing organization of India that declares the institutions as Grade a, Grade B or Grade C according to the scores assigned at the time of accreditation.

The intention of organizing Green Audit is to upgrade the environment condition in and around the institutes, colleges, companies and other organizations. It is carried out with the aid of performing tasks like waste management, energy saving and others to turn into a better environmentally friendly institute.

#### 1.1 GOALS OF GREEN AUDIT

- The objective of carrying out Green Audit is securing the environment and cut down the threats posed to human health.
- To make sure that rules and regulations are taken care of
- To avoid the interruptions in environment that are more difficult to handle and their correction requires high cost.
- To suggest the best protocols for adding to sustainable development.



#### 1.2 BENEFITS OF GREEN AUDIT

#### Green Campus

The vision of the institute focuses on the green culture development and to aware community about eco-friendly environment. Since the beginning, trees have shaped us with essential components of life, viz., food and oxygen. As we evolved, they provided additional necessities such as shelter, medicine and tools. Today their value continues to increase and more benefits of trees are being discovered as their role expands to satisfy the needs created by our modern lifestyles. Peth Vadgaon is a small town. It is prosperous with nature. However, due to current urbanization Peth Vadgaon is changing. Therefore, plantation is very useful to sustain the health of the town. The college has taken the tree plantation project to develop awareness about environmental conservation in young generation. It is the great initiative to connect the young generation of the college with the environment.

#### **ACTIVITY REPORT 2022-23**

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	16 <sup>th</sup> July 2022
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 35 and SW 09 Total 44 Cadet
Number of Teacher participated	06
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus



#### Introduction:

Dr. Babasaheb Ambedkar College, PethVadgaon, Dist. Kolhapur Through National Service Scheme on Monday 16/07/2022, tree plantation was done on a large scale in the vast premises of the college. Program Officer of National Service Scheme Prof. A. A. Gurav welcomed and introduced the dignitaries present. College Principal Prof. J. C. Ghatge expressed his opinion about the importance of tree plantation and the need of the hour. Prof. K. C. Kanade expressed vote of thanks. For this program principal of the college Prof. J. C. Ghatge, N. S. S. Program Officer Prof. A. A. Gurav Teaching and non-teaching staff as well as volunteers of National Service Scheme were present.

Tree Plantation drives combat many environmental issues like deforestation, erosion of soil, desertification in semi-arid areas, global warming and hence enhancing the beauty and balance of the environment. Trees absorb harmful gases and emit oxygen resulting in an increase in oxygen supply. Plants planted 20, Subedar Supanekar Planted Trees.

#### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warming and hence enhancing the beauty and balance of the environment.
- · To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

#### Programme Outcome

- Many saplings of different species were planted. Students were encouraged to address the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.

The entire program created a strong feeling among the students.

- · It would help to shield the environment
- Recognize the cost saving methods through waste minimizing and managing. Point out the prevailing and forthcoming complications
- Authenticate conformity with the implemented laws
- Empower the organizations to frame a better environmental performance



- It portrays a good image of a company which helps building better relationships with the group of stakeholders
- Enhance the alertness for environmental guidelines and duties.























Fig:Tree Plantation in college campus









#### 2. ENVIRONMENTAL AUDIT

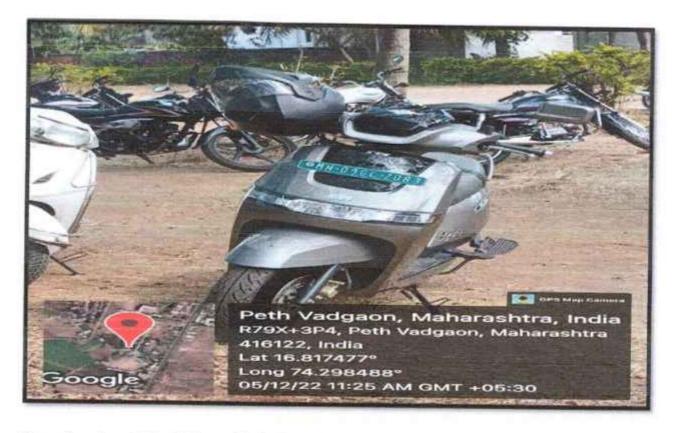
#### 2.1 World environment day

The world environment day is celebrated every year on 5th June to raise global awareness to take positive environmental action to protect nature and the planet earth. It is a day that reminds everyone on the planet to get involved in environment friendly activities. From school children to community groups, companies and governments, all come together to pledge towards building a greener planet. Keeping this aim in view, Dr. Babasaheb Ambedkar College, PethVadgaon, Dist. Kolhapur were briefed about the importance of this day. They were asked to plant a sapling in small pots and bring them to college to create a green corner in the college corridor. A lot of enthusiasm was seen in the kids who brought pots with saplings of different varieties of herbs and shrubs. The event was conducted successfully with whole hearted participation and awareness for a greener World

#### 2.2 NO Vehicle Day







Our college located in Vadgaon dist kolhapur. In our college about 1000 student are studying in UG to PG section and about 35 teaching and non-teaching staff are present. Most of the students and staff coming from villages by common buses, two wheeler s as well car. We are start our college campus pollution free and campus goes to green under the guidance of Prin. Dr. S. D. Disale. Our Principal call the meeting on the month of June 2022 on discussion on No Vehicle Day. During this meeting all students and teaching staff are accepted the rules and regulation of "No - Vehicle Day". During this meeting Principal talks on benefits of "No - Vehicle Day" on the environment, Social life, and Health and Socio economic importance of Nation. All these suggestions and benefits are accepted by students and staff of our college.

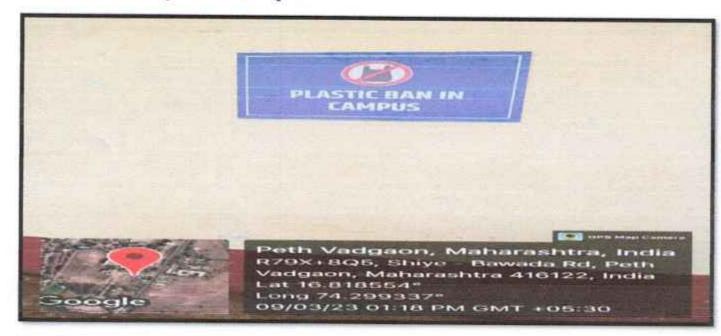
Principal released notice to all students, faculties and non teaching staff of college on 25/11/2022. During meeting finalized last Saturday of every month is "No Vehicle Day" of campus. All the students, faculties and non teaching staff of college are accepted for Future Safe, clean Environment and Sound Free Zone. In our College 5 staff coming by Electrical Vechical, 4 staff coming by Motor Cycle, 2 staff by Own car, 15 by Bycycle, 10 staff by Public Transport and remaining are by walk. Most of the students are coming by Public transport. "No Vehicle Day" was declared on last Saturday of every Month. Last Saturday of every month considered as a "No Vehicle Day".

EEL

#### Output of "No -Vehicle Day"

- 1. No Vehicle Day helps to avoid air pollution and sound pollution.
- It also helps to save the excess burning of fossil fuels.
- 3. It also protects nature from high temperature and minimum release of polluting gases.
- 4. It also responsible for increase the income of public transport.
- 5. It saves the consumption petrol and diesel of Nation.
- 6. It protects environment from air pollution.
- 7. It maintains free sound pollution and clean College campus.
- 8. Each staff and student involved in protection of Earth from air pollution.

### 2.3 Plastic And Paper Free Campus







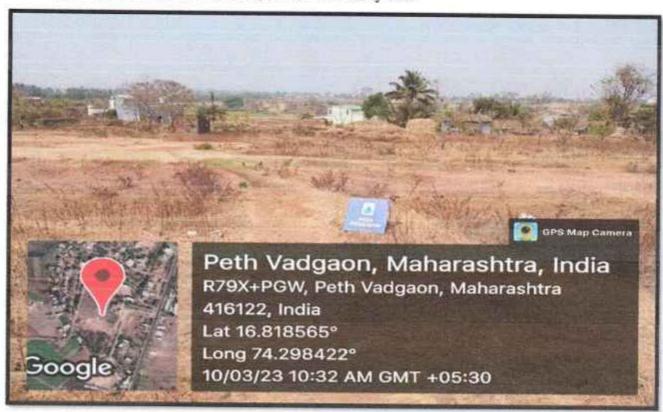
Initiative has been taken by college administrative to make the campus plastic and paper free. Most of the information is now shared to the faculty and students by email and social media applications rather than paper notice. Also, college has organized awareness program for students on above topic. It has been decided that 1 day in a month will be celebrate as bicycle day which will avoid the use of motor vehicles Below is the image of awareness program conducted in college.

#### 2.4 Liquid Waste Management

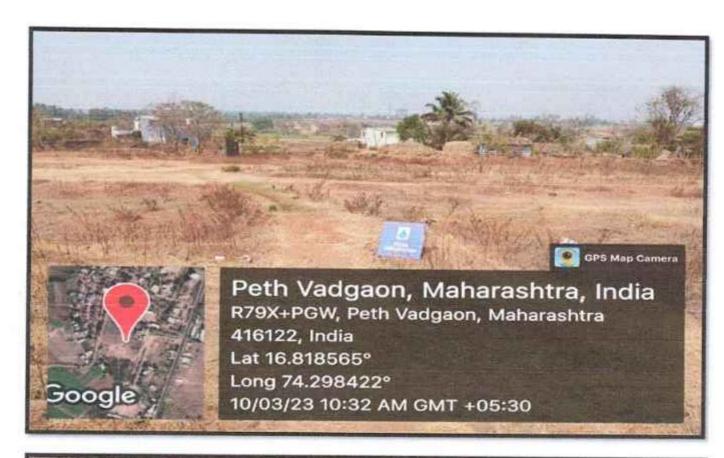
- Liquid waste management:
- The waste chemicals mixed water from laboratory passes through concealed pipe line into soak pit & recycled water is used for the watering trees or non-potable usage.
- Liquids are diluted by getting mixed with the washroom and toilet liquid wastes in to the common drainage.

### Water Conservation

Water conservation is the practice of using water efficiently to reduce unnecessary water usage. According to Fresh Water Watch, water conservation is important because fresh clean water is a limited resource, as well as a costly one.

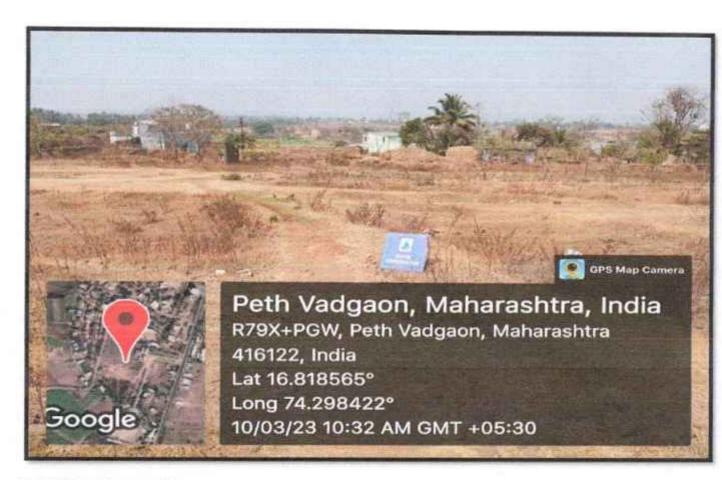




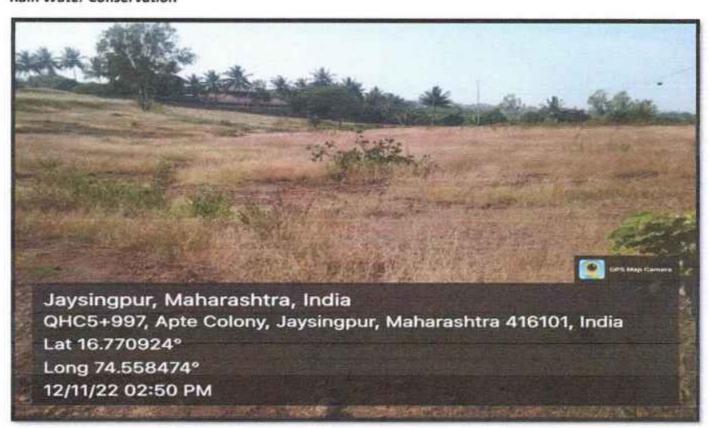


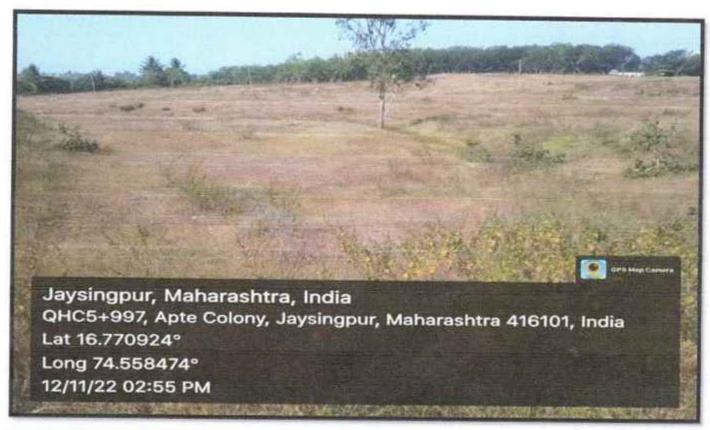


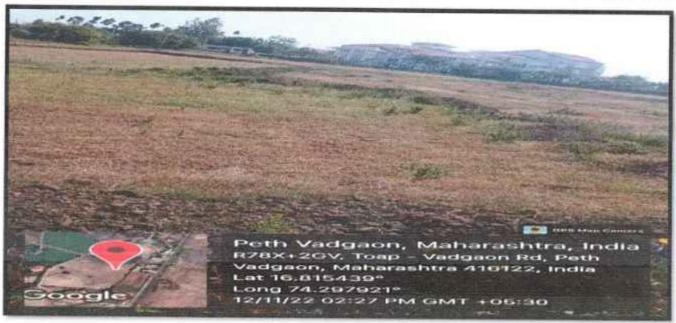




#### Rain Water Conservation



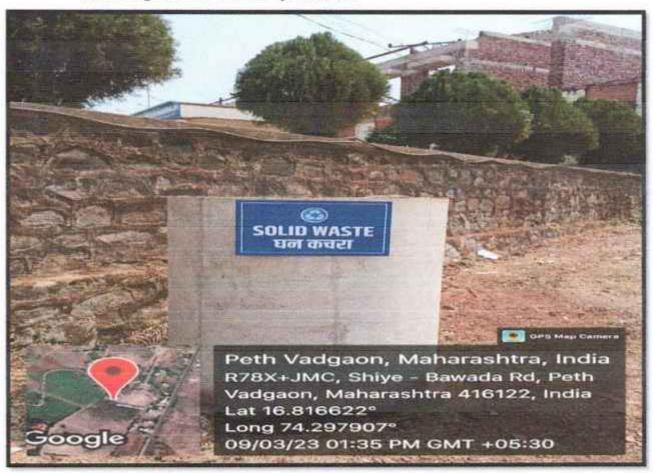






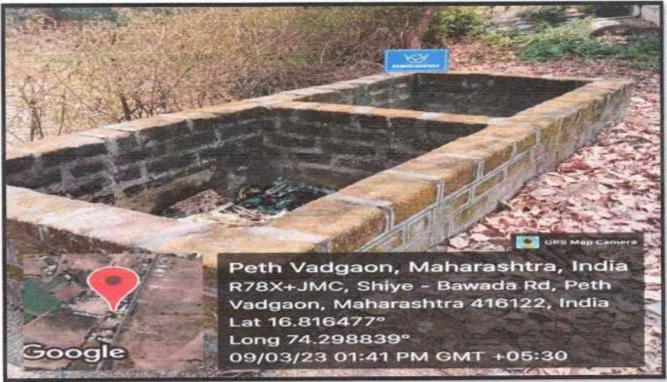
#### 2.5 Solid waste management

- To reduce waste at institute, students and staff are educated on proper waste management practices through lectures, advertisement on notice boards, displaying slogan boards in the campus.
- Waste is collected on a daily basis from various sources and is separated as dry and wet waste.
- Color coded dustbins are used for different types of wastes. Green for wet and blue for solid waste.
- Daily garbage is collected by housekeeping personnel and handed over to authorized personnel of vadgaon municipal for further processing. All waste water lines from toilets; bathrooms etc. are connected with Municipal drainage mains. Waste material like plastic, papers etc. are collected and sold out to scrap vendor from time to time.
- Efforts have taken to produce compost manure from the canteen solid waste and waste from other sources and efficiently run by the students. Manure is used for the purpose of herbal garden as well or for planted tree.











#### 2.6 E-waste management

The disposal of E-Waste is a rapidly growing problem because electronic equipment frequently contains hazardous substances which affect the environment and human health. E-waste such as, discarded computers, office electronic equipment, monitors, Hard Disks are disposed off as per their conditions. These wastes are sold to local scrap. Efforts are made to reduce e-waste by making optimum use of electronic devices.

#### Observations

The college conscientiously works towards generating minimal e-waste, for which the following strategies are adopted: Regular maintenance of electronic equipment and computers by the in house technician and AMC, ensures longer life. Weeded out computers from the computer science laboratories due to up gradation are transferred to departments, the administration within the college campus. Outdated Computers, servers, monitors, compact discs (CDs), DVD's, printers, scanners, copiers, motherboard, battery cells and other electronic equipment, weeded out from the computer laboratory are used for demonstration of internal parts of the equipment. Some electronic equipment are replaced with newer models due to the rapid technology advancements and production of newer electronic equipment.

#### Recommendations:

Electronic equipment may contain heavy metals and other materials. Computers and electronic equipment typically contain:

- Lead Computer monitors contain a picture tube known as a cathode ray tube (CRT).
   CRT's contain leaded glass, and are the largest source of lead in municipal waste. Solder used in printed circuit boards may also contain lead.
- Cadmium The largest source of cadmium in municipal waste is rechargeable nickel cadmium (NiCd) batteries. These batteries are found in most desktop and laptop computers.
- Mercury Some electronic equipment also contains recoverable quantities of mercury, which is a toxic metal. Unwanted electronic equipment must therefore either be donated for reuse or sent for recycling.

#### 2.7 World Ozone Day

The World Ozone Day is celebrated on September 16th of every year to spread awareness about the Ozone depletion. The theme for this year celebration given by United Nation Environmental Programme is — "Ozone for life: 35 years of ozone layer protection". The slogan of the day Ozone for life, reminds us that not only is Ozone crucial for life on Earth, but that we must continue to protect the ozone layer for future generation.

To spread the awareness and make the young minds understand about the importance of Ozone layer and the need to protect this fragile shield of gas ,the students of Dr. Babasaheb Ambedkar Mahavidyalaya, Peth Vadgaon, Kolhapur. were involved in various activities virtually like Online Poster making, Quiz contest etc .The students were very enthusiastic and prepared beautiful posters /charts depicting drawings of the ozone layer depletion .

Through PowerPoint Presentation, Children were apprised that Ozone layer is a natural part of our atmosphere and shields Earth from most of the Sun's harmful ultraviolet radiations. UV rays can be very damaging for our planet- for plants, humans and animals all alike.

The students were also sensitised that as a result of Ozone depletion there will be increase in Earth temperature, melting of glaciers, cancerous disease and rise in the level of ocean and many more. Through the activities children were encouraged to adopt and follow simple ways to keep the Ozone layer safe such as:

- ·Buy energy saving gadgets and bulbs.
- Follow 4 R's policy-Reduce, Reuse, Refuse and Recycle at home and school.
- Use alternative means of transport: buses, bicycles or simply walk or carpools
- Avoid buying and using aerosols and spray having CFC.

Active and energetic participation of students was observed throughout the session. On the whole it was a creative and interesting session, which enlightened the students and made them realise the seriousness of the situation.





# श्री.मोहनतात रामतात माळी

मा. स्रोक्तमियुक्त मणराज्यक्ष वन्त्रांत जगरपरिपद वन्नांच

रांदर्भ का.

100 -16 June /2026

This is to certify that Jayprakash Education Society's Dr. Babasaheb Ambedkar Mahavidyalaya, Peth Vadgaon has maintained the campus as per norms of Local Governing authority. We appreciate the attempts made by institution to maintain the Green Campus of the Institution.

सी- मोहबलाल रामताल माळा राज्यसम्बद्धाः वहनाव नगरपरिषद् क्रमान

पैठ वडमांच - 416 112. ता. हातकशामो, जि. जोल्हापुर (महाराष्ट्र) कोम नं. (0230) 2471753 (मि) 2471362, मी. 9823890555 Email : mohanlak mak@gmail.com

2022 12 07 16 26



## 3 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE

#### AUDIT

- a) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- Formation of Environment Policy and communicated to all faculties and other staff members.
- c) Reduction in use of paper work by go digital system.
- Water Meter should be installed at institute for monitoring of water consumption for landscape.
- e) Increase in Environmental promotional activities for spreading awareness at campus.
- f) As practically feasible avoid use of personal vehicles inside the campus.

Mr.R.S.Pukale

Energy Audit Coordinator

Department of Electrical Engineering

Dr. H. T. Jadhav Director AMGOI, Vathar Certified Energy Auditor (BEE)

Reg. No. - EA - 3023



# 2020-21

# GREEN AND ENVIRONMENTAL AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2020-21
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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3	Conclusion and General Recommendations of the Audit	26



#### 1. GREEN AUDIT

Green audit was initiated with the beginning of 1970s with the motive of inspecting the work conducted within the organizations whose exercises can cause risk to the health of inhabitants and the environment. It exposes the authenticity of the proclamations made by multinational companies, armies and national governments with the concern of health issues as the consequences of environmental pollution. It is the duty of organizations to carry out the Green Audits of their ongoing processes for various reasons such as; to make sure whether they are performing in accordance with relevant rules and regulations, to improve the procedures and ability of materials, to analysis the potential duties and to determine a way which can lower the cost and add to the revenue. Through Green Audit, one gets a direction as how to improve the condition of environment and there are various factors that have determined the growth of carrying out Green Audit. Some of the incidents like Bhopal Gas Tragedy (Bhopal; 1984), Chernobyl Catastrophe (Ukraine; 1986) and Exxon-Valdez Oil Spill (Alaska; 1989) have cautioned the industries that setting corporate strategies for environmental security elements have no meaning until they are implemented.

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- To make sure that rules and regulations are taken care of
- To avoid the interruptions in environment that are more difficult to handle and their correction requires high cost.
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#### 1.2 BENEFITS OF GREEN AUDIT

#### Green Campus

The vision of the institute focuses on the green culture development and to aware community about eco-friendly environment. Since the beginning, trees have shaped us with essential components of life, viz., food and oxygen. As we evolved, they provided additional necessities such as shelter, medicine and tools. Today their value continues to increase and more benefits of trees are being discovered as their role expands to satisfy the needs created by our modern lifestyles. Peth Vadgaon is a small town. It is prosperous with nature. However, due to current urbanization Peth Vadgaon is changing. Therefore, plantation is very useful to sustain the health of the town. The college has taken the tree plantation project to develop awareness about environmental conservation in young generation. It is the great initiative to connect the young generation of the college with the environment.







#### VITY REPORT 2020-21

Tree Plantation
NCC
<sup>20 th</sup> July 2020
Dr. Babasaheb Ambedkar College
SD 35 and SW 09 Total 44 Cadet
06
College Campus
College Campus

#### Introduction:

Tree Plantation drives combat many environmental issues like deforestation, erosion of soil, desertification in semi-arid areas, global warming and hence enhancing the beauty and balance of the environment. Trees absorb harmful gases and emit oxygen resulting in an increasein oxygen supply. Plants planted 20, Subedar Supanekar Planted Trees.

#### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warrig and hence enhancing the beauty and balance of the\ environment.
- To save endangered environment and to beautify our life.
- · Awareness to reduce pollution.

#### Programme Outcome

- Many saplings of different species were planted. Students were encouraged to addressthe climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.

The entire program created a strong feeling among the students.











Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA	
	Special lecture on 'Plastic Pollution'	
Organized by	NCC	
Date of the programme	08th July 2020	
Funding Agency	Dr. Babasaheb Ambedkar College	
Number of student participants/ Targeted Group	SD 19 and SW 07 Total 26 Cadet	
Number of Teacher participated	03	_
Place of extension / outreach activity	College Campus	_
Beneficiaries	Cadets	

Plastic pollution is the accumulation of plastic objects and particles (e.g. plastic bottles, bags and micro beads) in the Earth's environment that adversely affects humans, wildlife and their habitat. Plastics that act as pollutants are categorized by size into micro, meso or macro debris. Plastics are inexpensive and durable, making them very adaptable for different uses; as a result, manufacturers choose to use plastic over other materials. However, the chemical structure of most plastics renders them resistant to many natural processes of degradation and as a result they are slow to degrade. Together, these two factors allow large volumes of plastic to enter the environment as mismanaged waste and for it to persist in the ecosystem. Plastic pollution can afflict land, waterways and oceans.

#### Aims and Objectives

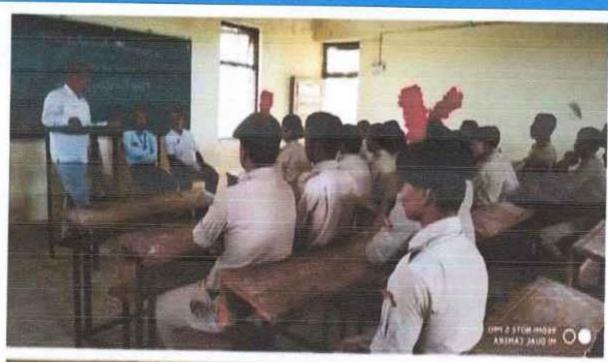
- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nuked, quiz, pledge etc.

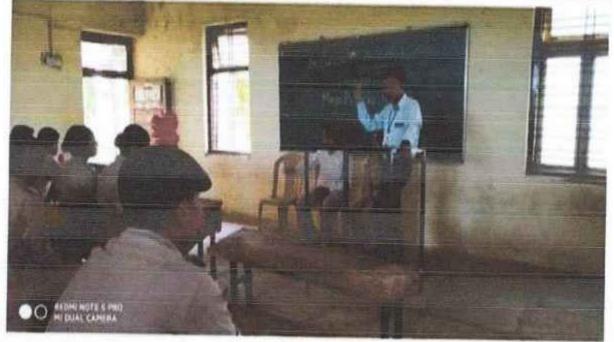
# Programme Outcome

- Cadet aware about various types of pollution
- People also know about various types of pollution

The cadets perform these activities as part of social responsibilities and community









Title of the programme	SWACHHATA PAKHWADA
	Cleanness Drive
Organized by	NCC
Date of the programme	19th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 40 and SW 10 Total 50 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth -Vadgaon Bus Stand Campus
Beneficiaries	Peth- Vadgaon People

Swachhata means cleanliness and Pakhwada means duration of 15 days, this means it is an initiative of 15 days of different activities for Swachha Bharat mission. The aim behind this celebration was to create awareness among all students about cleanliness. The first activity of Swachhata Pakhwada campaign was cleanness drive. It was especially designed for the youngest students of the school.

# Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around thecampus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing those actions that make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transformSwachh Bharat into a citizen's movement.

### Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

The cadets perform these activities as part of social responsibilities and community

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Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	27 <sup>th</sup> September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	College Campus
Beneficiaries	Peth Vadgaon People

Swatch Bharat Mission (SBM), Swatch Bharat Abhiyan, or Clean India Mission is a countrywide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets.

# Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around thecampus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing thoseactions that make our country a better place.
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   Swatch Bharat into a citizen's movement.

# Programme Outcome

- Development of clean and hygienic environment.
- · It has made students aware of cleanliness and social hygiene.



The cadets perform these activities as part of social responsibilities and community.









Title of the programme	SWACHHATA PAKHWADA Swachata Awareness Rally
Organized by	NCC
Date of the programme	01st October 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 42 and SW 10 Total 51 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	Peth -Vadgaon People

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets. Initiated by the Government of India, the mission aimed to achieve an "open-defecation free" (ODF) India by 2 October 2019, the 150th anniversary of the birth of Mahatma Gandhi through construction of toilets.

#### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around thecampus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing those actions that make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transformSwachh Bharat into a citizen's movement.



# Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

The cadets perform these activities as part of social responsibilities and community.





# 2. ENVIRONMENTAL AUDIT

# 2.1 World environment day

The world environment day is celebrated every year on 5th June to raise global awareness to take positive environmental action to protect nature and the planet earth. It is a day that reminds everyone on the planet to get involved in environment friendly activities. From school children to community groups, companies and governments, all come together to pledge towards building a greener planet. Keeping this aim in view, Dr. Babasaheb Ambedkar College, PethVadgaon, Dist. Kolhapur were briefed about the importance of this day. They were asked to plant a sapling in small pots and bring them to college to create a green corner in the college corridor. A lot of enthusiasm was seen in the kids who brought pots with saplings of different varieties of herbs and shrubs. The event was conducted successfully with whole hearted participation and awareness for a greener World

# 2.2 NO Vehicle Day







Our college located in Vadgaon dist kolhapur. In our college about 1000 student are studying in UG to PG section and about 35 teaching and non-teaching staff are present. Most of the students and staff coming from villages by common buses, two wheeler s as well car. We are start our college campus pollution free and campus goes to green under the guidance of Prin. Dr. S. D. Disale. Our Principal call the meeting on the month of June 2020 on discussion on No Vehicle Day. During this meeting all students and teaching staff are accepted the rules and regulation of "No - Vehicle Day". During this meeting Principal talks on benefits of "No - Vehicle Day" on the environment, Social life, and Health and Socio economic importance of Nation. All these suggestions and benefits are accepted by students and staff of our college.

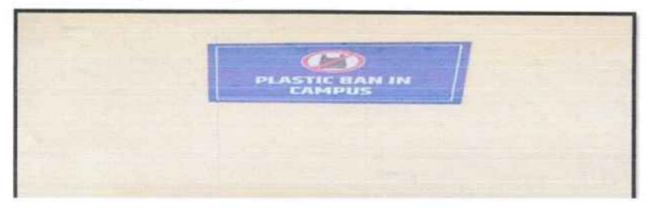
Principal released notice to all students, faculties and non teaching staff of college on 20/08/2020. During meeting finalized last Saturday of every month is "No Vehicle Day" of campus. All the students, faculties and non teaching staff of college are accepted for Future Safe, clean Environment and Sound Free Zone. In our College 5 staff coming by Electrical Vechical, 4 staff coming by Motor Cycle, 2 staff by Own car, 15 by Bycycle, 10 staff by Public Transport and remaining are by walk. Most of the students are coming by Public transport. "No Vehicle Day" was declared on last Saturday of every Month. Last Saturday of every month considered as a "No Vehicle Day".

# Output of "No -Vehicle Day"

- 1. No Vehicle Day helps to avoid air pollution and sound pollution.
- It also helps to save the excess burning of fossil fuels.
- 3. It also protects nature from high temperature and minimum release of polluting gases.
- 4. It also responsible for increase the income of public transport.
- 5. It saves the consumption petrol and diesel of Nation.
- 6. It protects environment from air pollution.
- 7. It maintains free sound pollution and clean College campus.
- 8. Each staff and student involved in protection of Earth from air pollution.



# 2.3 Plastic And Paper Free Campus





Initiative has been taken by college administrative to make the campus plastic and paper free. Most of the information is now shared to the faculty and students by email and social media applications rather than paper notice. Also, college has organized awareness program for students on above topic. It has been decided that I day in a month will be celebrate as bicycle day which will avoid the use of motor vehicles Below is the image of awareness program conducted in college.

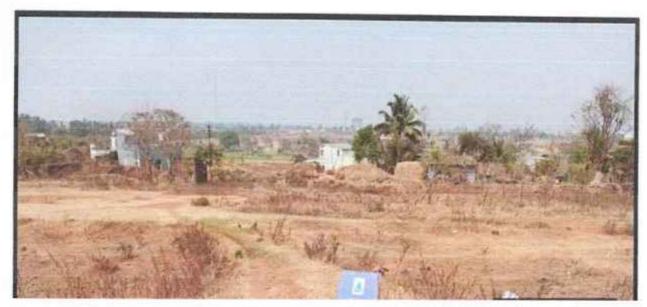
# 2.4 Liquid Waste Management

- Liquid waste management:
- The waste chemicals mixed water from laboratory passes through concealed pipe line into soak pit & recycled water is used for the watering trees or non-potable usage.
- Liquids are diluted by getting mixed with the washroom and toilet liquid wastes in to the common drainage.

#### Water Conservation

Water conservation is the practice of using water efficiently to reduce unnecessary water usage. According to Fresh Water Watch, water conservation is important because fresh clean water is a limited resource, as well as a costly one.











# **Rain Water Conservation**



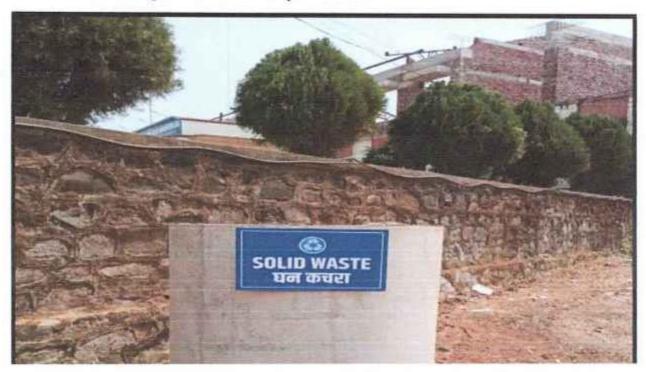




# 2.5 Solid waste management

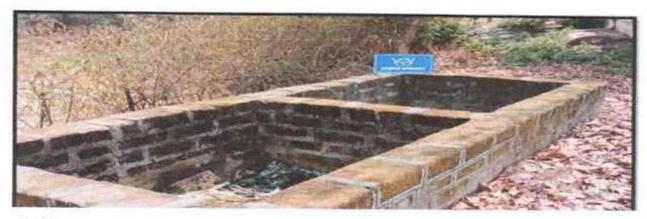
- To reduce waste at institute, students and staff are educated on proper waste management practices through lectures, advertisement on notice boards, displaying slogan boards in the campus.
- Waste is collected on a daily basis from various sources and is separated as dry and wet waste.

- Color coded dustbins are used for different types of wastes. Green for wet and blue for solid waste.
- Daily garbage is collected by housekeeping personnel and handed over to authorized personnel of vadgaon municipal for further processing. All waste water lines from toilets; bathrooms etc. are connected with Municipal drainage mains. Waste material like plastic, papers etc. are collected and sold out to scrap vendor from time to time.
- Efforts have taken to produce compost manure from the canteen solid waste and waste from other sources and efficiently run by the students. Manure is used for the purpose of herbal garden as well or for planted tree.









#### 2.6 E-waste management

The disposal of E-Waste is a rapidly growing problem because electronic equipment frequently contains hazardous substances which affect the environment and human health. E-waste such as, discarded computers, office electronic equipment, monitors, Hard Disks are disposed off as per their conditions. These wastes are sold to local scrap. Efforts are made to reduce e-waste by making optimum use of electronic devices.

#### Observations

The college conscientiously works towards generating minimal e-waste, for which the following strategies are adopted: Regular maintenance of electronic equipment and computers by the in house technician and AMC, ensures longer life. Weeded out computers from the computer science laboratories due to up gradation are transferred to departments, the administration within the college campus.Outdated Computers, servers, monitors, compact discs (CDs), DVD's, printers, scanners, copiers, motherboard, battery cells and other electronic equipment, weeded out from the computer laboratory are used for demonstration of internal parts of the equipment. Some electronic equipment are replaced with newer models due to the rapid technology advancements and production of newer electronic equipment.

#### Recommendations:

Electronic equipment may contain heavy metals and other materials. Computers and electronic equipment typically contain:

Lead - Computer monitors contain a picture tube known as a cathode ray tube (CRT).
 CRT's contain leaded glass, and are the largest source of lead in municipal waste. Solder used in printed circuit boards may also contain lead.



- Cadmium The largest source of cadmium in municipal waste is rechargeable nickel cadmium (NiCd) batteries. These batteries are found in most desktop and laptop computers.
  - · Mercury Some electronic equipment also contains recoverable quantities of mercury,

which is a toxic metal. Unwanted electronic equipment must therefore either be donated for reuse or sent for recycling.

# 2.7 World Ozone Day

The World Ozone Day is celebrated on September 16th of every year to spread awareness about the Ozone depletion. The theme for this year celebration given by United Nation Environmental Programme is — "Ozone for life: 35 years of ozone layer protection". The slogan of the day Ozone for life, reminds us that not only is Ozone crucial for life on Earth, but that we must continue to protect the ozone layer for future generation.

To spread the awareness and make the young minds understand about the importance of Ozone layer and the need to protect this fragile shield of gas ,the students of Dr. Babasaheb Ambedkar Mahavidyalaya, Peth Vadgaon, Kolhapur. were involved in various activities virtually like Online Poster making, Quiz contest etc .The students were very enthusiastic and prepared beautiful posters /charts depicting drawings of the ozone layer depletion .

Through PowerPoint Presentation, Children were apprised that Ozone layer is a natural part of our atmosphere and shields Earth from most of the Sun's harmful ultraviolet radiations. UV rays can be very damaging for our planet- for plants, humans and animals all alike.

The students were also sensitised that as a result of Ozone depletion there will be increase in Earth temperature, melting of glaciers, cancerous disease and rise in the level of ocean and many more. Through the activities children were encouraged to adopt and follow simple ways to keep the Ozone layer safe such as:

- \*Buy energy saving gadgets and bulbs.
- Follow 4 R's policy-Reduce, Reuse, Refuse and Recycle at home and school.
- · Use alternative means of transport : buses ,bicycles or simply walk or carpools
- Avoid buying and using aerosols and spray having CFC.

Active and energetic participation of students was observed throughout the session. On the whole it was a creative and interesting session, which enlightened the students and made them realise the seriousness of the situation.



# 3.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE

# AUDIT

- a) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather,
- Formation of Environment Policy and communicated to all faculties and other staff members.
- c) Reduction in use of paper work by go digital system.
- d) Water Meter should be installed at institute for monitoring of water consumption for landscape.
- e) Increase in Environmental promotional activities for spreading awareness at campus.
- f) As practically feasible avoid use of personal vehicles inside the campus.

Mr.R.S.Pukale

Energy Audit Coordinator

Department of Electrical Engineering

Dr. H. T. Jadhav Director AMGOI, Vathar Certified Energy Auditor (BEE) Reg. No. - EA - 3023



2019-20

# GREEN AND ENVIRONMENTAL AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2019-20
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



# DISCLAIMER

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# ACKNOWLEDGEMENT

We appreciate the interest and participation of Honorable Management and Principal and Faculty in carrying out the energy audit at **Dr. Babasaheb**Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur.

Our special thanks to Technicians and Staff involved for college who have extended their co-operation and courtesy to the energy audit team during the audit.



# Green And Environmental Audit

Team Member

Dr. H.T. Jadhav

Certified Energy Auditor

Bureau of Energy Efficiency

Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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2	Environmental Audit	22
3	Conclusion and General Recommendations of the Audit	30



# 1. GREEN AUDIT

Green audit was initiated with the beginning of 1970s with the motive of inspecting the work conducted within the organizations whose exercises can cause risk to the health of inhabitants and the environment. It exposes the authenticity of the proclamations made by multinational companies, armies and national governments with the concern of health issues as the consequences of environmental pollution. It is the duty of organizations to carry out the Green Audits of their ongoing processes for various reasons such as; to make sure whether they are performing in accordance with relevant rules and regulations, to improve the procedures and ability of materials, to analysis the potential duties and to determine a way which can lower the cost and add to the revenue. Through Green Audit, one gets a direction as how to improve the condition of environment and there are various factors that have determined the growth of carrying out Green Audit. Some of the incidents like Bhopal Gas Tragedy (Bhopal; 1984), Chernobyl Catastrophe (Ukraine; 1986) and Exxon-Valdez Oil Spill (Alaska; 1989) have cautioned the industries that setting corporate strategies for environmental security elements have no meaning until they are implemented.

Green Audit is assigned to the Criteria 7 of NAAC, National Assessment and Accreditation Council which is a self-governing organization of India that declares the institutions as Grade a, Grade B or Grade C according to the scores assigned at the time of accreditation.

The intention of organizing Green Audit is to upgrade the environment condition in and around the institutes, colleges, companies and other organizations. It is carried out with the aid of performing tasks like waste management, energy saving and others to turn into a better environmentally friendly institute.

#### 1.1 GOALS OF GREEN AUDIT

- The objective of carrying out Green Audit is securing the environment and cut down the threats posed to human health.
- To make sure that rules and regulations are taken care of
- To avoid the interruptions in environment that are more difficult to handle and their correction requires high cost.
- To suggest the best protocols for adding to sustainable development.



# 1.2 BENEFITS OF GREEN AUDIT

# Green Campus

The vision of the institute focuses on the green culture development and to aware community about eco-friendly environment. Since the beginning, trees have shaped us with essential components of life, viz., food and oxygen. As we evolved, they provided additional necessities such as shelter, medicine and tools. Today their value continues to increase and more benefits of trees are being discovered as their role expands to satisfy the needs created by our modern lifestyles. Peth Vadgaon is a small town. It is prosperous with nature. However, due to current urbanization Peth Vadgaon is changing. Therefore, plantation is very useful to sustain the health of the town. The college has taken the tree plantation project to develop awareness about environmental conservation in young generation. It is the great initiative to connect the young generation of the college with the environment.







# **ACTIVITY REPORT 2019-20**

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	16 <sup>th</sup> July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 35 and SW 09 Total 44 Cadet
Number of Teacher participated	06
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

#### Introduction:

Tree Plantation drives combat many environmental issues like deforestation, erosion of soil, desertification in semi-arid areas, global warming and hence enhancing the beauty and balance of the environment. Trees absorb harmful gases and emit oxygen resulting in an increasein oxygen supply. Plants planted 20, Subedar Supanekar Planted Trees.

# Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warrig and hence enhancing the beauty and balance of the\ environment.
- To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

#### Programme Outcome

- Many saplings of different species were planted. Students were encouraged to address the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.

The entire program created a strong feeling among the students.







Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019 TO 11th JUL 2019) Plastic Pollution Awareness Rally
Organized by	NCC
Date of the programme	07th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/Targeted Group	SD 19 and SW 08 Total 27 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	Sonarli Vasahat, Peth Vadgaon
Beneficiaries	People Sonarli Vasahat, Peth Vadgaon

Plastic pollution is today one of the most serious environmental problems affecting the oceans. Once in the natural environment, plastic can take up to 500 years to disappear and impacts wildlife on a daily basis. Drifting between two bodies of water it can strangle or smother any number of animal species. A rally was conducted under the leadership of the TROP members of the college where the students showed their support to the State Government's decision of banningsingle-use plastic. An eco-critical sense was instilled among the on-lookers that made us spreadthe green message of stopping plastic usage easily.

#### Aims and Objectives

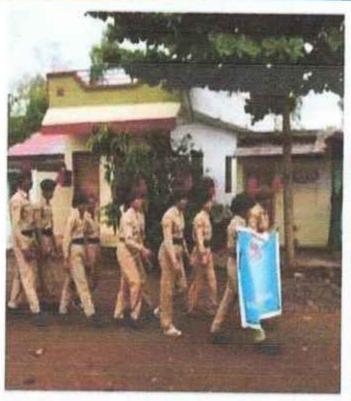
- To sensitize people against various kind of pollution.
- To create awareness about pollution impact on health.
- To organized various activities like lectures, rallies, nuked, quiz, pledge etc.

#### Programme Outcome

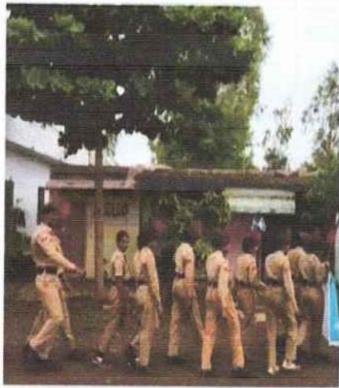
- Cadet aware about various types of pollution
- People also know about various types of pollution

The cadets perform these activities as part of social responsibilities and community

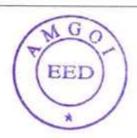












Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019 TO 11th JUL 2019) Plastic free Campus
Organized by	NCC
Date of the programme	08 <sup>th</sup> July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/Targeted Group	SD 18 and SW 08 Total 26 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

Global Campaign empowering students to take action on plastic pollution. These materials serveas a base to customise and advertise awareness activities to the school or adapt them to specific needs. There are three main reasons to change out of plastics:

- Human Health
- The Environment
- Social Justice

It is important to show the cause and effect of plastics on human health, social justice and theenvironment. Posters can be created showing local examples and products.

#### Aims and Objectives

- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

#### Programme Outcome

- Cadet aware about various types of pollution
- People also know about various types of pollution

The cadets perform these activities as part of social responsibilities and community.

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Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019) TO 11th JUL 2019) Special lecture on 'Plastic Pollution'
Organized by	NCC
Date of the programme	04th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 19 and SW 07 Total 26 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	College Campus
Beneficiaries	Cadets

Plastic pollution is the accumulation of plastic objects and particles (e.g. plastic bottles, bags and micro beads) in the Earth's environment that adversely affects humans, wildlife and their habitat. Plastics that act as pollutants are categorized by size into micro, meso or macro debris. Plastics are inexpensive and durable, making them very adaptable for different uses; as a result, manufacturers choose to use plastic over other materials. However, the chemical structure of most plastics renders them resistant to many natural processes of degradation and as a result they are slow to degrade. Together, these two factors allow large volumes of plastic to enter the environment as mismanaged waste and for it to persist in the ecosystem. Plastic pollution can afflict land, waterways and oceans.

#### Aims and Objectives

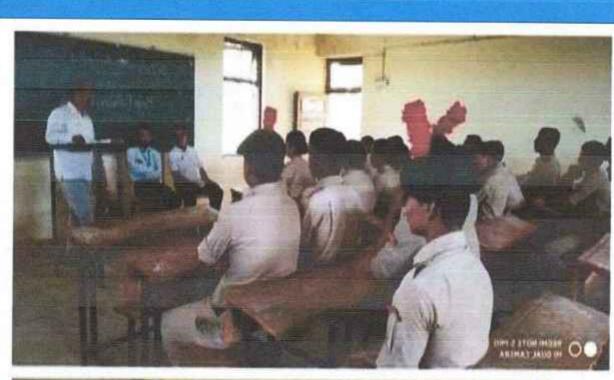
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#### Programme Outcome

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- People also know about various types of pollution

The cadets perform these activities as part of social responsibilities and community









Title of the programme	SWACHHATA PAKHWADA
	Cleanness Drive
Organized by	NCC
Date of the programme	19th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/Targeted Group	SD 40 and SW 10 Total 50 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth -Vadgaon Bus Stand Campus
Beneficiaries	Peth- Vadgaon People

Swachhata means cleanliness and Pakhwada means duration of 15 days, this means it is an initiative of 15 days of different activities for Swachha Bharat mission. The aim behind this celebration was to create awareness among all students about cleanliness. The first activity of Swachhata Pakhwada campaign was cleanness drive. It was especially designed for the youngest students of the school.

# Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around thecampus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing those actionsthat make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transformSwachh Bharat into a citizen's movement.

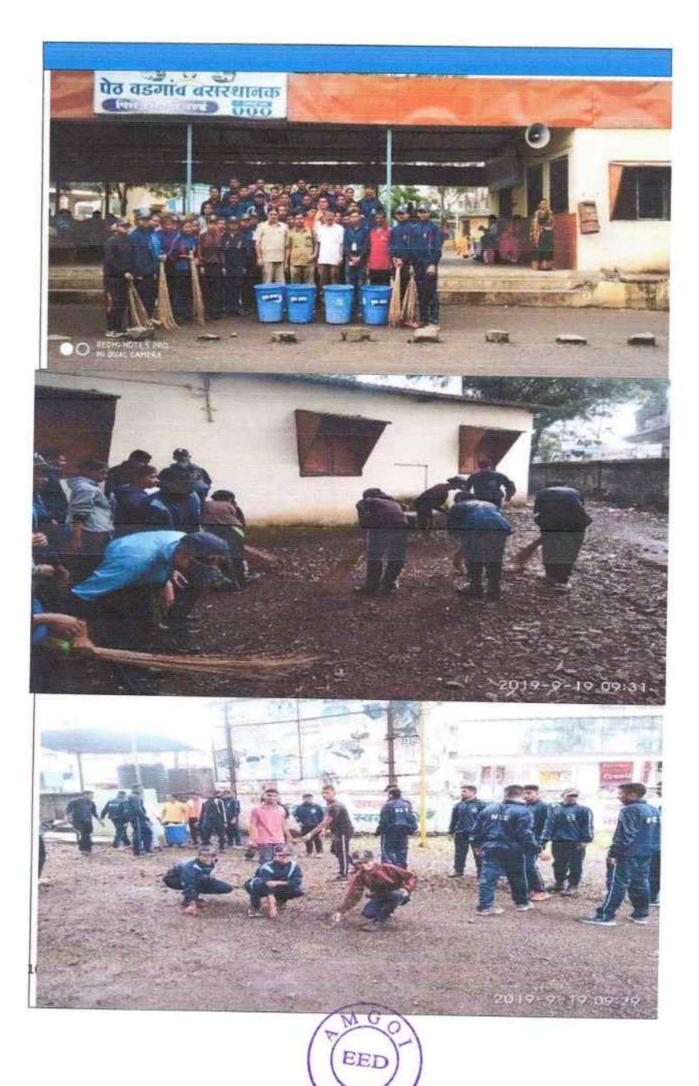
#### Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

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Associate NCC Officer o Mah, Bn. NCC, Remodur Bantsday Activities Charles Feb. (adjoint



Mei.

Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kelhapur, Maharashtra



Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	27 <sup>th</sup> September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	College Campus
Beneficiaries	Peth Vadgaon People

#### Introduction:

Swatch Bharat Mission (SBM), Swatch Bharat Abhiyan, or Clean India Mission is a countrywide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets.

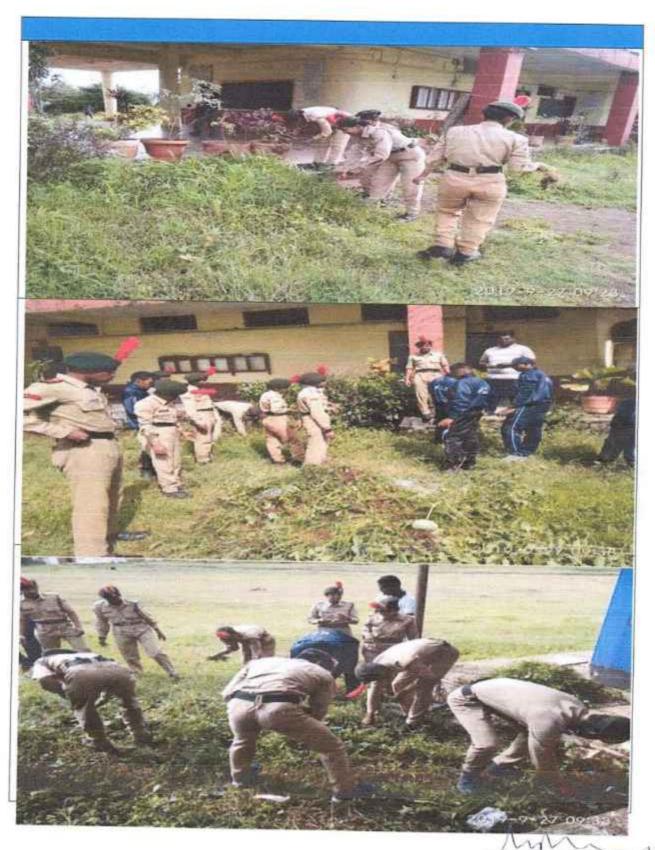
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Organized by	NCC
Date of the programme	01st October 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 42 and SW 10 Total 51 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	Peth -Vadgaon People

#### Introduction:

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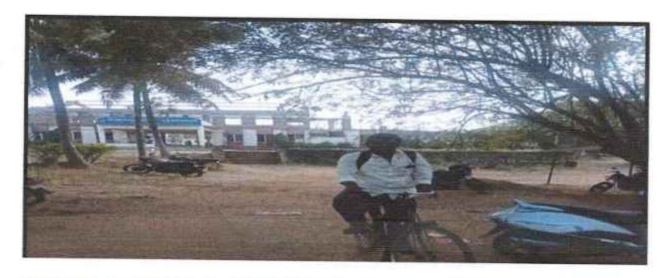


#### 2. ENVIRONMENTAL AUDIT

#### 2.1 World environment day

The world environment day is celebrated every year on 5th June to raise global awareness to take positive environmental action to protect nature and the planet earth. It is a day that reminds everyone on the planet to get involved in environment friendly activities. From school children to community groups, companies and governments, all come together to pledge towards building a greener planet. Keeping this aim in view, Dr. Babasaheb Ambedkar College, PethVadgaon, Dist. Kolhapur were briefed about the importance of this day. They were asked to plant a sapling in small pots and bring them to college to create a green corner in the college corridor. A lot of enthusiasm was seen in the kids who brought pots with saplings of different varieties of herbs and shrubs. The event was conducted successfully with whole hearted participation and awareness for a greener World

#### 2.2 NO Vehicle Day







Our college located in Vadgaon dist kolhapur. In our college about 1000 student are studying in UG to PG section and about 35 teaching and non-teaching staff are present. Most of the students and staff coming from villages by common buses, two wheeler s as well car. We are start our college campus pollution free and campus goes to green under the guidance of Prin. Dr. S. D. Disale. Our Principal call the meeting on the month of June 2019 on discussion on No Vehicle Day. During this meeting all students and teaching staff are accepted the rules and regulation of "No - Vehicle Day". During this meeting Principal talks on benefits of "No - Vehicle Day" on the environment, Social life, and Health and Socio economic importance of Nation. All these suggestions and benefits are accepted by students and staff of our college.

Principal released notice to all students, faculties and non teaching staff of college on 25/08/2029. During meeting finalized last Saturday of every month is "No Vehicle Day" of campus. All the students, faculties and non teaching staff of college are accepted for Future Safe, clean Environment and Sound Free Zone. In our College 5 staff coming by Electrical Vechical, 4 staff coming by Motor Cycle, 2 staff by Own car, 15 by Bycycle, 10 staff by Public Transport and remaining are by walk. Most of the students are coming by Public transport. "No Vehicle Day" was declared on last Saturday of every Month. Last Saturday of every month considered as a "No Vehicle Day".

#### Output of "No -Vehicle Day"

- 1. No Vehicle Day helps to avoid air pollution and sound pollution.
- 2. It also helps to save the excess burning of fossil fuels.
- 3. It also protects nature from high temperature and minimum release of polluting gases.
- 4. It also responsible for increase the income of public transport.
- 5. It saves the consumption petrol and diesel of Nation.
- It protects environment from air pollution.
- 7. It maintains free sound pollution and clean College campus.
- 8. Each staff and student involved in protection of Earth from air pollution.



#### 2.3 Plastic And Paper Free Campus





Initiative has been taken by college administrative to make the campus plastic and paper free. Most of the information is now shared to the faculty and students by email and social media applications rather than paper notice. Also, college has organized awareness program for students on above topic. It has been decided that I day in a month will be celebrate as bicycle day which will avoid the use of motor vehicles Below is the image of awareness program conducted in college.

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- Liquid waste management:
- The waste chemicals mixed water from laboratory passes through concealed pipe line into soak pit & recycled water is used for the watering trees or non-potable usage.
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#### **Rain Water Conservation**





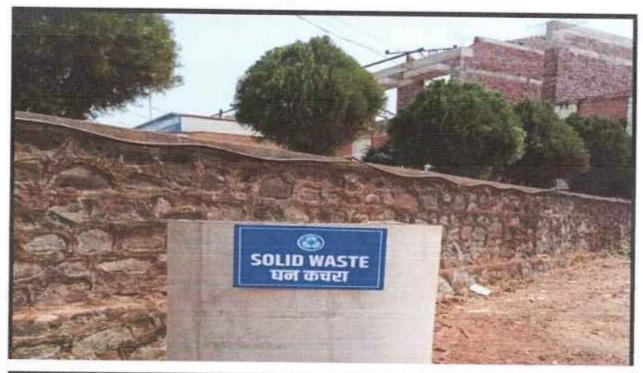


## 2.5 Solid waste management

- To reduce waste at institute, students and staff are educated on proper waste management practices through lectures, advertisement on notice boards, displaying slogan boards in the campus.
- Waste is collected on a daily basis from various sources and is separated as dry and wet waste.

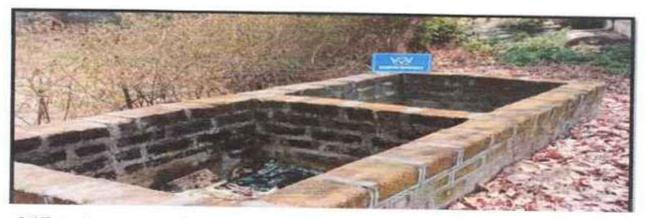


- Color coded dustbins are used for different types of wastes. Green for wet and blue for solid waste.
- Daily garbage is collected by housekeeping personnel and handed over to authorized personnel of vadgaon municipal for further processing. All waste water lines from toilets; bathrooms etc. are connected with Municipal drainage mains. Waste material like plastic, papers etc. are collected and sold out to scrap vendor from time to time.
- Efforts have taken to produce compost manure from the canteen solid waste and waste from other sources and efficiently run by the students. Manure is used for the purpose of herbal garden as well or for planted tree.









#### 2.6 E-waste management

The disposal of E-Waste is a rapidly growing problem because electronic equipment frequently contains hazardous substances which affect the environment and human health. E-waste such as, discarded computers, office electronic equipment, monitors, Hard Disks are disposed off as per their conditions. These wastes are sold to local scrap. Efforts are made to reduce e-waste by making optimum use of electronic devices.

#### Observations

The college conscientiously works towards generating minimal e-waste, for which the following strategies are adopted: Regular maintenance of electronic equipment and computers by the in house technician and AMC, ensures longer life. Weeded out computers from the computer science laboratories due to up gradation are transferred to departments, the administration within the college campus. Outdated Computers, servers, monitors, compact discs (CDs), DVD's, printers, scanners, copiers, motherboard, battery cells and other electronic equipment, weeded out from the computer laboratory are used for demonstration of internal parts of the equipment. Some electronic equipment are replaced with newer models due to the rapid technology advancements and production of newer electronic equipment.

#### Recommendations:

Electronic equipment may contain heavy metals and other materials. Computers and electronic equipment typically contain:

Lead - Computer monitors contain a picture tube known as a cathode ray tube (CRT).
 CRT's contain leaded glass, and are the largest source of lead in municipal waste. Solder used in printed circuit boards may also contain lead.



- Cadmium The largest source of cadmium in municipal waste is rechargeable nickel cadmium (NiCd) batteries. These batteries are found in most desktop and laptop computers.
  - · Mercury Some electronic equipment also contains recoverable quantities of mercury,

which is a toxic metal. Unwanted electronic equipment must therefore either be donated for reuse or sent for recycling.

#### 2.7 World Ozone Day

The World Ozone Day is celebrated on September 16th of every year to spread awareness about the Ozone depletion. The theme for this year celebration given by United Nation Environmental Programme is — "Ozone for life: 35 years of ozone layer protection". The slogan of the day Ozone for life, reminds us that not only is Ozone crucial for life on Earth, but that we must continue to protect the ozone layer for future generation.

To spread the awareness and make the young minds understand about the importance of Ozone layer and the need to protect this fragile shield of gas ,the students of Dr. Babasaheb Ambedkar Mahavidyalaya, Peth Vadgaon, Kolhapur. were involved in various activities virtually like Online Poster making, Quiz contest etc .The students were very enthusiastic and prepared beautiful posters /charts depicting drawings of the ozone layer depletion .

Through PowerPoint Presentation, Children were apprised that Ozone layer is a natural part of our atmosphere and shields Earth from most of the Sun's harmful ultraviolet radiations. UV rays can be very damaging for our planet- for plants, humans and animals all alike.

The students were also sensitised that as a result of Ozone depletion there will be increase in Earth temperature, melting of glaciers, cancerous disease and rise in the level of ocean and many more. Through the activities children were encouraged to adopt and follow simple ways to keep the Ozone layer safe such as:

- ·Buy energy saving gadgets and bulbs.
- Follow 4 R's policy-Reduce, Reuse, Refuse and Recycle at home and school.
- · Use alternative means of transport : buses ,bicycles or simply walk or carpools
- Avoid buying and using aerosols and spray having CFC.

Active and energetic participation of students was observed throughout the session. On the whole it was a creative and interesting session, which enlightened the students and made them realise the seriousness of the situation.



#### 3.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE

#### AUDIT

- a) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- Formation of Environment Policy and communicated to all faculties and other staff members.
- Reduction in use of paper work by go digital system.
- d) Water Meter should be installed at institute for monitoring of water consumption for landscape.
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Mr.R.S.Pukale

Energy Audit Coordinator

Department of Electrical Engineering

Dr. H. T. Jadhav
Director AMGOI, Vathar
rtified Energy Auditor (BEE)
Reg. No. - EA - 3023



# 2018-19

# GREEN AND ENVIRONMENTAL AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2018-19
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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#### ACKNOWLEDGEMENT

We appreciate the interest and participation of Honorable Management and Principal and Faculty in carrying out the energy audit at Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur. Our special thanks to Technicians and Staff involved for college who have extended their co-operation and courtesy to the energy audit team during the audit.



# **Green And Environmental Audit**

Team Member

Dr. H.T. Jadhav

Certified Energy Auditor

Bureau of Energy Efficiency

Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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2	Environmental Audit	10
3	Conclusion and General Recommendations of the Audit	26



#### 1. GREEN AUDIT

Green audit was initiated with the beginning of 1970s with the motive of inspecting the work conducted within the organizations whose exercises can cause risk to the health of inhabitants and the environment. It exposes the authenticity of the proclamations made by multinational companies, armies and national governments with the concern of health issues as the consequences of environmental pollution. It is the duty of organizations to carry out the Green Audits of their ongoing processes for various reasons such as; to make sure whether they are performing in accordance with relevant rules and regulations, to improve the procedures and ability of materials, to analysis the potential duties and to determine a way which can lower the cost and add to the revenue. Through Green Audit, one gets a direction as how to improve the condition of environment and there are various factors that have determined the growth of carrying out Green Audit. Some of the incidents like Bhopal Gas Tragedy (Bhopal; 1984), Chernobyl Catastrophe (Ukraine; 1986) and Exxon-Valdez Oil Spill (Alaska; 1989) have cautioned the industries that setting corporate strategies for environmental security elements have no meaning until they are implemented.

Green Audit is assigned to the Criteria 7 of NAAC, National Assessment and Accreditation Council which is a self-governing organization of India that declares the institutions as Grade a, Grade B or Grade C according to the scores assigned at the time of accreditation.

The intention of organizing Green Audit is to upgrade the environment condition in and around the institutes, colleges, companies and other organizations. It is carried out with the aid of performing tasks like waste management, energy saving and others to turn into a better environmentally friendly institute.

#### 1.1 GOALS OF GREEN AUDIT

 The objective of carrying out Green Audit is securing the environment and cut down the threats posed to human health.



- To make sure that rules and regulations are taken care of
- To avoid the interruptions in environment that are more difficult to handle and their correction requires high cost.
- To suggest the best protocols for adding to sustainable development.

#### 1.2 BENEFITS OF GREEN AUDIT

#### **Green Campus**

The vision of the institute focuses on the green culture development and to aware community about eco-friendly environment. Since the beginning, trees have shaped us with essential components of life, viz., food and oxygen. As we evolved, they provided additional necessities such as shelter, medicine and tools. Today their value continues to increase and more benefits of trees are being discovered as their role expands to satisfy the needs created by our modern lifestyles. Peth Vadgaon is a small town. It is prosperous with nature. However, due to current urbanization Peth Vadgaon is changing. Therefore, plantation is very useful to sustain the health of the town. The college has taken the tree plantation project to develop awareness about environmental conservation in young generation. It is the great initiative to connect the young generation of the college with the environment.

#### Activity Report 2018-19

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	5 <sup>th</sup> July 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 25 and SW 10 Total 35 Cadet
Number of Teacher participated	20
Place of extension / outreach activity	College
Beneficiaries	College Students and Staff



#### **Brief Report**

#### Introduction:

Tree plantation means planting more trees in a planned way. It is significant in the current age of climate change and global warming. We cannot think of our existence without trees. Trees exert much influence on the climate condition of a country, they are responsible for maintaining the ecological balance throughout the world. An average tree produces enough oxygen to fulfill the oxygen needs of four people. Trees remove pollutants and fine grained particles from the air, reduce noise pollution and act as a buffer to keep residential areas quiet and serene.

Speech about Importance of Tree Plantation given by Honorable Nanasaheb Mane, Chairman Jayprakasha Education Society.

#### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warming and hence enhancing the beauty and balance of the environment.
- · To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

#### Programme Outcome

- Many saplings of different species were planted. Students were encouraged to address the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.

The entire program created a strong feeling among the students.







Fig: Tree Plantation in college campus





Fig: Tree Plantation in college campus



#### 2. ENVIRONMENTAL AUDIT

#### 2.1 World environment day

The world environment day is celebrated every year on 5th June to raise global awareness to take positive environmental action to protect nature and the planet earth. It is a day that reminds everyone on the planet to get involved in environment friendly activities. From school children to community groups, companies and governments, all come together to pledge towards building a greener planet. Keeping this aim in view, Dr. Babasaheb Ambedkar College, PethVadgaon, Dist. Kolhapur were briefed about the importance of this day. They were asked to plant a sapling in small pots and bring them to college to create a green corner in the college corridor. A lot of enthusiasm was seen in the kids who brought pots with saplings of different varieties of herbs and shrubs. The event was conducted successfully with whole hearted participation and awareness for a greener World

Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	18 August 2018 Saturday
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	NCC Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth- Vadgaon
Beneficiaries	Peth- Vadgaon

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission will also make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness amongst locals to maintain cleanliness. Speech about Importance of Swach



Bharat given I/C, Principal Dr. R.M.Mirajkar Rally Started from Srasenapati Dhanaji Jadhavs Statue - Chh.Shivaji Maharaj Statue - Main Market Lane - Bus Stand - Vijayshiha Yadav Statue and end at Sarsenapati Dhanaji Jadhavs Statue.

#### Aims and Objectives

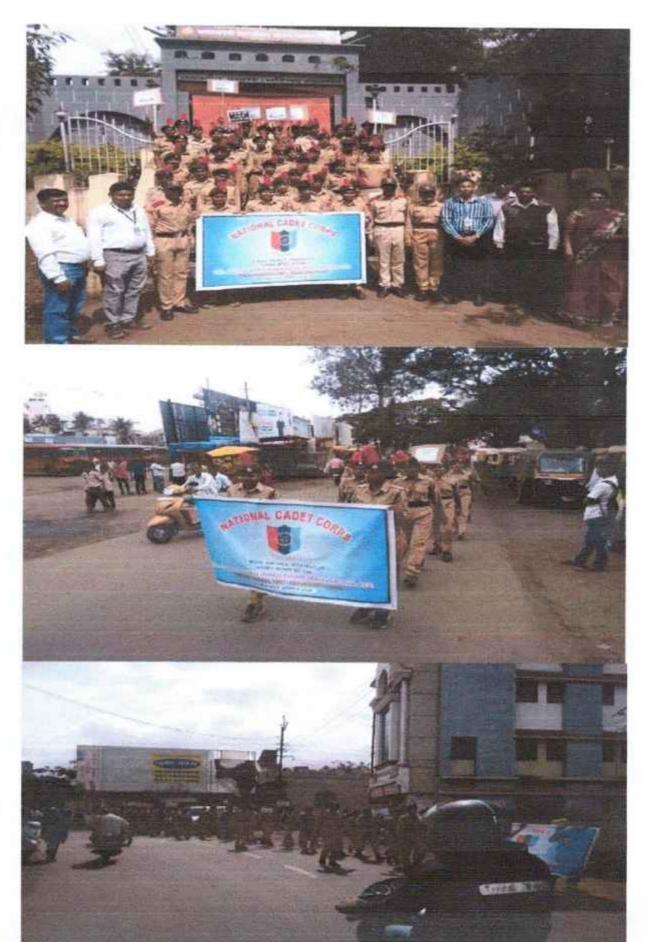
- · To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and aroundthe campus.

#### Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

The cadets perform these activities as part of social responsibilities and community.









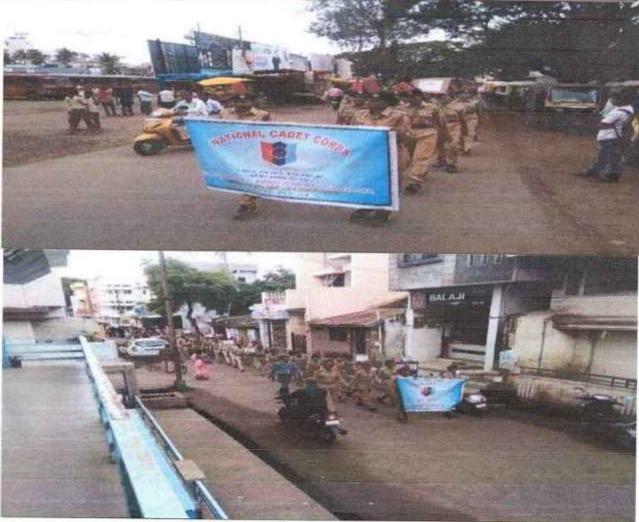


Fig: Photos of Swachh Bharat rally



Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	3 <sup>rd</sup> October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 41 and SW 14 Total 55 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat City, Tal-Hatkangale, Dist- Kolhapur
Beneficiaries	College Students and Staff

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission willalso make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness among st locals to maintain cleanliness. Activities: All 55cadets sw/sd were presented at college sharp at 8:00 am. Speech about Importance of Swach Bharat given I/C, Principal Dr. R.M.Mirajkar Rally Started from Collage

 Vadgaon Court Main Road – Sonarli Vasahat Boudha Vihar — Primary School and end at Maruti Temple.

#### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around thecampus.

#### Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.



The cadets perform these activities as part of social responsibilities and community





Title of the programme	SWACH BHARAT- Cleanness Drive
Organized by	NCC
Date of the programme	8 <sup>th</sup> October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Mahalakshami Temple, Peth Vadgaon City, Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	College Students and Staff

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal BharatAbhiyan launched in 2009 that failed to achieve its intended targets. All 53 cadets sw/sd were presented at college sharp at 9:00 am., Speech about Importance of Swach Bharat given Chief officer of Vadgaon Municipality Mr. Atul Patil, This activity organized jointly with municipal council, Also participated our teaching and non-teaching staff.

#### Aims and Objectives

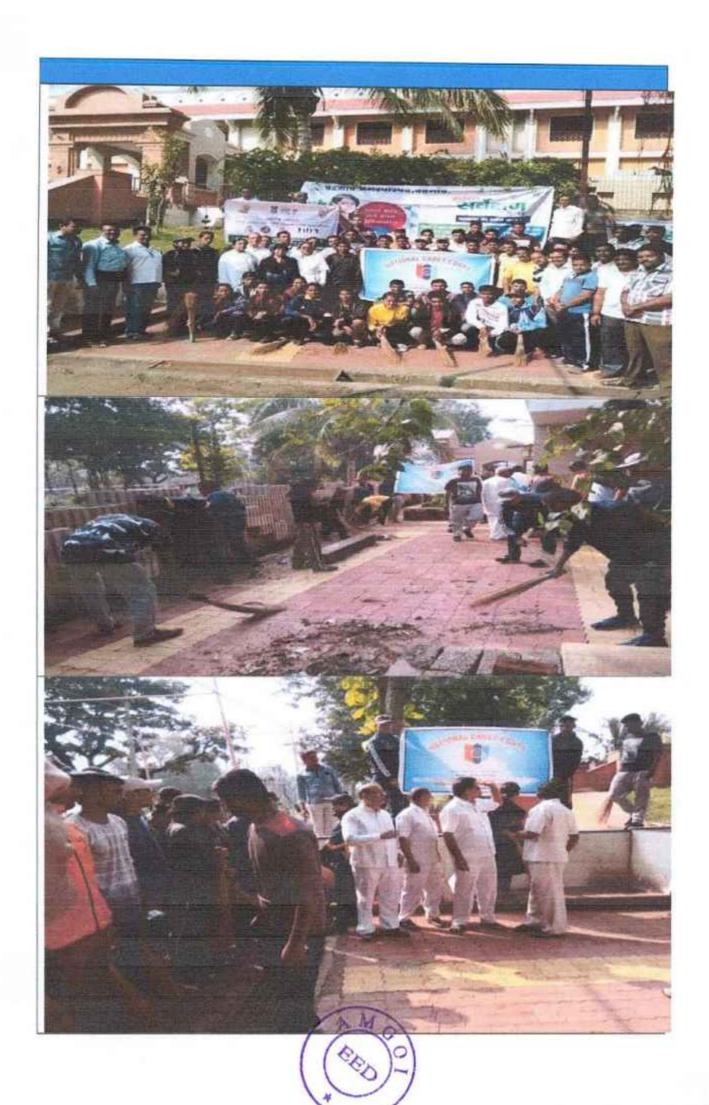
- To create awareness about cleanliness of environment.
- · To create awareness about health and hygiene among the students.

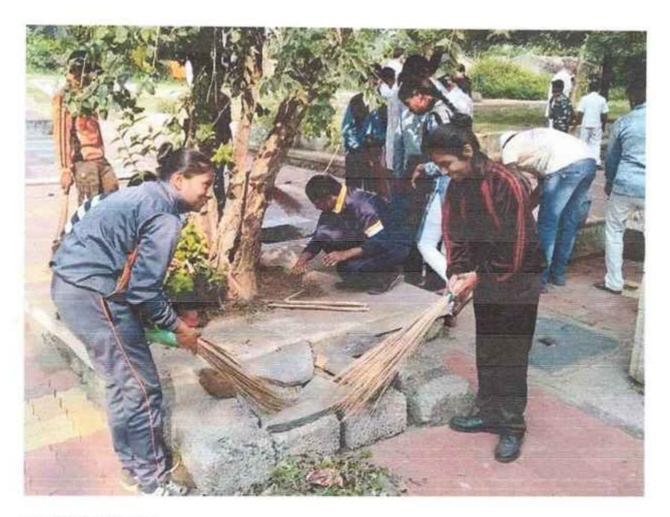
#### **Programme Outcome**

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

The cadets perform these activities as part of social responsibilities and community







#### 2.2 NO Vehicle Day

Our college located in Vadgaon dist kolhapur. In our college about 1000 student are studying in UG to PG section and about 35 teaching and non-teaching staff are present. Most of the students and staff coming from villages by common buses, two wheeler s as well car. We are start our college campus pollution free and campus goes to green under the guidance of Prin. Dr. S. D. Disale. Our Principal call the meeting on the month of June 2022 on discussion on No Vehicle Day. During this meeting all students and teaching staff are accepted the rules and regulation of "No - Vehicle Day". During this meeting Principal talks on benefits of "No - Vehicle Day" on the environment, Social life, and Health and Socio economic importance of Nation. All these suggestions and benefits are accepted by students and staff of our college.

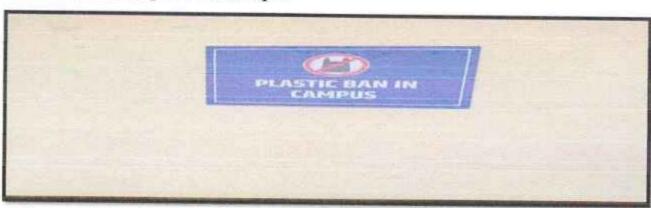
Principal released notice to all students, faculties and non teaching staff of college on 25/11/2022. During meeting finalized last Saturday of every month is "No Vehicle Day" of campus. All the students, faculties and non teaching staff of college are accepted for Future Safe, clean Environment and Sound Free Zone. In our College 5 staff coming by Electrical

Vechical, 4 staff coming by Motor Cycle, 2 staff by Own car, 15 by Bycycle, 10 staff by Public Transport and remaining are by walk. Most of the students are coming by Public transport. "No Vehicle Day" was declared on last Saturday of every Month. Last Saturday of every month considered as a "No Vehicle Day".

## Output of "No -Vehicle Day"

- 1. No Vehicle Day helps to avoid air pollution and sound pollution.
- 2. It also helps to save the excess burning of fossil fuels.
- 3. It also protects nature from high temperature and minimum release of polluting gases.
- 4. It also responsible for increase the income of public transport.
- 5. It saves the consumption petrol and diesel of Nation.
- 6. It protects environment from air pollution.
- 7. It maintains free sound pollution and clean College campus.
- 8. Each staff and student involved in protection of Earth from air pollution.

#### 2.3 Plastic And Paper Free Campus



Initiative has been taken by college administrative to make the campus plastic and paper free. Most of the information is now shared to the faculty and students by email and social media applications rather than paper notice. Also, college has organized awareness program for students on above topic. It has been decided that 1 day in a month will be celebrate as bicycle day which will avoid the use of motor vehicles Below is the image of awareness program conducted in college.



# 2.4 Liquid Waste Management

- Liquid waste management:
- The waste chemicals mixed water from laboratory passes through concealed pipe line into soak pit & recycled water is used for the watering trees or non-potable usage.
- Liquids are diluted by getting mixed with the washroom and toilet liquid wastes in to the common drainage.

#### Water Conservation

Water conservation is the practice of using water efficiently to reduce unnecessary water usage. According to Fresh Water Watch, water conservation is important because fresh clean water is a limited resource, as well as a costly one.

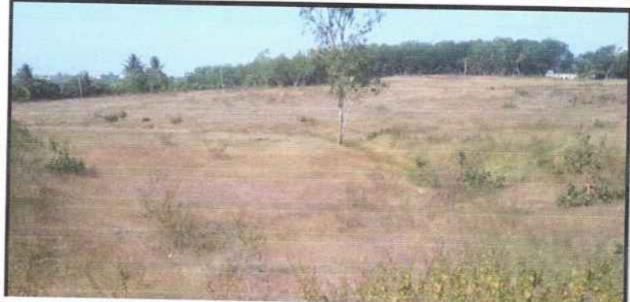






# Rain Water Conservation



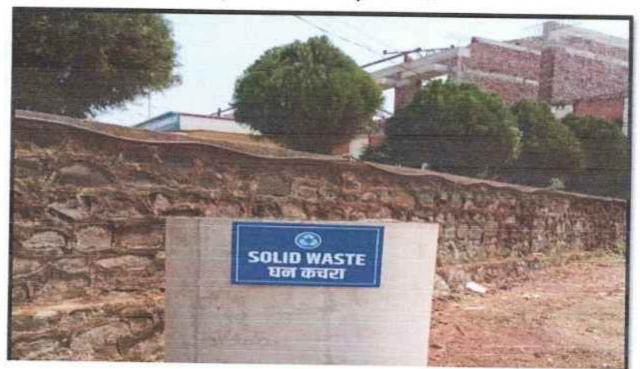






# 2.5 Solid waste management

- To reduce waste at institute, students and staff are educated on proper waste management practices through lectures, advertisement on notice boards, displaying slogan boards in the campus.
- Waste is collected on a daily basis from various sources and is separated as dry and wet waste.
- Color coded dustbins are used for different types of wastes. Green for wet and blue for solid waste.
- Daily garbage is collected by housekeeping personnel and handed over to authorized personnel of vadgaon municipal for further processing. All waste water lines from toilets; bathrooms etc. are connected with Municipal drainage mains. Waste material like plastic, papers etc. are collected and sold out to scrap vendor from time to time.
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#### Observations

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Reg. No. - EA - 3023



# 2017-18

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Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Year 2022-23
Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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Number of Teacher participated	20
Place of extension / outreach activity	College
Beneficiaries	College Students and Staff



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#### Aims and Objectives

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- To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

#### Programme Outcome

- Many saplings of different species were planted. Students were encouraged to address the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.

The entire program created a strong feeling among the students.







Fig: Tree Plantation in college campus





Fig: Tree Plantation in college campus



# 2. ENVIRONMENTAL AUDIT

# 2.1 World environment day

The world environment day is celebrated every year on 5th June to raise global awareness to take positive environmental action to protect nature and the planet earth. It is a day that reminds everyone on the planet to get involved in environment friendly activities. From school children to community groups, companies and governments, all come together to pledge towards building a greener planet. Keeping this aim in view, Dr. Babasaheb Ambedkar College, PethVadgaon, Dist. Kolhapur were briefed about the importance of this day. They were asked to plant a sapling in small pots and bring them to college to create a green corner in the college corridor. A lot of enthusiasm was seen in the kids who brought pots with saplings of different varieties of herbs and shrubs. The event was conducted successfully with whole hearted participation and awareness for a greener World

Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	18 August 2018 Saturday
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	NCC Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth- Vadgaon
Beneficiaries	Peth- Vadgaon
man division	

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission will also make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness amongst locals to maintain cleanliness. Speech about Importance of Swach



Bharat given I/C, Principal Dr. R.M.Mirajkar Rally Started from Srasenapati Dhanaji Jadhavs Statue – Chh.Shivaji Maharaj Statue – Main Market Lane – Bus Stand - Vijayshiha Yadav Statue and end at Sarsenapati Dhanaji Jadhavs Statue.

# Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and aroundthe campus.

#### **Programme Outcome**

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

The cadets perform these activities as part of social responsibilities and community.



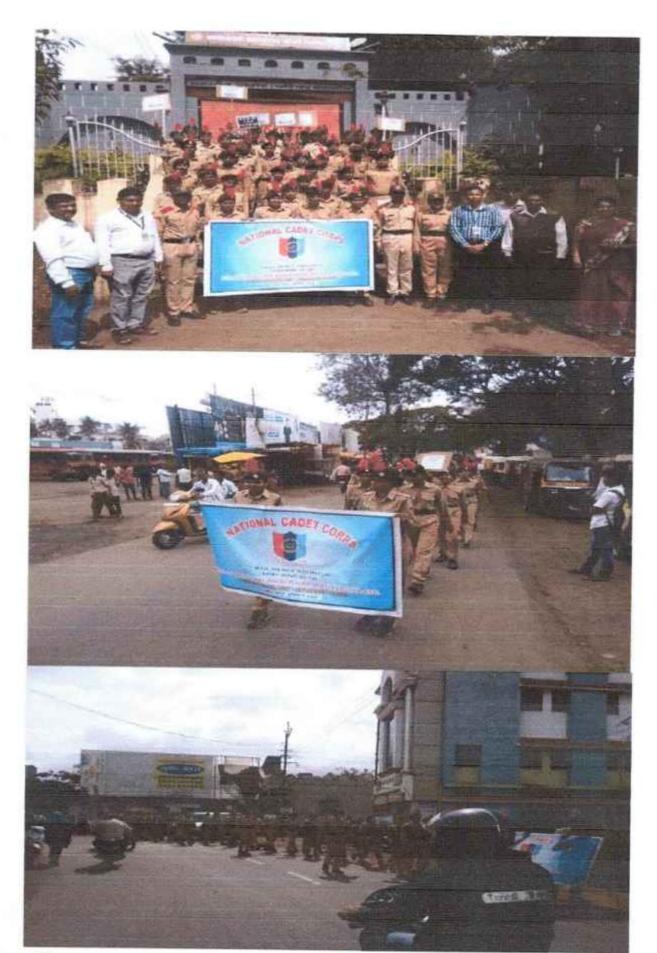








Fig: Photos of Swachh Bharat rally



Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	3 <sup>rd</sup> October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 41 and SW 14 Total 55 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat City, Tal-Hatkangale, Dist- Kolhapur
Beneficiaries	College Students and Staff

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission willalso make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness among st locals to maintain cleanliness. Activities: All 55cadets sw/sd were presented at college sharp at 8:00 am. Speech about Importance of Swach Bharat given I/C, Principal Dr. R.M.Mirajkar Rally Started from Collage

 Vadgaon Court Main Road – Sonarli Vasahat Boudha Vihar — Primary School and end at Maruti Temple.

#### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around thecampus.

#### Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.



The cadets perform these activities as part of social responsibilities and community





SWACH BHARAT- Cleanness Drive
NCC
8 <sup>th</sup> October 2018
Dr. Babasaheb Ambedkar College
SD 37 and SW 16 Total 53 Cadet
02
Mahalakshami Temple, Peth Vadgaon City, Tal-Hatkangale, Dist-Kolhapur
College Students and Staff

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal BharatAbhiyan launched in 2009 that failed to achieve its intended targets. All 53 cadets sw/sd were presented at college sharp at 9:00 am., Speech about Importance of Swach Bharat given Chief officer of Vadgaon Municipality Mr. Atul Patil, This activity organized jointly with municipal council, Also participated our teaching and non-teaching staff.

#### Aims and Objectives

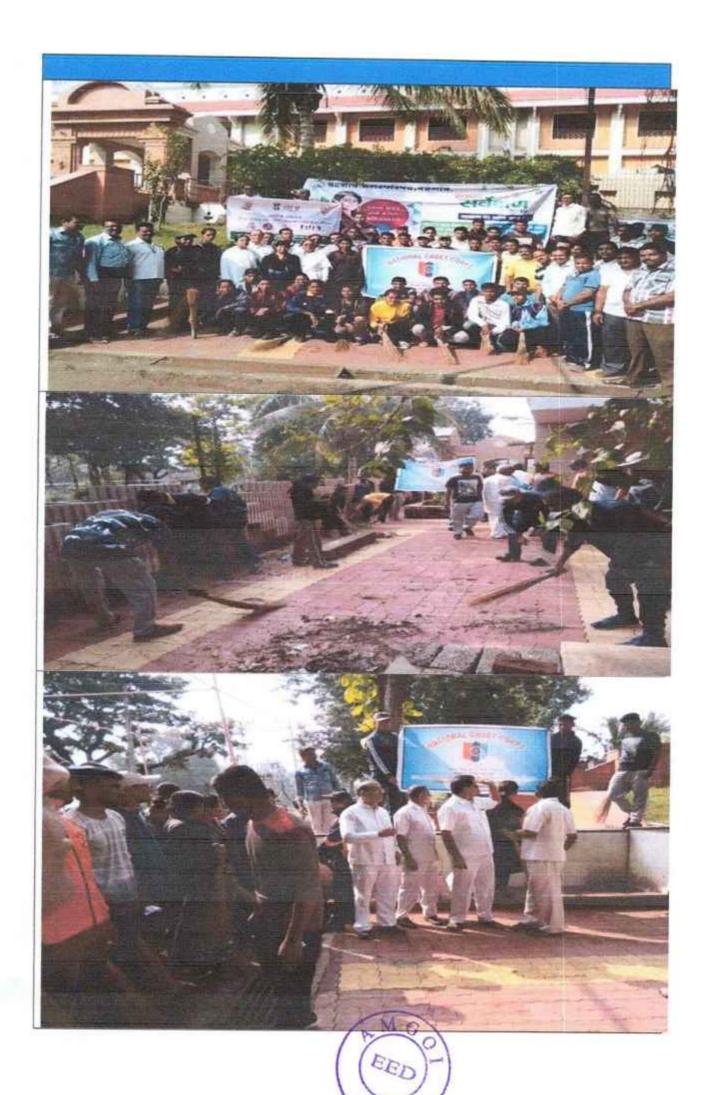
- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene among the students.

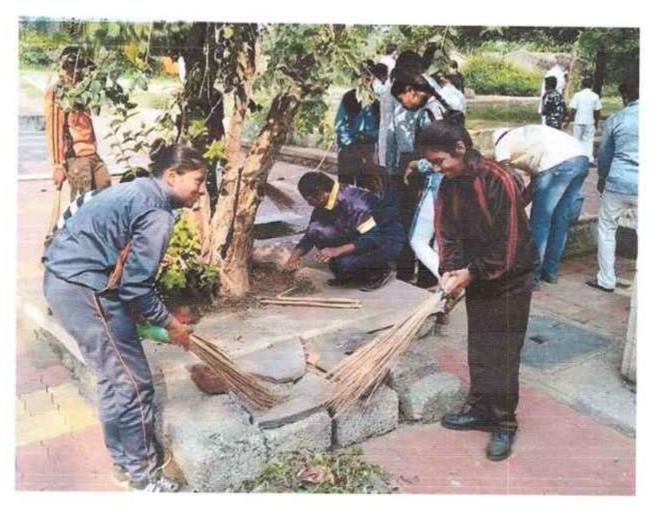
#### Programme Outcome

- Development of clean and hygienic environment.
- It has made students aware of cleanliness and social hygiene.

The cadets perform these activities as part of social responsibilities and community







### 2.2 NO Vehicle Day

Our college located in Vadgaon dist kolhapur. In our college about 1000 student are studying in UG to PG section and about 35 teaching and non-teaching staff are present. Most of the students and staff coming from villages by common buses, two wheeler s as well car. We are start our college campus pollution free and campus goes to green under the guidance of Prin. Dr. S. D. Disale. Our Principal call the meeting on the month of June 2022 on discussion on No Vehicle Day. During this meeting all students and teaching staff are accepted the rules and regulation of "No - Vehicle Day". During this meeting Principal talks on benefits of "No - Vehicle Day" on the environment, Social life, and Health and Socio economic importance of Nation. All these suggestions and benefits are accepted by students and staff of our college.

Principal released notice to all students, faculties and non teaching staff of college on 25/11/2022. During meeting finalized last Saturday of every month is "No Vehicle Day" of campus. All the students, faculties and non teaching staff of college are accepted for Future Safe, clean Environment and Sound Free Zone. In our College 5 staff coming by Electrical

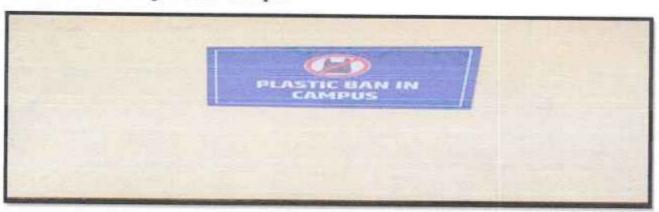


Vechical, 4 staff coming by Motor Cycle, 2 staff by Own car, 15 by Bycycle, 10 staff by Public Transport and remaining are by walk. Most of the students are coming by Public transport. "No Vehicle Day" was declared on last Saturday of every Month. Last Saturday of every month considered as a "No Vehicle Day".

### Output of "No -Vehicle Day"

- 1. No Vehicle Day helps to avoid air pollution and sound pollution.
- 2. It also helps to save the excess burning of fossil fuels.
- 3. It also protects nature from high temperature and minimum release of polluting gases.
- 4. It also responsible for increase the income of public transport.
- 5. It saves the consumption petrol and diesel of Nation.
- 6. It protects environment from air pollution.
- 7. It maintains free sound pollution and clean College campus.
- 8. Each staff and student involved in protection of Earth from air pollution.

# 2.3 Plastic And Paper Free Campus



Initiative has been taken by college administrative to make the campus plastic and paper free. Most of the information is now shared to the faculty and students by email and social media applications rather than paper notice. Also, college has organized awareness program for students on above topic. It has been decided that 1 day in a month will be celebrate as bicycle day which will avoid the use of motor vehicles Below is the image of awareness program conducted in college.



# 2.4 Liquid Waste Management

- Liquid waste management:
- The waste chemicals mixed water from laboratory passes through concealed pipe line into soak pit & recycled water is used for the watering trees or non-potable usage.
- Liquids are diluted by getting mixed with the washroom and toilet liquid wastes in to the common drainage.

#### Water Conservation

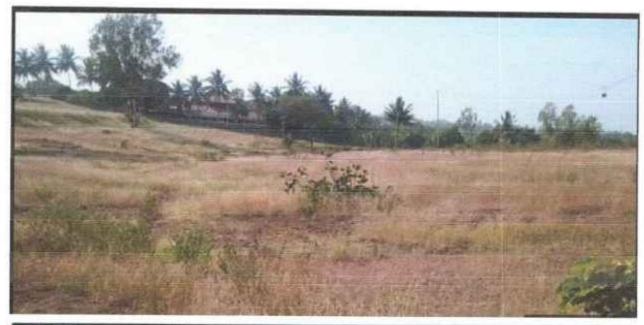
Water conservation is the practice of using water efficiently to reduce unnecessary water usage. According to Fresh Water Watch, water conservation is important because fresh clean water is a limited resource, as well as a costly one.

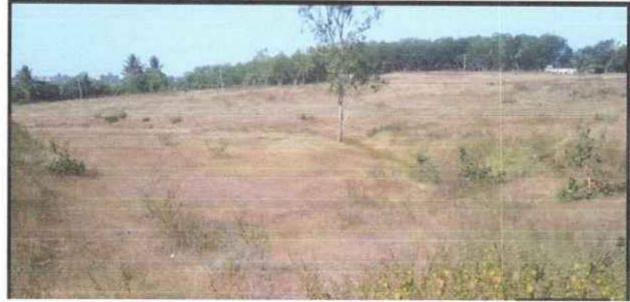






# Rain Water Conservation



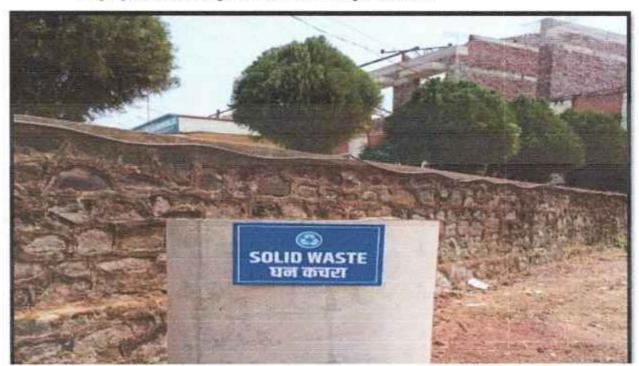






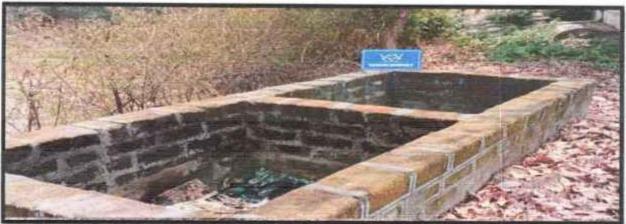
#### 2.5 Solid waste management

- To reduce waste at institute, students and staff are educated on proper waste management practices through lectures, advertisement on notice boards, displaying slogan boards in the campus.
- Waste is collected on a daily basis from various sources and is separated as dry and wet waste.
- Color coded dustbins are used for different types of wastes. Green for wet and blue for solid waste.
- Daily garbage is collected by housekeeping personnel and handed over to authorized personnel of vadgaon municipal for further processing. All waste water lines from toilets; bathrooms etc. are connected with Municipal drainage mains. Waste material like plastic, papers etc. are collected and sold out to scrap vendor from time to time.
- Efforts have taken to produce compost manure from the canteen solid waste and
  waste from other sources and efficiently run by the students. Manure is used for
  the purpose of herbal garden as well or for planted tree.









### 2.6 E-waste management

The disposal of E-Waste is a rapidly growing problem because electronic equipment frequently contains hazardous substances which affect the environment and human health. E-waste such as, discarded computers, office electronic equipment, monitors, Hard Disks are disposed off as per their conditions. These wastes are sold to local scrap. Efforts are made to reduce e-waste by making optimum use of electronic devices.

#### Observations

The college conscientiously works towards generating minimal e-waste, for which the following strategies are adopted: Regular maintenance of electronic equipment and computers by the in house technician and AMC, ensures longer life. Weeded out computers from the computer science laboratories due to up gradation are transferred to departments, the administration within the college campus. Outdated Computers, servers, monitors, compact discs (CDs), DVD's, printers, scanners, copiers, motherboard, battery cells and other electronic equipment, weeded out from the computer laboratory are used for demonstration of internal parts of the equipment. Some electronic equipment are



replaced with newer models due to the rapid technology advancements and production of newer electronic equipment.

#### Recommendations:

Electronic equipment may contain heavy metals and other materials. Computers and electronic equipment typically contain:

- Lead Computer monitors contain a picture tube known as a cathode ray tube (CRT). CRT's contain leaded glass, and are the largest source of lead in municipal waste.
   Solder used in printed circuit boards may also contain lead.
- Cadmium The largest source of cadmium in municipal waste is rechargeable nickel cadmium (NiCd) batteries. These batteries are found in most desktop and laptop computers.
- Mercury Some electronic equipment also contains recoverable quantities of mercury,

which is a toxic metal. Unwanted electronic equipment must therefore either be donated for reuse or sent for recycling.

#### 2.7 World Ozone Day

The World Ozone Day is celebrated on September 16th of every year to spread awareness about the Ozone depletion. The theme for this year celebration given by United Nation Environmental Programme is – "Ozone for life: 35 years of ozone layer protection". The slogan of the day Ozone for life, reminds us that not only is Ozone crucial for life on Earth, but that we must continue to protect the ozone layer for future generation.

To spread the awareness and make the young minds understand about the importance of Ozone layer and the need to protect this fragile shield of gas ,the students of Dr. Babasaheb Ambedkar Mahavidyalaya, Peth Vadgaon, Kolhapur. were involved in various activities virtually like Online Poster making, Quiz contest etc .The students were very enthusiastic and prepared beautiful posters /charts depicting drawings of the ozone layer depletion .

Through PowerPoint Presentation, Children were apprised that Ozone layer is a natural part of our atmosphere and shields Earth from most of the Sun's harmful ultraviolet radiations. UV rays can be very damaging for our planet- for plants, humans and animals all alike.



The students were also sensitized that as a result of Ozone depletion there will be increase in Earth temperature, melting of glaciers, cancerous disease and rise in the level of ocean and many more. Through the activities children were encouraged to adopt and follow simple ways to keep the Ozone layer safe such as:

- ·Buy energy saving gadgets and bulbs.
- · Follow 4 R's policy-Reduce, Reuse, Refuse and Recycle at home and school.
- · Use alternative means of transport : buses ,bicycles or simply walk or carpools
- · Avoid buying and using aerosols and spray having CFC.

Active and energetic participation of students was observed throughout the session. On the whole it was a creative and interesting session, which enlightened the students and made them realise the seriousness of the situation.



# 3.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE

### AUDIT

- a) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- Formation of Environment Policy and communicated to all faculties and other staff members.
- c) Reduction in use of paper work by go digital system.
- d) Water Meter should be installed at institute for monitoring of water consumption for landscape.
- e) Increase in Environmental promotional activities for spreading awareness at campus.

f) As practically feasible avoid use of personal vehicles inside the campus.

Mr.R.S.Pukale

Energy Audit Coordinator

Department of Electrical Engineering

Dr. H. T. Jadhav

Director AMGOI, Vathar Certified Energy Auditor (BEE) Reg. No. - EA - 3023



# ENERGY AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2021-22
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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## ACKNOWLEDGEMENT

We appreciate the interest and participation of Honorable Management and Principal and Faculty in carrying out the energy audit at **Dr. Babasaheb**Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur.

Our special thanks to Technicians and Staff involved for college who have extended their co-operation and courtesy to the energy audit team during the audit.



# THE ENERGY AUDIT TEAM

Team Member

Dr. H.T. Jadhav

Certified Energy Auditor

Bureau of Energy Efficiency

Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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2	Summary of savings potential in Class rooms and Laboratory	6
3	Summary of analysis of current energy Scenario	7
4	Scope of Work	12
5	Methodology of the Audit	13
6	Conclusion and General Recommendations of the Audit	17



# 1. EXECUTIVE SUMMARY (Lighting Load):

Monthly present expenditure in Rs.	Investment for the saving of expenditure in Rs.	Savings per month in Rs.	Payback period in years.
R.s. 6831	20 W LED bulb- (53 no. LED) =53*450=23850 35 W Fan — (31 No. fan)	Cost of energy Rs. 3185.325 Saving=Rs. 6831 -Rs.3185.325 = Rs.3645.675	
	=31*3500 =108500 Total=132350		
			3 yrs
*			
	expenditure in Rs.	expenditure in Rs.  Rs.  R.s.  6831  Compared to the saving of expenditure in Rs.  20 W LED bulb- (53 no. LED) =53*450=23850  35 W Fan - (31 No. fan) =31*3500 =108500	expenditure in Rs.  Rs.  R.s.  Cost of energy Rs. 3185.325 Saving=Rs. 6831  (53 no. LED) Rs. 3185.325 Saving=Rs. 6831  -Rs.3185.325 = Rs.3645.675  (31 No. fan) = 31*3500 = 108500



## 2. SUMMARY OF SAVINGS POTENTIAL OF CLASSROOM

## 1. Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon.

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	53	6	2120	12720	12.72	Replace 40W old
2	Fan	80	31	6	2480	14880	14.88	tube light (53 no) & 80W old fan
3	Air Conditioner	1350	4	6	5400	32400	32.4	(31 no) by energy efficient tube
4	Projector	300	7	6	2100	12600	12.6	light & fan.
5	Computer system	250	79	- 6	19750	118500	118.5	
6	LED bulb	20	27	6	540	3240	3.24	1
7	T.V	60	1	6	60	360	0.36	顯
8	Printer	40	13	2	520	1040	1.04	
9	Xerox Machine	1500	4	2	6000	12000	12	
				Total	38970	207740	207.74	100



# 3. SUMMARY ANALYSIS OF CURRENT SCENARIO:

#### 3.1 ANALYSIS ENERGY METER.

Approx. Unit charges including taxes: - Rs.8.25/- Unit

Maximum Consumption in year 2021-22 = Mar-22 ( 4800 units )

Meter No:1

Sr.No	Month	Unit Consumed in KWh				
1	Mar-22	4800				
2	Feb-22	906				
3	Jan-22	706				
4	Dec-21	845				
5	Nov-21	765				
6	Oct-21	785				
7	Sep-21	795				
8	Aug-21	747				
9	Jul-21	747				
10	Jun-21	558				
11	May-21	1683				
12	Apr-21	809				
	Total	14,146				
	Maximum	4800				
	Minimum	558				
	Average	1,179				



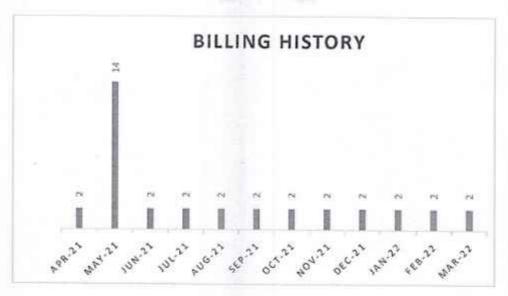


Meter No:2

Maximum Consumption in year 2021-22 = May-21 (14 units)

	2502	52024014'
Sr.No	Month	Unit Consumed in KWh
1	Mar-22	2
2	Feb-22	2
3	Jan-22	2
4	Dec-21	2
5	Nov-21	2
6	Oct-21	2
7	Sep-21	2
8	Aug-21	2
9	Jul-21	2
10	Jun-21	2
11	May-21	14
12	Apr-21	2
	Total	36
	Maximum	14
	Minimum	2
	Average	3

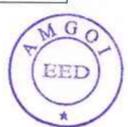


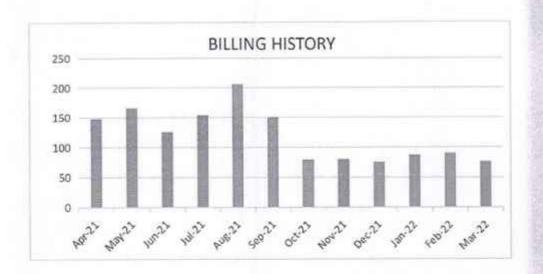


Meter No:3

#### Maximum Consumption in year 2021-22 = Jul-18 ( 265 units )

250252150508'					
Sr.No	Month	Unit Consumed in KWh			
1	Mar-22	76			
2	Feb-22	90			
3	Jan-22	87			
4	Dec-21	75			
5	Nov-21	80			
6	Oct-21	79			
7	Sep-21	150			
8	Aug-21	206			
9	Jul-21	154			
10	Jun-21	125			
11	May-21	166			
12	Apr-21	148			
	Total	1,436			
	Maximum	206			
	Minimum	76			
	Average	120			



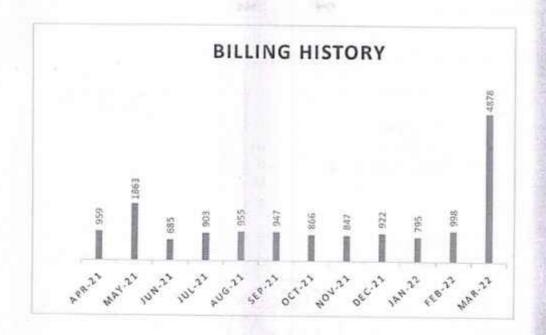


**Total Consumption** 

# Maximum Consumption in year 2021-22 = Mar-22 ( 4878 units )

	101010	Consumption			
Sr.No	Month	Unit Consumed in KW			
1	Mar-22	4878			
2	Feb-22	998			
3	Jan-22	795			
4	Dec-21	922			
5	Nov-21	847			
6	Oct-21	866			
7	Sep-21	947			
8	Aug-21	955			
9	Jul-21	903			
10	Jun-21	685			
11	May-21	1863			
12	Apr-21	959			
	Total	15,618			
	Maximum	4878			
	Minimum	685			
	Average	1,302			





## 3.2. INSTITUTE IN PROCESS TOWARDS ENERGY CONSERVATION:

- Step by step replacing the 40 Watt i.e. T12 Fluorescent Tube Lights in the class rooms and Laboratory rooms and using 12W LED which gives almost same luminous flux.
- Replacing the 80W ceiling fan in class rooms and laboratories by energy efficient fans of 35
  w is much help to save the energy.



#### 4.0 SCOPE OF WORK:

- 1. Detailed examination of the existing energy uses of the facility.
- Measurement and analysis of demand and power factor, energy meter to reduce the energy bill.
- Detailed examination of lighting system and other electrical equipment in laboratory and class rooms.
- 4. Survey report of lighting system in overall institute.



# 5. METHODOLOGY:

## 5.1 MEASURED LUX LEVELS:

Sr.no.	Location/ Area/ Room	Measured Lux	Recommended Lux Level	
01	Principal cabin	250	300-500	
02	Office	210	300	
03	Staff Room	200	300	
04	Store Room	178	300	
05	Library	178	300	
06	Students Reading Room	250	300	
07	Exam strong Room	220	300	
08	Girl's common room	250	300	
09	Teacher Reading Room	200	300	
10	NSS Office	200	300	
11	Computer Lab	178	300	
12	Class Room 1	178	300	
13	Class Room 2	190	300	
14	Class Room 3	200	300	
15	Class Room 5	210	300-500	
16	Class Room 6	225	300-500	
17	Class Room 7	255	300-500	
18	Class Room 8	188	300-500	
19	Laboratories 1 Science	175	300-500	
20	Laboratories 2 BCA	170	300-500	
21	NAAC Room	165	300-500	



22	Ladies Staff wash Room	188	300-500	
23	Ladies Student wash Room	225	300-500	
24	Conference Hall	225	300-500	



#### 5.2 SAVING POTENTIAL CALCULATION IN EACH CLASS ROOM AND LABORATORY:

Assumptions: - Working hours of class room, laboratory and office = Approx.6hrs Unit for institute energy bill = Approx. Rs.8.25/ kwh

Specimen calculation for Exam room:

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	53	6	2120	12720	12.72	Replace 40W old
2	Fan	80	31	6	2480	14880	14.88	tube light (53 no) & 80W old fan
3	Air Conditioner	1350	4	6	5400	32400	32,4	(31 no) by energy efficient tube light & fan.
4	Projector	300	7	6	2100	12600	12.6	
5	Computer system	250	79	6	19750	118500	118.5	
6	LED bulb	20	27	6	540	3240	3.24	NAME OF THE PARTY
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	13	2	520	1040	1.04	
9	Xerox Machine	1500	4	2	6000	12000	12	
				Total	38970	207740	207.74	

Specimen calculation for tube set :- Energy consumption of conventional tube light set :- 40Watt capacity tube set used for 6hrs per day so unit consumed by tube is  $\frac{40Watt \times 6hr}{1000} = 0.24kwh$  per day and monthly unit consumed by tube set = 0.24x30 days = 7.2kwh / month. Energy consumption of one tube in terms of rupees =  $7.2kwh \times Rs.8.25 = Rs.59.4$ .

Specimen calculation for Fan :- A old fan capacity is 80W and used for 6 hrs. day so unit consumed by fan is  $\frac{80 \text{Watt x 6hr}}{1000} = 0.48 \text{ kwh per day and monthly unit consumed by fan} = 0.48 \text{x30 days} = 14.4 \text{ kwh}$  / month. Energy consumption of fan in terms of Rs. = 14.4 kwh x Rs.8.25 = Rs.118.8.

Computer Lab has one old ceiling fan. So monthly expenditure due to fan is Rs.118.8

If old fan will have replaced by new energy efficient (BEE star rating) it will consume energy Rs. 51.97 for one month.

Tube set type	Cost Rs.	Payback	Life	Efficacy
T-8 LED tube light1.00 inch	1600-2000	3-4 Yrs	10-15 Yrs.	@100-120Lumens / watt
T-5 LED tube light 0.625 inch	500	6 month-1yr.	3-4 yrs.	110 lumens /watt



#### Evolution of BEE 5 star rated Fan

Speed	1	2	3	4	5
Wattage	13 W	24 W	30 W	40W	55W

Cost: - Rs. 1700 -2000 and Life: - 10-15 yrs.

#### Evolution of regular rated Fan

Speed	1	2	3	4	5
Wattage	14 W	26 W	39 W	48 W	76 W

Cost: - Rs. 1000 -1500 and Life: - 5-10 yrs.

A typical desktop computer uses about up to 250 watts and 20-40 watts for an LCD monitor and don't forget related devices like cable modem uses 7 watts, D-Link DI-604 router uses 4.5 watts,

To calculate your costs, use this formula:

Watts x Hours Used
x Cost per kilowatt-hour = Total Cost
1000

One LCD computer consumes 1.5Kwh (Unit) per day i.e. 9Rs. Per day (300 W x 5 hrs.)

Old version computer consumes 2.5kwh(unit) per day i.e.15Rs. per day (500 W x5hrs)



#### 6.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE AUDIT

- Replace conventional tube light fittings of 40W with T-5 LED Tube light for 400 500 lumens light efficacy. Replace 80 W old fan by energy efficient fans.
- Replace old version computer system with energy efficient LCD monitor and new generation energy efficient computer systems.
- c) Ensure maximum natural day light and natural ventilation in class rooms, Labs and staff rooms i.e. when it's bright outside in the daytime, turn off the light and open blinds of windows.
- d) In fact, try to turn on lights in our cabin, labs only after the sun sets. Do your reading and writing near a window or natural illumination.
- e) Installing occupancy sensors to turn ON-OFF lighting and fan can save considerable energy.
- f) Overhead projectors, computers and UPS all use electricity for power. Be sure to unplug these types of items when they're not in use can achieve energy saving considerably.
- g) Use power "saving option" (hibernate mode) for computer and possibly switched off when not in use.
- h) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- Suggested to protect all Transformer, Generators and UPS with fencing and keep the awareness boards and safety signs on 'Dangers' and 'Warnings, etc.
- j) Advised to cover Electrical wires, switch boxes, inverters, and stabilizers not to cause any problem to the staff and student members.
- k) Advised to replace old generation computers and TVs with LED monitors and old incandescent (tungsten) bulbs with LED lights and install automatic street solar lights.

Mr.R.S.Pukale

Energy Efficiency Coordination

Dr. H.T.Jadhav

Director, AMGOI, Vathar Certified Energy Auditor (BEE) Govt. Of India, Reg.No.-EA3023



# ENERGY AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2020-21
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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#### ACKNOWLEDGEMENT

We appreciate the interest and participation of Honorable Management and Principal and Faculty in carrying out the energy audit at **Dr. Babasaheb**Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur.

Our special thanks to Technicians and Staff involved for college who have extended their co-operation and courtesy to the energy audit team during the audit.



### THE ENERGY AUDIT TEAM

Team Member

Dr. H.T. Jadhav

Certified Energy Auditor

Bureau of Energy Efficiency

Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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5	Methodology of the Audit	13
6	Conclusion and General Recommendations of the Audit	17



# 1. EXECUTIVE SUMMARY (Lighting Load):

Recommendations	Monthly present expenditure in Rs.	Investment for the saving of expenditure in Rs.	Savings per month in Rs.	Payback period in years.
Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon. Replace 40W Copper choke tube set by 20 W LED Tube set. Quantity -60 no Replace 80W old fan by energy efficient fan. Quantity -29 no	R.s. 9082.224	20 W LED bulb- (60 no. LED) =60*450=27000 35 W Fan – (29 No. fan) =29*3500 =101500 Total=128500	Cost of energy Rs. 4262.103 Saving=Rs. 9082.224 -Rs. 4262.103 = Rs.4820.121	2.2 yrs



# 2. SUMMARY OF SAVINGS POTENTIAL OF COLLEGE

# 1. Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon.

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	60	6	2400	14400	14.4	Replace 40W old
2	Fan	80	29	6	2320	13920	13.92	tube light (60 no) & 80W old fan
3	Air Conditioner	1350	4	6	5400	32400	32.4	(29 no) by energy efficient tube
4	Projector	300	7	6	2100	12600	12.6	light & fan.
5	Computer system	250	65	6	16250	97500	97.5	
6	LED bulb	20	27	6	540	3240	3.24	
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	13	2	520	1040	1.04	
9	Xerox Machine	1500	4	2	6000	12000	12	
_		1		Total	35590	187460	187.46	



#### 3. SUMMARY ANALYSIS OF CURRENT SCENARIO:

#### 3.1 ANALYSIS ENERGY METER.

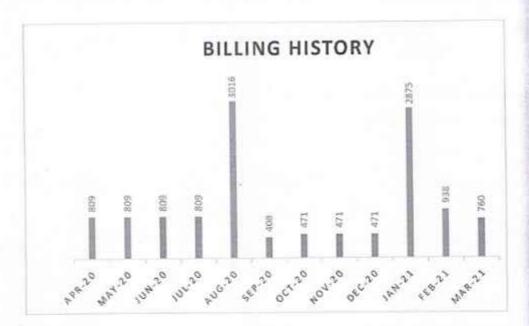
Approx. Unit charges including taxes: - Rs.10.69/- Unit

Maximum Consumption in year 2020-21 = Aug-20 (3016 units)

Meter No:1

	2502	252103895'
Sr.No	Month	Unit Consumed in KWh
1	Mar-21	760
2	Feb-21	938
3	Jan-21	2875
4	Dec-20	471
5	Nov-20	471
6	Oct-20	471
7	Sep-20	408
8	Aug-20	3016
9	Jul-20	809
10	Jun-20	809
11	May-20	809
12	Apr-20	809
	Total	12,646
	Maximum	3016
	Minimum	471
	Average	1,054



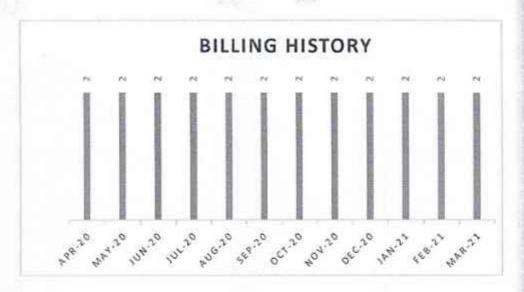


Meter No:2

Maximum Consumption in year 2020-21 = Dec-20 ( 2 units )

	2502	52024014'
Sr.No	Month	Unit Consumed in KWh
1	Mar-21	2
2	Feb-21	2
3	Jan-21	2
4	Dec-20	2
5	Nov-20	2
6	Oct-20	2
7 Sep-20		2
8	Aug-20	2
9	Jul-20	2
10	Jun-20	2
11	May-20	2
12	Apr-20	2
	Total	24
	Maximum	2
	Minimum	2
	Average	2



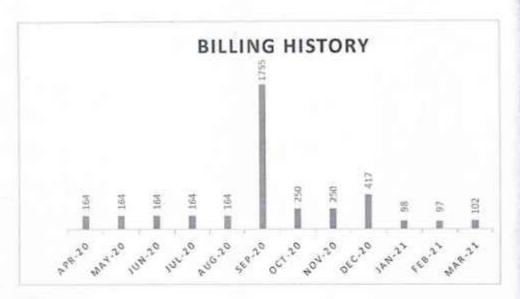


Meter No:3

Maximum Consumption in year 2020-21 = Sep-20 (1755 units)

250252150508							
Sr.No	Month	Unit Consumed in KWh					
1	Mar-21	102					
2	Feb-21	97					
3	Jan-21	98					
4	Dec-20	417					
5	Nov-20	250					
6	Oct-20	250					
7	Sep-20	1755					
8	Aug-20	164					
9	Jul-20	164					
10	Jun-20	164					
11	May-20	164					
12	Apr-20	164					
	Total	3,789					
	Maximum	1755					
	Minimum	97					
	Average	316					



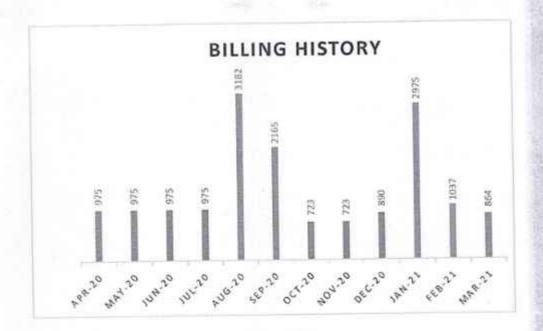


**Total Consumption** 

#### Maximum Consumption in year 2020-21 = Aug-20 (3182 units)

	Total	Consumption
Sr.No	Month	Unit Consumed in KWh
1	Mar-21	864
2	Feb-21	1037
3	Jan-21	2975
4	Dec-20	890
5	Nov-20	723
6	Oct-20	723
7	Sep-20	2165
8	Aug-20	3182
9	Jul-20	975
10	Jun-20	975
11	May-20	975
12	Apr-20	975
	Total	16,459
	Maximum	3182
	Minimum	723
	Average	1,372





# 3.2. INSTITUTE IN PROCESS TOWARDS ENERGY CONSERVATION:

- Step by step replacing the 40 Watt i.e. T12 Fluorescent Tube Lights in the class rooms and Laboratory rooms and using 12W LED which gives almost same luminous flux.
- Replacing the 80W ceiling fan in class rooms and laboratories by energy efficient fans of 35
  w is much help to save the energy.



#### 4.0 SCOPE OF WORK:

- 1. Detailed examination of the existing energy uses of the facility.
- Measurement and analysis of demand and power factor, energy meter to reduce the energy bill.
- Detailed examination of lighting system and other electrical equipment in laboratory and class rooms.
- 4. Survey report of lighting system in overall institute.



### 5. METHODOLOGY:

# 5.1 MEASURED LUX LEVELS:

Sr.no.	Location/ Area/ Room	Measured Lux	Recommended Lux Level	
01	Principal cabin	250	300-500	
02	Office	210	300	
03	Staff Room	210	300	
04	Store Room	170	300	
05	Library	240	300	
06	Students Reading Room	210	300	
07	Exam strong Room	220	300	
08	Girl's common room	250	300	
09	Teacher Reading Room	200	300	
10	NSS Office	200	300	
11	Computer Lab	178	300	
12	Class Room 1	178	300	
13	Class Room 2	190	300	
14	Class Room 3	200	300	
15	Class Room 5	210	300-500	
16	Class Room 6	225	300-500	
17	Class Room 7	255	300-500	
18	Class Room 8	188	300-500	
19	Laboratories 1 Science	175	300-500	
20	Laboratories 2 BCA	170	300-500	
21	NAAC Room	165	300-500	



22	Ladies Staff wash Room	188	300-500
23	Ladies Student wash Room	225	300-500
24	Conference Hall	225	300-500



## 5.2 SAVING POTENTIAL CALCULATION IN EACH CLASS ROOM AND LABORATORY:

Assumptions: - Working hours of class room, laboratory and office = Approx.6hrs Unit for institute energy bill = Approx. Rs.10.69/ kwh

#### Specimen calculation for Exam room:

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	60	6	2400	14400	14.4	Replace 40W old tube light (60 no)
2	Fan	80	29	6	2320	13920	13.92	& 80W old fan
3	Air Conditioner	1350	4	6	5400	32400	32.4	(29 no) by energy efficient tube
4	Projector	300	7	6	2100	12600	12.6	light & fan.
5	Computer system	250	65	6	16250	97500	97.5	
6	LED bulb	20	27	6	540	3240	3.24	
7	T.V	60	1	6	60	360	0.36	26
8	Printer	40	13	2	520	1040	1.04	toval
9	Xerox Machine	1500	4	2	6000	12000	12	
				Total	35590	187460	187.46	Mak

Specimen calculation for tube set :- Energy consumption of conventional tube light set :- 40Watt capacity tube set used for 6hrs per day so unit consumed by tube is  $\frac{40Watt \times 6hr}{1000} = 0.24kwh$  per day and monthly unit consumed by tube set = 0.24x30 days = 7.2kwh / month. Energy consumption of one tube in terms of rupees =  $7.2kwh \times Rs.10.69 = Rs.76.96..$ 

Specimen calculation for Fan :- A old fan capacity is 80W and used for 6 hrs. day so unit consumed by fan is  $\frac{80 \text{Watt x 6hr}}{1000} = 0.48 \text{ kwh per day and monthly unit consumed by fan} = 0.48 \text{x30 days} = 14.4 \text{ kwh}$  / month. Energy consumption of fan in terms of Rs. = 14.4 kwh x Rs.10.69 = Rs.157.143.

Computer Lab has one old ceiling fan. So monthly expenditure due to fan is Rs.144.144

If old fan will have replaced by new energy efficient (BEE star rating) it will consume energy Rs. 63.06 for one month.

Tube set type	Cost Rs.	Payback	Life	Efficacy
T-8 LED tube light1.00 inch	1600-2000	3-4 Yrs	10-15 Yrs.	@100-120Lumens / watt
T-5 LED tube light	500	6 month-1yr.	3-4 yrs.	110 lumens /watt
0.625 inch				(320)



#### Evolution of BEE 5 star rated Fan

Speed	1	2	3	4	5
Wattage	13 W	24 W	30 W	40W	55W

Cost: - Rs. 1700 -2000 and Life: - 10-15 yrs.

#### **Evolution of regular rated Fan**

Speed	1	2	3	4	5	
Wattage	14 W	26 W	39 W	48 W	76 W	

Cost: - Rs. 1000 -1500 and Life: - 5-10 yrs.

A typical desktop computer uses about up to 250 watts and 20-40 watts for an LCD monitor and don't forget related devices like cable modem uses 7 watts, D-Link DI-604 router uses 4.5 watts,

To calculate your costs, use this formula:

Watts x Hours Used
x Cost per kilowatt-hour = Total Cost

One LCD computer consumes 1.5Kwh (Unit) per day i.e. 9Rs. Per day (300 W x 5 hrs.)

Old version computer consumes 2.5kwh(unit) per day i.e.15Rs. per day (500 W x5hrs)



# 6.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE

#### AUDIT

- a) Replace conventional tube light fittings of 40W with T-5 LED Tube light for 400 500 lumens light efficacy. Replace 80 W old fan by energy efficient fans.
- Replace old version computer system with energy efficient LCD monitor and new generation energy efficient computer systems.
- c) Ensure maximum natural day light and natural ventilation in class rooms, Labs and staff rooms i.e. when it's bright outside in the daytime, turn off the light and open blinds of windows.
- d) In fact, try to turn on lights in our cabin, labs only after the sun sets. Do your reading and writing near a window or natural illumination.
- e) Overhead projectors, computers and UPS all use electricity for power. Be sure to unplug these types of items when they're not in use can achieve energy saving considerably.
- f) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- g) Advised to cover Electrical wires, switch boxes, inverters, and stabilizers not to cause any problem to the staff and student members.
- h) Advised to replace old generation computers and TVs with LED monitors and old incandescent (tungsten) bulbs with LED lights and install automatic street solar lights.

Mr.R.S.Pukale

Energy Efficiency Coordination



Dr. H.T.Jadhav

Director, AMGOI, Vathar

Certified Energy Auditor (BEE)

Govt. Of India, Reg.No.-EA3023

# ENERGY AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112				
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112				
Date	Year 2019-20				
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)				



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Team Member

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Certified Energy Auditor

Bureau of Energy Efficiency

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Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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# 1. EXECUTIVE SUMMARY (Lighting Load):

Recommendations	Monthly present expenditure in Rs.	Investment for the saving of expenditure in Rs.	Savings per month in Rs.	Payback period in years.	
Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon.  Replace 40W old tube light (65 no) & 80W old fan (28 no) by energy efficient tube light & fan.	R.s. 8407.08	20 W LED bulb- (65 no. LED) =65*450=29250 35 W Fan — (28 No. fan) =28*3500 =98000 Total=127250	Cost of energy Rs. 3960.36 Saving=Rs. 8407.08 -Rs. 3960.36= Rs.4446.72	2.3 yrs	



## 2. SUMMARY OF SAVINGS POTENTIAL OF COLLEGE

### 1. Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon.

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	65	6	2600	15600	15.6	Replace 40W old
2	Fan	80	28	6	2240	13440	13.44	tube light (65 no) & 80W old fan
3	Air Conditioner	1350	4	6	5400	32400	32.4	(28 no) by energy efficient tube
4	Projector	300	6	6	1800	10800	10.8	light & fan.
5	Computer system	250	65	6	16250	97500	97.5	
6	LED bulb	20	25	6	500	3000	3	
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	10	- 2	400	800	0.8	1
9	Xerox Machine	1500	3	2	4500	9000	9	
				Total	33750	182900	182.9	



# 3. SUMMARY ANALYSIS OF CURRENT SCENARIO: 3.1 ANALYSIS ENERGY METER.

Approx. Unit charges including taxes: - Rs.10.01/- Unit

Maximum Consumption in year 2019-20 = May-19 (1960 units)

Meter No:1

Sr.No	Month	Unit Consumed in KWh
1	Mar-20	809
2	Feb-20	832
3	Jan-20	800
4	Dec-19	695
5	Nov-19	675
6	Oct-19	695
7	Sep-19	788
8	Aug-19	604
9	Jul-19	708
10	Jun-19	977
11	May-19	1960
12	Apr-19	937
	Total	10,480
	Maximum	1960
	Minimum	604
	Average	163



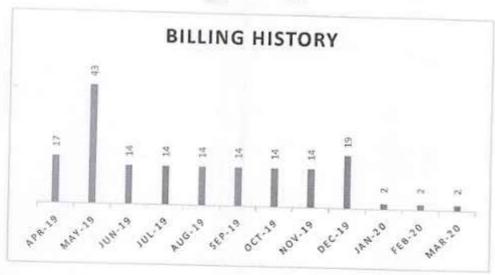


Meter No:2

Maximum Consumption in year 2019-20 = May-19 (43 units)

	250	252024014'
Sr.No	Month	Unit Consumed in KWh
1	Mar-20	2
2	Feb-20	2
3	Jan-20	2
4	Dec-19	19
5	Nov-19	14
6	Oct-19	14
7	Sep-19	14
8	Aug-19	14
9	Jul-19	14
10	Jun-19	14
11	May-19	43
12	Apr-19	17
	Total	169
	Maximum	43
	Minimum	2
	Average	14



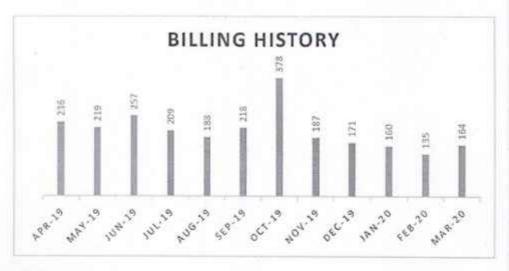


Meter No:3

Maximum Consumption in year 2019-20 = Oct-19 ( 378 units )

	250	252150508'
Sr.No	Month	Unit Consumed in KWh
1	Mar-20	164
2	Feb-20	135
3	Jan-20	160
4	Dec-19	171
5	Nov-19	187
6	Oct-19	378
7	Sep-19	218
8	Aug-19	188
9	Jul-19	209
10	Jun-19	257
11	May-19	219
12	Apr-19	236
	Total	2,522
	Maximum	378
	Minimum	135
	Average	210



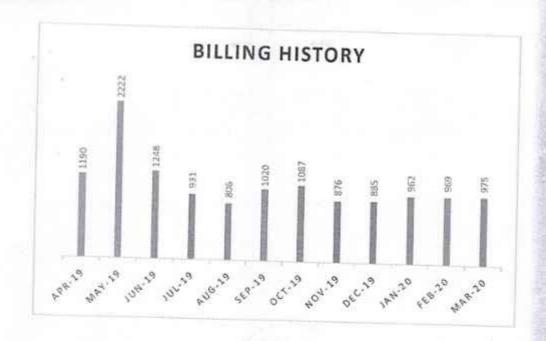


**Total Consumption** 

### Maximum Consumption in year 2019-20 = May-19 ( 2222 units )

	Total	Consumption		
Sr.No	Month	Unit Consumed in KW		
1	Mar-20	975		
2	Feb-20	969		
3	Jan-20	962		
4	Dec-19	885		
5	Nov-19	876		
6	Oct-19	1087		
7	Sep-19	1020		
8	Aug-19	806		
9	Jul-19	931		
10	Jun-19	1248		
11	May-19	2222		
12	Apr-19	1190		
	Total	13,171		
	Maximum	2222		
	Minimum	806		
	Average	1,098		





# 3.2. INSTITUTE IN PROCESS TOWARDS ENERGY CONSERVATION:

- Step by step replacing the 40 Watt i.e. T12 Fluorescent Tube Lights in the class rooms and Laboratory rooms and using 12W LED which gives almost same luminous flux.
- Replacing the 80W ceiling fan in class rooms and laboratories by energy efficient fans of 35
  w is much help to save the energy.



#### 4.0 SCOPE OF WORK:

- 1. Detailed examination of the existing energy uses of the facility.
- Measurement and analysis of demand and power factor, energy meter to reduce the energy bill.
- Detailed examination of lighting system and other electrical equipment in laboratory and class rooms.
- 4. Survey report of lighting system in overall institute.



## 5. METHODOLOGY:

### 5.1 MEASURED LUX LEVELS:

Sr.no.	assault Alea/ Room	Measured Lux	Recommended Lux Level
01	Principal cabin	210	300-500
02	Office	225	300
03	Staff Room	255	300
04	Store Room	188	300
05	Library	175	300
06	Students Reading Room	210	300
07	Exam strong Room	225	300
08	Girl's common room	255	300
09	Teacher Reading Room	188	300
10	NSS Office	175	300
11	Computer Lab	250	300
12	Class Room 1	200	300
13	Class Room 2	200	300
14	Class Room 3	200	300
15	Class Room 5	210	300-500
16	Class Room 6	225	300-500
.7	Class Room 7	255	300-500
8	Class Room 8	188	300-500
9	Laboratories 1 Science	175	300-500
0	Laboratories 2 BCA	170	300-500
1	NAAC Room	165	300-500



22	Ladies Staff wash Room	188	300-500
23	Ladies Student wash Room	225	300-500
24	Conference Hall	225	300-500



# 5.2 SAVING POTENTIAL CALCULATION IN EACH CLASS ROOM AND LABORATORY:

Assumptions: - Working hours of class room, laboratory and office = Approx.6hrs Unit for institute energy bill = Approx. Rs.9.65/kwh

Specimen calculation for Exam room:

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	65	6	2600	15600	15.6	Replace 40W old tube light (65 no) & 80W old fan (28 no) by energy efficient tube light & fan.
2	Fan	80	28	6	2240	12112		
3	Nin Con Hat	VISIO N	1000		2240	13440	13.44	
3	Air Conditioner	1350	4	6	5400	32400	32.4	
4	Projector	300	6	6	1800	10800	10.8	
5	Computer system	250	65	6	16250	97500	97.5	
6	LED bulb	20	25	6	500	3000	3	
7	T.V	60	1	6	60	360	0.36	
8	Drinter	40			353	300	0.36	
	Printer	40	10	2	400	800	0.8	
9	Xerox Machine	1500	3	2	4500	9000	9	
				Total	33750	182900	182.9	

Specimen calculation for tube set :- Energy consumption of conventional tube light set :- 40Watt capacity tube set used for 6hrs per day so unit consumed by tube is  $\frac{40Watt \times 6hr}{1000} = 0.24kwh$  per day and monthly unit consumed by tube set = 0.24x30 days = 7.2kwh / month. Energy consumption of one tube in terms of rupees = 7.2kwh x Rs.9.65 = Rs.69.48.

Specimen calculation for Fan :- A old fan capacity is 80W and used for 6 hrs. day so unit consumed by fan is  $\frac{80 \text{Watt x 6hr}}{1000} = 0.48 \text{ kwh per day and monthly unit consumed by fan} = 0.48 \text{x30 days} = 14.4 \text{ kwh}$  / month. Energy consumption of fan in terms of Rs. = 14.4 kwh x Rs.9.65 = Rs.138.96.

Computer Lab has one old ceiling fan. So monthly expenditure due to fan is Rs.144.144

If old fan will have replaced by new energy efficient (BEE star rating) it will consume energy Rs. 60.79 for one month.

Rs.	Payback	Life	Efficacy
)-2000	3-4 Yrs	10-15 Yrs.	@100-120Lumens / watt
	6 month-1yr.	3-4 yrs.	110 lumens /watt
	0-2000	0-2000 3-4 Yrs	0-2000 3-4 Yrs 10-15 Yrs.



#### Evolution of BEE 5 star rated Fan

Speed	1	2	3	4	5	
Wattage	13 W	24 W	30 W	40W	55W	

Cost: - Rs. 1700 -2000 and Life: - 10-15 yrs.

#### Evolution of regular rated Fan

Speed	1	2	3	4	5
Wattage	14 W	26 W	39 W	48 W	76 W

Cost: - Rs. 1000 -1500 and Life: - 5-10 yrs.

A typical desktop computer uses about up to 250 watts and 20-40 watts for an LCD monitor and don't forget related devices like cable modern uses 7 watts, D-Link DI-604 router uses 4.5 watts,

To calculate your costs, use this formula:

Watts x Hours Used
x Cost per kilowatt-hour = Total Cost
1000

One LCD computer consumes 1.5Kwh (Unit) per day i.e. 9Rs. Per day (300 W x 5 hrs.)

Old version computer consumes 2.5kwh(unit) per day i.e.15Rs. per day (500 W x5hrs)



#### 6.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE AUDIT

- Replace conventional tube light fittings of 40W with T-5 LED Tube light for 400 500 lumens light efficacy. Replace 80 W old fan by energy efficient fans.
- Replace old version computer system with energy efficient LCD monitor and new generation energy efficient computer systems.
- c) Ensure maximum natural day light and natural ventilation in class rooms, Labs and staff rooms i.e. when it's bright outside in the daytime, turn off the light and open blinds of windows.
- d) In fact, try to turn on lights in our cabin, labs only after the sun sets. Do your reading and writing near a window or natural illumination.
- e) Overhead projectors, computers and UPS all use electricity for power. Be sure to unplug these types of items when they're not in use can achieve energy saving considerably.
- f) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- g) Advised to cover Electrical wires, switch boxes, inverters, and stabilizers not to cause any problem to the staff and student members.
- h) Advised to replace old generation computers and TVs with LED monitors and old incandescent (tungsten) bulbs with LED lights and install automatic street solar lights.

Mr.R.S.Pukale

**Energy Efficiency Coordination** 

M G O

Dr. H.T.Jadhav

Director, AMGOI, Vathar

Certified Energy Auditor (BEE)

Govt. Of India, Reg.No.-EA3023

# ENERGY AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2018-19
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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#### ACKNOWLEDGEMENT

We appreciate the interest and participation of Honorable Management and Principal and Faculty in carrying out the energy audit at **Dr. Babasaheb**Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur.

Our special thanks to Technicians and Staff involved for college who have extended their co-operation and courtesy to the energy audit team during the audit.



### THE ENERGY AUDIT TEAM

Team Member

Dr. H.T. Jadhav

Certified Energy Auditor

Bureau of Energy Efficiency

Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Assistant Professor

AMGOI, Vathar Tarf Vadgaon.



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3	Summary of analysis of current energy Scenario	7
4	Scope of Work	12
5	Methodology of the Audit	13
6	Conclusion and General Recommendations of the Audit	17



# 1. EXECUTIVE SUMMARY (Lighting Load):

Recommendations	Monthly present expenditure in Rs.	Investment for the saving of expenditure in Rs.	Savings per month in Rs.	Payback period in years.
Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon. Replace 40W old tube light (60 no) & 80W old fan (26 no) by energy efficient tube light & fan.	R.s. 8072.064	20 W LED bulb- (55 no. LED) =60*450=27000 35 W Fan – (25 No. fan) =26*3500 =91000 Total=118000	Cost of energy Rs. 3801.798 Saving=Rs. 8072.064 -Rs. 3801.798 = Rs.4270.266	2.3 yrs



# 2. SUMMARY OF SAVINGS POTENTIAL OF COLLEGE

# 1. Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon.

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	60	6	2400	14400	14.4	Replace 40W old
2	Fan	80	26	6	2080	12480	12.48	tube light (60 no) & 80W old fan
3	Air Conditioner	1350	3	6	4050	24300	24.3	(26 no) by energy
4	Projector	300	6	6	1800	10800	10.8	efficient tube light & fan.
5	Computer system	250	60	6	15000	90000	90	
6	LED bulb	20	22	6	440	2640	2.64	
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	10	2	400	800	0.8	
9	Xerox Machine	1500	2	2	3000	6000	6	
			A.3	Total	29230	161780	161.78	



# 3. SUMMARY ANALYSIS OF CURRENT SCENARIO: 3.1 ANALYSIS ENERGY METER.

Approx. Unit charges including taxes: - Rs.10.01/- Unit

Maximum Consumption in year 2018-19 = Apr-18 (1440 units)

Meter No:1

	2502	252103895		
Sr.No	Month	Unit Consumed in KWI		
1	Mar-19	806		
2	Feb-19	1068		
3	Jan-19	938		
4	Dec-18	624		
5	Nov-18	1052		
6	Oct-18	624		
7	Sep-18	1098		
8	Aug-18	576		
9	Jul-18	895		
10	Jun-18	551		
11	May-18	1380		
12	Apr-18	1480		
	Total	11,092		
	Maximum	1480		
	Minimum	551		
	Average	924		



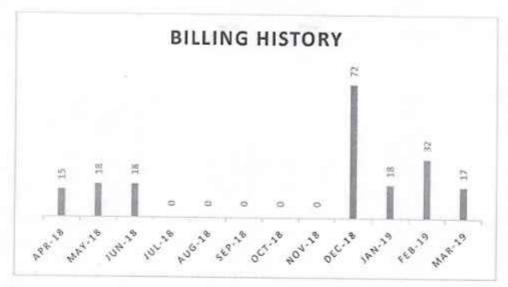


Meter No:2

Maximum Consumption in year 2018-19 = Dec-18 (72 units)

Sr.No	Month	Unit Consumed in KWh
1	Mar-19	17
2	Feb-19	32
3	Jan-19	18
4	Dec-18	72
5	Nov-18	0
6	Oct-18	0
7	Sep-18	0
8	Aug-18	0
9	Jul-18	0
10	Jun-18	18
11	May-18	18
12	Apr-18	15
	Total	190
	Maximum	72
10	Minimum	0
	Average	16



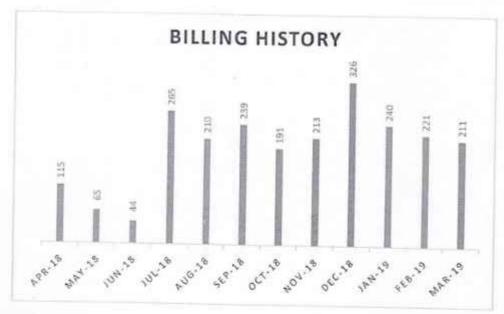


Meter No:3

Maximum Consumption in year 2018-19 = Jul-18 ( 265 units )

	250252150	508'
Sr.No	Month	Unit Consumed in KWh
1	Mar-19	211
2	Feb-19	221
3	Jan-19	240
4	Dec-18	326
5	Nov-18	213
6	Oct-18	191
7	Sep-18	239
8	Aug-18	210
9	Jul-18	265
10	Jun-18	44
11	May-18	65
12	Apr-18	115
	Total	2,340
	Maximum	326
	Minimum	44
	Average	195



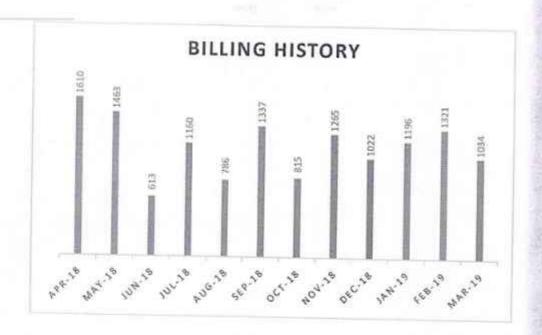


**Total Consumption** 

## Maximum Consumption in year 2018-19 = Apr-18 ( 1610 units )

	Total	Consumption
Sr.No	Month	Unit Consumed in KWh
1	Mar-19	1034
2	Feb-19	1321
3	Jan-19	1196
4	Dec-18	1022
5	Nov-18	1265
6	Oct-18	815
7	Sep-18	1337
8	Aug-18	786
9	Jul-18	1160
10	Jun-18	613
11	May-18	1463
12	Apr-18	1610
	Total	13,622
	Maximum	1610
	Minimum	613
	Average	1,135





## 3.2. INSTITUTE IN PROCESS TOWARDS ENERGY CONSERVATION:

- Step by step replacing the 40 Watt i.e. T12 Fluorescent Tube Lights in the class rooms and Laboratory rooms and using 12W LED which gives almost same luminous flux.
- Replacing the 80W ceiling fan in class rooms and laboratories by energy efficient fans of 35
  w is much help to save the energy.



#### 4.0 SCOPE OF WORK:

- 1. Detailed examination of the existing energy uses of the facility.
- Measurement and analysis of demand and power factor, energy meter to reduce the energy bill.
- Detailed examination of lighting system and other electrical equipment in laboratory and class rooms.
- 4. Survey report of lighting system in overall institute.



### 5. METHODOLOGY:

#### 5.1 MEASURED LUX LEVELS:

Sr.no.	Location/ Area/ Room	Measured Lux	Recommended Lux Level
01	Principal cabin	250	300-500
02	Office	210	300
03	Staff Room	87	100
04	Store Room	170	300
05	Library	240	300
06	Students Reading Room	95	100
07	Exam strong Room	220	300
08	Girl's common room	250	300
09	Teacher Reading Room	200	300
10	NSS Office	200	300
11	Computer Lab	178	300
12	Class Room 1	178	300
13	Class Room 2	190	300
14	Class Room 3	200	300
15	Class Room 5	210	300-500
16	Class Room 6	225	300-500
17	Class Room 7	255	300-500
18	Class Room 8	188	300-500
19	Laboratories 1 Science	175	300-500
20	Laboratories 2 BCA	170	300-500
21	NAAC Room	165	300-500



22	Ladies Staff wash Room	188	300-500
23	Ladies Student wash Room	225	300-500
24	Conference Hall	225	300-500



#### 5.2 SAVING POTENTIAL CALCULATION IN EACH CLASS ROOM AND LABORATORY:

Assumptions: - Working hours of class room, laboratory and office = Approx.6hrs Unit for institute energy bill = Approx. Rs.10.01/ kwh

Specimen calculation for Exam room:

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	60	6	2400	14400	14.4	Replace 40W old
2	Fan	80	26	6	2080	12480	12.48	tube light (60 no) & 80W old fan
3	Air Conditioner	1350	3	6	4050	24300	24.3	(26 no) by energy efficient tube light & fan.
4	Projector	300	6	6	1800	10800	10.8	
5	Computer system	250	60	6	15000	90000	90	
6	LED bulb	20	22	6	440	2640	2.64	481
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	10	2	400	800	0.8	122
9	Xerox Machine	1500	2	2	3000	6000	6	
_				Total	29230	161780	161.78	

Specimen calculation for tube set :- Energy consumption of conventional tube light set :- 40Watt capacity tube set used for 6hrs per day so unit consumed by tube is  $\frac{40Watt \times 6hr}{1000} = 0.24kwh$  per day and monthly unit consumed by tube set = 0.24x30 days = 7.2kwh / month. Energy consumption of one tube in terms of rupees = 7.2kwh x Rs.10.01 = Rs.72.07.

Specimen calculation for Fan :- A old fan capacity is 80W and used for 6 hrs. day so unit consumed by fan is  $\frac{80 \text{Watt x 6hr}}{1000} = 0.48 \text{ kwh per day and monthly unit consumed by fan} = 0.48 \text{x} 30 \text{ days} = 14.4 \text{ kwh}$  / month. Energy consumption of fan in terms of Rs. = 14.4 kwh x Rs.10.01 = Rs.144.144.

Computer Lab has one old ceiling fan. So monthly expenditure due to fan is Rs.144.144

If old fan will have replaced by new energy efficient (BEE star rating) it will consume energy Rs. 63.06 for one month.

Tube set type	Cost Rs.	Payback	Life	Efficacy
T-8 LED tube light1.00 inch	1600-2000	3-4 Yrs	10-15 Yrs.	@100-120Lumens / watt
T-5 LED tube light 0.625 inch	500	6 month-1yr.	3-4 yrs.	110 lumens /watt



#### Evolution of BEE 5 star rated Fan

Wattage 13 W 24 W 30 W 40W 55W	Speed	1	2	3	4	5
	Wattage	13 W	24 W	30 W	40W	55W

Cost: - Rs. 1700 -2000 and Life: - 10-15 yrs.

### Evolution of regular rated Fan

Speed	1	2	3	4	5
Wattage	14 W	26 W	39 W	48 W	76.14
		20 11	33 44	40 VV	76 W

Cost: - Rs. 1000 -1500 and Life: - 5-10 yrs.

A typical desktop computer uses about up to 250 watts and 20-40 watts for an LCD monitor and don't forget related devices like cable modern uses 7 watts, D-Link DI-604 router uses 4.5 watts,

To calculate your costs, use this formula:

Watts x Hours Used

x Cost per kilowatt-hour = Total Cost

1000

One LCD computer consumes 1.5Kwh (Unit) per day i.e. 9Rs. Per day (300 W x 5 hrs.)

Old version computer consumes 2.5kwh(unit) per day i.e.15Rs. per day (500 W x5hrs)



### 6.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE

#### **AUDIT**

- a) Replace conventional tube light fittings of 40W with T-5 LED Tube light for 400 500 lumens light efficacy. Replace 80 W old fan by energy efficient fans.
- Replace old version computer system with energy efficient LCD monitor and new generation energy efficient computer systems.
- c) Ensure maximum natural day light and natural ventilation in class rooms, Labs and staff rooms i.e. when it's bright outside in the daytime, turn off the light and open blinds of windows.
- d) In fact, try to turn on lights in our cabin, labs only after the sun sets. Do your reading and writing near a window or natural illumination.
- e) Overhead projectors, computers and UPS all use electricity for power. Be sure to unplug these types of items when they're not in use can achieve energy saving considerably.
- f) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- g) Advised to cover Electrical wires, switch boxes, inverters, and stabilizers not to cause any problem to the staff and student members.
- Advised to replace old generation computers and TVs with LED monitors and old incandescent (tungsten) bulbs with LED lights and install automatic street solar lights.

Mr.R.S.Pukale

Energy Efficiency Coordination

Dr. H.T.Jadhav

Director, AMGOI, Vathar

Certified Energy Auditor (BEE)

Govt. Of India, Reg.No.-EA3023



# ENERGY AUDIT REPORT

Client Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Project Name	Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon, Tal. Hatkanangle, Dist. Kolhapur Maharashtra 416112
Date	Year 2017-18
Submitted by	Ashokrao Mane Group of Institutions  Vathar Tarf Vadgaon,  Tal- Hatkanangale, DistKolhapur (Maharashtra state)



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Director AMGOI, Vathar Tarf Vadgaon.

Mr.R.S.Pukale

Mr.R.S.Pukale Assistant Professor AMGOI, Vathar Tarf Vadgaon.



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# 1. EXECUTIVE SUMMARY (Lighting Load):

Recommendations	Monthly present expenditure in Rs.	Investment for the saving of expenditure in Rs.	Savings per month in Rs.	Payback period in years.
Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon. Replace 40W old tube light (55 no) & 80W old fan (25 no) by energy efficient tube light & fan.	R.s. 6501.6	20 W LED bulb- (55 no. LED) =55*450=24750 35 W Fan - (25 No. fan) =25*3500 =87500 Total=112250	Cost of energy Rs. 3027.3 Saving=Rs. 6501.6 -Rs. 3027.3 = Rs.3444.3	3.8yrs



### 2. SUMMARY OF SAVINGS POTENTIAL OF COLLEGE

## 1. Dr. Babasaheb Ambedkar Mahavidhyalaya, Peth Vadgaon.

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	55	6	2200	13200	13.2	Replace 40W old
2	Fan	80	25	6	2000	12000	12	tube light (55 no) & 80W old fan
3	Air Conditioner	1350	3	6	4050	24300	24.3	(25 no) by energy efficient tube light & fan.
4	Projector	300	3	6	900	5400	5.4	
5	Computer system	250	50	6	12500	75000	75	
6	LED bulb	20	15	6	300	1800	1.8	
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	8	2	320	640	0.64	是
9	Xerox Machine	1500	2	2	3000	6000	6	
				Total	25330	138700	138.7	18



# 3. SUMMARY ANALYSIS OF CURRENT SCENARIO: 3.1 ANALYSIS ENERGY METER.

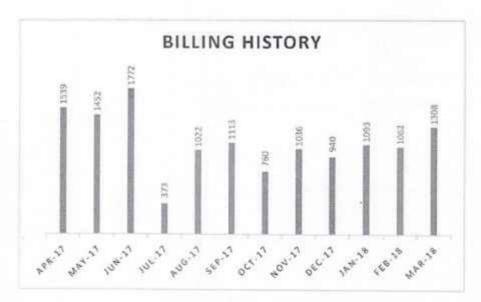
Approx. Unit charges including taxes: - Rs.8.60/- Unit

Maximum Consumption in year 2017-18 = Jun-17 (1772 units)

Meter No:1

2502521038951					
Sr.No	Month	Unit Consumed in KWh			
1	Mar-18	1308			
2	Feb-18	1062			
3	Jan-18	1093			
4	Dec-17	940			
5	Nov-17	1036			
6	Oct-17	760			
7	Sep-17	1113			
8	Aug-17	1022			
9	Jul-17	373			
10	Jun-17	1772			
11	May-17	1452			
12	Apr-17	1539			
	Total	13,470			
	Maximum	1772			
	Minimum	373			
	Average	1,123			



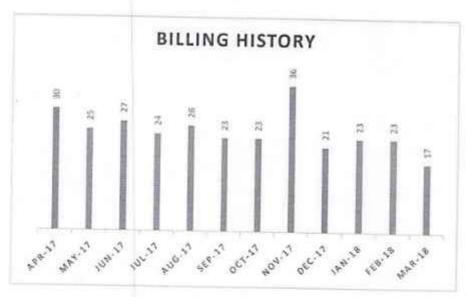


Meter No:2

Maximum Consumption in year 2017-18 = Nov-17 (36 units)

	>100000	252024014'
Sr.No	Month	Unit Consumed in KWh
1	Mar-18	17
2	Feb-18	23
3	Jan-18	23
4	Dec-17	21
5	Nov-17	36
6	Oct-17	23
7	Sep-17	23
8	Aug-17	26
9	Jul-17	24
10	Jun-17	27
11	May-17	25
12	Apr-17	30
	Total	298
	Maximum	36
	Minimum	17
	Average	25



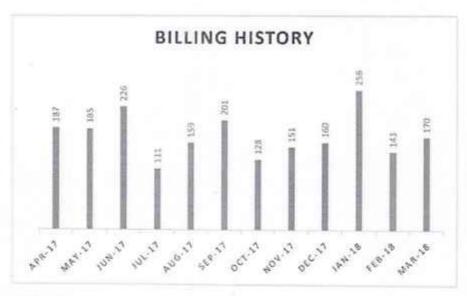


Meter No:3

Maximum Consumption in year 2017-18 = Jan-17 ( 256 units )

	250	252150508'
Sr.No	Month	Unit Consumed in KWh
1	Mar-18	170
2	Feb-18	143
3	Jan-18	256
4	Dec-17	160
5	Nov-17	151
6	Oct-17	128
7	Sep-17	201
8	Aug-17	159
9	Jul-17	111
10	Jun-17	226
11	May-17	185
12	Apr-17	187
	Total	2,077
	Maximum	256
	Minimum	111
	Average	173





**Total Consumption** 

# Maximum Consumption in year 2017-18 = Jan-17 ( 1756 units )

Sr.No	Month	Unit Consumed in KWh
1	Mar-18	1495
2	Feb-18	1228
3	Jan-18	1372
4	Dec-17	1121
5	Nov-17	1223
6	Oct-17	911
7	Sep-17	1337
8	Aug-17	1207
9	Jul-17	508
10	Jun-17	2025
11	May-17	1662
12	Apr-17	1756
	Total	15,845
	Maximum	1756
	Minimum	508
	Average	1,320





# 3.2. INSTITUTE IN PROCESS TOWARDS ENERGY CONSERVATION:

- Step by step replacing the 40 Watt i.e. T12 Fluorescent Tube Lights in the class rooms and Laboratory rooms and using 12W LED which gives almost same luminous flux.
- Replacing the 80W ceiling fan in class rooms and laboratories by energy efficient fans of 35
  w is much help to save the energy.



#### 4.0 SCOPE OF WORK:

- 1. Detailed examination of the existing energy uses of the facility.
- Measurement and analysis of demand and power factor, energy meter to reduce the energy bill.
- Detailed examination of lighting system and other electrical equipment in laboratory and class rooms.
- 4. Survey report of lighting system in overall institute.



## 5. METHODOLOGY:

## 5.1 MEASURED LUX LEVELS:

Sr.no.	Location/ Area/ Room	Measured Lux	Recommended Lux Level
01	Principal cabin	300	300-500
02	Office	200	300
03	Staff Room	85	100
04	Store Room	150	300
05	Library	100	300
06	Students Reading Room	95	100
07	Exam strong Room	150	300
08	Girl's common room	150	300
09	Teacher Reading Room	150	300
10	NSS Office	200	300
11	Computer Lab	175	300
12	Class Room 1	175	300
13	Class Room 2	175	300
14	Class Room 3	170	300
15	Class Room 5	180	300-500
16	Class Room 6	200	300-500
17	Class Room 7	190	300-500
18	Class Room 8	175	300-500
19	Laboratories 1 Science	150	300-500
20	Laboratories 2 BCA	165	300-500
21	NAAC Room	175	300-500



22	Ladies Staff wash Room	175	300-500	
23	Ladies Student wash Room	200	300-500	
24	Conference Hall	180	300-500	-



# 5.2 SAVING POTENTIAL CALCULATION IN EACH CLASS ROOM AND LABORATORY:

Assumptions: - Working hours of class room, laboratory and office = Approx.6hrs Unit for institute energy bill = Approx. Rs.8.60/ kwh

Specimen calculation for Exam room:

Sr.no	Particulars	Wattage	Quantity	Run Time (Hr/Day)	Total wattage	Watt Hours/Day	Energy consumed per day kWh/day	Recommendation
1	Tube light	40	55	6	2200	13200	13.2	Replace 40W old
2	Fan	80	25	6	2000	12000	12	tube light (55 no) & 80W old fan
3	Air Conditioner	1350	3	6	4050	24300	24.3	(25 no) by energy
4	Projector	300	3	6	900	5400	5.4	efficient tube light & fan.
5	Computer system	250	50	6	12500	75000	75	127
6	LED bulb	20	15	6	300	1800	1.8	
7	T.V	60	1	6	60	360	0.36	
8	Printer	40	8	2	320	640	0.64	
9	Xerox Machine	1500	2	2	3000	6000	6	
				Total	25330	138700	138.7	

Specimen calculation for tube set :- Energy consumption of conventional tube light set :- 40Watt capacity tube set used for 6hrs per day so unit consumed by tube is  $\frac{40Watt \times 6hr}{1000} = 0.24$ kwh per day and monthly unit consumed by tube set = 0.24x30 days = 7.2kwh / month. Energy consumption of one tube in terms of rupees = 7.2kwh x Rs.8.60 = Rs.61.92.

Specimen calculation for Fan :- A old fan capacity is 80W and used for 6 hrs. day so unit consumed by fan is  $\frac{80 \text{Watt x 6hr}}{1000} = 0.48 \text{ kwh per day and monthly unit consumed by fan} = 0.48 \text{x30 days} = 14.4 \text{ kwh}$  / month. Energy consumption of fan in terms of Rs. = 14.4 kwh x Rs.8.60 = Rs.123.84.

Computer Lab has one old ceiling fan. So monthly expenditure due to fan is Rs.123.84.

If old fan will have replaced by new energy efficient (BEE star rating) it will consume energy Rs. 54.18 for one month.

Rs. Payl	Jack   L		
		ife	Efficacy
2000 3-4	rs 1	0-15 Yrs.	@100-120Lumens / wat
6 m	onth-1yr. 3		110 lumens /watt
			5 7 1.5 10-15 Yrs.



#### Evolution of BEE 5 star rated Fan

Speed	1	2	3	4	5	_
Wattage	13 W	24 W	30 W	40W	55W	

Cost: - Rs. 1700 -2000 and Life: - 10-15 yrs.

#### Evolution of regular rated Fan

Speed	1	2	3	4	5
Wattage	14 W	26 W	39 W	48 W	76 W

Cost: - Rs. 1000 -1500 and Life: - 5-10 yrs.

A typical desktop computer uses about up to 250 watts and 20-40 watts for an LCD monitor and don't forget related devices like cable modern uses 7 watts, D-Link DI-604 router uses 4.5 watts,

To calculate your costs, use this formula:

Watts x Hours Used

x Cost per kilowatt-hour = Total Cost

1000

One LCD computer consumes 1.5Kwh (Unit) per day i.e. 9Rs. Per day (300 W x 5 hrs.)

Old version computer consumes 2.5kwh(unit) per day i.e.15Rs. per day (500 W x5hrs)



# 6.0 CONCLUSIONS AND GENERAL RECOMMENDATION OF THE AUDIT

- Replace conventional tube light fittings of 40W with T-5 LED Tube light for 400 500 lumens light efficacy. Replace 80 W old fan by energy efficient fans.
- Replace old version computer system with energy efficient LCD monitor and new generation energy efficient computer systems.
- c) Ensure maximum natural day light and natural ventilation in class rooms, Labs and staff rooms i.e. when it's bright outside in the daytime, turn off the light and open blinds of windows.
- d) In fact, try to turn on lights in our cabin, labs only after the sun sets. Do your reading and writing near a window or natural illumination.
- e) Overhead projectors, computers and UPS all use electricity for power. Be sure to unplug these types of items when they're not in use can achieve energy saving considerably.
- f) Consider planting trees and shrubs in strategic locations to help to reduce the temperature and airflow in Laboratory, classroom etc. Trees planted on the west and south sides of buildings help to keep the buildings shaded during hotter weather.
- g) Advised to cover Electrical wires, switch boxes, inverters, and stabilizers not to cause any problem to the staff and student members.
- Advised to replace old generation computers and TVs with LED monitors and old incandescent (tungsten) bulbs with LED lights and install automatic street solar lights.

Mr.R.S.Pukale

Energy Efficiency Coordination

302 4.1

Dr. H.T.Jadhav

Director, AMGOI, Vathar

Certified Energy Auditor (BEE)

Govt. Of India, Reg.No.-EA3023



# Clean and Green Campus



SN	Activity	Date	Volunteers
	Tree Plantation	1/25/2022	35

Dr. Babasaheb Ambedkar College, Peth Vadgaon, Dist. Kolhapur Through National Service Scheme on Monday 14/07/2020, tree plantation was done on a large scale in the vast premises of the college. Program Officer of National Service Scheme Prof. A. A. Gurav welcomed and introduced the dignitaries present. College Principal Prof. J. C. Ghatge expressed his opinion about the importance of tree plantation and the need of the hour. Prof. K. C. Kanade expressed vote of thanks. For this program principal of the college Prof. J. C. Ghatge, N. S. S. Program Officer Prof. A. A. Gurav Teaching and non-teaching staff as well as volunteers of National Service Scheme were present.







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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

## **ACTIVITY REPORT 2019-20**

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	16th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 35 and SW 09 Total 44 Cadet
Number of Teacher participated	06
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

## Brief Report

#### Introduction:

Tree Plantation drives combat many environmental issues like deforestation, erosion of soil, desertification in semi-arid areas, global warming and hence enhancing the beauty and balance of the environment. Trees absorb harmful gases and emit oxygen resulting in an increase in oxygen supply. Plants planted 20, Subedar Supanekar Planted Trees.

## Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warmingand hence enhancing the beauty and balance of the environment.
- To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

- Many saplings of different species were planted. Students were encouraged to address
  the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.
- The entire program created a strong feeling among the students.





Associate NGC Officer

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Times plantation







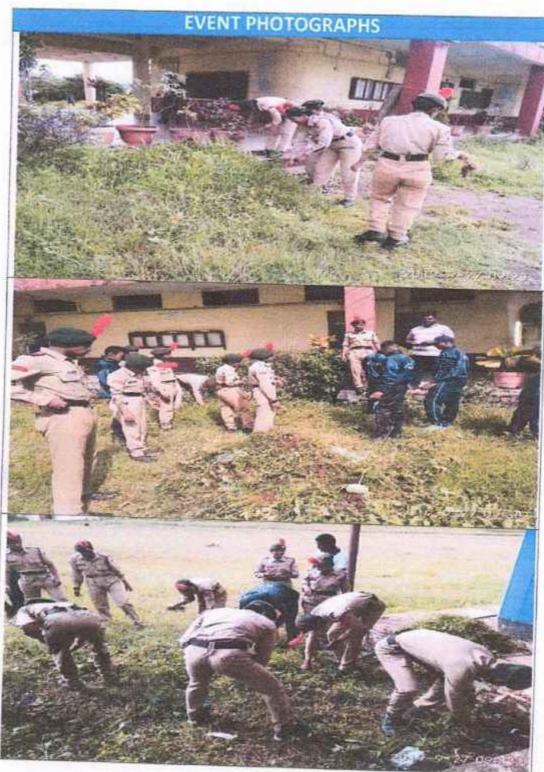






Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kolhapur, Maharashtra





Perh Vadiaon Dist.Kothapur







# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	27th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	College Campus
Beneficiaries	Peth Vadgaon People

#### Brief Report

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets.

## Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing those
  actions that make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transform Swachh Bharat into a citizen's movement.

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community



# EVENT PHOTOGRAPHS









# DR. BABASAHEB AMBEDKAR MAHAVIDYALA



Barrister Tatyasaheb Mane Vidhynagar, Peth VadgaonTal-Hatkanagale, Dist-Kolhapur (MS) India 416112

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Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	5 <sup>th</sup> July 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 25 and SW 10 Total 35 Cadet
Number of Teacher participated	20
Place of extension / outreach activity	College
Beneficiaries	College Students and Staff

#### Brief Report

#### Introduction:

Tree plantation means planting more trees in a planned way. It is significant in the current age of climate change and global warming. We cannot think of our existence without trees. Trees exert much influence on the climate condition of a country, they are responsible for maintaining the ecological balance throughout the world. An average tree produces enough oxygen to fulfill the oxygen needs of four people. Trees remove pollutants and fine grained particles from the air, reduce noise pollution and act as a buffer to keep residential areas quiet and serene.

Speech about Importance of Tree Plantation given by Hon,able Nanasaheb Mane, Chairman Jayprakasha Education Society

#### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warmingand hence enhancing the beauty and balance of the environment.
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- Many saplings of different species were planted. Students were encouraged to address
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- Students were encouraged for tree plantation.
- The entire program created a strong feeling among the students.



# EVENT PHOTOGRAPHS







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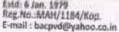


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DR. BABASAHEB AMBEDKAR MAHA

Barrister Tatyasaheb Mane Vidyanagar, Peth Vadgaon - 416112. Dist. Kolhapur (Maharashtra) Ph.Office: 0230-2471086

(Affiliated to Shivaji University, Kolhapur)

Founder Chairman: Hon. Adv. Nanasaheb S. Mano

Chairman: Shri. Satish S. Mano

UGC (2 f & 12 B) dt. 23 June 2006 Perm. Affi.No.Affi/T.2/SGB/10780 dt.16 Feb.2005

Jr.College Index No.23-06-004 J



# Environmental promotional activities conducted beyond the campus

## Particulars

Sr. No.	Name of the Activity	Date
1.	Tree Plantation	25/01/2022
2.	Environmental Awareness Rally	24/12/2021
3.	Mega Pollution Awareness Pakhawada (Plastic Pollution Awareness Rally)	07/07/2019
4.	Mega Pollution Awareness Pakhawada (Plastic Free Campus)	08/07/2019
5.	Mega Pollution Awareness Pakhawada (Special Lecture on Plastic Pollution)	04/07/2019
6.	Tree Plantation	16/07/2010
7.	Swachhta Pakhavada (Cleanness Drive)	16/07/2019
8.	Swachhta Pakhavada (Cleanness Drive)	19/09/2019
0	Swachhta Pakhavada (Swachhata	27/09/2019
9.	Awareness Rally)	01/10/2019
10.	Tree Plantation	Or manage
11.	Swachh Bharat Rally	05/07/2018
12.	Swachh Bharat Rally	18/08/2018
13.	Sweeth Dhorst Cl.	03/10/2018
14.	Swachh Bharat Cleanness Drive	08/10/2018
14.	Swachh Bharat Abhiyan	27/09/2017



Dr. Babasaheb Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kolhapur, Maharashtra



SN	Activity	Date	Volunteers
	Tree Plantation	1/25/2022	35

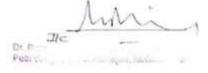
## Program information

Dr. Babasaheb Ambedkar College, Peth Vadgaon, Dist. Kolhapur Through National Service Scheme on Monday 14/07/2020, tree plantation was done on a large scale in the vast premises of the college. Program Officer of National Service Scheme Prof. A. A. Gurav welcomed and introduced the dignitaries present. College Principal Prof. J. C. Ghatge expressed his opinion about the importance of tree plantation and the need of the hour. Prof. K. C. Kanade expressed vote of thanks. For this program principal of the college Prof. J. C. Ghatge, N. S. S. Program Officer Prof. A. A. Gurav Teaching and non-teaching staff as well as volunteers of National Service Scheme were present.











# DR.BABASAHEB AMBEDKAR MAHAVIDYALAYA, PETH VADGAON

#### Work Report

This is report of Environmental Awareness rally carried out by NCC cadets of Dr.BabasahebAmbedkarMahavidyalaya, PethVadgaon, Tal-Hatkangale, Dist-kolhapur and VadgaonMuncipal Council.

- Location: B. Y ChoukToDr.BabasahebAmbedkar College, PethVadgaon
- Date and Day: 24 Dec 2021
- Time: Morning 6:30 to 09:30 A.M.
- Present cadets: SD 30 and SW 17 Total 47 cadet
- Ex cadet 03, other student 80 and college staff 5 presented
- ANO Dr.RanjitP.Mane
- Activities: All 47 cadets sw/sd were presented at for activity.
- Speech about Environmental Awareness rally given by Chief officer of Municipal Council











Associate NCC Officer
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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

## **ACTIVITY REPORT 2019-20**

Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019 TO 11st JUL 2019) Plastic Pollution Awareness Rally
Organized by	NCC
Date of the programme	07th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 19 and SW 08 Total 27 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	Sonarli Vasahat, Peth Vadgaon
Beneficiaries	People Sonarli Vasahat, Peth Vadgaon

## **Brief Report**

#### Introduction:

Plastic pollution is today one of the most serious environmental problems affecting the oceans. Once in the natural environment, plastic can take up to 500 years to disappear and impacts wildlife on a daily basis. Drifting between two bodies of water it can strangle or smother any number of animal species. A rally was conducted under the leadership of the TROP members of the college where the students showed their support to the State Government's decision of banning single-use plastic. An eco-critical sense was instilled among the on-lookers that made us spread the green message of stopping plastic usage easily.

#### Aims and Objectives

- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

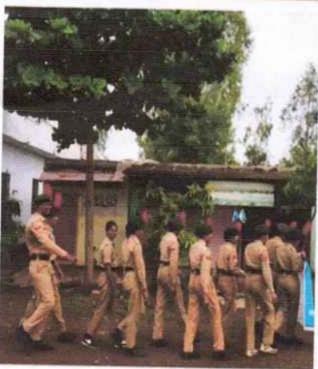
- Cadet aware about various types of pollution
- People also know about various types of pollution
- The cadets perform these activities as part of social responsibilities and community



# **EVENT PHOTOGRAPHS**









Associate NGC Officer
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Principal,

Dr. Babasaheu Ambedkar Mahavidvoldya Peth Vadgaon, Diet. Kohapur, Maharashtra



# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

#### **ACTIVITY REPORT 2019-20**

Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019 TO 11th JUL 2019) Plastic free Campus
Organized by	NCC
Date of the programme	08th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 18 and SW 08 Total 26 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

#### Brief Report

#### Introduction:

Global Campaign empowering students to take action on plastic pollution. These materials serve as a base to customise and advertise awareness activities to the school or adapt them to specific needs. There are three main reasons to change out of plastics:

- Human Health
- · The Environment
- Social Justice

It is important to show the cause and effect of plastics on human health, social justice and the environment. Posters can be created showing local examples and products.

#### Aims and Objectives

- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

- Cadet aware about various types of pollution
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- The cadets perform these activities as part of social responsibilities and community



# **EVENT PHOTOGRAPHS**









Associate NGC Officer
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Principal,

Or. Babasaheb Ambedkar Mahavidyakaya
Peth Vadgaon, Dist. Kelhapur, Maharashtra





# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

## **ACTIVITY REPORT 2019-20**

Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019 TO 11st JUL 2019) Special lecture on 'Plastic Pollution'
Organized by	NCC Triastic Foliation
Date of the programme	04th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 19 and SW 07 Total 26 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	College Campus
Beneficiaries	Cadets

## **Brief Report**

#### Introduction:

Plastic pollution is the accumulation of plastic objects and particles (e.g. plastic bottles, bags and micro beads) in the Earth's environment that adversely affects humans, wildlife and their habitat. Plastics that act as pollutants are categorized by size into micro, meso or macro debris. Plastics are inexpensive and durable, making them very adaptable for different uses; as a result, manufacturers choose to use plastic over other materials. However, the chemical structure of most plastics renders them resistant to many natural processes of degradation and as a result they are slow to degrade. Together, these two factors allow large volumes of plastic to enter the environment as mismanaged waste and for it to persist in the ecosystem. Plastic pollution can afflict land, waterways and oceans.

#### Aims and Objectives

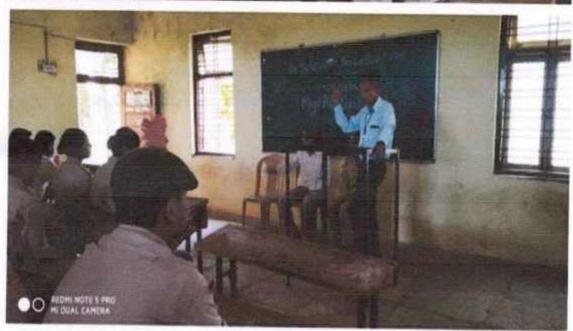
- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

- · Cadet aware about various types of pollution
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- The cadets perform these activities as part of social responsibilities and community



# **EVENT PHOTOGRAPHS**





Associate NCC Officer
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Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kolhapur, Maharashtra





# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

### **ACTIVITY REPORT 2019-20**

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	16th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 35 and SW 09 Total 44 Cadet
Number of Teacher participated	06
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

#### **Brief Report**

#### Introduction:

Tree Plantation drives combat many environmental issues like deforestation, erosion of soil, desertification in semi-arid areas, global warming and hence enhancing the beauty and balance of the environment. Trees absorb harmful gases and emit oxygen resulting in an increase in oxygen supply. Plants planted 20, Subedar Supanekar Planted Trees.

#### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warmingand hence enhancing the beauty and balance of the environment.
- To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

- Many saplings of different species were planted. Students were encouraged to address
  the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.
- The entire program created a strong feeling among the students.





Associate NCC Officer

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Dr. Brosser



Trees plantation











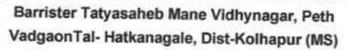


Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kolhapur, Maharashtra



# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY





## **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	19th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 40 and SW 10 Total 50 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth Vadgaon Bus Stand Campus
Beneficiaries	Peth Vadgaon People

#### **Brief Report**

#### Introduction:

Swachhata means cleanliness and Pakhwada means duration of 15 days, this means it is an initiative of 15 days of different activities for swachha bharat mission. he aim behind this celebration was to create awareness among all students about cleanliness. The first activity of Swachhata Pakhwada campaign was cleanness drive. It was especially designed for the youngest students of the school.

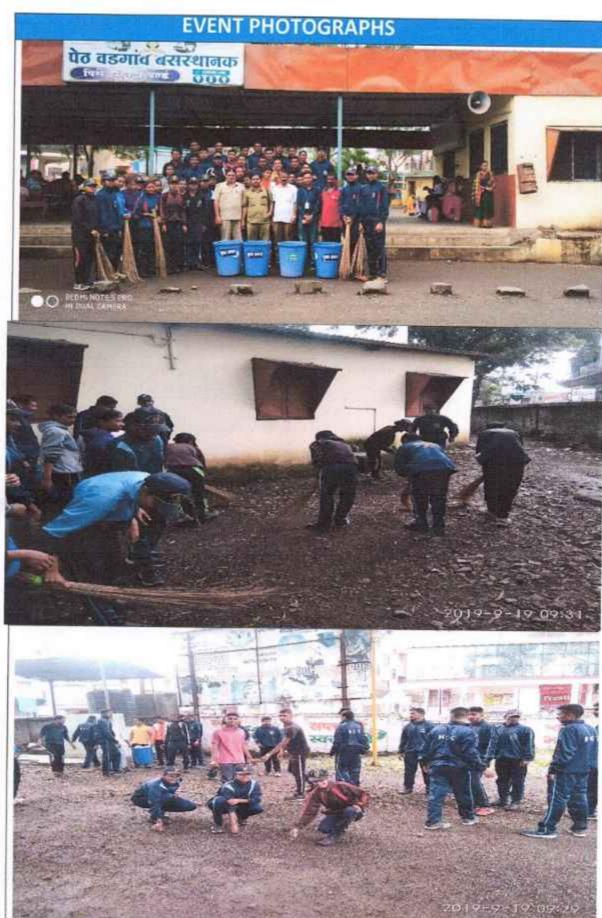
#### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and aroundthe campus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing thoseactions that make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transform Swachh Bharat into a citizen's movement.

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community















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Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kelhapur, Maharashtra





# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

## **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	27th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	College Campus
Beneficiaries	Peth Vadgaon People

## Brief Report

## Introduction:

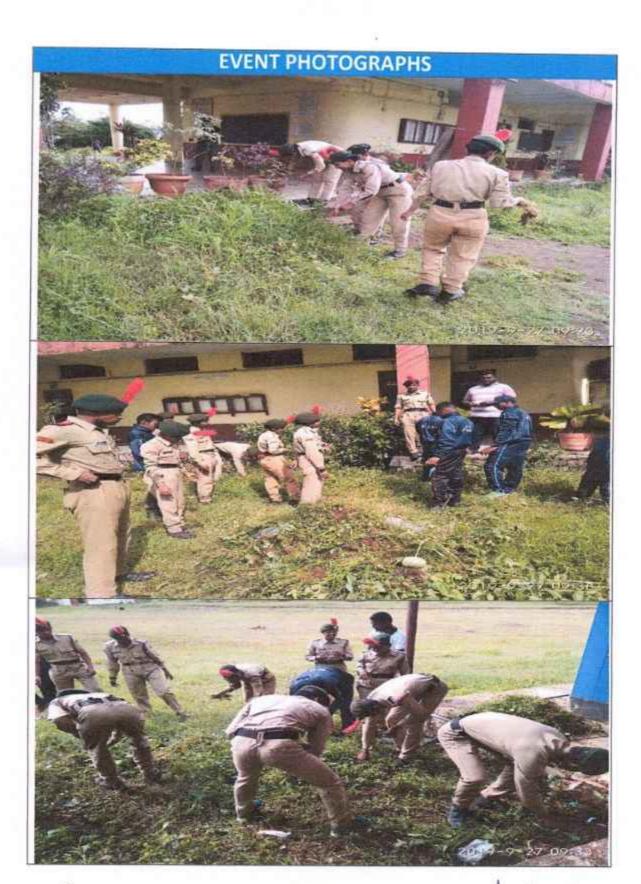
Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets.

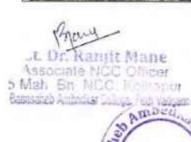
### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing those
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- The cadets perform these activities as part of social responsibilities and community







Peth Vadgaon Dist. Kolhapur

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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Swachata Awareness Rally
Organized by	NCC
Date of the programme	01st October 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 42 and SW 10 Total 51 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	Peth Vadgaon People

### **Brief Report**

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets. Initiated by the Government of India, the mission aimed to achieve an "open-defecation free" (ODF) India by 2 October 2019, the 150th anniversary of the birth of Mahatma Gandhi through construction of toilets.

### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing thoseactions that make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transform Swachh Bharat into a citizen's movement.

#### Programme Outcome

Peth Vadgaon Dist.Kolhapur

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community



Associate NGC Officer 5 Mah Bin NGC Kollingur Banssheb Antholis College Pen Verjax



Principal,
Or. Babasahen Ambedkar Mahaviriyalaya

Dr. Babasahen Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kelhapur, Maharashtra

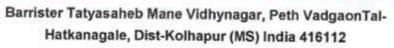


Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kolhapur, Maharashtra



# DR. BABASAHEB AMBEDKAR MAHAVIDYALA





Activity Report 2018-19

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	5 <sup>th</sup> July 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 25 and SW 10 Total 35 Cadet
Number of Teacher participated	20
Place of extension / outreach activity	College
Beneficiaries	College Students and Staff

## **Brief Report**

### Introduction:

Tree plantation means planting more trees in a planned way. It is significant in the current age of climate change and global warming. We cannot think of our existence without trees. Trees exert much influence on the climate condition of a country, they are responsible for maintaining the ecological balance throughout the world. An average tree produces enough oxygen to fulfill the oxygen needs of four people. Trees remove pollutants and fine grained particles from the air, reduce noise pollution and act as a buffer to keep residential areas quiet and serene.

Speech about Importance of Tree Plantation given by Hon,able Nanasaheb Mane, Chairman Jayprakasha Education Society

### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warmingand hence enhancing the beauty and balance of the environment.
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- Many saplings of different species were planted. Students were encouraged to address
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- Students were encouraged for tree plantation.
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# EVENT PHOTOGRAPHS







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Associate NCC Officer
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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# Activity Report 2018-19

Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	18 August 2018 Saturday
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	NCC Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth Vadgaon
Beneficiaries	Peth Vadgaon

## **Brief Report**

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission will also make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness amongst locals to maintain cleanliness. Speech about Importance of Swach Bharat given I/C, Principal Dr. R.M.Mirajkar Rally Started from Srasenapati Dhanaji Jadhavs Statue – Chh.Shivaji Maharaj Statue – Main Market Lane – Bus Stand - Vijayshiha Yadav Statue and end at Sarsenapati Dhanaji Jadhavs Statue

### Aims and Objectives

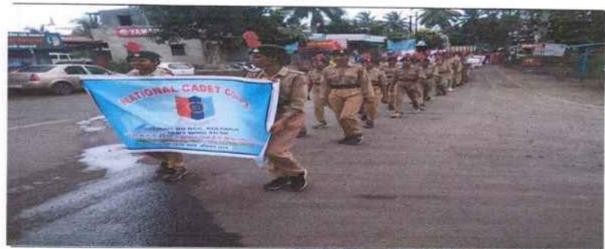
- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.

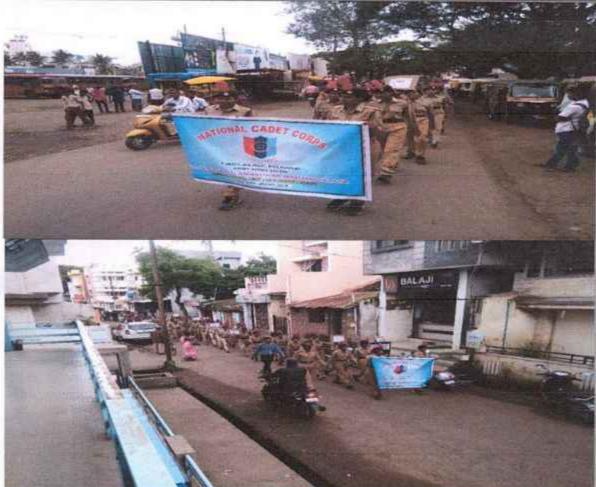
- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygine.
- The cadets perform these activities as part of social responsibilities and community











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# DR. BABASAHEB AMBEDKAR MAHAVIDYALA



Barrister Tatyasaheb Mane Vidhynagar, Peth VadgaonTal- Hatkanagale, Dist-Kolhapur (MS)

Activity Report 2018-19

	y Report 2018-19
Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	3 <sup>rd</sup> October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 41 and SW 14 Total 55 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat City, Tal-Hatkangale, Dist- Kolhapur
Beneficiaries	College Students and Staff
	12-75-4

# **Brief Report**

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission will also make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness amongst locals to maintain cleanliness. Activities: All 55cadets sw/sd were presented at college sharp at 8:00 am. Speech about Importance of Swach Bharat given I/C, Principal Dr. R.M.MirajkarRally Started from Collage – Vadgaon Court Main Road – Sonarli Vasahat Boudha Vihar ---Primary School and end at Maruti Temple.

### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community





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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAYA



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

Activity Report 2018-19

Title of the programme	SWACH BHARAT- Cleanness Drive
Organized by	NCC
Date of the programme	8th October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Mahalakshami Temple, Peth Vadgaon City, Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	College Students and Staff

## **Brief Report**

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets. All 53 cadets sw/sd were presented at college sharp at 9:00 am., Speech about Importance of Swach Bharat given Chief officer of Vadgaon Municipality Mr. Atul Patil, This activity organized jointly with municipal council, Also participated our teaching and non-teaching staff.

## Aims and Objectives

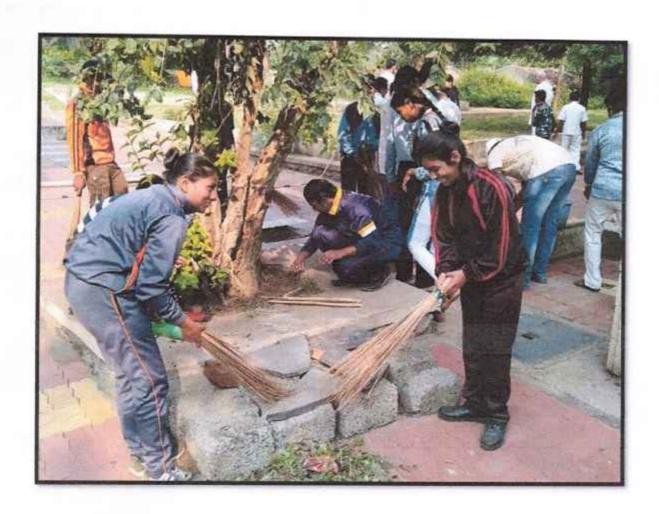
- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene among the students.

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community









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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



Barrister Tatyasaheb Mane Vidhynagar, Peth

VadgaonTal- Hatkanagale, Dist-Kolhapur (MS)

# Activity Report 2017-18

Title of the programme	SWACHHA BHARAT ABHIYAN
Organized by	NCC
Date of the programme	27th September 2017, Wednesday
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 44 and SW 10
Number of Teacher participated	01
Place of extension / outreach activity	Peth Vadgaon Court Campus
Beneficiaries	Peth Vadgaon People

## **Brief Report**

#### Introduction:

Aligning with the ideals of Mahatma Gandhi, the Swachh Bharat Mission (SBM) was initiated in 2014 to achieve universal sanitation coverage by 2 October 2019. This flagship programme is, perhaps, the largest cleanliness drive as well as an attempt to effect behavioural change in the world ever.

## Aims and Objectives

- To create awareness among the students regarding cleanliness and its benefits.
- To create awareness about health and hygiene.
- To learn about cleanliness, hygiene, sanitation and various diseases that are causeddue to poor hygienic conditions.

- Development of clean and hygienic environment.
- It has made the students aware of cleanliness and overall civic sense.
- It made students aware of cleanliness and social hygiene.

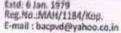




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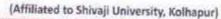


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# DR. BABASAHEB AMBEDKAR MAHA\

Barrister Tatyasaheb Mane Vidyanagar, Peth Vadgaon - 416112. Dist. Kolhapur (Maharashtra) Ph.Office: 0230-2471086



Founder Chairman: Hon. Adv. Nanasabeb S. Mano B.A. LIB, ELMIA

Chairman : Shri. Satish S. Mane M.A. M.Phil

Principal: Dr. S. D Mob.: 77098809

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# Environmental promotional activities conducted beyond the campus

## Particulars

Sr. No.	Name of the Activity	Date
1.	Tree Plantation	25/01/2022
2.	Environmental Awareness Rally	24/12/2021
3.	Mega Pollution Awareness Pakhawada (Plastic Pollution Awareness Rally)	07/07/2019
4.	Mega Pollution Awareness Pakhawada (Plastic Free Campus)	08/07/2019
5.	Mega Pollution Awareness Pakhawada (Special Lecture on Plastic Pollution)	04/07/2019
6.	Tree Plantation	16/07/2019
7.	Swachhta Pakhavada (Cleanness Drive)	19/09/2019
8.	Swachhta Pakhavada (Cleanness Drive)	27/09/2019
9.	Swachhta Pakhavada (Swachhata Awareness Rally)	01/10/2019
10.	Tree Plantation	05/07/2018
11.	Swachh Bharat Rally	18/08/2018
12.	Swachh Bharat Rally	03/10/2018
13.	Swachh Bharat Cleanness Drive	08/10/2018
14.	Swachh Bharat Abhiyan	27/09/2017



Principal, Dr. Babasaheb Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kolhapur, Maharashtra



SN	Activity	Date	Volunteers
	Tree Plantation	1/25/2022	35

## Program information

Dr. Babasaheb Ambedkar College, Peth Vadgaon, Dist. Kolhapur Through National Service Scheme on Monday 14/07/2020, tree plantation was done on a large scale in the vast premises of the college. Program Officer of National Service Scheme Prof. A. A. Gurav welcomed and introduced the dignitaries present. College Principal Prof. J. C. Ghatge expressed his opinion about the importance of tree plantation and the need of the hour. Prof. K. C. Kanade expressed vote of thanks. For this program principal of the college Prof. J. C. Ghatge, N. S. S. Program Officer Prof. A. A. Gurav Teaching and non-teaching staff as well as volunteers of National Service Scheme were present.











# DR.BABASAHEB AMBEDKAR MAHAVIDYALAYA, PETH VADGAON

Work Report

This is report of Environmental Awareness rally carried out by NCC cadets of Dr.BabasahebAmbedkarMahavidyalaya, PethVadgaon, Tal-Hatkangale, Dist-kolhapur and VadgaonMuncipal Council.

- Location: B. Y ChoukToDr.BabasahebAmbedkar College, PethVadgaon
- Date and Day: 24 Dec 2021
- Time: Morning 6:30 to 09:30 A.M
- Present cadets: SD 30 and SW 17 Total 47 cadet
- Ex cadet 03, other student 80 and college staff 5 presented
- ANO Dr.RanjitP.Mane
- Activities: All 47 cadets sw/sd were presented at for activity.
- Speech about Environmental Awareness rally given by Chief officer of Municipal Council











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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

## **ACTIVITY REPORT 2019-20**

Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01st JUL 2019 TO 11st JUL 2019) Plastic Pollution Awareness Rally
Organized by	NCC
Date of the programme	07th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 19 and SW 08 Total 27 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	Sonarli Vasahat, Peth Vadgaon
Beneficiaries	People Sonarli Vasahat, Peth Vadgaon

## **Brief Report**

## Introduction:

Plastic pollution is today one of the most serious environmental problems affecting the oceans. Once in the natural environment, plastic can take up to 500 years to disappear and impacts wildlife on a daily basis. Drifting between two bodies of water it can strangle or smother any number of animal species. A rally was conducted under the leadership of the TROP members of the college where the students showed their support to the State Government's decision of banning single-use plastic. An eco-critical sense was instilled among the on-lookers that made us spread the green message of stopping plastic usage easily.

### Aims and Objectives

- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

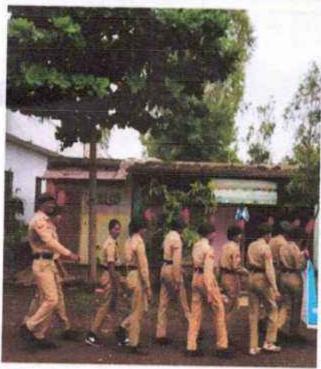
- Cadet aware about various types of pollution
- People also know about various types of pollution
- The cadets perform these activities as part of social responsibilities and community



# **EVENT PHOTOGRAPHS**









Associate NCC Officer

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Principal,

Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kolhapur, Maharashtra



# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

## **ACTIVITY REPORT 2019-20**

Title of the programme	MEGA POLLUTION AWARENESS  PAKHWADA (01st JUL 2019 TO 11th JUL 2019)  Plastic free Campus
Organized by	NCC
Date of the programme	08th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 18 and SW 08 Total 26 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

## **Brief Report**

### Introduction:

Global Campaign empowering students to take action on plastic pollution. These materials serve as a base to customise and advertise awareness activities to the school or adapt them to specific needs. There are three main reasons to change out of plastics:

- Human Health
- The Environment
- Social Justice

It is important to show the cause and effect of plastics on human health, social justice and the environment. Posters can be created showing local examples and products.

### Aims and Objectives

- To sensitize people against various kind of pollution.
- · To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

- Cadet aware about various types of pollution
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- The cadets perform these activities as part of social responsibilities and community

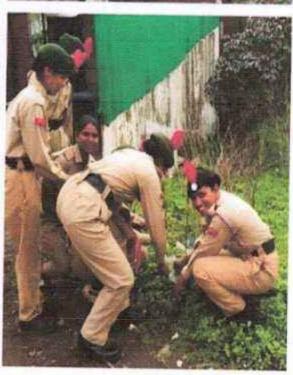


# **EVENT PHOTOGRAPHS**









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Principal,
Dr. Babasaheb Ambedkar Mahavidyakoya
Peth Vadgaon, Dist. Kolhapur, Maharashta





# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# **ACTIVITY REPORT 2019-20**

Title of the programme	MEGA POLLUTION AWARENESS PAKHWADA (01 <sup>st</sup> JUL 2019 TO 11 <sup>th</sup> JUL 2019) Special lecture on 'Plastic Pollution'
Organized by	NCC NCC
Date of the programme	04th July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 19 and SW 07 Total 26 Cadet
Number of Teacher participated	03
Place of extension / outreach activity	College Campus
Beneficiaries	Cadets

## **Brief Report**

### Introduction:

Plastic pollution is the accumulation of plastic objects and particles (e.g. plastic bottles, bags and micro beads) in the Earth's environment that adversely affects humans, wildlife and their habitat. Plastics that act as pollutants are categorized by size into micro, meso or macro debris. Plastics are inexpensive and durable, making them very adaptable for different uses; as a result, manufacturers choose to use plastic over other materials. However, the chemical structure of most plastics renders them resistant to many natural processes of degradation and as a result they are slow to degrade. Together, these two factors allow large volumes of plastic to enter the environment as mismanaged waste and for it to persist in the ecosystem. Plastic pollution can afflict land, waterways and oceans.

## Aims and Objectives

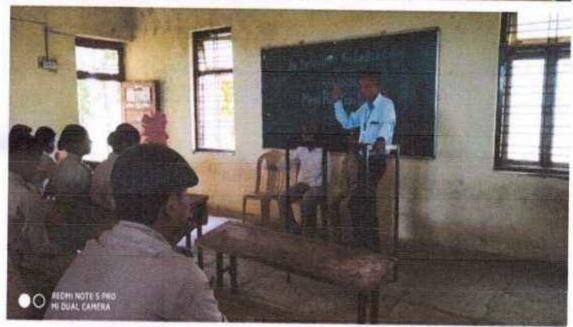
- To sensitize people against various kind of pollution.
- To create awareness about pollutions impact on health.
- To organized various activities like lectures, rallies, nukkad, quiz, pledge etc.

- Cadet aware about various types of pollution
- People also know about various types of pollution
- The cadets perform these activities as part of social responsibilities and community



# **EVENT PHOTOGRAPHS**





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Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kelhapur, Maharashtra





# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# **ACTIVITY REPORT 2019-20**

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	16 <sup>th</sup> July 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 35 and SW 09 Total 44 Cadet
Number of Teacher participated	06
Place of extension / outreach activity	College Campus
Beneficiaries	College Campus

## Brief Report

#### Introduction:

Tree Plantation drives combat many environmental issues like deforestation, erosion of soil, desertification in semi-arid areas, global warming and hence enhancing the beauty and balance of the environment. Trees absorb harmful gases and emit oxygen resulting in an increase in oxygen supply. Plants planted 20, Subedar Supanekar Planted Trees.

### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warmingand hence enhancing the beauty and balance of the environment.
- · To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

- Many saplings of different species were planted. Students were encouraged to address
  the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.
- The entire program created a strong feeling among the students.





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Trees plantation













Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kolhapur, Maharashtra



# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



Barrister Tatyasaheb Mane Vidhynagar, Peth VadgaonTal- Hatkanagale, Dist-Kolhapur (MS)

# **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	19th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 40 and SW 10 Total 50 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth Vadgaon Bus Stand Campus
Beneficiaries	Peth Vadgaon People

## **Brief Report**

## Introduction:

Swachhata means cleanliness and Pakhwada means duration of 15 days, this means it is an initiative of 15 days of different activities for swachha bharat mission, he aim behind this celebration was to create awareness among all students about cleanliness. The first activity of Swachhata Pakhwada campaign was cleanness drive. It was especially designed for the youngest students of the school.

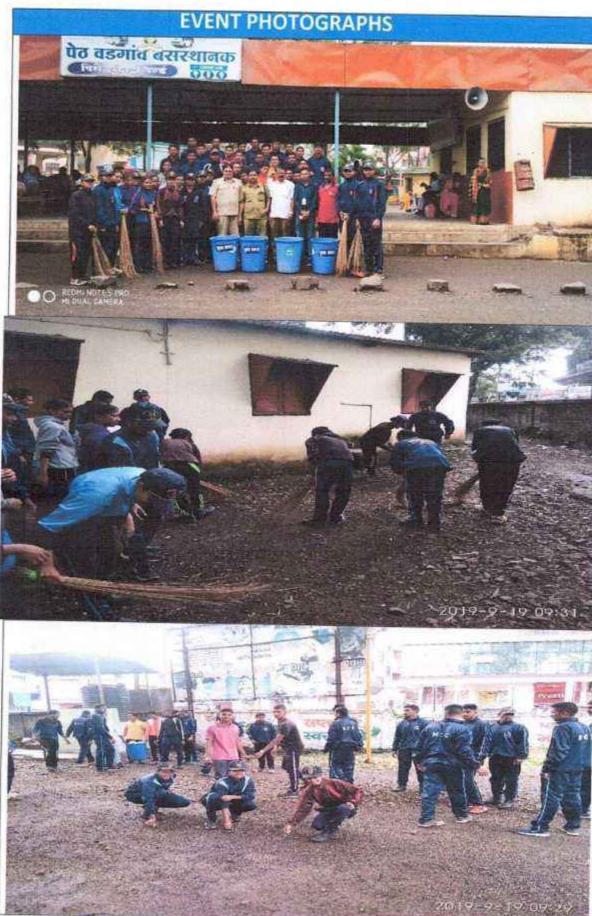
### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and aroundthe campus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing thoseactions that make our country a better place.
- To ensure mass participation of citizens in Swachhta activies and to truly transform Swachh Bharat into a citizen's movement.

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community















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Principal,
Dr. Babasahep Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kelhapur, Maharashua





# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Cleanness Drive
Organized by	NCC
Date of the programme	27th September 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	College Campus
Beneficiaries	Peth Vadgaon People

## **Brief Report**

#### Introduction:

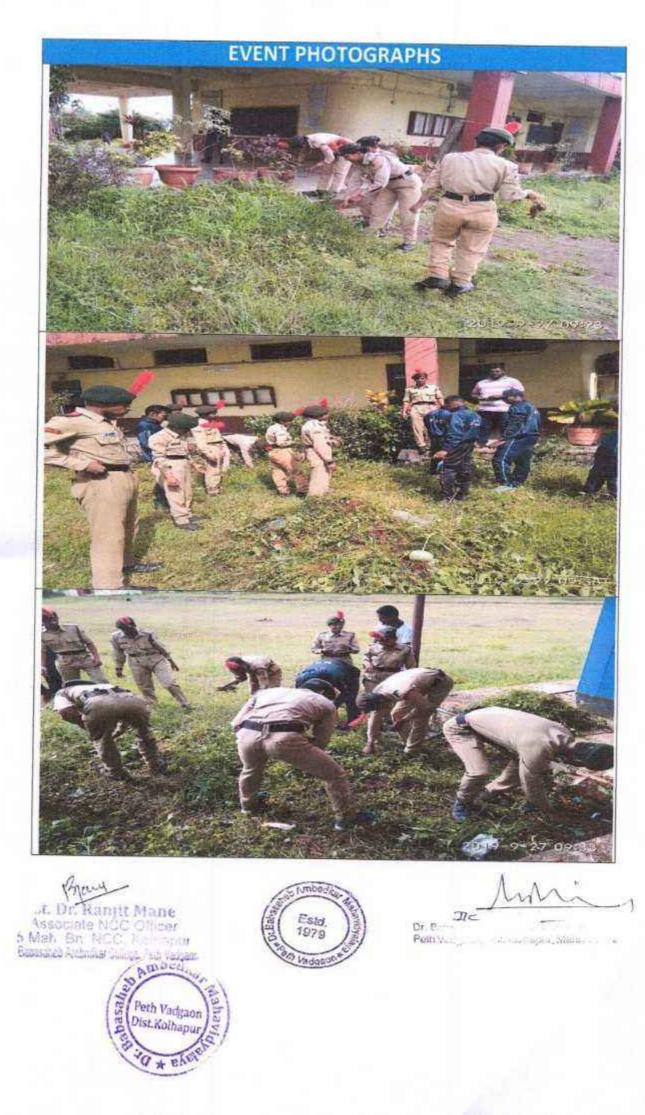
Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets.

#### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and aroundthe campus.
- Swachhta Pakhwada serves in connecting people to the nature and enhancing those
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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY.



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# **ACTIVITY REPORT 2019-20**

Title of the programme	SWACHHATA PAKHWADA Swachata Awareness Rally
Organized by	NCC
Date of the programme	01st October 2019
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 42 and SW 10 Total 51 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	Peth Vadgaon People

### **Brief Report**

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets. Initiated by the Government of India, the mission aimed to achieve an "open-defecation free" (ODF) India by 2 October 2019, the 150th anniversary of the birth of Mahatma Gandhi through construction of toilets.

#### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and aroundthe campus.
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Principal,

Or. Babasaheb Ambedkar Mahavidyalaya Peth Vadgaon, Dist. Kelhapur, Maharashtra

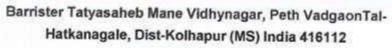


Principal,

Dr. Babasaheb Ambedkar Mahavidyalaya
Peth Vadgaon, Dist. Kolhapur, Maharashtra



# DR. BABASAHEB AMBEDKAR MAHAVIDYALA





Activity Report 2018-19

Title of the programme	Tree Plantation
Organized by	NCC
Date of the programme	5th July 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 25 and SW 10 Total 35 Cadet
Number of Teacher participated	20
Place of extension / outreach activity	College
Beneficiaries	College Students and Staff

## **Brief Report**

#### Introduction:

Tree plantation means planting more trees in a planned way. It is significant in the current age of climate change and global warming. We cannot think of our existence without trees. Trees exert much influence on the climate condition of a country, they are responsible for maintaining the ecological balance throughout the world. An average tree produces enough oxygen to fulfill the oxygen needs of four people. Trees remove pollutants and fine grained particles from the air, reduce noise pollution and act as a buffer to keep residential areas quiet and serene.

Speech about Importance of Tree Plantation given by Hon, able Nanasaheb Mane, Chairman Jayprakasha Education Society

#### Aims and Objectives

- Combat many environmental issues like deforestation, erosion of soil, global warmingand hence enhancing the beauty and balance of the environment.
- To save endangered environment and to beautify our life.
- Awareness to reduce pollution.

- Many saplings of different species were planted. Students were encouraged to address
  the climate change by participating in the massive tree plantation drive.
- Students were encouraged for tree plantation.
- The entire program created a strong feeling among the students.



# EVENT PHOTOGRAPHS







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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

# Activity Report 2018-19

Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	18 August 2018 Saturday
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	NCC Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Peth Vadgaon
Beneficiaries	Peth Vadgaon

## **Brief Report**

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission will also make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness amongst locals to maintain cleanliness. Speech about Importance of Swach Bharat given I/C, Principal Dr. R.M.Mirajkar Rally Started from Srasenapati Dhanaji Jadhavs Statue – Chh.Shivaji Maharaj Statue – Main Market Lane – Bus Stand - Vijayshiha Yadav Statue and end at Sarsenapati Dhanaji Jadhavs Statue

#### Aims and Objectives

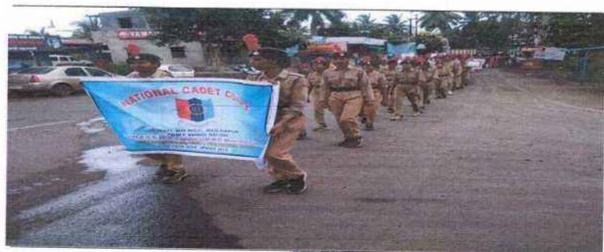
- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.

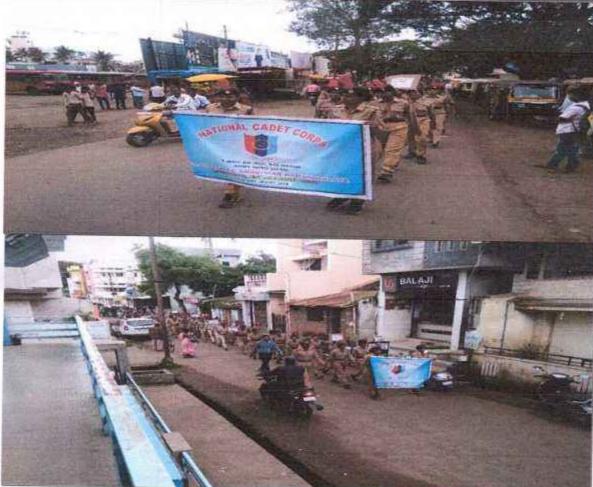
- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygine.
- The cadets perform these activities as part of social responsibilities and community











Associate NCC Officer
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# DR. BABASAHEB AMBEDKAR MAHAVIDYALA



Barrister Tatyasaheb Mane Vidhynagar, Peth VadgaonTal- Hatkanagale, Dist-Kolhapur (MS)

Activity Report 2018-19

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Title of the programme	SWACH BHARAT RALLY
Organized by	NCC
Date of the programme	3 <sup>rd</sup> October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 41 and SW 14 Total 55 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Sonarli Vasahat City, Tal-Hatkangale, Dist- Kolhapur
Beneficiaries	College Students and Staff

## **Brief Report**

#### Introduction:

To eliminate or reduce open defecation. Open defecation is one of the main causes of deaths of thousands of children each year. Not only latrine construction, the Swachh Bharat Mission will also make an initiative of establishing an accountable mechanism of monitoring latrine us. The objective of the Rally is to promote Prime Minister's noble mission of "Swachh Bharat Abhiyan". The Rally aims at spreading awareness amongst locals to maintain cleanliness. Activities: All 55cadets sw/sd were presented at college sharp at 8:00 am. Speech about Importance of Swach Bharat given I/C, Principal Dr. R.M.MirajkarRally Started from Collage — Vadgaon Court Main Road — Sonarli Vasahat Boudha Vihar ----Primary School and end at Maruti Temple.

### Aims and Objectives

- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene.
- To create awareness about plastic wastes, its impacts and cleanliness in and around the campus.

- · Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- The cadets perform these activities as part of social responsibilities and community





Associate NGC Officer 5 Mah. Bn. NGC Kolhapur Ranssheb Ambrillar Guliga Feat Valgan.







# DR. BABASAHEB AMBEDKAR MAHAVIDYALAYA



# Barrister Tatyasaheb Mane Vidhynagar, Peth Vadgaon Tal- Hatkanagale, Dist-Kolhapur (MS) India 416112

Activity Report 2018-19

Title of the programme	SWACH BHARAT- Cleanness Drive
Organized by.	NCC
Date of the programme	8th October 2018
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 37 and SW 16 Total 53 Cadet
Number of Teacher participated	02
Place of extension / outreach activity	Mahalakshami Temple, Peth Vadgaon City, Tal-Hatkangale, Dist-Kolhapur
Beneficiaries	College Students and Staff

## **Brief Report**

#### Introduction:

Swachh Bharat Mission (SBM), Swachh Bharat Abhiyan, or Clean India Mission is a country-wide campaign initiated by the Government of India in 2014 to eliminate open defecation and improve solid waste management. It is a restructured version of the Nirmal Bharat Abhiyan launched in 2009 that failed to achieve its intended targets. All 53 cadets sw/sd were presented at college sharp at 9:00 am., Speech about Importance of Swach Bharat given Chief officer of Vadgaon Municipality Mr. Atul Patil, This activity organized jointly with municipal council, Also participated our teaching and non-teaching staff.

## Aims and Objectives

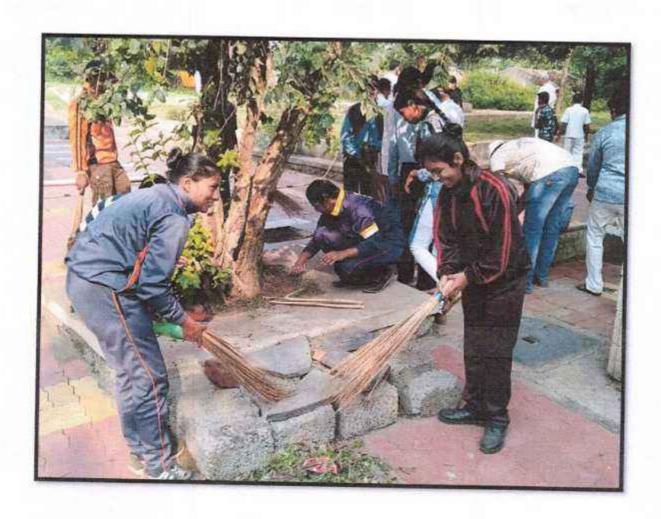
- To create awareness about cleanliness of environment.
- To create awareness about health and hygiene among the students.

- Development of clean and hygienic environment.
- It has madestudents aware of cleanliness and social hygiene.
- · The cadets perform these activities as part of social responsibilities and community









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# DR. BABASAHEB AMBEDKAR MAHAVIDYALAY



Barrister Tatyasaheb Mane Vidhynagar, Peth

VadgaonTal- Hatkanagale, Dist-Kolhapur (MS)

Activity Report 2017-18

Title of the programme	SWACHHA BHARAT ABHIYAN
Organized by	NCC
Date of the programme	27th September 2017, Wednesday
Funding Agency	Dr. Babasaheb Ambedkar College
Number of student participants/ Targeted Group	SD 44 and SW 10
Number of Teacher participated	01
Place of extension / outreach activity	Peth Vadgaon Court Campus
Beneficiaries	Peth Vadgaon People

## **Brief Report**

#### Introduction:

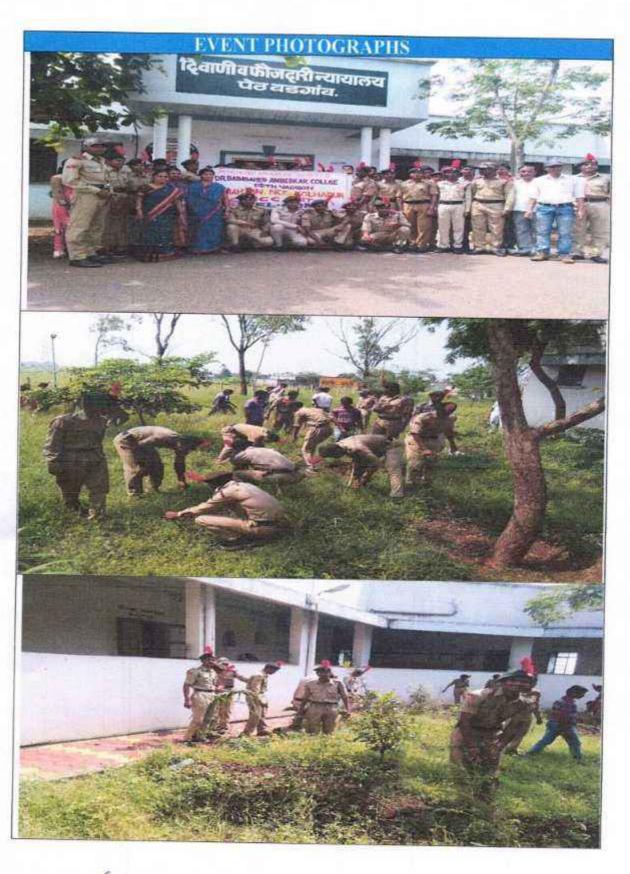
Aligning with the ideals of Mahatma Gandhi, the Swachh Bharat Mission (SBM) was initiated in 2014 to achieve universal sanitation coverage by 2 October 2019. This flagship programme is, perhaps, the largest cleanliness drive as well as an attempt to effect behavioural change in the world ever.

#### Aims and Objectives

- To create awareness among the students regarding cleanliness and its benefits.
- To create awareness about health and hygiene.
- To learn about cleanliness, hygiene, sanitation and various diseases that are causeddue to poor hygienic conditions.

- Development of clean and hygienic environment.
- It has made the students aware of cleanliness and overall civic sense.
- It made students aware of cleanliness and social hygiene.





Associate NGC Officer
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