

# “A STUDY TO ASSESS THE EFFECTIVENESS OF PLANNED TEACHING PROGRAMME ON ALZHEIMER’S DISEASE AMONG OLD AGE PEOPLE RESIDING IN SELECTED OLD AGE HOME AT VADODARA CITY.”

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**Abstract: BACKGROUND:** This study was design to improve the knowledge of Alzheimer’s disease of old age people in old age home at Vadodara city. Emphasis was put on trying to establish the relation between age, gender, history of mental illness, educational status, family member working in health care centre, Previous exposure for knowledge of Alzheimer’s disease. The validity and reliability of research instruments was established and data was collected from 60 old age people selected old age home. To analyse the data and correlation statistics tool was used with aim of establishing to find association of knowledge of Alzheimer’s disease with selected demographic variable. **METHOD:** A quantitative research approach with pre-experimental one group pre-test post-test design with non-probability purposive sampling to collect the 30 samples. A self-structured questionnaire was prepared to assess the knowledge of Alzheimer’s disease on old age people. **RESULT:** The finding shows that association between Pre-test knowledge score of the old age people with selected Demographic variables which includes Age, Gender, History of mental illness, Educational status, Family members working in health care sector and Previous exposure for knowledge of Alzheimer’s disease. The pre-test mean score of knowledge of old age people is and 10.33(34.3%) and post-test mean score of knowledge is 22.54(75.1%) the mean difference of pre-test and post-test of knowledge is 12.21%. The paired ‘t’ calculated value of knowledges 17.26% at 0.05 level of significance which is more than table value of ‘t’ test. **CONCLUSION:** The following conclusion can be drawn from the study findings, which are supported by evidence from the other literature. The self-administered questioner has been shown remarkable association between knowledge questioner with demographic variable. Using the statistical formula, we have computed the association between the demographic variable Age, Gender, History of mental illness, educational status, family member working in health care sector, previous exposure for knowledge of Alzheimer’s disease and knowledge questioner.

**Key Words:** Effectiveness, Alzheimer’s disease, Knowledge, old age people, Health teaching programme.

## 1. INTRODUCTION:

The Alzheimer's Association was founded by Jerome H. Stone with the help of several family members in Chicago, Illinois and incorporated in April 10, 1980 as the Alzheimer's Disease and Related Disorders Association, Inc. and is a non-profit American volunteer health organization which focuses on care, support and research for Alzheimer's disease. The Alzheimer's Association is the largest non-profit funder of Alzheimer's disease research. The organization has chapters and communities across the nation, with its national office located in Chicago and the public policy office in Washington. Its mission is "to eliminate Alzheimer’s disease through the advancement of research”.<sup>2</sup>

Alzheimer’s disease, also referred to simply as Alzheimer’s, is a chronic neurodegenerative disease that usually starts slowly and worsens over time. It is the cause of 60% to 70% of cases of dementia. The most common early symptoms are difficulty in remembering recent events. As the disease advances, symptoms can include problems with language, disorientation, mood swings, loss of motivation, not managing self-care, and behavioural issues. As a person’s condition declines, they often withdraw from family and society. Gradually, bodily functions are lost, ultimately leading to death. The cause of Alzheimer’s disease is poorly understood. About 70% of the risk is believed to be genetic with many genes usually involved. Mental and physical exercise and avoiding obesity may decrease the risk of AD.<sup>3</sup>

## 2. LITERATURE REVIEW:

**Alzheimer's Association (2016)** conducted research study on Alzheimer's disease facts and figures. This report describes the public health impact of Alzheimer's disease. The actual number of deaths to which Alzheimer's disease contributes is likely much larger than the number of deaths from Alzheimer's disease recorded on death certificates. In 2016, an estimated 700,000 Americans age  $\geq 65$  years will die with Alzheimer's disease, and many of them will die because of the complications caused by Alzheimer's disease. Average per-person Medicare payments for services to beneficiaries age  $\geq 65$  years with Alzheimer's disease. Such findings highlight the need for solutions to prevent dementia-related costs from jeopardizing the health and financial security of the families of people with Alzheimer's and other dementias.<sup>24</sup>

**Zhou J, Peng W, Li W, Liu Z (2014)** conducted study on Acupuncture for patients with Alzheimer's disease. The aim of this protocol is to provide the methods used to assess the effectiveness and safety of acupuncture for the treatment of patients with Alzheimer's disease. Other sources such as Chinese acupuncture journals and the reference list of selected studies will also be searched. After screening the studies, a meta-analysis of randomised controlled trials will be conducted. Results expressed as risk ratios for dichotomous data and standardised will be used for data synthesis. The protocol of this systematic review will be disseminated in a peer-reviewed journal and presented at a relevant conference.<sup>33</sup>

## 3. MATERIAL AND METHOD:

### Research design

The research design used was pre experimental one group pre-test post-test design

### Research Setting

Old age people from a selected old age home, Vadodara

### Sample

60 Old age people

### Inclusion criteria

Old age persons

1. Who can speak and understand Gujarati / English.
2. Who are willing to participate in the study.

### Exclusion criteria

Old age persons

1. Who are very sick and taking treatment.
2. Who having severe mental illness.
3. Who have sensory Impairments.

## 4. DESCRIPTION OF TOOLS:

**Section 1:** Demographic variables such as Age, Gender, history of mental illness, educational status, family member working in health care sector, previous exposure for knowledge of Alzheimer's disease.

**Section 2:** Knowledge Questions will be used to assess the knowledge of Alzheimer's disease in old age home.

### Reliability

The reliability of tool established by using split half method Spearman Brown Prophecy formula ( $r=0.75$ ) reliability test.

### Data collection procedure

The data for main study will be collected from old age people who are residing at old age home, Vadodara who fulfilled the inclusive criteria by purposive sampling technique and Health Teaching Programme will be used to give knowledge of Alzheimer's disease. Consent will be taken from the participants and Pre-test will be taken. Post-test will be assessed after one week the Pre-test using Health Teaching Programme.

### Statistical design

Data were verified prior to computerized entry. The Statistical Package for Social Sciences (SPSS version 20.0) was used. Descriptive statistics were applied (e.g., mean, standard deviation, frequency and percentages). Test of significance (chi square and paired t test) was applied to test the study hypothesis.

## 5. FINDINGS:

**Section A:** Analysis of Demographic variables.

In the Present study, Age wise Distribution revealed that out of 60 old age people, the (13.3%) of old age people were in the age group of 50-59 years, (23.3%) of Old age people were in the age group 60-69 years, (45%) of Old age people were in the age group of 70-79 years and (18.3%) of old age people were in the age group of  $>80$  years. In relation to Gender, data indicate the highest percentage (50%) of old age people were Female and (50%) of old age

people were Male. In the Study data shows that there is no any history of mental illness in family of old age people. Educational level of Old age people shows that (25%) of old age people have primary education, (45%) of old age people have secondary education, (23.3%) old age people are graduate and (6.6%) old age people are uneducated. In the study, data shows the (8.3%) of family member working in health care sector, (91.6%) of family member not working in health care sector. In the study, data shows that the (00%) of old age people having Previous exposure for knowledge of Alzheimer's disease through seminar, (15%) of old age people having Previous exposure for knowledge of Alzheimer's disease through Media , (31.6%) of old age people having Previous exposure for knowledge of Alzheimer's disease through newspaper. And (53.3%) of old age people having Previous exposure for knowledge of Alzheimer's disease through any other aid.

#### Section: -B Analysis of Pre -Test Knowledge Score of Old Age People Regarding Alzheimer's Disease

TABLE 1: Distribution of mean, SD and mean percentages of pre-test knowledge Score of old age people.

N=60

Sr. no	Knowledge Aspect	Maximum	Mean	Mean percentage	SD
1.	Introduction	03	0.91	30.3%	0.46182
2.	Cause	01	0.28	28%	2.18727
3.	Sign and symptoms	03	1.31	43.8%	0.70089
4.	Prevention	23	7.8	33.9%	1.48210
Overall score		30	10.33	34.3%	4.833208

Above table shows that the area wise distribution of the pre-test knowledge scores of Old Age People regarding Alzheimer's disease, the introduction aspect comprise of 3 questions had mean (0.91)with SD (0.46182) & mean percentage (30.3%), the cause comprise 1 question had mean (0.28) with SD(2.18727) & mean percentage (28%), the sign & symptoms aspect comprise of 3 questions had mean (1.31)with SD (0.70089) & mean percentage (43.8%), the prevention aspect comprise of 3 questions had mean (7.8)with SD (1.48210) & mean percentage (33.9%) and Overall pre-test score mean (10.33) with SD (4.833208) ,mean percentage (34.3%).

TABLE 2: Distribution of mean, SD and mean percentage of post- test knowledge score of old age people.

N=60

Sr. no	Knowledge Aspect	Maximum	Mean	Mean percentage	SD
1.	Introduction	3	2.38	79.3%	0.84556
2.	Causes	1	0.8	80%	6.05656
3.	Sign and symptoms	3	2.26	75.3%	0.79972
4.	Prevention	23	17.1	74.6%	2.31056
Overall score		30	22.54	75.1%	10.0124

Above cited table shows that the area wise distribution of the post-test knowledge scores of OLD AGE PEOPLE regarding Alzheimer's disease, The introduction aspect comprise of 3 questions had mean (2.38) with SD (0.84556) & mean percentage (79.3%), the cause comprise 1 question had mean (0.8) with SD (6.05656) & mean percentage (80%), The sign & symptoms aspect comprise of 3 questions had mean (2.26) with SD (0799972) & mean percentage (75.3%), The prevention aspect comprise of 3 questions had mean (17.1) with SD (2.31056) & mean percentage (74.6%) Overall post test score mean (22.54) with SD (10.0124) , mean percentage (75.1%).

### SECTION C

#### DISTRIBUTION OF OVERALL MEAN, MEAN DIFFERENCE, SD BETWEEN PRE- TEST AND POST - TEST KNOWLEDGE SCORE OF SAMPLES

Table 3: Comparison of pre- test and post- test knowledge score Old age people.

Variable	Aspect	Mean	Mean difference	Mean percentage	Std. Deviation	t- Value
Knowledge regarding Alzheimer's disease	Pre-test	10.33	12.21	34.3%	3.09923	17.26
	Post-Test	22.54		75.1%	4.35922	

The comparison between pre-test and post-test shows score of the respondent. Pre-test knowledge score Mean (10.33), Mean percentage (34.3%) and Standard deviation (3.09923) and In post-test knowledge score Mean (22.54), Mean percentage (75.1%) and Standard deviation (4.35922). Mean difference between pre-test knowledge score and post-test knowledge score is 12.21.

## 6. DISCUSSION

This chapter deals with discussion part according to the results, obtained from statistical analysis based on the data of the study, the reviewed literature, hypothesis which was selected for the study. The present study was conducted to determine the effectiveness of Planned teaching programme of knowledge on Alzheimer's disease in old age people. In order to achieve the objectives of the study, a pre-experimental one group pre-test, post test design was adopted. non-probability purposive sampling technique was used to select the sample. The data was collected from 60 respondents before and after providing planned teaching programme on by self-structured questionnaire schedule. The findings of the study have been discussed with reference to the objectives, hypothesis, and with the findings of other studies

## 7. RECOMMENDATIONS:

**Based on the findings of the present study recommendation offered for the future study:**

- A Similar study can be undertaken by utilizing another domain like attitude and practice.
- A similar study can be undertaken on large scale.
- A similar study can be undertaken using different teaching methods.
- A similar study can be replicated with a control group.

## 8. CONCLUSION:

The present study assessed the effectiveness of planned teaching programme on the Knowledge of Alzheimer's disease of old age people residing in old age home. The study was conducted in old age home at, Vadodara city. The data was collected from 60 old age people by self-structured questionnaire, before and after planned teaching programme. nonprobability purposive sampling technique was used to select the samples. The old age people completed the self-structured questionnaire in pre-test that followed by implementation of knowledge at same day. Post-test was conducted 7 days after the planned teaching programme the same self-structured knowledge questionnaire to find out the effectiveness. The result was analysed by using both descriptive and inferential statistic.

## 9. CONFLICTS OF INTEREST

The authors declare that there is no conflict of interest statement.

## 10. SOURCE OF FUNDING

Researchers used their own fund for their research.

## 11. ETHICAL CLEARANCE

Ethical clearance for this UG research project was obtained from the ethical committee SVIEC of Sumandeep Vidyapeeth deemed to be University.

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