Y.A GOVERNMENT COLLEGE FOR WOMEN, CHIRALA

GREEN AUDIT

2017-22

CONTENTS

AUDIT TEAM

1. Dr. CH.RAMANAMMA	: Principal
2.Dr.S.RAJA SHEKAR REDDY	: Coordinator,IQAC
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4. M.Jyothi	: Lecturer in Zoology

CHAPTER–I INTRODUCTION

Y.A Government College for Women was established in 1966 in Chirala of Prakasam district of Andhra Pradesh. The college is named after Smt. Yarlagadda Annapurnamba of Karamchedu village for her munificent donations. This is a Government institution meant exclusively for women. It Was included under UGC 2(f) and 12B in 1972. It was affiliated to Andhra University, Visakhapatnam in the beginning and later on changed to Acharya Nagarjuna University, Guntur. The college is situated in an area of 5 acres land.

Chirala town is also known as Kshirapuri which translates as sea looks as white as milk. The name got transformed to Chirala, where Chirala means Sari. It is also known as "SMALL BOMBAY" or "MINI MUMBAI" of South India, where textiles and handlooms are famous till date. It is also one of the main producers of Cashew Nuts in different varieties and exported across the world. It is also famous tourist spot for beach resorts.

Clean and healthy environment is one of the desired pre-requisites in any educational institution. To fulfill this, our institution emphasizes on adopting good green practices and creates environment awareness amongst all its stakeholders. Active participation of stakeholders facilitates this process of making campus eco-friendly. The strategies used to make campus eco-friendly are maintaining clean and green campus. Swachhta Action plan is implemented. conducting Swachhta and plantation programmes regularly for making the campus clean and green and adopting healthy energy conservation practices, effective waste management, waste water treatment and further various green practices are rain water harvesting, solar power, solid and liquid waste management, composting, organic farming etc. Further college has active Eco club, youth red cross unit, NSS,NCC Units which conducts various activities to increase awareness amongst students such as awareness rallies, different competitions. The college has adopted the swachhta action plan from 2021. Further academic activities such as study tours/ visits to biodiversity places, camps, cleaning of campus and the nearby villages on different occasion and projects are also arranged in accordance to imply Green policy. The institution has been recognized for its Green initiative and awarded **twice** as one **District ONE Green champion award** by **MGNCRE, Ministry of Higher education, GOI.**

Campus Audit aims to address the need for more comprehensive and focused Education Training and Holistic Development of an institution. In the world of advanced researches and globalization an audit programme of the institution provides knowledge about the detailed

working of the various campus entities and the scope for betterment in areas of education and environmental action programmes. Floristic characteristics and biodiversity patterns are often influenced by environmental factors and anthropogenic disturbances (Hong, 1999; Liu et al., 2009). Conservation of biodiversity is essential for the proper functioning of ecosystems and for the maintenance of the environmental services they provide (Lopez-del-Toro et al., 2010)

Total area of the campus is 5 acres. Audit of plants was conducted in the college campus and information gathered was recorded by the botany and zoology students and faculty. In the main entrance, there are syzigium on either side**an oldest and biggest tree of Banyan at the canteen** which is since the inception of the college gives additional value and prettiness to the campus. All buildings and blocks are surrounded by different types of trees and ornamental plants.

The objectives of Green Audit are:

- To fulfill the Institution's responsibility towards reducing carbon footprint and contribute to environmental protection.
- To promote Environmental Consciousness and Responsibility among students.
- To implement green practices consistently and effectively towards creating a sustainable campus.
- To monitor and evaluate the Green practices , towards building a sustainable campus
- To generate innovative green practices, promoting the spirit of eco-innovation among students.

Initiatives of Green audit committee

- Under the monitoring of Dept of Botany and swachhta action plan , Green Audit Committee helps to keep the environment on the campus pollution free ,neat clean & Green
- The committee comprises of teachers and students who work hand in hand to take care of the green practices in the campus.
- The whole campus is divided in to small areas, each area is looked after by a teacher in charge and ward with 15-20 student volunteers
- The teachers and volunteers actively participate in the plantation and maintenance of the areas.

- Systematic disposal of the garbage is regularly carried out by classifying them in to biodegradable and non-degradable components.

Objectives set by the institute to go green are

1. Implement term "Go green" – Making the campus green in every possible way and foster environmental literacy.

2. To identify and implement opportunities to save energy.

3. Encourage everybody to avoid pollution and to see that proper steps are being taken to control or to prevent pollution

4. To reduce solid and liquid waste and adopt green methods to dispose waste and monitor the processes.

5. Health and safety practices.

6. Minimize human exposure to risks from environmental health and safety problems

7. The institution encourages to adopt Green culture and contributes for resource conservation

In order to achieve the above objectives following action plan is prepared and activities are continuously monitored.

Main activities taken up by the college to sustain green performance are:

The college has started Botanical Garden in the campus in the year 2015. Cultivation of fruit trees, medicinal and aromatic plants and Organic vegetable farm garden are also properly maintained in the campus. Cultivation of in a 30cent area of the

As part of routine Green Practices the Botany department , and swachhta action plan committees and Eco club and Youth Red Cross, NSS, and NCC Volunteers conduct Vanam manam plantation and programmes to increase the greenery in the campus Every year college conducts VANAM MANAM and *vanamahotsav* plantation in the last week of July and continues every month and also on important days like World Environment Day, World forest day , Water Day and Ozone Day etc which are observed in the college to

focus and provide awareness to the students about the importance of the environment, its conservation and sustainable use of environmental resources.

Curriculum included with Environmental studies as subject at second year for all undergraduate students

- Plantation and tree nurturing in campus
- Rain water harvesting system
- Solar panel units
- Observation of environmental nature awareness days and events through ECO club · Architectural design for natural ventilation and more natural light .
- Use of energy efficient devices.
- Display boards to aware stakeholders to avoid wastage of water and energy.
- Checking the switching off electrical equipments before leaving the campus by student representatives.
- Use of minimum prints with utilization both sides of paper, reusing the one sided print papers.
- Disposal of solid and E waste through transfer to authorized agencies for recycling through write off.
- Organic & vermin-composting.
- Use of recycled waste water for gardens and trees.
- Promotion of eco friendly campus and avoid litter.

CHAPTER–I PRE AUDIT

Introduction on green auditing

Green auditing is an independent assessment conducted to evaluate an educational institution's environmental performance, resource utilization, and compliance with environmental regulations. It includes the systematic identification, quantification, recording, reporting and analysis of components of environmental diversity. It was initiated with the motive of inspecting the work conducted within the organizations whose exercises can cause risk to the health of inhabitants and the environment. By conducting the Green Audit, one gets a direction as how to improve the condition of environment.

Pre-auditing report:

A pre-audit meeting was held on 04.02.2021 in our college campus. The committee is decided to audit different areas like water management, energy management, waste management in our college campus. Our principal has shown great interest and dedication towards green auditing during the pre-audit meeting. She encouraged all green activities such as awareness programmes on waste management, clean and green campus and planting more trees on the campus etc. Institution has set some policies on eco-friendly environment. College administration is vital to the process of realizing campus sustainability and college policy is an essential instrument for any substantial change in the campus environment.

Areas of green auditing:

Our institution is eco-friendly and rich in biodiversity. The Department of Botany is maintaining Botanical Garden and green campus premises. In the Botanical garden, we have grown medicinal plants, flowering plants and gymnosperms for botanical studies as a part of academics. Rest of the campus is fully covered with other flora and fauna.

Methodology:

- Green auditing was conducted during August 2021 by our committee with the help of teaching , non-teaching and NSS students.
- For our study convenience the entire college was divided into 7 blocks.

Division of campus in to Blocks for maintenance of Gardens	
I Block	Botanical Garden maintained by Botany Department.It is divided in to 3 sub blocks a. Ornamental Garden b. Medicinal Garden c. Horticulture Garden and YRC
II Block	NCC Parade ground maintained by NCC
III Block	Beside Administrative & science block maintained by NSS
IV Block Arts Block	Eden Garden maintained by Dept of Economics
V Block canteen & hostel Block	Maintained by hostel students
VI Block commerce	Block near Canteen and commerce class rooms maintained by hostel students
VII Block	Seminar hall / open air auditorium Alumni Garden

- The college and its premises were visited and analyzed by the audit-team several times to gather information.
- Campus trees were counted and identified; play grounds, library, office rooms and parking grounds were also examined to collect data.

Data collection

Soil sample collection

Organic compost

Y.A GOVT DEGREE COLLEGE FOR WOMEN CHIRALA

Floral diversity of the campus

Total number of plant species identified 128

Total number of plants in the campus nearly

List of plants in the campus

Sl No	Scientific Name	Common/local name	Family	Habitat	Uses	No of Plants
1	Abutilon indica	Duvvenakaya	Malvaceae	Herb	Medicinal	10
2	Acalypha indica	Muripinda	Euphorbiaceae	Herb	Medicinal	Many
3	Achras sapota	Sapota	Sapotaceae	Tree	Edible	2
4	Adenium obesum	Desert rose	Apocynaceae	shrub	Ornamental	5
5	Aerva lanata	Kondapindaku	Amaranthaceae	Herb	Medicinal	Many
6	Aglonema commutatum	chineese evergreen	Araceae	shrub	Ornamental	4
7	Allamanda cathartica	Golden trump	Apocynaceae	climbing shrub	Ornamental	5
8	Abelmoschus esculentum	Benda	Malvaceae	shrub	Edible	3
9	Ananas comosum	Pine apple	Bromeliaceae	shrub	Edible	1
10	Annona muricata	Lakshman phal	Annonaceae	Tree	Edible	1
11	Annona reticulata	Rama phal	Annonaceae	Tree	Edible	1
12	Annosa squamosa	Sithaphal	Annonaceae	Tree	Edible	12
13	Asparagus recemosus	Shatavari	Liliaceae	Herb	Medicinal	2
14	Achyranthus aspera	Uttareni	Amaranthaceae	Herb	Medicinal	Many
15	Adhatoda vasica	Addasaramu/vasaka	Acanthaceae	shrub	Medicinal	4
16	Aegle marmelos	Maredu chettu	Rutaceae	Tree	Medicinal	4
17	Albezzia lebbeck	Nidra ganneru	Mimosaceae	Tree	Medicinal	12
18	Aloe vera	Kalabandha	Liliaceae	Herb	Medicinal	15
19	Azadiracta indica	Vepa chettu	Maliaceae	Tree	Medicinal	42
20	Bambusa indica	Veduru	Poaceae	shrub	Timber	1
21	Boerhaavia diffusa	Atikamamidi	Bignoniaceae	Herb	Medicinal	Many
22	Bryophyllum pinnatum	Ranapala	Malvaceae	Herb	Medicinal	2
23	Cucumis sativum	Dosakaya	Cucurbitaceae	creeper	Edible	5
24	Caesalpinia pulcherrima	Peacock flower	Fabaceae	shrub	Avenue	10
25	Calotropis gigantia	Jilledu	Asclipediaceae	shrub	Medicinal	5

26	Canna indica	Metta tamara	Cannanaceae	shrub withRhizome	Wild	33
27	Cardiospermum halicacabum	Budda kakara	Sapindaceae	creeper	Wild	4
28	Carica papaya	Papaya	Caricaceae	tree	Edible fruit	18
29	Carissa carandas	Vakkaya	Apocynaceae	tree	Edible	1
30	Casuarina equisetifolia	Sarivi	Casuarinaceae	tree	Timber	2
31	Catharanthus alba	Tella Billaganneru	Apocynaceae	shrub	Medicinal	5
32	Catharanthus roseus	Erra Billaganneru	Apocynaceae	Shrub	Medicinal	10
33	Cissus quandrangularis	Nalleru	Crassulaceae	creeper	Medicinal	1
34	Citrus limon	Lemon	Rutaceae	grass	Edible	4
35	Cleome viscosa	Kukkavaminta	Capparidaceae	Herb	wild	Many
36	Clitoria ternatea	Sankupushpum	Fabaceae	creeper	Medicinal	3
37	Coccinia grandis	Dondakaya	Cucurbitaceae	creeper	Edible	2
38	Cocus nicifera	Coconut	Poaceae	tree	Edible	30
39	Codiaeum variegatum	Multicolour croton	Euphorbiaceae	shrub	Ornamental	Many
40	Coleus amboinicus	Vamaku	Lamiaceae	Herb	Medicinal	55
41	Commilina bengalensis	Nirukassuvu	Commelinaceae	grass	Weed	Many
42	Costus speciosus	Crape ginger/insulin plant	Costaceae	Herb	Medicinal	1
43	Couroupita guianesis	Nagalingam	Lecythidaceae	Tree	Medicinal	2
44	Crinum asiaticum	chengalva	Amaryllidaceae	shrub	Ornamental	2
45	Curcuma longa	Pasupu	Zingeberaceae	shrub withRhizome	Medicinal	3
46	Cycas revoluta	Japanese sago palm	Cycadaceae	Tree	Ornamental	1
47	Cymbopogan citratus	Lemon grass	Poaceae	grass	Medicinal	2
48	Cynodon dactylon	Garika	Poaceae		Weed	Many
49	Datura metal	Ummetta	Solanaceae	shrub	Medicinal	6
50	Delonix regia	Gulmohar	Fabaceae	Tree	Ornamental	Many
51	Dracaena coloroma	Female dragon	Liliaceae	small tree	Ornamental	4
52	Dracaena reflexa	Song of india	Liliaceae	small tree	Ornamental	7
53	Dypsis lutescens	Areca palm	Arecaceae	tree	Ornamental	109

54	Dieffenbachia	Dumb cane	Araceae	shrub	Avenue	3
55	Eclipta alba	Guntakalagara aku	Asteraceae	Herb	Medicinal	Many
56	Epipremnum aureum	Money plant	Araceae	climber	Ornamental	3
57	Euphorbia hirta	Pachabotlu	Euphorbiaceae	Herb	Medicinal	Many
58	Euphorbia tirucalli	Pullala jamudu	Euphorbiaceae	shrub	Medicinal	5
59	Ficus hispida	Medi chettu	Moraceae	Tree	Medicinal	1
60	Ficus benghalensis	Banyan/marri chettu	Moraceae	Tree	Medicinal	3
61	Ficus religiosa	Raavi chettu	Moraceae	Tree	Medicinal	3
62	Ficus recemosa	Atti chettu	Rutaceae	Tree	Medicinal	1
63	Gynandrropsis pentaphylla	Kukka vaminta	Capparidaceae	herb	Wild	Many
64	Hibiscus micranthus	Nityamalli	Malavceae	shrub	Medicinal	5
65	Hibiscus rosa sinensis	Mandaram	Malvaceae	shrub	Ornamental	29
66	Hibiscus sabdariffa	erragomgura	Malvaceae	shrub	Ornamental	12
67	Hibiscus schizopetalous	spider hibiscus	Malvaceae	shrub	Ornamental	1
68	Howea forsteriana	Kentia palm	Malvaceae	shrub	Ornamental	
69	Indigofera arrecta	Neelimandu	Fabaceae	shrub	Medicinal	15
70	Ixora indica	Nooruvarahalu	Rubiaceae	shrub	Ornamental	34
71	Jasminum sambac	Gundu malli	Oleaceae	shrub	Ornamental	1
72	Jatropha gossypiifolia	Nepaalam	Euphorbiaceae	small tree	Medicinal	9
73	Lantana camara	Akshintala poolu	Verbenaceae	shrub	Ornamental	Many
74	Lawsonia inermis	Gorintaku	Lythraceae	shrub	Medicinal	12
75	Leucaena leucocephala	Subabul	Fabaceae	tree	Fodder	10
76	Leucas aspera	Tummi	Lamiaceae	Herb	Medicinal	many
77	Mangifera indica	Mango tree	Anacardiaceae	tree	Edible	39
78	Moringa oleifera	Munaga chettu	Moringaceae	tree	Edible	1
79	Muraya koengii	Curry leaves	Rutaceae	Tree	Medicinal	19
80	Musa paradaisica	Banana	Musaceae	tree	Edible	2
81	Nerium oleander	Nerium	Apocynaceae	tree	Ornamental	8
82	Nyctanthes arbor-tristis	Paarijatham	Oleaceae	tree	Ornamental	2
83	Ocimum canum	Kukka tulasi	Lamiaceae	shrub	Medicinal	5
84	Ocimum kilmands charicum	Karpura tulasi	Lamiaceae	shrub	Medicinal	1
85	Ocimum sanctum	Rama Tulasi	Lamiaceae	shrub	Medicinal	5
86	Ocimum tenuiflorum	krishna tulasi	Lamiaceae	shrub	Medicinal	10

87	Oldenlandia corymbosa	Vennela vemu	Rubiaceae	Herb	Medicinal	Many
88	Operculina turpethum	Erra tegada/nalla tegada	Convolvulaceae	climber	Medicinal	4
89	Parthenium hysterophorus	Vayyaribhama	Asteraceae	herb	Weed	Many
90	Phyllanthus acidus	Pedda usirika	Euphorbiaceae	tree	Medicinal	1
91	Phyllanthus amarus	Nela usiri	Euphorbiaceae	Herb	Medicinal	Many
92	Phyllanthus emblica	Amla/indian goseberry/vusiri	Euphorbiaceae	tree	Medicinal	6
93	Phyllanthus niruri	Nelavusiri	Euphorbiaceae	Herb	Medicinal	Many
94	Plectranthus ambomicus	Vaamaku	Lamiaceae	Herb	Medicinal	9
95	Plumaria alba	Temple tree	Apocynaceae	tree	Ornamental	5
96	Plumaria pudica	White frangipani	Apocynaceae	tree	Ornamental	50
97	Plumaria rubra	Red frangipani	Apocynaceae	tree	Ornamental	7
98	Pongamia pinneta	Ganuga chettu	fabaceae	tree	Avenue	29
99	Polyalthia longifolia	Naramaamidi	Annonaceae	tree	Avenue	24
100	Psidium guajava	Guava	Myrtaceae	tree	Edible	37
101	Punica granatrum	Danimma chettu	Punicaceae/Lythraceae	tree	Edible	4
102	Rhapis humilis	Lady palm	Arecaceae	tree	Ornamental	2
103	Rhinacanthus nasutus	Naaga malle	Acanthaceae	shrub	Medicinal	1
104	Rhoeo spathacea	Purple leaved spider wort	Commelinaceae	herb	Ornamental	Many
105	Ricinus communis	Aamudamu chettu	Euphorbiaceae	small tree	Medicinal	5
106	Rosa indica	Roja	Rosaceae	Shrub	Ornamental	20
107	Sansevieria roxburghiana	Chaga	Agavaceae	shrub	Medicinal	10
108	Selenicereus undatus	Dragon fruit	Cactaceae	climber	Edible	4
109	Sida acuta	Chilakathotakura	Malvaceae	herb	Medicinal	Many
110	Sida cordifolia	Chirubenda	Malvaceae	herb	Medicinal	Many
111	Sida rhombifolia	Arrow leaf sida	Malavceae	herb	Medicinal	Many
112	Solanum melongena	Vankaya	Solanaceae	shrub	Edible	3
113	Solanum nigrum	Kamanchi	Solanaceae	herb	Medicinal	Many
114	Syzygium cumini	Jamun tree/neredu	Myrtaceae	tree	Medicinal/timber	3
115	Tabernarmontana divaricatum	Nandivardanam	Apocynaceae	shrub	Ornamental	6

116	Tagetus patula	Marigold	Asteraceae	herb	Medicinal	20
117	Tecoma stans	Suvarna ganneru	Bignoniaceae	tree	Ornamental	5
118	Tectona grandis	Teak	Verbinaceae	tree	Timber	5
119	Terminalia catappa	Almond	Combretaceae	tree	Medicinal	2
120	Thespesia populnea	Ganga ravi	Malvaceae	tree	Avenue	4
121	Thuja occidentalis	Tarbor vitae	Cupressaceae	shrub	Ornamental	4
122	Tradescantia spathacea	Spider wort	Commelinaceae	herb	Ornamental	Many
123	Theriophonum infastum	Tuber	Araceae	creeper	Medicinal	4
124	Tinospora cardifolia	Tippa teega	Menispermaceae	creeper	Medicinal	10
125	Tridax procumbens	Gaddi chamanthi	Asteraceae	herb	Medicinal	Many
126	Vitex negundo	Vaavili	Verbenaceae	tree	Medicinal	2
127	Vernonia cinerea	Garuda kammi	Asteraceae	herb	Wild	Many
128	Zizipus jujuba	Regu/chinese date	Rhamnaceae	tree	Edible	3
						979

CHAPTER-III: ONSITE AUDIT OBSERVATIONS AND RECOMMENDATIONS

Auditing of Water management:

The Water Management program is to harvest and store rainwater for direct use, and/or replenish groundwater by building and restoring infrastructure. It supports revival of traditional water bodies, construction of water storage infrastructure, and safe disposal of wastewater. It promotes safe drinking water for all with innovative low-cost, sustainable technologies.

Our students and staff follow the best practice "SAVE WATER-SAVE LIFE". Auditing of water management is an onsite survey which includes water sources, water consumption, irrigation, storm water, appliances and fixtures, and assessment to determine the water use and hence improving the efficiency of its use.

Observations

✓ The study observed that, Bore well and municipal running water are the two major sources of water.

✓ Water is used for drinking purpose, toilets, laboratory and gardening.

✓ The students and staff use sufficient quantity of water and turn off taps immediately.

✓ we have a drinking water point, water points for hand wash and cleaning lunch boxes

✓ Utmost care is taken to flow water through pipes and reach terminal points to fulfil our basic needs without any leakage

✓ Waste water is channelled into soak pits to improve ground water level.

✓ The waste water generated by RO Plant is channelized to the plants.

✓ During the survey, no loss of water was observed, neither by any leakages nor by over flow of water from the overhead tanks.

Recommendations:

- Monitor and control of overflow is essential and supervision is essential periodically.
- Recycle of water system is necessary to reuse the waste water if any.
- Minimize wastage of water and use of electricity during water filtration process, if used such as RO filtration process.
- Ensure that all cleaning products used by college staff should be biodegradable and non-toxic.
- Establish water waste and energy management systems.
- Increase the number of water taps and set up recycling of water system

3.3. Auditing of Green Area

Green area auditing includes plants, greenery and sustainability of the campus to ensure that the buildings conform to green standards. This also helps in ensuring that the Environmental Policy is enacted, enforced and reviewed using various environmental awareness programmes.

Observations

The present investigation explored and identified 134 species of plants.Most of the species of plants have medicinal value. Of these very few threatened plant species are present in the campus.A higher proportion of the exotic flora of the college campus is represented by ornamental plants, which include Allamanda cthartica, Asparagus racemosus, Bougainvillea spectabilis, ixora, Catharanthus roseus, Coleus blumei, Delonix regia, Jatropha gossypifolia, Lantana camara, Lawsonia inermis, Plumeria rubra, Hibiscus,Quisqualis indica, Enterolobium saman, and Tecoma stans. These plant species had been planted for the ornamentation of the college campus. Several of the exotics are edible fruit-producing plants of the college campus. These are represented by Annona squamosal, Pisidum guajava, Punica granatum and Ziziphus jujube. Our results are in accordance with Parthipan et al., 2016.

The information of the data reveals that the distribution of plants according to the habitat is as follows

S.no	Types of plants	No .of species
1.	**Herb**	**33**
2.	**Shrub**	**37**
3.	**Tree**	**47**
4.	**Climber/creepers**	**11**
	Total	128

Out of the total **128** species **33** species are herbs, **37** are shrubs , **47** are trees and **11** species creepers and climbers.

S.no	Name of the family	No .of plantspecies
1.	Malvaceae	12
2.	Euphorbiaceae	10
3.	Sapotaceae	01
4.	Apocynaceae	10
5.	Amaranthaceae	02
6.	Araceae	04
7.	Bromeliaceae	01
8.	Annonaceae	04
9.	Liliaceae	04
10.	Acanthaceae	02
11.	Rutaceae	04
12.	Mimosaceae	01
13.	Meliaceae	01

14.	Poaceae	04
15.	Bignoniaceae	02
16.	Cucurbitaceae	01
17.	Fabaceae	07
18.	Asclipediaceae	01
19.	Cannanaceae	01
20.	Sapindaceae	01
21.	Caricaceae	01
22.	Casuarinaceae	01
23.	Crassulaceae	01
24.	Capparidaceae	02
25.	Lamiaceae	08
26.	Commelinaceae	03
27.	Costaceae	01
28.	Lecythidaceae	01
22.	Casuarinaceae	01
23.	Crassulaceae	01
24.	Capparidaceae	02
25.	Lamiaceae	08
26.	Commelinaceae	03
27.	Costaceae	01
28.	Lecythidaceae	01
29.	Amaryllidaceae	01
30.	Zingeberaceae	01
31.	Cycadaceae	01
32.	Solanaceae	03
33.	Arecaceae	02

34.	Asteraceae	05
35.	Moraceae	03
36.	Rubiaceae	01
37.	Oleaceae	02
38.	Verbenaceae	02
39.	Lythraceae	01
40.	Anacardiaceae	01
41.	Moringaceae	01
42.	Musaceae	01
43.	Convolvulaceae	01
44.	Myrtaceae	02
45.	Punicaceae	01
46.	Rosaceae	01
47.	Agavaceae	01
48.	Cactaceae	01
49.	Combretaceae	01
50.	Cupressaceae	01
51.	Menispermaceae	01
52.	Rhamnaceae	01
53.	Verbenaceae	03

The data reveals that the Taxonomical (families) distribution of plants is as follows:

Total families 53 types were identified of which majority are from Malvaceae,Fabaceae ,Apocyanaceae,Euphorbiaceaeand Lamiaceae.

Recommendations

- Planting of trees in every year in the campus
- Improve the vegetable and medicinal plant gardens
- Reviews periodically the list of trees planted in the garden, allot numbers to the trees and keep records. Give scientific names to the trees.
- Promote environmental awareness as a part of course work in various curricular areas, independent research projects, and community service.
- Conduct more awareness of environmental sustainability and takes actions to ensure environmental sustainability.
- College Environmental Committee should take the responsibility for the enactment, enforcement and review of the Environmental Policy.

Auditing of waste management:

Waste production and disposal, plastic waste, paper waste, food waste and recycling comes under auditing of waste management.

Under solid waste management,the used waste paper is stored and handed over to the ITC paper unit for recycling. They, inturn provide us note books which are distributedfreely to the needy students. We have MoU with ITC PAPER BOARDS,Prakasam Dist., in this regard.The fallen dry leaves and rotten fruits and vegetables are dropped in to the Organic manure pit.The manure is used for the plants in the campus.

Water Waste is avoided through proper liquid management. Rain harvesting pits are available, for water conservation. The plants are watered through sprinklers and water wastage is avoided.We have MoU with Sarang technologies in association with MI,Chirala for the purpose of implementing e-waste management.The students collect e-waste materials like unserviceable mobiles, chargers,batteries,data cables, CD's , catridges etc.and handover to the said firm. In return,the students are rewarded with stationary items by the firm.LED bulbs are used for energy saving.

Recommendations

1. Establish an e-waste collection centre
2. More participation of students and teachers in local environmental issues.
3. Conduct seminars and workshops on environmental education.

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Dr. Ch.Ramanamma
M.Sc.,M.Phil.,Ph.D
Principal

Date: .....

Green Audit

Certificate

This is to certify that **Y.A Government College for Women, Chirala** has conducted **"Green Audit"** in August 2021 to assess the green initiative planning, efforts, activities implemented in the college campus like Plantation, Waste Management, Rain water harvesting, Conservation of Energy, Paperless Technology and various Environment Awareness activities. This green Audit also aimed to assess impact of green initiatives for maintenance of the campus eco-friendly.

Place: Chirala

Date: 30-08-2021

Lec in Botany
DEPT. OF BOTANY
GOVT. COLLEGE FOR WOMEN
GUNTUR

External Audit

M SANTOSH KUMARI
LECTURER IN BOTANY
Y.A. GOVT. COLLGE FOR WOMEN
CHIRALA - 523 155

Coordinator

M. Jyothi

Internal Audit

Internal Auditor

IQAC Coordinator

Principal

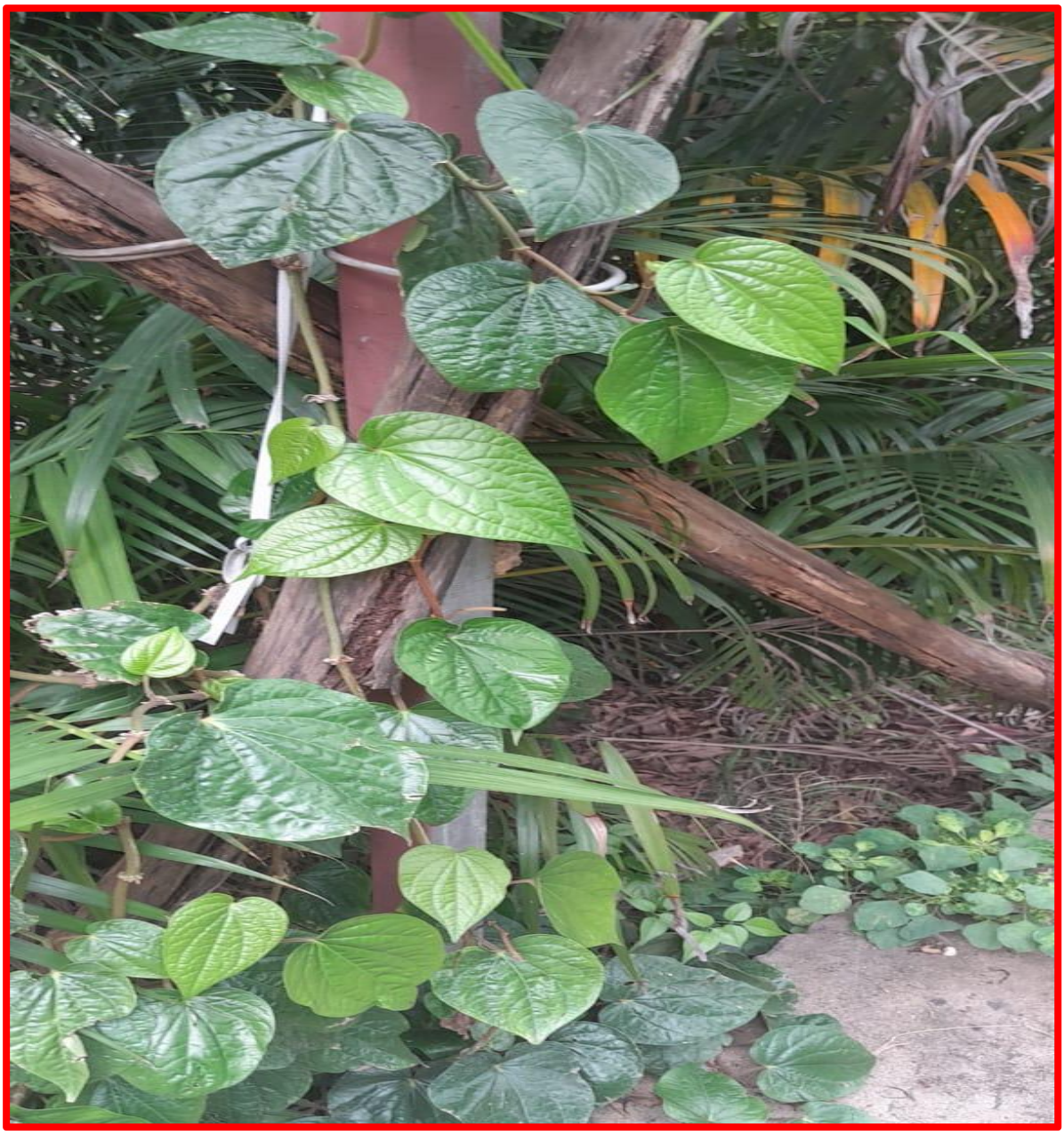
MEDICINAL PLANTS IN OUR INSTITUTE

Elettaria cardomomum

Carissa carandas

Aegle marmelos

Adhatoda vasica



Piper betle

Punica granatum

Emblica officinalis

Phyllanithus acidus

Cinnamomum zylancum

Cinnamomum tamala