

# GREEN AND ENVIROMENTAL AUDIT REPORT

2023-2024



**Nagaon G.N.D.G Commerce College**  
**Panigaon, Nagaon, Assam**  
**Pin-782003**

# **DHING COLLEGE: DHING: NAGAON: ASSAM**

## **DEPARTMENT OF BOTANY**



### **CERTIFICATE**

This is to certify that Nagaon G.N.D.G Commerce College has conducted a detailed “Green cum Environmental Audit” for the session 2023-24 of their campus and successfully established eco friendly practices and management systems for conservation of environment at all levels. The environment awareness initiatives are substantial. This will surely boost the new generation to take care of environment and propagate this view for many generations to come. The efforts undertaken by the supervision of Principal, faculty members, non-teaching members and students of Nagaon G.N.D.G Commerce College towards environment and sustainability are highly appreciated and commendable.

  
**External Auditor  
Green Audit**

**Dr. Sanjeeb Kumar Nath**  
**HOD & Associate Professor**  
**Department of Botany**  
**Dhing College : Dhing : Nagaon : Assam**

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# Introduction

Green audit is a process of systematic identification, quantification, recording, reporting and analysis of components of flora and fauna diversity within the campus. It aims to analyze green practices inside and outside of the concerned sites, which will have an impact on the eco-friendly environment. Green Audit provides direction for improvement of the condition of environment. It is carried out with the aid of performing tasks like waste management, energy saving and tree plantation to turn into a better environment friendly institute. Green audit can be a useful tool for universities and colleges to determine their consumption of energy or water or other resources and then plan to implement changes and make savings. It can create health consciousness and promote environmental awareness, values and ethics. It allows faculty members, students and other staff members to better understand the impacts of green activities on the premises.

The rapid urbanization and economic development at local, regional and global level has led to several environmental and ecological crises. The biodiversity is facing serious threats from habitat loss, pollution, over consumption and invasive species. Species are disappearing at an alarming rate and each loss affects nature's delicate balance and our quality of life. Without this variability in the living world, ecological systems and functions would break down with detrimental consequences for all form of life, including human beings. In this context, it is necessary to adopt a green campus system for the institute, which will lead to sustainable development while reducing the large amount of atmospheric CO<sub>2</sub> emission to the environment.

In the background of this scenario, government of India through its National Environment Policy (2006) has made mandatory for all higher educational institution to conduct green audit in order to ensure a clean and healthy environment within and outside the institution. As environmental sustainability is becoming an increasingly important issue for the nation, the role of higher educational institutions in relation to environment sustainability is more prevalent. Accordingly, realizing the need of being responsible towards environment NAAC has also added the concept of environmental audit in accreditation methodologies of state, central universities and colleges.

## Overview of the College

Nagaon Gopinath Dev Goswami Commerce College is one of the pioneer institutions of higher education in the entire central Assam region. The college was started on the 24th of September, 1984 in the premises of Sankardev Natya Chora under the name of Nagaon Commerce College. It was renamed as Nagaon G.N.D.G. Commerce College. After the name of Late Gopinath Dev Goswami, an illustrious son of Nagaon and was shifted to its present site at Panigaon, Nagaon in 1991.

### Environmental Setting

College is easily accessible by road as it is located at the road side of the AT Road (NH 37) and at the very entrance of the Nagaon Town from the eastern side i.e. from Tezpur, Jorhat, etc. and from other direction it is 3 km away from the centre of Nagaon Town. By railways it is nearly 2km from Morikolong railway station and 5km from the Haiborgaon railway station. The college is spread over 3 acres of area. Although campus is located in semi urban area, presence of green belt including gardens, lawns and an herbal garden has considerably reduced pollution in the campus.

### College Campus Land area and Total Building area

Campus area = 135039sqft = 12558.63m (3 acres 1 katha 11 losha)

Academic & others College Building Area	=	51700 sqft.
Administrative Building Area	=	6266 sqft.
Girls Hostel	=	3614 sqft.
Total	=	61580sqft,

It is approximately 50% of total area (after adding the pathways and concrete front yard)

Thus the College have a green area of nearly 50% out of the total area, which includes lawn, garden, open space, road side shrubs and boundary side shrubs and trees.

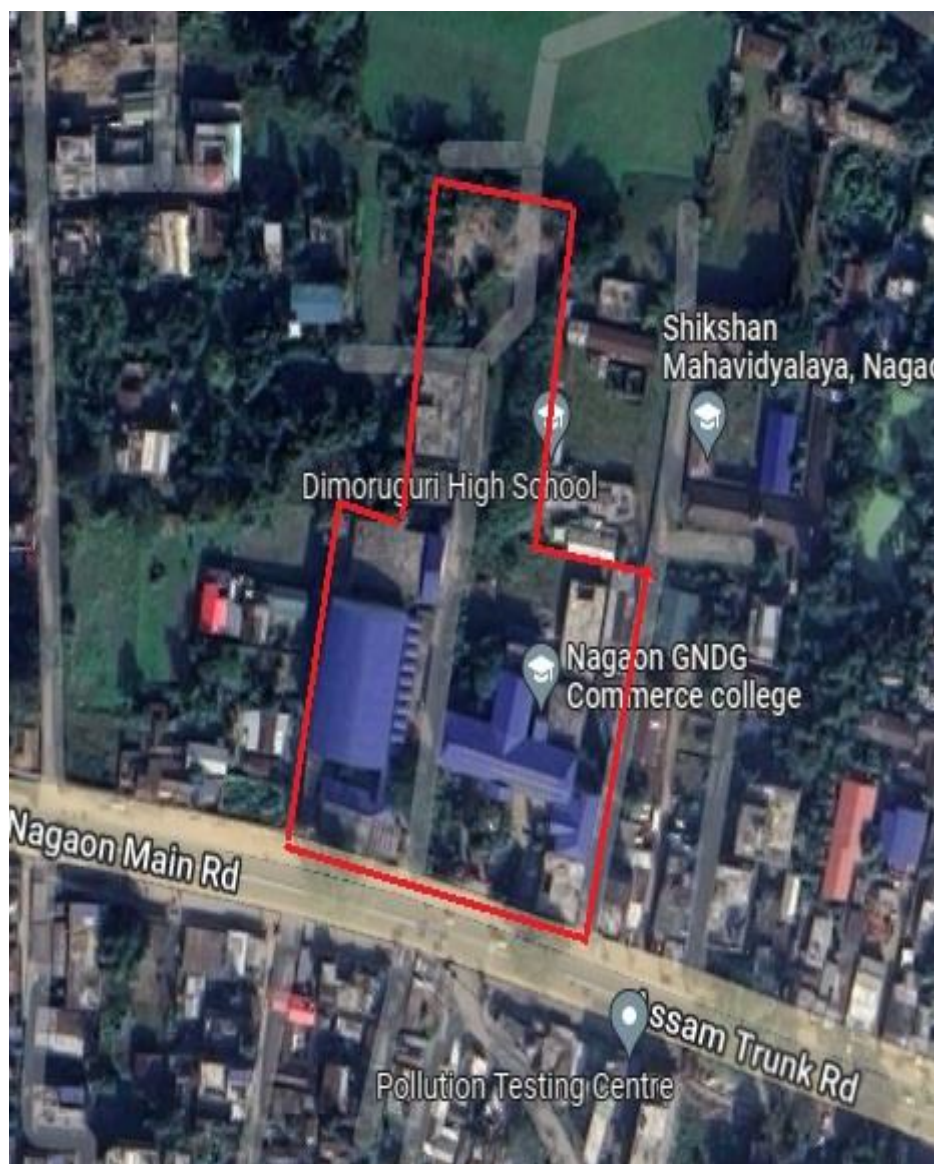


Fig 1. Google Map- Aerial view of Nagaon G.N.D.G. Commerce College









## **Audit Objectives and Methodology**

Green audit is done with the objective to conduct assessment of environment related issues and to minimize these issues particularly inside the campus. So adequate steps have been taken and will be taken to maintain an eco-friendly environment inside the campus mainly focus on sustainable development. The main aims and objectives are as follows.

- To document the green area management and plant diversity of the campus
- To document the water and waste management of the campus
- To ensure environment friendly activities and review the implementation of policies
- To secure the environment and cut down the threats posed to human health by ensure optimum utilization of resources
- To promote environmental awareness among students and staff members
- To establish a baseline data to assess future sustainability by avoiding the interruptions in environment

Honourable principal, Dr. Mriganka Saikia with a discussion with all the staff members formed a Green cum Environmental Audit Committee (including both internal and external members) on 19<sup>th</sup> June, 2024. The need for a Green and Environment Audit Report was raised in the meeting organized by Green Audit Team of the college with external member on 19<sup>th</sup> June, 2024. In order to perform green audit, the methodology included physical inspection of the campus, observation, measurements and documentation. The methods of plant identification include expert determination, recognition, comparison and the use of keys, manuals, monographs and E-flora. The present report covered the areas like green area management, water management, waste management, environment friendly practices etc.

## Green cum Environmental Audit Team

A Green cum Environmental Audit Committee has been formed to perform the task of Green and Environment Audit of Nagaon G.N.D.G. Commerce College with effect from the year 2023-24.

### External Member

1. **Dr. Sanjeeb Kumar Nath**, HOD & Associate Professor, Department of Botany, Dhing College, Dhing, Nagaon, Assam.
2. **Dr. Ajit Debnath**, Associate Professor and Head, Department of Economics, Mahapurusha Srimanta Sankaradeva Vishwavidyalaya, Nagaon, Assam.
3. **Dr. Bhaswati Sarma**, Assistant Professor, Department of Botany, A.D.P. College.

### Internal Members

4. **Miss. Himashree Bhattacharyya**, Assistant Professor, Department of Botany, Nagaon G.N.D.G Commerce College
5. **Miss. Kabyashree Borah**, Assistant Professor, Department of Zoology, Nagaon G.N.D.G Commerce College
6. **Mr. Mintu Gayan**, Assistant Professor, Department of Information and Technology, Nagaon G.N.D.G Commerce College
7. **Mr. Nayan Jyoti Bora**, Junior Assistant, Nagaon G.N.D.G Commerce College

### Green cum Environmental Audit Committee



## Campus Biodiversity

Nagaon G.N.D.G. Commerce College harbours rich plant diversity even if has small area and besides situated side by the national highway. All the way through the preliminary research, hundred numbers of species were identified and listed below herewith. The species were classified and listed as medicinal, fruit plant and ornamental plants. In addition some of species have more potential and used as insecticide, pesticide, biodiesel, air purifier etc. The plant diversity is explored during May and June months of this year as we know the rainy season has more species richness. More diversity exploration work in different seasons of the year is necessary to have a complete flora list of the campus. It is a continuous work and our college had already initiated a digital biodiversity register involving students and all the staff members with a noble idea to help the local community.

**Table1: List of medicinal plants of the campus**

SL.NO	SCIENTIFIC NAME	LOCAL NAME	COMMON NAME/ ENGLISH NAME
1.	<i>Ageratum conyzoides</i> L.	Gendhali Bon	Billygoat weed
2.	<i>Altenanthera sessilis</i> (L.) R.Br. ex DC.	Matikaduri	Sessile joyweed
3.	<i>Axonopus compressus</i> (Sw.) P. Beauv.	Dolicha-bon	Carpet grass
4.	<i>Azadirachta indica</i> A. Juss.	Neem	Neem
5.	<i>Caesalpinia pulcherrima</i> (L.) Sw.	Krishnachuda	peacock flower/Gold Mahur
6.	<i>Cassia javanika</i> L.	Golopia Sonaru	Pink shower
7.	<i>Chrysopogon gryllus</i> (L.) Trin.	Bonguti ghah	scented grass
8.	<i>Cleome viscosa</i> L.	Hurhuriya	Fringed spider flower

9.	<i>Clitoria ternatea</i> L.	Aparajita	Butterfly creeper
10.	<i>Coix lacryma</i> L.	Kaurimoni	Job's tear
11.	<i>Colocasia esculanta</i> (L.)Schott	Kola kachu	Taro
12.	<i>Commelina benghalensis</i> L.	Kona-shimolu	Benghal dayflower
13.	<i>Crassocephalum crepidioides</i> (Benth.) S. Moore	--	Redflower ragleaf
14.	<i>Cymbogan citratus</i> (DC.) Stapf	Gondha biringa	Lemongrass
15.	<i>Cynodon dactylon</i> (L.) Pers.	Dubori bon	Devil' grass
16.	<i>Desmodium trifolium</i> (L.) DC.	--	Creeping tick trefoil
17.	<i>Digitaria ciliaris</i> (Retz.) Koeler	Ghah	Southern crabgrass
18.	<i>Diplazium esculentum</i> (Retz.) Sw.	Dhekia xak	vegetable fern
19.	<i>Dracaena reflexa</i> Lam.	--	Song of India
20.	<i>Eleusine indica</i> (L.) Gaertn.	Bobosa-bon	Goosegrass
21.	<i>Eryngium foetidum</i> L.	Man-dhonia	Culantro
22.	<i>Euphorbia hirta</i> L.	Gakhiroti Bon	Asthma plant
23.	<i>Euphorbia milii</i> Des Moul.	Sijwu	Crown of thorns
24.	<i>Ficus religiosa</i> L.	Aahot	Ficus
25.	<i>Galinsoga quadriradiata</i> Ruiz & Pav	--	Shaggy soldier
26.	<i>Glinus oppositifolius</i> (L.) Aug. DC.	--	Slender Carpet-weed
27.	<i>Heliotropium indicum</i> L.	Hatisur	Indian heliotrope
28.	<i>Helminthotheca echioides</i> (L.)Holub	--	bristly oxtongue
29.	<i>Jatropha curcus</i> L.	Bhot-era	Bubble bush

30.	<i>Kalanchoe pinnata</i> (Lam.)Pers.	Dupar tenga	Miracle leaf
31.	<i>Kyllinga brevifolia</i> Rottb.	Kariah Bon	Green kyllinga
32.	<i>Leucus aspera</i> (Wild.) Link	Durun	Thumba
33.	<i>Mikania micrantha</i> Kunth	Japani lata	mile-a-minute
34.	<i>Murraya koenigii</i> (L.) Sprengel	Narasingha	Inidian curry leaf plant
35.	<i>Mimosa pudica</i> L.	Nilaji bon	Touch-me-not
36.	<i>Nyctanthaes arbor-tristis</i> L.	Sewali	Night jasmine
37.	<i>Ocimum tenuiflorum</i> L.	Tulasi	Holy basil
38.	<i>Oldenandia corymbosa</i> L.	Bon-jaluk	Diamond flower
39.	<i>Oplismenus hirtellus</i> (L.) P. Beauv.	A type of Ghah	Basket grass
40.	<i>Oxalis corniculata</i> L.	Tengeshi-tenga	Sleeping beauty
41.	<i>Oxalis corymbosa</i> DC.	Tengeshi-tenga	Pink shamrock
42.	<i>Panicum dichotomiflorum</i> Michx	Bon	Fall panicgrass
43.	<i>Panicum maximum</i> Jacq.	Bon	Guinea grass
44.	<i>Parietaria officinalis</i> L.	--	Lichwort
45.	<i>Persicaria strigosa</i> (R.Br.) Nakai	--	Spotted knotweed
46.	<i>Phyllanthus niruri</i> L.	Bhui-amlakhi	Bhumi amla
47.	<i>Piper betle</i> L.	Pan	Betel leaf
48.	<i>Pouzolzia zeylanica</i> (L.) Benn.	Borali Bokua	Graceful Pouzolz's Bush
49.	<i>Ruellia angustifolia</i>	Petunia	Wild petunias
50.	<i>Scoparia dulcis</i> L.	Bon-dhonia	Goatweed
51.	<i>Senna occidentalis</i> (L.) Link	Kusum	Coffee Senna
52.	<i>Setaria pumila</i> (Poir.) Roem. & Schult	--	yellow foxtail



53.	<i>Sida acuta</i> Burm. f.	Bor sonborial	Common wirewood
54.	<i>Solanum nigrum</i> L.	Pokmou	Black nightshade
55.	<i>Solanum torvum</i> Sw.	Tita bhekuri	Turkey berry
56.	<i>Typhonium trilobatum</i> (L.) Schott	Samakochu	Bengal Arum
57.	<i>Vernonia cineria</i> (Carl Linnaeus) H. Rob	kuk shim	little ironweed

## Few medicinal plants of Nagaon G.N.D.G. Commerce College campus



*Heliotropium indicum* L.



*Leucospora aspera* (Wild.) Link



*Mimosa pudica* L.



*Ageratum conyzoides* L.



## Green Belt of College campus



**Bottle palm plantation at the College campus**



## Naming the Plant Species





**Part of the garden of the College**



**Students exploring plant diversity**





## Preparing of Vermicompost Unit

**Table2: List of fruit plants of the campus**

SL.NO	SCIENTIFIC NAME	LOCAL NAME	COMMON NAME/ ENGLISH NAME
1.	<i>Carica papaya</i> L.	Amita	Papaya
2.	<i>Cucurbita pepo</i> L.	Rangalao	Pumpkin
3.	<i>Citrus limon</i> (L.) Osbeck	Nemu	Lemon
4.	<i>Cocos nucifera</i> L.	Narikol	Coconut
5.	<i>Mangifera indica</i> L.	Aam	Mango
6.	<i>Musa acuminata</i> Colla	Cheni champa kol	wild banana
7.	<i>Musa paradisiaca</i> L.	Malbhog kol	Banana
8.	<i>Psidium guajava</i> L.	Madhuri Aam	Guava
9.	<i>Punica granatum</i> L.	Dalim	Pomegranate
10.	<i>Solanum lycopersicum</i> L.	Bilahi	Tomato
11.	<i>Ziziphus jujube</i> Mill.	Bogori	Indian Cherry



**Few fruit plants of Nagaon G.N.D.G. Commerce College campus**



***Cocos nucifera* L.**



***Solanum lycopersicum* L.**

***Carica papaya* L.**

**Table3: List of garden plants and indoor plants of the campus**

SL.NO	SCIENTIFIC NAME	LOCAL NAME	COMMON NAME/ ENGLISH NAME
1.	<i>Agave angustifolia</i> Haw.	--	Narrow century plant
2.	<i>Allamanda cathartica</i> L.	Ghanta-phul	Yellow Bell
3.	<i>Araucaria heterophylla</i> (Salisb.) Franco	--	Christmas living tree
4.	<i>Begonia sierra</i> L.	Begonia	Begonia
5.	<i>Caladium bicolor</i> (Aiton) Vent.	Futuki Kochu	Heart of Jesus
6.	<i>Carex siderosticta</i> Hance	--	leaf sedge
7.	<i>Catharanthus roseus</i> (L.) G. Don	Nayantara	Rosy Periwinkle
8.	<i>Cestrum nocturnum</i> L.	Hasnahana	Night jasmine
9.	<i>Chlorophytum laxum</i> R. Br.	--	spider plant
10.	<i>Codiaeum variegatum</i> (L.) A. Juss.	Pat bahar	Garden croton
11.	<i>Cordyline fruticosa</i> (L.) A. Chev.	--	Ti-plant
12.	<i>Cycas</i> sp	Cycas	Cycas
13.	<i>Dracaena trifasciata</i> (Prain) Mabb.	--	Snake plant
14.	<i>Dypsis lutescens</i> (H. Wendl.) Beentje	Momai-Tamul	Areca palm
15.	<i>Epipremnum aureum</i> G.S. Bunting.	--	Money plant
16.	<i>Gerbera jamesonii</i> Bolus ex Hooker f.	Daisy ful	Barberton daisy
17.	<i>Hibiscus rosa-sinensis</i> L.	Jaba	china rose (peach)
18.	<i>Hydrangea macrophylla</i> (Thunb.) Seringe	--	Big leaf hydrangea
19.	<i>Hyophorbe lagenicaulis</i> (L.H. Bailey) H. E. Moore	--	Bottle palm
20.	<i>Ixora coccinea</i> L.	Ranga Rangan	Scarlet jungle flame
21.	<i>Mesua ferrea</i> L.	Nahor	Ceylon ironwood
22.	<i>Mussaenda philippica</i> A. Rich.	Mithai phul	Mussaenda
23.	<i>Nephrolipsis obliterated</i> (R.Br.) J. Sm.	--	Kimberley Queen fern
24.	<i>Nerium oleander</i> L.	Korobi(Pink)	oleander
25.	<i>Pilea cadierei</i> Gagnep. & Guillaumin.	--	Aluminum plant

26.	<i>Polyathia longifolium</i> Sonn. B. Xue & R.M.K. Saunders	Debadaru	Indian mast tree
27.	<i>Saribus rotundifolius</i> (Lam.) Blume	--	Fan palm
28.	<i>Syngonium podophyllum</i> Schott	--	American evergreen
29.	<i>Tabernamontana divaricata</i> R.Br. ex Roem. & Schult.	Kathana	Crape jasmine
30.	<i>Thuja orientalis</i> L.	Thuja	Thuja
31.	<i>Tradescantia spathacea</i> Sw.	--	Boat lily, oyster plant

**Table4: List of fauna in the G.N.D.G. Commerce College campus**

Sl. No.	SCIENTIFIC NAME	LOCAL NAME	COMMON NAME/ ENGLISH NAME
1.	<i>Pieris canidia</i>	Pokhila	Asian Cabbage-white butterfly
2.	<i>Gandaca harina</i>	--	Tree-Yellow Butterfly
3.	<i>Duttaphrynus melanostictus</i>	Bhekuli	Common Indian Toad
4.	<i>Pheretima posthuma</i>	Kesu	Earthworm
5.	<i>Cryptozona bistrialis</i>	Kunjelekua	Snail
6.	<i>Achatina fulica</i>	Shamuk	Giant African Snail
7.	<i>Scirus caroliniensis</i>	Kerketuwa	Squirrel
8.	<i>Vespa affinis</i>	Kodu	Hornet
9.	<i>Myrmecaria brunnea</i>	Kola poruwa	Weaver ant
10.	<i>Isopteran spp.</i>	Ui poruwa	Termite
11.	<i>Lasius niger</i>	Porwa	Common black ant
12.	<i>Mantis religiosa</i>	Foring	Praying mantis



Sl. No.	SCIENTIFIC NAME	LOCAL NAME	COMMON NAME/ ENGLISH NAME
13.	<i>Zenaida macroura</i>	Kopou	Mourning Dove
14.	<i>Acridotheres tristis</i>	Shalika	Indian myna
15.	<i>Ardea alba modesta</i>	Bogoli	Egret
16.	<i>Narceus americanus</i>	Kereluwa	Millipede
17.	<i>Xenochrophis piscator</i>	Dhura Xap	Checkered Keelback



**Termite mounds**



**Egrets**



**Checkered keelback**

## **Water management**

The major sources of water in the college campus are ground water produced by bore wells and stored in reservoirs. Water is mainly used for drinking, conducting practical in the laboratories, bathroom, toilet, gardening and cooking in hostel and canteen. Aqua-guards have been installed for drinking purposes in different locations throughout the entire college. A large cooler cum filter is installed for common use, especially for students.

### **Rain Water Harvesting**

All living things including plants, animals and human being need water to live and to carry out different kinds activities. It is hard to imagine a day without water. We use water for different kinds of day to day activities such as cleaning, washing, bathing, cooking, drinking, gardening and other domestic and industrial use.

Water is precious, essential and an abiotic component of the ecosystem. Today we all are heading toward to scarcity of water. This is mainly become of the lack of water conservation and pollution of water bodies. So let us not waste water and start conserving water for further use.

There are different kinds methods used for conserving water. One such method is rain water harvesting. Rain water harvesting is the simple process used to conserve rainwater by collecting, storing, purifying of rain water that runs off from rooftop, roads, open ground etc. for later use.

It is a process of accumulation and storage of rainwater for reuse rather than allowing it to run off.

Rain water harvesting is a method of collecting rainwater for further use on reuse before it reaches the ground. Generally rainwater is collected from the rooftop through pipe and stored in over ground tank or underground storing structure.

The water collected from rain water harvesting system shall be used as a secondary source of water and will be used for all other purposes like gardening, cleaning, washing hands etc. which does not require drinking water quality.



In Nagaon G.N.D.G. Commerce College, we have rain water harvesting unit where the rain water coming from roof tops are collected through pipe in a tank of 1000 Litres and used for gardening and other uses.



**Rain water Harvesting**



**Cold water unit**



**Drinking water station**

## **DRINKING WATER SUPPLY**

Nagaon G.N.D.G. Commerce College has well equipped drinking water facilities. The aqua Guard has been installed in all the Departs of the College including Office, Teachers Common Room, Boys Common Room, Girls Common Room, Boys and Girls Hostel etc for drinking purpose of students, teachers and those visit the College.

### **The water installations available in the college are -**

Water cooler with drinking water filtration facility

Urinals and toilets

Bathrooms

Water taps in teachers common room, Boys and Girls common room, canteen etc.

Water taps in laboratories

### **Water consumption**

Quantity of water pumped – 15 K. litr./day

Number of water tanks for water storage (College & Hostel campus) -08

Amount of water stored – 15000 L Water audit observations

### **The reasons of water wastage**

Water taps left open after use.

Leakages from taps

Over use of water.

### **Recommendations**

Leakage in tapes to be repaired.

Establishment rain water harvesting system

Awareness programme on water conservation

## Report of water for drinking

Water Samples was collected from two different sites of the College and the Report is attached herewith. The Test was carried out by District Level Laboratory, PHED Nagaon, Office of the Executive Engineer (PHE), NAGAON, ASSAM. The report is attached herewith.

**District Level Laboratory, PHED NAGAON  
Office of the Executive Engineer(PHE),NAGAON**

**Test Report**

Test Report No. PHED/S/31855	Test Report Issue Date: 25/06/2024
Customer Name & Address: NAGAON GNDG COMMERCE COLLEGE	
Customer Contact No: NA	Sample Received Date: 24/06/2024
Test Start Date: 24/06/2024	Test Complete Date: 25/06/2024
<b>Sample Details Furnished by Customer</b>	
Source: COLLEGE WATER	Sample Container: WATER BOTTLE
Location: NAGAON	Sample Quantity: 1000 mL
Sample Collected By: NA	Sample Collected at Source Date: 24/06/2024

Sr. #	Parameter	Method Used	Results	IS 10500:2012 (Second Revision)		Unit
				Desirable limit	Max. Permissible limit (in absence better alternate source)	
1.	pH	IS: 3025: Part 11 @ 25 °C	6.97	6.5 – 8.5	6.5-8.5	pH Units
2.	Total Dissolved Solids	IS: 3025: Part 16	136	500	2000	mg/L
3.	Turbidity	IS: 3025: Part 10		1	5	NTU
4.	Iron	APHA 3500- Fe B	0.12	0.3	1	mg/L
5.	Chloride	IS: 3025: Part 32	62.38	250	1000	mg/L
6.	Total Hardness	IS: 3025: Part 21	142	200	600	mg/L
7.	Total Alkalinity	IS: 3025: Part 23	164	200	600	mg/L
8.	Fluoride	IS: 3025: Part 60	0.07	1.0	1.5	mg/L
9.	Residual Chlorine		NA	0.2	1	mg/L
10.	Arsenic	IS 3025: Part 37		0.01	0.05	mg/L
11.	Colour	IS: 3025: Part 4	5	5	15	HU
12.	Odour	IS: 3025: Part 5	Agreeable	Agreeable	Agreeable	
13.	Taste	IS: 3025: Part 8	Agreeable	Agreeable	Agreeable	
14.	Calcium	IS: 3025: Part 40	38.24	75	200	mg/L
15.	Magnesium	APHA 3500- Mg B	18.86	30	100	mg/L
16.	Bacteria		NEGATIVE	0	0	MPN/100ml

Opinion: The parameter tested at Sr. No. 16 in this test report does not meet the requirement of IS 10500:2012.

OR

Opinion: The parameters tested from Sr. No PHED/WSS/001 in this test report individually meet the requirement of IS 10500:2012. THE SOURCE IS SAFE.

**Notes:**

NA: Not Available, BDL: Below Detection Level, NT: Not Tested

• The results given above are related only to the sample as received and tested in this laboratory.

• Reliability of sample lies with the sender.


• The test report cannot be regenerated/re-produced in whole or in part without written permission of Laboratory.

• The test report cannot be used for any public city or any legal purpose.

• The test samples meant for chemical analysis will not be retained more than 15 days from the date of issue of test report

--- End of Report ---

Sample Tested by:

  
NAME: Ritwik Kashyap  
Authorized Signatory  
Quality Manager  
DLL, PHED Nagaon

  
Asstt. Executive Engineer (PHE)  
Nagaon Sub Division, Nagaon



## Waste management

The solid waste generated in the campus is segregated at source by providing separate dustbins for biodegradable and non-biodegradable. The college has a tie up with Nagaon Municipal Corporation (NMC) for disposal of waste generated. The waste generated by newspapers, magazines, cartoons and examination oriented waste are reused as possible and stored in the proper places. The plastic waste generated in the campus is regularly put in the 'plastic tank'. Metal waste, concrete waste and wooden waste are stored and given to scrap agents for further processing. Kitchen waste of hostel are dumped in pits and used as fertilizer.

We are in dire need of sustainable alternatives to dispose sanitary napkins in India. In an effort promote proper disposal of menstrual waste and promote the Swachh Bharat Mission, Sanitary pad vending machines and eco-friendly incinerators were installed in Girls' hostel of our college.

The electronic wastes like obsolete computer, laptops, monitors, compact discs, printers, scanners, calculators etc are repaired and reused and those irreparable are sold out. The college try to reduce the volume of e-waste by upgrading the software at the right time and period checking of electronic items.



**Eco-friendly Incinerators and Sanitary pad vending Machine at girls' hostel of the college campus**

## Environment friendly practices

### Tree plantation programme

The college undertakes tree plantation programmes every year on various occasions like Environment Day, Teachers day etc. The plantation programme includes plantation of various types of air purifying plants (like Neem), economically important plants, ornamental, fruit plants and medicinal plant species. The NSS unit of the college conducted tree plantation programme at our adopted village, Karaiani time to time. This activity is done particularly during the rainy season of the year. These types of programme help to maintain a green environment and helps in the conservation of biodiversity of the college in particular and the surrounding area.



### Tree plantation drive at college adopted village



### Tree Plantation Programme by Alumni Association





## Plantation and a lecturer programme on “Algae: a solution to restore land, halt desertification and combat drought” at the college on 5th June, 2024

### Encouraged to “reuse, refill, replenish”

The college has been trying to make it plastic free campus by creating awareness regarding the same among the students and staff members by displaying boards and other programmes. Another practice of the college is the use of reusable utensils which help in keeping the campus plastic free. Students were encouraged to incorporate reusable bottles use as well as other sustainable practices into their lives, such as using their own reusable service-ware for takeout and using reusable bags instead of disposable plastic or paper.



## Distributing some Bags made of old News Paper on “World Plastic Free Week”



## 7 Days Special NSS Camp, Nagaon G.N.D.G. Commerce College, NSS Unit

Nagaon G.N.D.G. Commerce College NSS Unit organized a 7 days Special Camp on 25<sup>th</sup> May to 31<sup>st</sup> May, 2024 at College adopted village Palashani. In 7 days Special Programme, NSS unit covers different types of activities in 649 No. L.P. Schools situated in the adopted villages. During this 7 days Programme, NSS volunteers conducted cleanliness and plantation drive, classes taken on literacy, numeracy and also organized art competition, quiz and dance among the students and making woollen items among the women of the village. The NSS unit provides certificate and other gift to the students who secured 1<sup>st</sup>, 2<sup>nd</sup> and 3<sup>rd</sup> position in art competition and distribute proficiency. We the NSS unit of Nagaon G.N.D.G. Commerce College successfully concluded these 7 days Special Camp in our College adopted village.



### Cleanliness programme at college adopted village

## Plantation Programme under Amrit Brikshya Andolan at Nagaon G.N.D.G. Commerce College

Nagaon G.N.D.G. Commerce College drive a plantation programme at college campus under **Amrit Brikshya Andolan**, Government of Assam on 17<sup>th</sup> September, 2023 with the participation of NSS Unit of Nagaon G.N.D.G. Commerce College.



## Vermicompost Unit







## Faculties of different Departments purchasing Vermicompost packets

### Digital Biodiversity Register:

Preparation of Institutional Digital Biodiversity Register along with Students already initiated on 5<sup>th</sup> June'2022 by identifying species and keeping their uses in different fields. With a hope to give information and take benefit by the college staff, students and for common people.



## Display board for plastic free campus

### **Eco-friendly rules in the campus-**

- ❖ Turn off everything
- ❖ Using LED light bulbs
- ❖ Reduce, reuse, recycle
- ❖ Water-usage control
- ❖ Wash cups and plates, don't use disposable paper or plastic utensils
- ❖ Walk, bike and use public transport instead of a car
- ❖ Using electronics instead of paper

### **Suggestions and Recommendation**

1. The college should maintain the existing green cover and increase if possible through the creation of botanical garden and other such measures.
2. The college should emphasize on the regular monitoring of air quality and ambient noise level within the campus.
3. Proposal for NO HORN ZONE at the college campus
4. Colour coded bins should be placed around the campus for segregating the biodegradable and non-biodegradable waste.
5. More environment awareness posters should be displayed in the different places around the college campus.