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RESEARCH ARTICLE

A Study on the Effectiveness of Visual Communication in Enhancing Plant Awareness and Sustainable Practices

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ABSTRACT

Visual communication is the process of transferring messages through visual elements such as images, graphics, signs and symbols, colours and typography, and video clips for effective communication. It simplifies complex messages, seeks attention, and improves understanding and memory of a heterogeneous audience.(Franconeri et al., 2021) Effective visualization can influence attitudes of consumers, increase their awareness, and boost their behavioural changes. Plant awareness is the understanding of the importance of plants in sustaining life and the need for environmental health. It encourages people to value, protect, and conserve plant resources, which is essential for sustaining life and biodiversity. (Parsley, 2020) Sustainable practices are behaviours that conserve natural resources without compromising the ability of future generations to meet their own. And it is to reduce environmental degradation, promote the responsible use of natural resources for future ecological balance, and conserve biodiversity. (IPCC, 2023; Steffen et al.,)This study on the effectiveness of visual communication in enhancing plant awareness and sustainable practices examines the effectiveness of visual communication in enhancing plant awareness and promoting sustainable practices. The theoretical background of this study is Semiotic Theory and Cultivation Theory to explain how visualization creates meaning and influences the perceptions over time. Data were collected using a structured questionnaire using simple random sampling from the college students and the urban dwellers for this descriptive study. Results were tabulated after the statistical analysis for interpretation.

Keywords: *Environmental Sustainability, Visual Communication, Plant Awareness, Sustainable Practices, Media Influence.*

INTRODUCTION

Environmental sustainability is one of the current issues of this digital era. Ecological equilibrium maintains the balance between living organisms

and their environment, and environmental sustainability ensures the conservation of natural resources. Interaction of the public with nature is decreasing drastically due to rapid urbanization and technological growth, which negatively

impacts our ecosystem, that is, loss of biodiversity. Eventually, ecological equilibrium and environmental sustainability were affected due to the decrease of the interaction of people with nature. Raising awareness of plants and sustainable environmental practices is therefore necessary to create a responsible and ecologically conscious society. In this case, visual communication has a significant impact on public education and attitudes toward environmental protection. Visual communication plays a vital role in the perception of complex information into simple and understandable. (Dunlap & Lowenthal, 2016)

The public can now be successfully informed on environmental themes through posters, images, infographics, and digital media content. Visual cues are swiftly processed by the human brain and can cause emotional responses that encourage behavioural change. Environmental campaigns frequently employ visual media to highlight concerns including sustainable practices, biodiversity conservation, and deforestation. (O'Neill & Smith, 2014)

The aim of this study is to make the public aware of ecological equilibrium, biodiversity and environmental sustainability through visual communication and to prove that the visuals can be used effectively in order to raise awareness of plants and promote sustainable practices like planting trees, reducing waste, and conserving biodiversity.

The need for this study is to investigate how well visual communication could promote eco-friendly behaviour and increase knowledge of plants and to comprehend how students' and urban residents' responses to environmental visual media affect their understanding, perception, and eco-friendly behaviour.

The scope of this study is how visual communication techniques like infographics, social media campaigns, and posters affect respondents' knowledge of plants and sustainable behaviour.

The limitation of this study is, the results of this study cannot be generalised as the primary data were collected only from the District of Trichirappalli.

LITERATURE REVIEW

O'Neill and Smith (2019) examined the role of visual imagery in environmental communication and discovered that images, posters, and infographics are more effective than text in raising public engagement and environmental awareness.

The study emphasizes that repeated exposure to significant visual messages reinforces sustainable behaviour and strengthens environmental concern.

Van der Linden (2020) examined the social-psychological factors influencing climate change risk perception and found that visual communication enhances environmental awareness and encourages sustainable behaviour. The study highlights that repeated exposure to environmental messages increases concern and strengthens intentions to adopt environmentally responsible practices, supporting Cultivation Theory.

Wang, Hsu, and Fang (2021) examined the effect of environmental advertising on pro-environmental behaviour and discovered that visually appealing ads, infographics, and symbolic representations successfully encourage sustainable behaviour and environmental awareness. The study concludes that clear and attractive visual communication is a powerful tool for encouraging eco-friendly behaviour and supporting plant awareness campaigns.

Ardoin, Bowers, and Gaillard (2020) conducted a systematic review on environmental education and found that ecological awareness and knowledge retention are greatly enhanced by visual learning resources like infographics, posters, and environmental photos. The study further emphasizes the value of visual communication in environmental education and plant awareness programs by showing that repeated visual exposure increases sustainable behaviour.

Geiger, Swim, and Fraser (2021) examined psychological responses to environmental communication and found that positive, solution-oriented visual messages are more effective than fear-based imagery in promoting environmental awareness and sustainable behaviour. The study emphasizes that well-designed visual communication enhances engagement, motivation, and long-term commitment to environmental conservation.

Testa, Iraldo, and Vaccari (2020) reviewed the influence of environmental communication on consumer behaviour and found that eco-labels, visual symbols, and green imagery promote sustainable behaviour and increase environmental confidence. The study emphasizes how visual communication may simplify sustainability information and encourage pro-environmental behaviour.

Anderson (2019) examined the significance of digital media in environmental communication and discovered that social media visual content is very successful in raising environmental awareness and capturing young audiences' attention. The study supports the ideas of Cultivation Theory by demonstrating how regular exposure to environmental pictures increases ecological concern and encourages sustainable behaviour.

Feldman and Hart (2018) examined the use of visual communication in conveying environmental risks and found that graphs, charts, and symbolic images improve understanding of ecological issues. The study highlights that clear, simple, and repeated visual messages enhance environmental awareness and positively influence attitudes toward sustainability.

Kim and Stepchenkova (2020) examined the function of digital visual media in fostering environmental involvement and discovered that interactive graphics, social media visuals, and visual storytelling successfully raise environmental awareness and promote sustainable behavior among young adults. The study highlights the value of digital visual communication in supporting plant awareness campaigns.

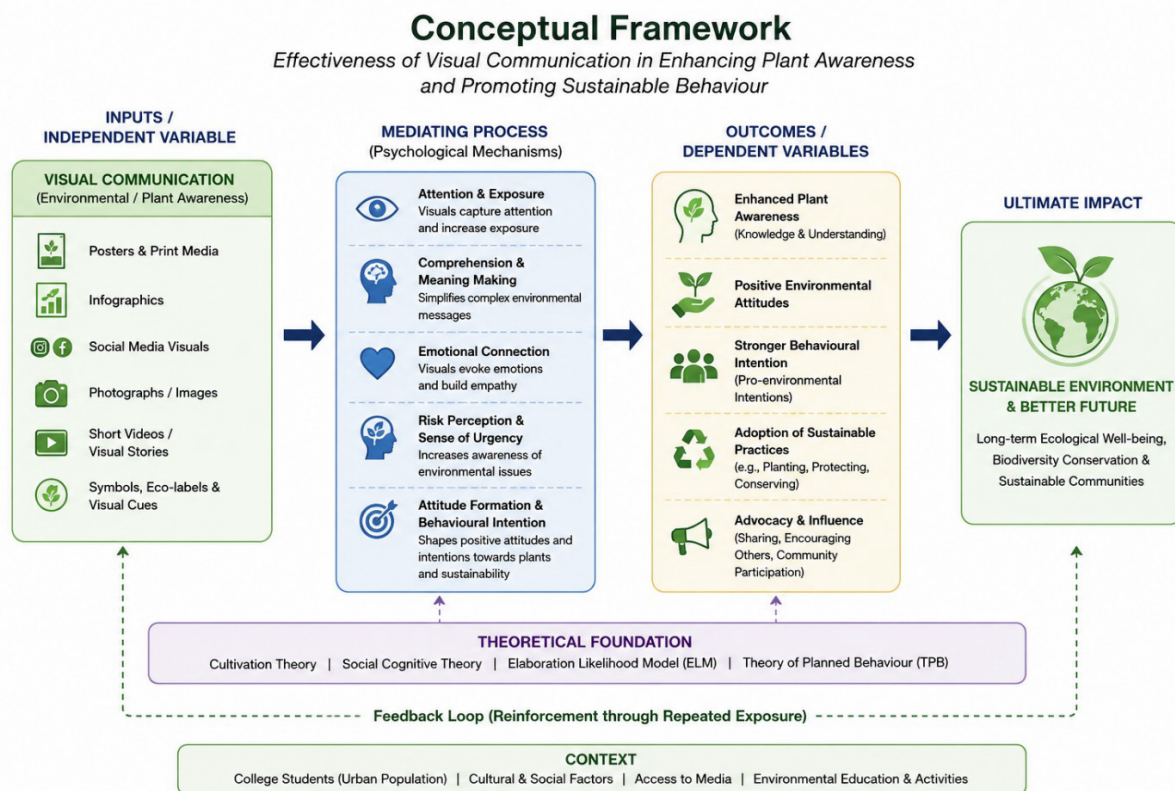
Zhang and Skoric (2023) conducted a systematic review on media exposure and environmental behaviour and found that sustainable actions and environmental attitudes are positively impacted by visual environmental content. According to the study, pro-environmental behaviour is strengthened by frequent exposure to visual media, which also supports the use of strategic visual communication in environmental awareness initiatives.

OBJECTIVES

1. To assess how well visual communication increases college students' and urban dwellers' knowledge of plants.
2. To examine how exposure to environmental visual media helps the adoption of sustainable actions like planting trees and reducing waste.

HYPOTHESES

Ho: The awareness of plants is not significantly positively correlated with the respondent's exposure to visual environmental communication.
Ho: The adoption of sustainable habits is not strongly influenced by their exposure to visual aids.



SUPPORTED THEORIES

Cultivation Theory

According to George Gerbner's Cultivation Theory, (Gerbner et al., 1986) people's attitudes, beliefs, and perceptions of reality are gradually shaped by frequent exposure to media messages. Over time, sustained exposure to visual content in environmental communication such as infographics, posters, and social media campaigns raises awareness of plants and promotes sustainable behaviour.

Semiotic Theory

Ferdinand de Saussure and Charles Sanders Peirce established semiotic theory, (Saussure, F. de. 1983) which describes how signs, symbols, colours, and images produce and convey meaning. Visual components in environmental communication, such as images of plants, eco-symbols, infographics, and posters, help audiences understand environmental messaging, raise awareness of plants, and promote sustainable habits by rapidly and efficiently communicating information. (Chandler, 2017)

METHOD

This descriptive research method is to investigate the role of visual communication in educating the people with ecological equilibrium and environmental sustainability. For this study the researcher selected Agriculture and Horticulture students of Dhanalakshmi Srinivasan college and Urban dwellers as the sample. This descriptive study on how visual communication affects public understanding of environmental sustainability piqued the researcher's curiosity. A pre - test was done with 30 students and this pre - test give the understandability and simplicity of the questionnaire for the students to the researcher. Based on the feedback of these 30 students, modifications were done in the questionnaire and the researcher

proceeded to collect data on the basis of this modified questionnaire. A Reliability test also has been done to check the reliability of the variables (value is 0.72). The researcher found the questionnaire is apt for collecting primary of data and care has been taken to enable the respondents to express their opinions freely and accurately. The primary data collection was made by the self-prepared questionnaire. The researcher designed the structured questionnaire based on the pilot study and the final questionnaire. In this study, the researcher used a self-administered questionnaire which is an "instrument used to collect information from people who complete the instruments themselves" (Bourque & Fielder, 2002). Simple Random Sampling Technique was used to collect data from the students and the convenience sampling technique was used to collect data from urban dwellers, as the researcher experienced much negligence from the urban dwellers. 100 students from all classes responded and 100 urban dwellers registered their responses. A systematic questionnaire was used to gather primary data. Collected more than 200 responses and taken only 200 responses from the students and urban dwellers for the study. The study utilized both primary and secondary data. Primary data collected directly from respondents through the questionnaire survey. Secondary data collected from research journals, books, academic articles, and online sources related to environmental communication, visual media, and sustainability. The collected data were analysed using percentage analysis(Frequency Test) Standard deviation and Mean analysis to support the Hypothesis. The results were tabulated and presented using pie charts for clear understanding.

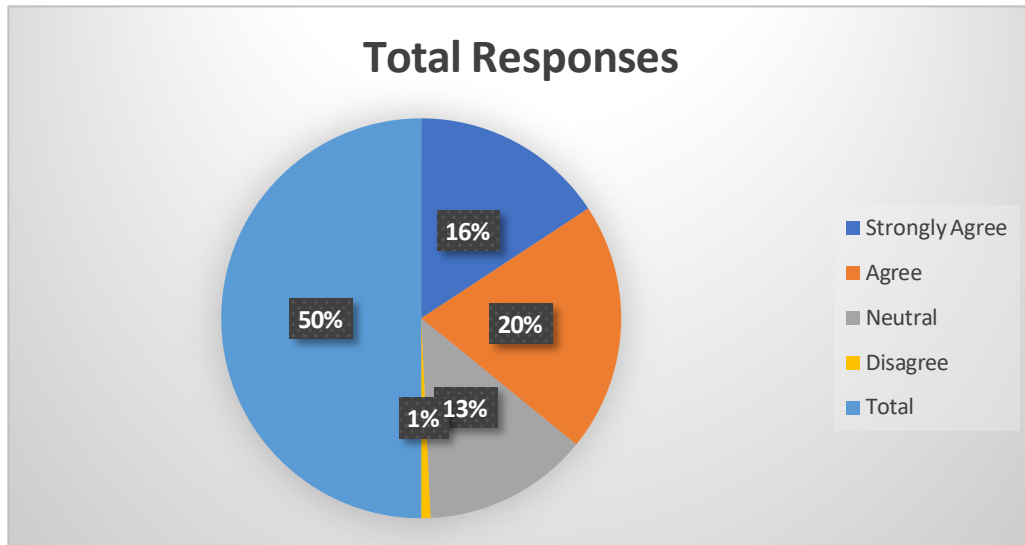
DATA ANALYSIS AND INTERPRETATION

Data analysis of the responses from the College students

Table 1. Exposure to Environmental Visual Communication (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
1	I notice environmental posters or plant-related visuals displayed on campus.	29	40	31	0
2	I often see plant awareness posts on social media.	25	46	25	4
3	Environmental infographics attract my attention more than text messages.	37	38	24	1
4	I watch videos or campaigns related to environmental sustainability.	35	37	27	1

Overall result of Exposure to Environmental Visual Communication



The findings indicate that students have high exposure to environmental visual communication. A majority (71.8%) either agreed or strongly agreed that they regularly encounter environmental posters, plant-awareness social media content,

infographics, and sustainability campaigns. Around 26.8% remained neutral, while only 1.5% disagreed. This proves that environmental visual communication is widely visible and reaches most students effectively.

Table 2. Effectiveness of Visual Communication (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
5	Visual messages are easier to understand than text messages.	29	38	33	0
6	Visual content helps me remember information about plants.	29	37	24	10
7	Repeated exposure to environmental visuals increases my interest in plant conservation.	39	37	25	0

Overall Result of Effectiveness of Visual Communication

The results indicate that students generally perceive visual communication as an effective medium for environmental education. A combined 69.6% of respondents either agreed or strongly agreed that visual messages are easier to understand than text, help them remember information about plants, and increase their

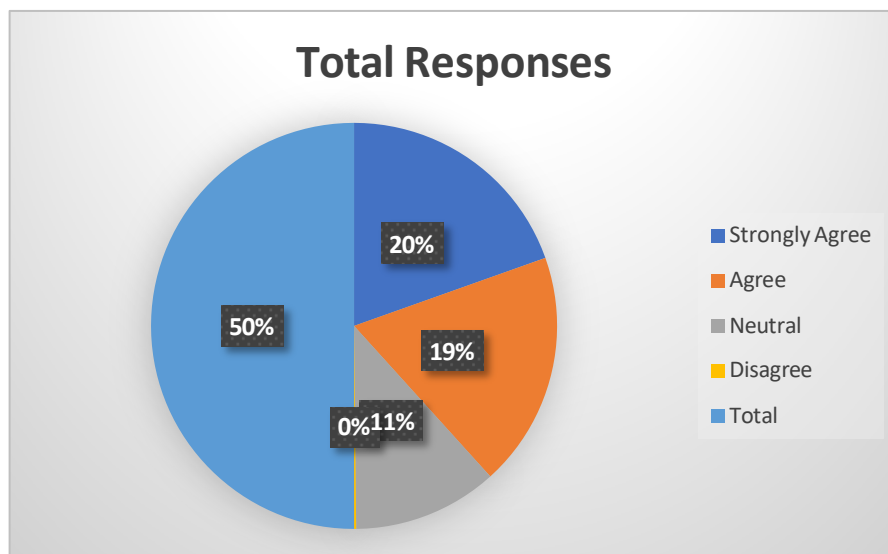
interest in plant conservation through repeated exposure. About 27.3% remained neutral, while only 3.3% disagreed. These findings suggest that visual communication is an effective tool for enhancing comprehension, memory retention, and engagement with environmental conservation messages among students.

Table 3. Knowledge about Plants and Environment (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
8	Plants are essential for maintaining ecological	27	38	34	0

	balance.				
9	Plants help reduce pollution in the environment.	64	24	12	0
10	Deforestation negatively affects the environment.	26	50	23	1

Overall Result of Knowledge about Plants and Environment



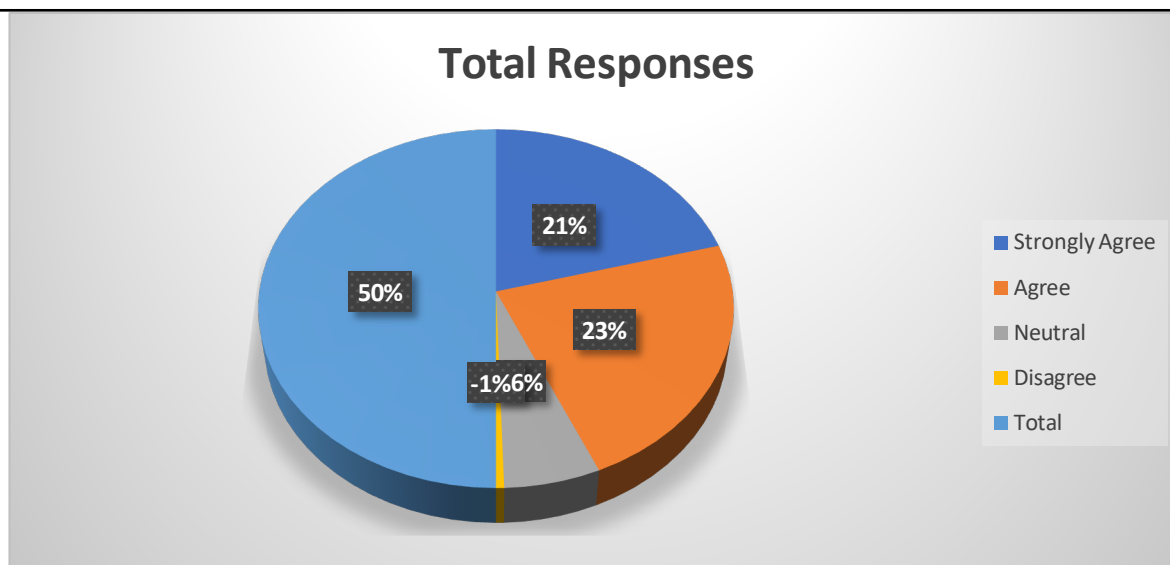
The findings reveal that students possess a high level of knowledge about plants and the environment. A substantial 76.3% of respondents either agreed or strongly agreed that plants are essential for maintaining ecological balance, help reduce environmental pollution, and that deforestation has negative environmental

consequences. Nearly 23.0% of respondents were neutral, while only 0.3% disagreed. These results indicate that students have a strong understanding of the ecological importance of plants and the environmental impacts of deforestation, reflecting a sound level of environmental awareness.

Table 4. Attitude toward Plant Conservation (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
11	I feel responsible for protecting plants and greenery.	50	37	12	1
12	Visual environmental campaigns motivate me to adopt eco-friendly behaviour.	33	54	12	1

Overall Result of Attitude toward Plant Conservation (N = 100).



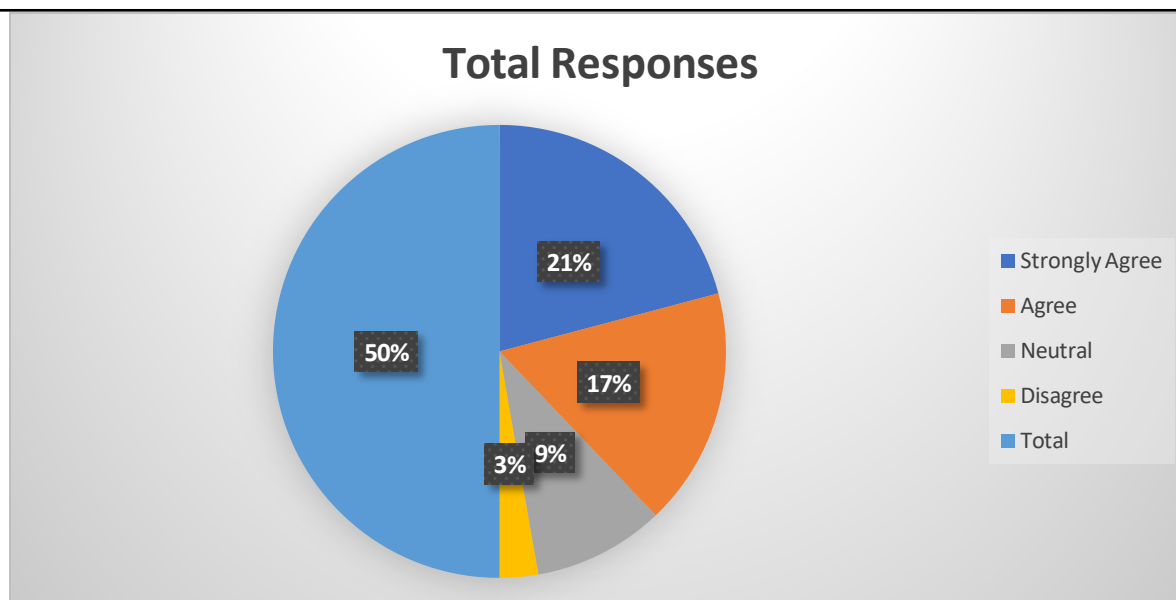
The findings indicate that respondents exhibit a highly positive attitude toward plant conservation. A combined 87.0% of students either agreed or strongly agreed that they feel personally responsible for protecting plants and greenery and that visual environmental campaigns motivate them to adopt eco-friendly behaviour. Only 12.0%

of respondents remained neutral, while 1.0% disagreed. These results suggest that students possess a strong sense of environmental responsibility and that visual communication campaigns play an important role in fostering positive attitudes toward plant conservation and sustainable practices.

Table 5. Sustainable Behaviour (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
13	I participate in tree planting or environmental activities.	44	28	27	1
14	I practice waste segregation to protect the environment.	50	35	14	1
15	I try to reduce paper usage to save trees.	37	34	10	19
16	I encourage others to protect plants and the environment.	36	39	24	1

**Overall Result of Sustainable Behaviour
(N = 100)**



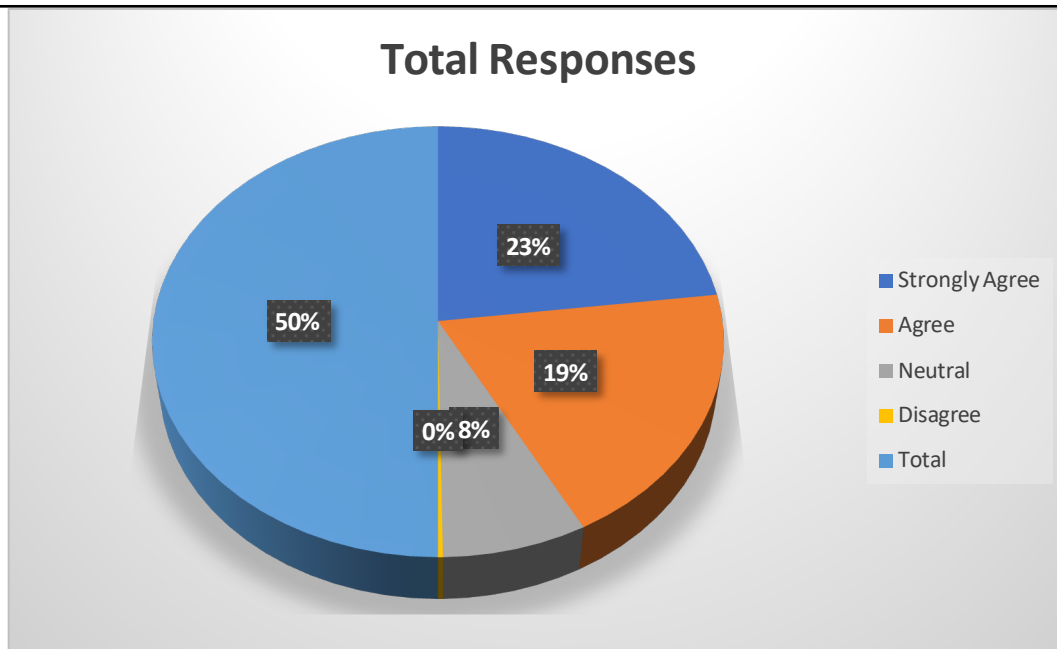
The results indicate that students demonstrate a high level of sustainable environmental behaviour. Overall, 75.8% of respondents either agreed or strongly agreed that they actively participate in tree planting and environmental activities, practice waste segregation, reduce paper usage, and encourage others to protect plants and the environment. About 18.8% remained neutral, while

5.5% disagreed. Although the majority reported engaging in environmentally responsible practices, the comparatively higher disagreement level—particularly regarding reducing paper usage—suggests that there is still scope for strengthening sustainable behavioural practices through continued environmental education and visual awareness campaigns.

Table 6. Sustainable Environmental Behaviour (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
17	I prefer eco-friendly products whenever possible.	45	39	15	1
18	I try to reduce plastic usage in my daily life.	48	37	15	0
19	I maintain plants or greenery at home or in my surroundings.	46	38	15	1
20	Visual campaigns encourage me to plant more trees.	45	40	15	0

Overall Result of Sustainable Environmental Behaviour (N = 100)



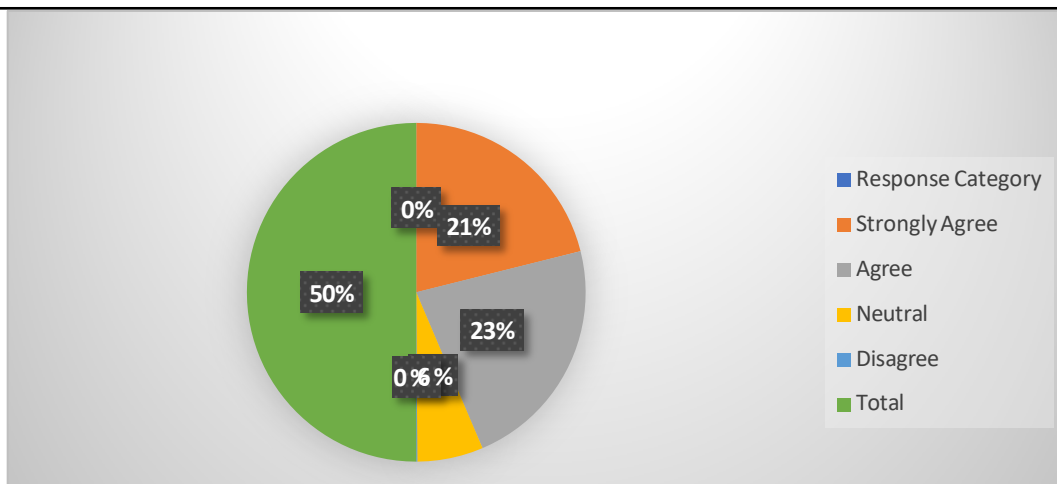
The findings reveal that visual communication has a strong positive influence on sustainable environmental practices among the respondents. A substantial 84.5% of students either agreed or strongly agreed that they prefer eco-friendly products, reduce plastic usage, maintain plants or greenery, and are encouraged by visual campaigns to plant more trees. Only 15.0% remained neutral,

while a negligible 0.5% disagreed. These results indicate that environmental visual communication effectively promotes sustainable lifestyle choices and motivates students to engage in environmentally responsible practices, highlighting its potential as an effective tool for fostering pro-environmental behaviour.

Table 7. Influence of Visual Communication (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
21	Colourful and creative visuals attract my attention more easily.	39	49	12	0
22	Images of plants and nature create a positive emotional response.	50	38	12	0
23	Environmental posters can influence people's attitudes.	37	50	13	0
24	Infographics make complex environmental information easier to understand.	38	49	13	0
25	Visual storytelling can motivate people to protect nature.	47	39	13	1

Overall Result of Influence of Visual Communication (N = 100)



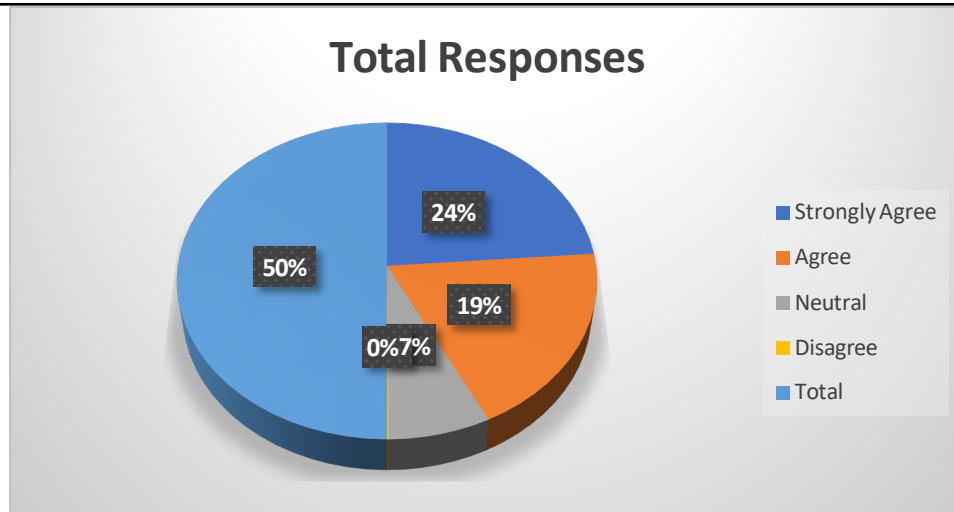
The findings demonstrate that visual communication exerts a strong positive influence on students' environmental awareness and attitudes. A remarkable 87.2% of respondents either agreed or strongly agreed that colourful visuals attract their attention, nature-related images evoke positive emotions, environmental posters shape attitudes, infographics simplify complex environmental information, and visual

storytelling motivates environmental protection. Only 12.6% remained neutral, while a negligible 0.2% disagreed. These results underscore the effectiveness of visual communication as a powerful educational and persuasive tool for promoting environmental awareness, fostering positive attitudes toward nature, and encouraging sustainable environmental behaviour among students.

Table 8. Impact of Visual Communication (N = 100)

S. No.	Statement	Strongly Agree	Agree	Neutral	Disagree
26	Environmental awareness visuals influence my daily habits.	36	40	24	1
27	Visual environmental campaigns should be increased in educational institutions.	51	37	13	0
28	Students can play an important role in plant conservation.	52	37	12	0
29	Environmental awareness should be promoted through visual media.	51	38	12	0
30	Visual communication can help create a more sustainable future.	50	39	12	0

Overall Result of Impact of Visual Communication (N = 100)



The findings indicate that respondents hold a highly positive perception of the role of visual communication in promoting environmental sustainability. Overall, 86.2% of students either agreed or strongly agreed that environmental awareness visuals influence their daily habits, educational institutions should increase visual environmental campaigns, students have an important role in plant conservation, environmental awareness should be promoted

through visual media, and visual communication can contribute to a more sustainable future. Only 14.4% remained neutral, while 0.2% disagreed. These results suggest that students strongly recognize the importance of visual communication as an effective strategy for encouraging environmental awareness, fostering sustainable attitudes, and supporting long-term environmental conservation initiatives.

Data analysis of the responses from the City Dwellers

No	Questions	SD	D	N	A	SA	Mean
1	Notice environmental posters	6	19	32	31	12	3.24
2	Infographics easier than text	0	12	38	44	6	3.44
3	Plant awareness campaigns seen	6	19	32	31	12	3.24
4	Remember visual messages better	0	19	38	43	0	3.24
5	See visuals promoting tree planting	6	25	32	31	6	3.06
6	Environmental images capture attention	6	25	38	25	6	3.00
7	Repeated visuals increase awareness	0	12	44	38	6	3.38
8	Environmental posters appealing	0	12	38	44	6	3.44
9	Symbols communicate quickly	0	19	37	38	6	3.31
10	Trust visuals with environmental info	0	6	38	50	6	3.56
11	Aware plants maintain ecological balance	0	6	38	50	6	3.56
12	Know plants reduce air pollution	0	19	37	38	6	3.31
13	Aware of deforestation impacts	6	19	38	31	6	3.12
14	Plants help combat climate change	0	12	44	38	6	3.38
15	Aware of sustainable plant practices	0	12	44	38	6	3.38
16	Visual campaigns increase knowledge	0	19	44	31	6	3.24
17	Concern about reduction of green cover	0	19	38	37	6	3.30
18	Actively seek plant conservation info	0	12	31	50	6	3.51
19	Plant awareness essential for sustainability	0	12	44	37	6	3.37
20	Feel responsible for protecting plants	6	25	38	25	6	3.00
21	Participate in tree planting	0	25	38	31	6	3.18
22	Practice waste segregation	0	12	31	56	0	3.44
23	Reduce plastic usage	0	12	38	44	6	3.44
24	Conserve water	6	19	38	31	6	3.12

25	Prefer eco-friendly products	0	19	38	37	6	3.30
26	Encourage others to protect plants	0	19	44	31	6	3.24
27	Visual campaigns motivate action	6	19	44	25	6	3.06
28	Changed habits due to visuals	0	19	38	37	6	3.30
29	Willing to volunteer for conservation	6	25	31	31	6	3.06
30	Live environmentally responsible life	0	12	44	37	6	3.37

SD – Strongly Disagree, D – Disagree, N – Neutral, A – Agree, SA – Strongly Agree

INTERPRETATION

A five-point Likert scale was used to gather data from 100 respondents, and the results were analysed to explain how the urban dwellers perceived visual communication and environmental awareness in relation to plant conservation. The findings indicate a modest degree of agreement among the respondents (urban dwellers), with the majority of mean scores falling between 3.00 and 3.57.

According to results of questions about visual communication and environmental awareness, most respondents registered that visual components like posters, infographics, and symbols improve their understanding of environmental information. The mean scores for statements like finding infographics easier to understand than text and believing environmental information backed by images were comparatively higher. This implies that visual media is the effective media for drawing attention to and enhancing comprehension of environmental issues.

And the value of plants in preserving ecological balance, lowering air pollution, and combating climate change was acknowledged by the respondents. The results of high mean scores show that participants had a primary understanding of the environment and the need of plant protection.

According to the results, a large number of individuals engage in eco-friendly practices like cutting back on plastic use, conserving water, and sorting waste. The mean scores, however, are somewhat lower for active engagement activities like volunteering for conservation initiatives or accepting personal responsibility for plant protection. This suggests that although attitudes and understanding are favourable, there is relatively little active participation in environmental projects.

HYPOTHESIS 1

Ho: The awareness of plants is not significantly positively correlated with the respondent's exposure to visual environmental communication.

According to the survey's analysis, most participants said they were regularly exposed to

visual environmental communication materials such as infographics, posters, and social media awareness content. Simultaneously, the majority of participants showed a high level of understanding about the ecological significance of plants, their ability to reduce pollutants, and the effects of deforestation on the ecosystem. The findings also demonstrate that respondents concurred that visual cues improve their comprehension and retention of environmental knowledge. According to this trend, those who are exposed to visual environmental communication are more likely to be aware of environmental issues and plant protection. Hence the Null hypothesis is rejected and the respondent's exposure to visual environmental communication is positively correlated with their awareness of plants.

Hypothesis 2

Ho: The adoption of sustainable habits is strongly influenced by the respondent's exposure to well-designed visual communication.

According to the study's findings, a large number of participants reported implementing eco-friendly practices like cutting back on plastic use, caring for plants, sorting waste, and motivating others to do the same. Many respondents also concurred that visual environmental advertisements inspire people to change their everyday routines and embrace eco-friendly behaviours. These answers suggest that effective visual communication, including infographics, posters, and visual storytelling, contributes to the development of favourable environmental attitudes and behaviours. Hence the Null hypothesis is rejected partially and the respondent's adoption of sustainable habits may be influenced by their exposure to visual environmental communication.

OVERALL INTERPRETATION

The overall analysis of the thirty questionnaire items indicates that respondents were widely exposed to environmental visual communication through posters, infographics, films, and social media. Most participants regularly encountered environmental messages on digital platforms and campus, and agreed that visuals such as images, graphics, and colours attracted more attention

than text alone, demonstrating the effectiveness of visual communication in conveying environmental messages.

The findings further reveal that visual communication enhances understanding and memory retention of environmental information. Respondents reported that visual presentations made concepts related to plants and environmental conservation easier to understand and remember, while repeated exposure increased their interest in environmental protection. This highlights the value of visual media in environmental education and awareness campaigns.

The study also found that respondents possessed good knowledge of the ecological importance of plants and the harmful effects of deforestation, reflecting the positive influence of environmental education and awareness initiatives. In addition, participants expressed favourable attitudes towards protecting the environment, with many feelings responsible for conserving plants and maintaining a green environment. Visual environmental messages were also found to encourage positive environmental attitudes.

Finally, respondents demonstrated moderate to high levels of sustainable behaviour, including reducing plastic use, segregating waste, caring for plants, and encouraging others to adopt eco-friendly practices. They also recognized the important role of students in plant conservation and supported increasing visual environmental campaigns in educational institutions.

A five-point Likert scale was used to collect data from 100 respondents (urban dwellers) to assess perceptions of visual communication, environmental awareness, and plant sustainability. The findings revealed moderate agreement, with mean scores ranging from 3.00 to 3.57. Respondents agreed that visual communication, particularly posters, infographics, and images, improved their understanding of environmental issues. They also demonstrated good awareness of the ecological importance of plants and environmental sustainability. While many reported adopting eco-friendly practices such as reducing plastic use and waste segregation, active participation in conservation initiatives was comparatively lower, indicating a gap between environmental awareness and practical involvement.

DISCUSSION

The viewpoints of Cultivation Theory and Semiotic Theory can be used to interpret the study's

findings. Visual components including images, colours, symbols, and design serve as signs that give viewers meaning, according to semiotic theory. (Chandler, 2017) Respondents in this study stated that environmental posters, infographics, and visual campaigns caught their interest and made it easier for them to comprehend information about plants and environmental conservation. As Ferdinand de Saussure said, "Language is a system of signs" (Saussure, F. de. (2011), the concept of signs can be extended to visual communication, where images and colours communicate meanings related to ecosystems. According to Peirce's statement that "We think only in signs," we can understand the importance of visual symbols in shaping respondents' understanding of plants and environmental conservation.

In a similar vein, Cultivation Theory describes how people's attitudes and perceptions are gradually shaped by frequent exposure to media content. (Gerbner et al., 1986). The study's findings demonstrate that respondents' awareness and interest in plant conservation are raised by ongoing exposure to environmental imagery on campus and social media. Additionally, a lot of participants said that visual environmental advertisements encourage people to undertake eco-friendly behaviours including cutting back on plastic use, taking care of plants, and inspiring others to do the same. The respondents' increased awareness through visual campaigns aligns with UNESCO's emphasis that education is central to achieving sustainability, highlighting the educational value of visual communication. United Nations Educational, Scientific and Cultural Organization. (2020) Hence, the research results show that regular visual communication can foster sustainable behaviours and positive environmental views in people.

CONCLUSION

The study concludes that visual communication plays an important role in promoting environmental awareness and encouraging sustainable behaviour among respondents. The findings indicate that exposure to environmental posters, infographics, and visual campaigns helps individuals understand and remember information about plants and environmental issues more effectively. Respondents also demonstrate good knowledge about the ecological importance of plants and show positive attitudes toward plant conservation and environmental protection. In addition, visual environmental communication influences individuals to adopt eco-friendly

practices such as reducing plastic usage, segregating waste, and maintaining plants. Overall, the study highlights that well-designed visual communication can significantly contribute to increasing environmental awareness, shaping positive attitudes, and encouraging sustainable habits, thereby supporting efforts toward environmental conservation and sustainability.

FUTURE RECOMMENDATIONS

To raise awareness about plant conservation and sustainability, educational institutions can employ more visual environmental campaigns, such as posters, infographics, and digital media. Environmental messages can be made more interesting and understandable for audiences by using innovative visual communication techniques. Students can be continuously exposed to sustainability themes by incorporating environmental imagery into academic activities, exhibitions, and campus festivities. In order to better understand how visual communication affects environmental awareness and sustainable behaviour, future research may also take into account employing a larger sample size and a wider range of population groups.

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