

A STUDY OF ENVIRONMENTAL AWARENESS AMONG POST-GRADUATE STUDENTS OF DIFFERENT FACULTIES OF ALIGARH MUSLIM UNIVERSITY

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ABSTRACT

The Environmental degradation is the major concern in the world of globalization. Due to rapid increase in human population and non-sustainable developments in every sector, the environmental pollution is increasing day by day. Lithosphere, hydrosphere and biosphere are getting polluted by human activities beyond the rational limit. So there is an urgent need to increase the level of awareness among human beings to conserve, preserve and nurture environmental resources. Consequently, environmental education should be included in school curriculum as well as in college curriculum right from the beginning. The present study was conducted to study the environmental awareness among post graduate students of Aligarh Muslim University. In the present study a total of 200 student's sample has been taken from different faculties of Aligarh Muslim University. The findings of the study indicated that level of environmental awareness among science students was greater than other faculties' students. The results also reveal that the female students were more aware than male students. The urban students have much more awareness as compared to rural students.

Keywords: Environment, Awareness, Post-graduate Students, Faculties, Aligarh Muslim University

1. INTRODUCTION

Our existence, lifestyles and growth depend entirely on the sun and the earth. The energy from the sun is called solar capital. In the same way, the planets, air, water, fertile soil, forests, grasslands, wetlands, oceans, lakes, wildlife, minerals and natural purification and recycling process are treated as Earth's capital. We use the term 'environment' to describe, in the language of G.T Miller, the Plant's life-support system for us and for all other forms of life. In fact, the

environment to me is sum-total of solar capital and earth capital. It also includes the thing created by humans. Environment now extends far beyond the bounds of the local environment, thus it is the intimate enclosure of the individual or a local human population and the global domain of the human species. Ecology as a discipline is focused on studying the interactions between an organism of some kind and its environment. In ecology, 'niche' refers to the role, an organism or species play in its ecosystem. An organism's niche includes everything affected by the organism during its lifetime. So ecology is a study to achieve new goals to help scientists to develop methods to protect the natural world-physical environment. (Bandhopadhyay, 1985). We need to know all the methods and procedures which are directly and indirectly involved in process of environmental degradation and pollution.

2. JUSTIFICATION OF STUDY

One in every seven persons on this planet lives in India. With 16% of the world's population and only 2.4% of its land area, India is facing heavy pressure on the existing resources including land. There must be 33% area covered with forest in any nation as per direction of united nation. But in India only 24.39% area is under forest which is great threat for our existence. Irrational human activities lead to unexpected pollution and degradation on environment and if this trend is continue then existence of healthy life will be under great question mark in the coming few years. Now people are exploring and using natural resources not for their need but for their greed. Mahatma Gandhi once said that there is everything in the nature for human need but nothing for human greed. Agricultural revolution, industrial revolution, development of crony capitalism, unhealthy competition among corporate sectors leads excess use of natural resources. Global warming, ultra-violet rays, water pollution, air pollution, sound pollution, soil pollution become very common words before us. Many of the coastal areas will be under water if the present rate of ice melting is going on for the next 50 years. So we need immediate action on this. Civil society must come forward to stop environmental degradation. Students at schools, colleges and university level should start environmental awareness programs to keep this world fit for living. Our day to day life style should have an orientation to save environment.

3. STATEMENT OF THE PROBLEM

The title of the problem of the present study is formally stated as:-

“A Study of Environmental Awareness among Post-Graduate Students of Different Faculties of Aligarh Muslim University.”

4. DEFINITION OF THE TERMS

The terms in the present investigation have been defined operationally to carry following operational meaning:

ENVIRONMENTAL AWARENESS

Environment includes all living and non-living things. We live in the environment and use the different environmental resources like air, land, forest and water to meet our needs and demands. While meeting the daily needs, we put pressure on the environment. When the pressure exceeds the carrying capacity of the environment to repair or replace itself, it creates an acute problem of environmental degradation. If we use any environmental resource such as ground water and forest beyond its limit of replacement, we may lose it forever. Therefore, there is a need to make 'awareness' among the people about Environmental protection. While efforts are being made at the national and international level to protect our environment, it is also the responsibility of every common man to use our environmental resources with care and protect them from degradation or destruction. In this lesson we will discuss the meaning and causes of environmental degradation and the importance of environmental conservation.

Post Graduate Students

Post Graduate Students are those who are doing M.A, M.SC, M.COM, MBA, MCA, PGDM, M.TECH, MD, M.TH, M.ED., L.L.M., etc. from Aligarh Muslim University.

Faculties

In AMU there are 13 faculties and these are Agricultural Sciences, Arts, Commerce, Engineering & Technology, Law, Life Sciences, Medicine, Management Studies & Research, Science, Social Sciences, Theology, Unani Medicine, each comprising of several Departments of Studies.

Aligarh Muslim University:

Aligarh is a district in the state of Uttar Pradesh that is famous for lock industries and Aligarh Muslim University. It lies 310 kilometres northwest of Kanpur and is approximately 135 kilometres southeast of the capital, New Delhi. Aligarh Muslim University, (AMU) is a central university. It was established by Sir Syed Ahmad Khan as Mohammedan Anglo-Oriental College in 1875. The Muhammadan Anglo-Oriental College became Aligarh Muslim University in 1920. The main campus of AMU is located in the city of Aligarh. Spread over 470 hectares, AMU offers more than 300 courses in both traditional and modern branches of education. In addition to this it has its three off-campus centres at Malappuram (Kerala), Murshidabad (West Bengal) and Kishanganj (Bihar). The university comprises all castes, creeds, religions and genders, and is

an Institute of National Importance provided under the Seventh Schedule of the Constitution at its commencement.

5. OBJECTIVES OF THE STUDY

- I. To assess the environmental awareness of post-graduate students of AMU.
- II. To compare the environmental awareness of the post-graduate students of different faculties of AMU.
- III. To compare the environmental awareness of male and female post-graduate students of AMU.
- IV. To compare the Environmental Awareness of rural and urban post-graduate students of AMU.

6. HYPOTHESES OF THE STUDY:

- I. There will be no significant difference in Environmental Awareness among the post-graduate students of different faculties of AMU.
- II. There is will be no significant difference in Environmental Awareness between male and female post-graduate students of AMU.
- III. There will be no significant difference in Environmental Awareness between rural and urban post-graduate students of AMU.

7. SIGNIFICANCE OF THE STUDY

The present investigation was carried out with the purpose of studying environmental awareness among postgraduate students of AMU. The issue of Environmental Education has been discussed at several national and international seminars, workshops, conferences such as deliberation at Fourx in 1971 and at Stockholm in 1972. The Stockholm conference (1972) stressed specifically on the need for promoting awareness of environmental issue.

In Belgrade Charter also, developing environmental awareness started as one of the objectives of Environmental Education. Thus, awareness was selected because that provides the basis for developing a positive attitude towards the appreciation of different environmental problems and inspires one for actively participating in the program for conserving nature and preventing further deterioration. Awareness is the springboard to conservation. The study was carried out in university students because the most pressing need of environmental education was recently introduced at university level.

8. DELIMITATIONS OF THE STUDY

Due to scarcity of time, the present study was delimited to the following points:

- I. Because of limited resources and paucity of time, the sample (200) was selected from only six faculties (arts, social science, science, commerce, life science and management & research) out of twelve faculties.
- II. Only one subject or discipline has been selected from each faculty.
- III. The findings of this study limit to a small sample and therefore, cannot be generalized to a large extent.

9. REVIEW OF RELATED LITERATURE

Kate, (2010) The idea of “Green Initiatives” in schools at any age level is a positive step towards installing sustainability in the minds of future generations. To reduce the amount of energy needed, recycle rain water, lessen landfill space and cut the barrels of oil can insure that our natural resource will be intact for many years to come. However, obstacles to Green Initiatives are costs (money), programme management and proper data collection. Is it possible to initiate Green Methods in schools and really save cash as a result? It is possible

Prashant, K. A. (2011) studied “A study of environmental awareness among higher secondary students and some educational factors affecting it.” The Objectives of the study were compare 11th and 12th standard and art and science students with regards to their level of environmental awareness. And researcher also wants to know environmental awareness between CBSE and UP Board students in relation to their gender. Students of 11th and 12th standard were identical as for as their environmental awareness was concerned. Science and CBSE board students had more environmental awareness in comparison to arts and state board students because of their different syllabus pattern and teaching style. In relation to gender male students are more aware than girls.

Selvam, V., and Abdul, N. N. (2011) studied “An analysis of environmental awareness and responsibilities among university students.” It is the duty of Central and State Governments, public and private companies and NGOs to take initiatives to create more awareness about global warming, natural disaster and environmental degradation. State and Central Educational Departments should allocate more funds to organize Conferences, Seminars and Workshops for creating awareness among students at school, college and university level and insist of all faculties to teach, motivate and inspire the student community.

Shazli, H. K. (2012) conducted a research on “A study of attitude towards environmental awareness in relation to certain variables among senior secondary school students.” The Objectives of the Study were to know the Environmental awareness among the Senior Secondary School students in terms of gender of Aligarh city and to find out the significant difference in the environmental awareness of government and private Senior Secondary School students in relation to their living standard. The researcher found that private school students and male are

more aware than the govt. School students and female students. There is no significant difference on environmental awareness of senior secondary school students residing in their own houses in comparison to those residing in rental houses.

10. METHODOLOGY AND DESIGN OF THE STUDY

In view of the objectives of the present study, the researcher has adopted the Descriptive Survey Method. The details are as under:

Sample:

In the present study a total of 200 student's sample has been taken from different faculties of Aligarh Muslim University. All the elements in the population were included irrespective of their caste, creed, religion, sex, rural, urban etc. The sample of total cluster of students studying in Post-Graduation in different departments of different faculties was selected by using stratified random sampling.

Table 1: Showing sample distribution

S. No.	Faculties	Male	Female	Rural	Urban	Total
1.	Arts	18	17	15	20	35
2.	Science	19	16	16	19	35
3	Social Science	8	22	6	24	30
4	Commerce	20	20	6	34	40
5	Life Science	13	17	9	21	30
6	Management and Research	12	18	3	27	30
TOTAL		90	110	55	145	200

The research tool:

A standardized Environment Awareness Ability Measure (EAAM) constructed by Dr. Praveen Kumar Jha, professor, P.G. Dept. of Psychology, T.P. College, Madhipura (B.N Mandal University), Bihar.

The scale consists of fifty one statements of which eight statements were negatively worded and the remaining forty three statements were positively worded. All these statements were to be rated on a two-point scale from Agree to Disagree. The respondents were required to check the

appropriate column related to a particular scale point. The purpose of the study is typed on the little page of the scale in order to make topic as well as the significance of the study clear to the respondents. Space was also allotted on the questionnaire to write down their name, age, sex, level of education (class), department, and faculty, religion, rural and urban.

Statistical Techniques used

The data was statistically analyzed by using mean, SD, **t-test, one way ANOVAs F-test.**

11. ANALYSIS

Major findings of the study have been discussed here

Objective: To compare the environmental awareness of the post-graduate students of different faculties of A.M.U.

Hypothesis: 1. There will be no significant difference in Environmental Awareness among the post-graduate students of different faculties of A.M.U.

Table 2.

Faculty Name	Gender	N	Mean	Standard Deviation
Arts	Male	18	41.61	4.51
	Female	17	44.12	3.69
	Total	35	42.83	4.27
Life Sciences	Male	13	46.54	3.69
	Female	17	46.59	2.12
	Total	30	46.57	2.85
Management & Research	Male	12	44.17	3.79
	Female	18	44.61	2.62
	Total	30	44.43	3.08
Commerce	Male	20	41.30	4.37
	Female	20	44.30	3.71
	Total	40	42.80	4.28
Science	Male	19	40.00	4.75
	Female	16	43.94	1.39
	Total	35	41.80	4.09
Social Science	Male	8	40.13	8.31
	Female	22	45.68	2.68

	Total	30	44.20	5.30
Total	Male	90	42.12	5.15
	Female	110	44.90	2.94
	Total	200	43.65	4.30

Table 3. ANOVA Table, showing the distribution of f value.

Source of variation	Sum of Squares	Df	Mean Square	F value calculated	F-value tabulated
Between Groups	454.995	5	90.999	5.468*	2.26
Within Groups	3228.505	194	16.642		
Total	3683.5	199			

*Significant at 0.05 level

From the above table it is clear that calculated value is more than the tabulated value. So the hypothesis is rejected. That means there is a lot of difference in environmental awareness among the students of different faculties of A.M.U. Here the tabulated value 2.26 and calculated value is 5.468. So calculated value is more than the tabulated value. It is also clear from the mean distribution which is given below.

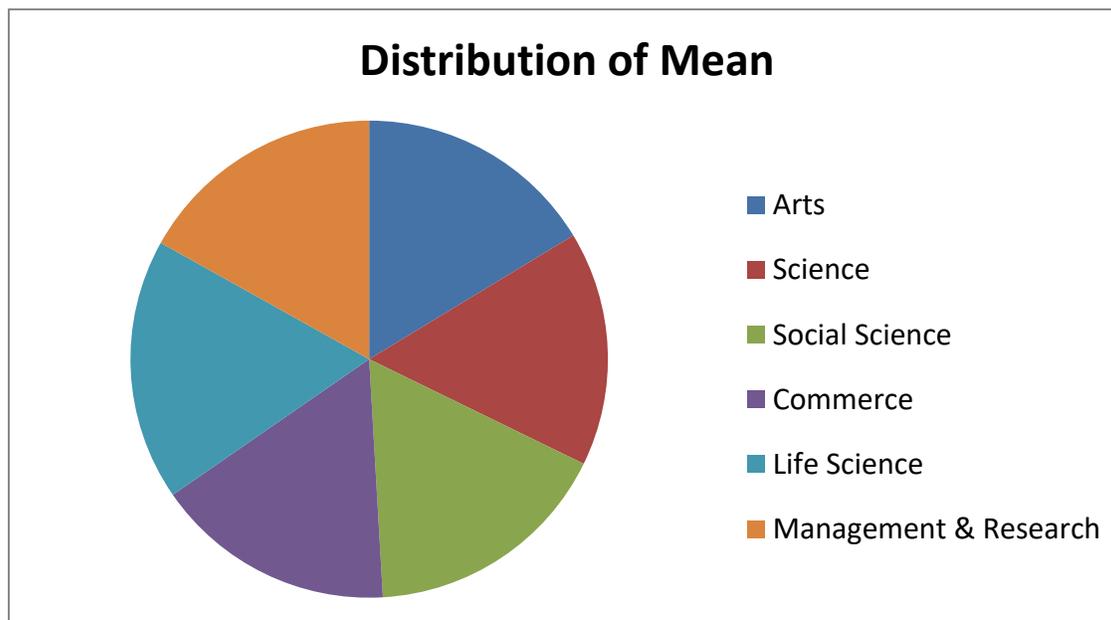


Fig 1: showing the distribution of means of environmental awareness of post-graduate students of different faculties of AMU.

Objective 2: The second objectives of this study was concerned with comparison of environmental of awareness of students on the basis of their gender i.e. whether there are differences in the environmental awareness of male or female or not.

Hypothesis. 2 “There is no significant difference in Environmental Awareness between male and female post-graduate students of AMU”.

Table 4

Gender	N	M	S.D.	‘t’-value	Tabulated ‘t’ value	d.f.
Male	90	42.1	5.14	4.465	1.98	198
Female	110	44.9	3.567			

At 0.05 significance level.

The above table reveals that the calculated ‘t’ value is more than the tabulated ‘t’ value at 0.05 significant level and at 198 degree of freedom. Hence the null hypothesis was rejected. Thus there exists a significant difference between the male and female students. The result in the table shows that the female students (M=44.9) possess higher environment awareness than those of male students (M=42.1). The results are also clear from the following pie chart:

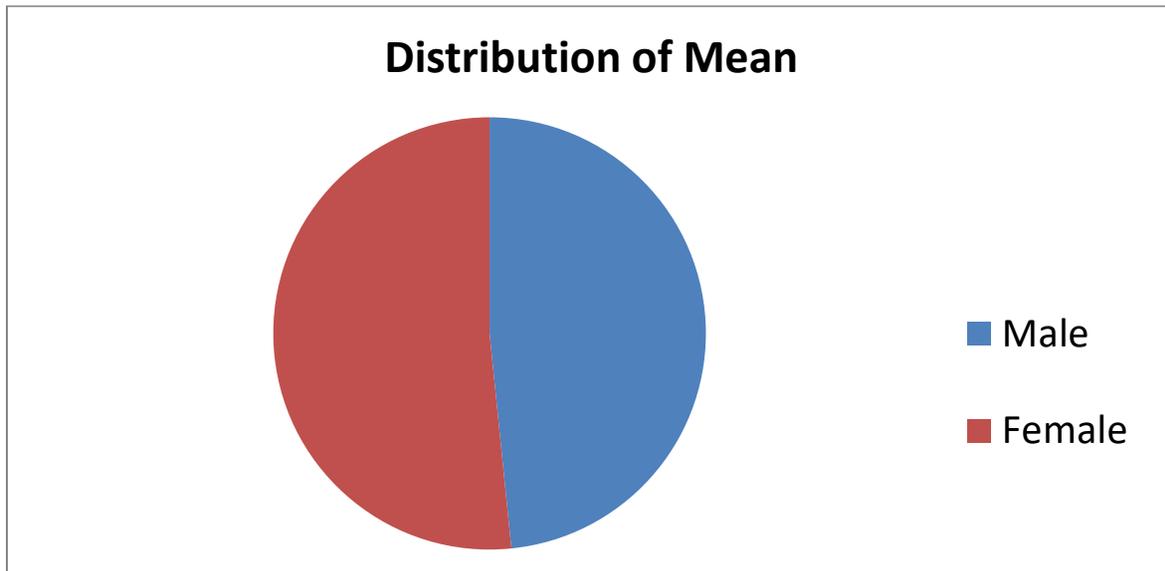


Fig 2: showing the mean distribution of male and female post-graduate students of AMU on environmental awareness.

Objective 3: This objective was concerned with the comparison of environmental awareness of Urban and Rural students of AMU. The null hypothesis was formulated to achieve this objective which is stated as:

Hypothesis 3. “There is no significant difference in Environmental Awareness between rural and urban post-graduate students of AMU”.

TABLE 4

ITEMS	N	M	S.D.	‘t’ value	Tabulated ‘t’ value	d.f.
Urban	145	44.3	3.74	3.782	1.97	198
Rural	55	41.8	5.11			

Significant at 0.05 level.

The above table reveals that the calculated ‘t’ value is more than the tabulated ‘t’ value at 0.05 significant level and at 198 degree of freedom. Hence the null hypothesis was rejected. Thus there exists a significant difference between the Urban and Rural students Of AMU. The result in the table shows that the mean of the urban students (M=44.3) is more than the mean of the rural students (M=41.8) of AMU. The results are also clear from the following pie chart.

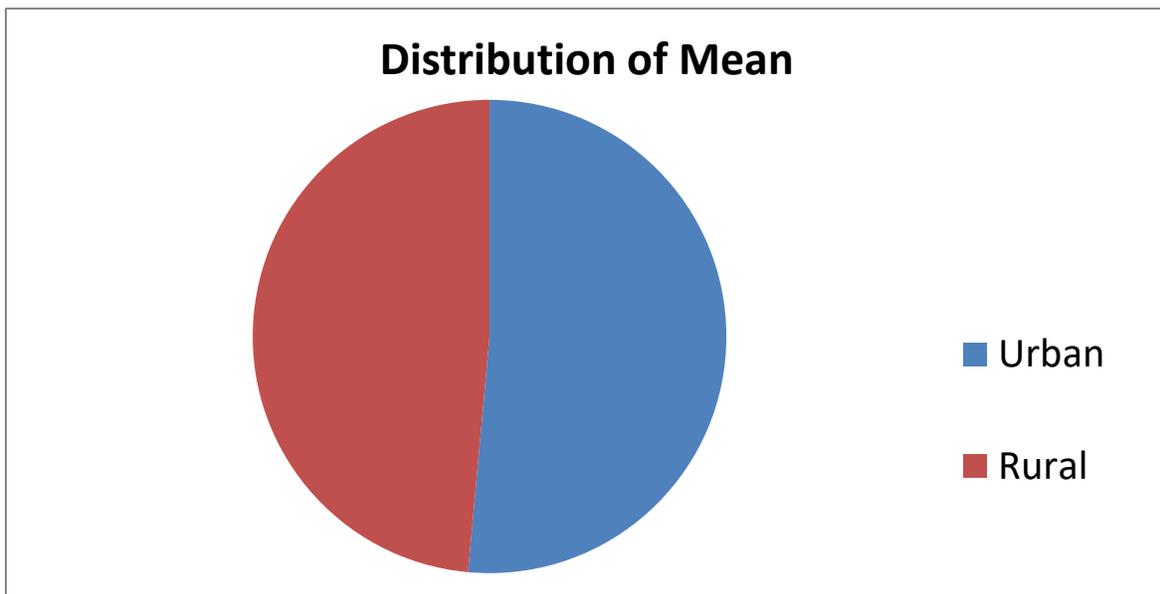


Fig 3: Showing the means of urban and rural post-graduate students of AMU on environmental awareness.

12. FINDINGS

The major findings related to the objectives of the present study are given as follows:

1. The students of life science have more awareness about environment, as compared to the students of other faculties. The results also reveal that the female students are more aware than male students. The urban students have more awareness than rural students.
2. The mean of life science faculty on environmental awareness is 46.57, Management and Research (44.43), Social science (44.20), Arts (42.83), Commerce (42.80) and Science (41.80). According to norms of the scale the awareness on environment above 37 is high so all the faculties have high awareness level.
3. Among the male and female students of A.M.U, female have more awareness than their counterpart. The mean of the female is 44.9 which are more than the male that is 42.1.
4. Among rural and urban students of A.M.U, urban students have more awareness on environment than the rural student. The mean distribution of rural students is 41.8 which is less than the urban students that is 44.3 on environmental awareness.

CONCLUSION AND DISCUSSION:

On the basis of the findings of this study, some conclusions could be drawn. Here conclusion is followed by discussion. So each conclusion has been discussed in details. The post-graduate students of life science faculty have more environmental awareness than the post-graduate students of others faculties.

The students of the life science faculty have more awareness because they are more close to the environment through their academic and non-academic life as their subject is related to life of the animal and plant and existence of the same in different environment. The life of the animal and plant is always changing with the changes of environment whole over the world. So the students of life science have close connection with the environment. The students of others faculties also have high environmental awareness. The distribution of the mean on environmental awareness of all faculties in descending order is 46.57, 44.43, 44.20, 42.83, 42.80 and 41.80 for life science, management and research, social science, arts, commerce and science respectively. Female students have more environmental awareness than the male because female are more concern and sincere on environment. Female normally go through their study in detail and they are very close to nature by nature. Urban students are more concern on environment than the rural students because urban area is the centre of all kind pollution and here people are always busy to find out the alternative to overcome the pollution. But rural students are close to environment but not to the pollution. So the rural students have close connection to the environment but not to the pollution and urban students have much connection to the pollution

than the environment. But to solve the problems of environmental pollution it is necessary to have ample and huge knowledge about environment problems. This is one of the main reasons behind high environmental awareness of urban students. Another important reason is that the urban people suffer more from environmental problems and that's why Government and NGOs organize different programs on environment.

13. EDUCATIONAL IMPLICATION:

To protect and conserve the environment, emphasis should be given to Environmental Education in both formal and non-formal system of education. In formal system of education, teachers play a very significant role in developing a greater awareness about environment among students. This may bring radical change among the students in the way of thinking, living and working. Awareness of environment among students could bring positive impact which might reduce the imbalance of environment already affected by various causes

No doubt education is a strong means of identification of behavior. It increases knowledge, changes personality and improves quality of life of individual. Education connects the entire world as it may solve the problems faced by human beings globally. Education develops awareness in human beings towards environment. It enhances the concern of people towards their environment, their immediate surroundings as well as towards the entire world.

The review of researches has shown that the government, policy makers and the educationist all have come to one platform to propagate environmental education in order to increase awareness of people towards environment. The media is too playing important role in developing awareness.

14. SUGGESTIONS FOR FURTHER RESEARCHES

In the light of the findings of the present study, the following points have been suggested for the further study-

1. Further research can be done by drawing a large sample.
2. A study can be conducted on different level of schools, colleges and universities students such as primary, secondary, higher secondary, higher education and professional students etc.
3. A similar study can be conducted on different streams of higher secondary, colleges and university students.
4. A similar study can be undertaken to study the Interest on Greening Initiatives of school, college and university teachers.

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