Pilot study on Audio - video assisted humor on reduction of perceived stress among elderly

Author(s): Manasa Godati, phD Scholar, Department of Nursing, Himalayan University, Arunachal pradesh, India Email: godati.manasa@gmail.com

Dr. Rajina Rani Principal, Rass academy college of nursing, Poovanthi, Tamilnadu and Email: rajina_sahul@yahoo.com

ABSTRACT: The present study was conducted to assess the perceived stress among elderly. The research design for the study was one group pre-test post-test design. A sample of 20 elderly persons were selected by using non- probability convenient sampling technique at Navajeevan Old age home, Tirupati. The tools used for conducting the study were a set of demographic variables and Standardized Cohen (1983) Perceived Stress Scale. The subjects were administered audio video assisted humor for 30 days with pre and post assessment of perceived stress levels. Data were analyzed with the help of descriptive and inferential statistics.

Among 20 elderly, majority 4 (20%) had moderate stress, 13 (65%) had severe stress and 3 (15%) had mild stress in the pre assessment of perceived stress levels. After the administration of audio video assisted humor, majority 10 (50%) had mild stress, 8 (40%) had moderate stress and 2(10%) had severe stress in the post assessment of perceived stress levels. It represents that audio video assisted humor was effective in reduction of perceived stress levels among elderly people.

There was no statistically significant association between post assessment of perceived stress levels and the demographic variables such as age of elderly persons, gender, religion, marital status, education, occupational status, residence, number of children, residence area of children, duration of stay in old age home and elderly persons suffering with illness. There was statistically significant association between post assessment of perceived stress levels and the demographic variables such as financial assistance and frequency of visitors to the participant at p<0.01 level of significance.

I.INTRODUCTION

"If you can laugh at it, you can survive it"

Great Indian saint Gautam Buddha had said your body is precious. It is our vehicle for awakening. Treat it with care.

The last century has witnessed a rapid increase in the population of the elderly people in the developed and industrialized countries. This phenomenon is not restricted to the western world only, but many countries such as India are now feeling the impact of this transaction. This situation could be attributed to a combination of factors such as increase in age, longevity and decreased death rates due to advancements in the field of medicine, improvement of life expectancy at birth and enhancement in the average span of life. India ranks 4^{rth} in terms of absolute size of elderly population (Aruna Dubey, Seema Bahasin, Neelima Gupta, and Neeraja Sharma, 2011).

Old age means reduced physical ability, declining mental ability, the gradual giving up of role playing in socio- economic activities and a shift in economic status moving from economic independence to economic dependence upon other's for support (Aruna Dubey, Seema Bahasin, Neelima Gupta, and Neeraja Sharma, 2011).

The reduction in fertility level, reinforced by steady increase in the life expectancy has produced fundamental changes in the age structure of the population, which in turn leads to the aging population. India has the second largest number of elderly (60+) in the world as of 2001. The analysis of historical patterns of mortality and fertility decline in India indicates that the process of population aging intensified only in the 1990's. The older population of India, which was 56.7 million in 1991, is 76 million in 2001and is expected to grow to 137 million by 2021 (Dr. Daizy Kujur, Rajesh Prakash Ekka, 2010).

Stress may drain a person's reserve capacity physiologically, socially and economically, increasing vulnerability to illness and injury (Gail W. Stuart, 2005).

The major sources of stress are life changes, hassles, job settings, home life and acculturation.

LIFE CHANGE: Refers to change in life that one will have to adjust to.

HASSELS: These are the frustrating everyday situations and events that interfere with the ability to function efficiently or to attain goals.

JOB STRESS: Job will influence on stress.

HOME LIFE: Inability to cope up situations at home.

ACCULTRATION: The process of adapting to and becoming integrated with a new cultural environment.

The increased stress levels can lead to changes in psychological and physiological functioning. In addition to changes in the usual stress hormones such as ACTH, cortisol, epinephrine and nor epinephrine, many other messengers are influenced by exposure by stressors. Production and release of prolactin, growth hormone, insulin, glucagon, thyroid hormone and gonadotrophin can be affected by stress. Levels of neurotransmitters, neurohormones, cytokines and various cells in the immune system can also be affected by stress (Mary P.B, Cecile A.L, 2006).

Chokkanathan S (2009) conducted a study on Resources, stressors and psychological distress among older adults in Chennai. Data was collected from 400 older adults of 65 yrs and above by using epidemiological Studies Depression Scale and Geriatric Depression scale. Results showed that resources had an indirect, negative relationship with psychological distress, and stressors had a direct, positive effect on distress (Chokkanathan S.Resources, 2009).

Aruna Dubey, Seema Bhasin, et al (2011) conducted a study on Elderly living in Old Age Home and within Family set up in Jammu. Data was collected from 30 elderly women aged above 60 years from old age homes as well as a similar number from the family setups by using a specially designed interview schedule and observation technique. Results of the study revealed that most of the elderly felt the attitude of the younger generation is unsatisfactory towards them especially those who were in old age homes in terms of getting respect, love and affection which leads to stress in old age (Aruna Dubey, Seema Bahasin, Neelima Gupta, and Neeraja Sharma, 2011).

II METHODOLOGY

The research design for the study was one group pre-test post-test design. A sample of 20 elderly persons were selected by using non- probability convenient sampling technique at Navajeevan Old age home, Tirupati. The tools used for conducting the study were a set of demographic variables and Standardized Cohen (1983) Perceived Stress Scale. The subjects were administered audio video assisted humor for 30 days with pre and post assessment of perceived stress levels. Data were analyzed with the help of descriptive and inferential statistics.

The tools used for the study were categorized into 2 sections.

The tool consists of two sections:

SECTION-I: It consists of 15 questions to collect the demographic data of elderly people such as age, gender, religion, marital status, education, occupational status, residence, financial assistance, number of the children, residence of children of respondents, channel to join in old age home, duration of stay in old age home, frequency of visitors, health status and treatment.

SECTION-II: It consists of standardized Perceived Stress Scale which was developed by Cohen et al., (1983). It consists of 14 statements which were scored based on 5 point Likert scale. Among 14 statements 7 are reverse scored. (Question No.4, 5, 6, 7, 9, 10, 13)

0=Never, 1=Almost Never, 2 =Sometimes, 3=Fairly Often, 4=Very Often

INTERPRETATION OF SCORES:

The score was interpreted in the following manner

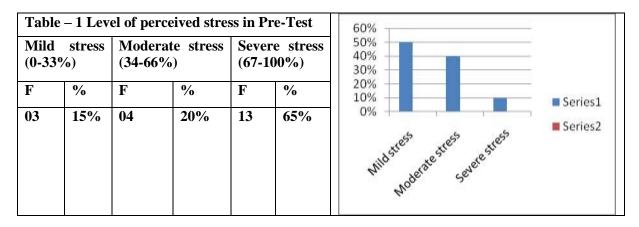
A score between 0 – 18 (0% - 32%) — Mild stress A score between 19 – 37 (33% - 66%) — Moderate stress A score between 38 – 56 (67% - 100%) — Severe stress

III RESULTS AND DISCUSSIONS

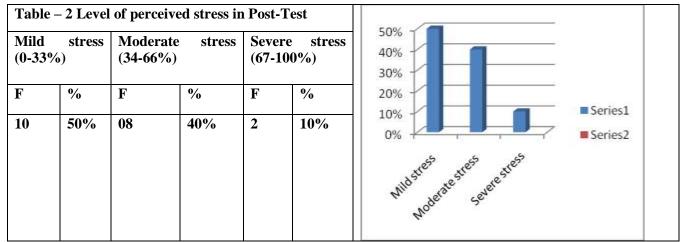
The results of the study done among elderly (N=20) on their levels of perceived stress was depicted under the following tables:

- Among 20 selected elderly, majority 4 (20%) had moderate stress, 13 (65%) had severe stress and 3 (15%) had mild stress in the pre assessment of perceived stress levels.
- After the administration of audio video assisted humor, majority 10 (50%) had mild stress, 8 (40%) had moderate stress and 2(10%) had severe stress in the post assessment of perceived stress levels. It represents that audio video assisted humor was effective in reduction of perceived stress levels among elderly people.
- The present study also revealed that there was no statistically significant association between post assessment of perceived stress levels and the demographic variables such as age of elderly persons,

gender, religion, marital status, education, occupational status, residence, number of children, residence area of children, duration of stay in old age home and elderly persons suffering with illness. There was statistically significant association between post assessment of perceived stress levels and the demographic variables such as financial assistance and frequency of visitors to the participant at p<0.01 level of significance.

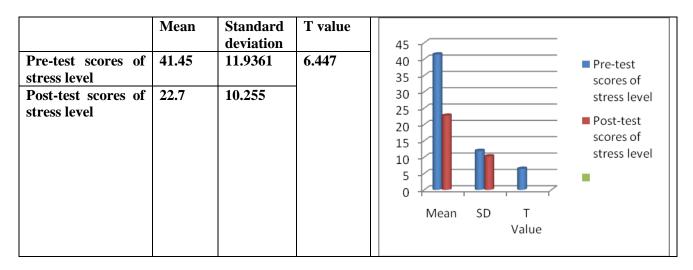


The data presented in the Table –1 shows the perceived stress levels among elderly persons 4 (20%) had moderate stress, 13(65%) had severe stress and 3(15%) had mild stress.



The data presented in the Table 2 shows that the stress levels among elderly are majority 10 (50%) had mild stress, 8(40%) had moderate stress and 2(10%) had severe stress. It represents that audio-video assisted humor is effective in reduction of perceived stress levels of elderly people.

The mean score 41.45 and standard deviation 11.9361 obtained in the pre- test and a mean score 22.7 and standard deviation 10.255 were obtained in the post test for the perceived stress levels among elderly persons showed that there was a decrease in mean and standard deviation after the administration of audio video assisted humor for elderly persons.



CONCLUSION

The **first objective** of the study was to assess the level of perceived stress among elderly persons. Table 1 showed that 3(15%) of the elderly had mild stress, 4(20%) had moderate stress and 13(65%) had severe stress.

The result of the present study was supported by earlier study conducted by Chokkanathan S (2009) on Resources, stressors and psychological distress among older adults in Chennai. Data was collected from 400 adults among 65 yrs and above by using epidemiological Studies Depression Scale and Geriatric Depression scale. Results showed that resources had an indirect, negative relationship with psychological distress, and stressors had a direct, positive effect on distress.

The **second objective** of the study was to evaluate the effectiveness of audio video assisted humor on reduction of perceived stress among elderly persons. Table 2 showed that 10(50%) had mild stress, 8(40%) had moderate stress and 2(10%) had severe stress. It represents that audio video assisted humor was effective in the reduction of perceived stress levels among elderly.

The results of the study were supported by earlier study conducted by **Bennett M P et al., (2003)** on the "effect of mirthful laughter on stress and natural killer cell activity". Data was collected from 33 healthy adult women by stress arousal check list. Humor response scale and chromium release natural killer cell cytotoxic assay before and after which experimental subjects viewed a humorous video while subjects in the distraction control group viewed a tourism video. Results were showed that stress decreased for subjects in the humor group compared with those in the distraction group. The study concluded that humor shows reduce stress and improve natural killer cell activity.

There was no statistically significant association between post assessment of perceived stress levels and the demographic variables such as age of elderly persons, gender, religion, marital status, education, occupational status, residence, number of children, residence area of children, duration of stay in old age home and elderly persons suffering with illness. There was statistically significant association between post assessment of perceived stress levels and the demographic variables such as financial assistance and frequency of visitors to the participant at p<0.01 level of significance.

REFERENCES

- 1. Abel M.H. Humor, Stress and Coping strategies. Humor.2002; 15:365-381.
- 2. Aruna Dubey, Seema Bahasin, Neelima Gupta and Neeraj Sharma." A study of elderly living in Old age Home and within the Family set up in Jammu. Stud Hom Com Sci.2011; 5(2): 93-98.
- **3.** Balick M, Lee R. The role of laughter in traditional medicine and its relevance to clinical setting. Alternative Therapies of Health and Medicine. 2003;9: 88-91.
- 4. Barry O Smith, Psychology Science and Understanding. McGraw Hill Publishers. First edition. 1998;515-516
- 5. Benett MP, Zeller JM, Rosenberg L, McCann J. The effect of mirthful laughter on stress and natural killer cell activity. Altern Ther Health Med. 2003 Mar-Apr; 9(2); 38-45.
- **6.** Beullens J. Elderly and Humor. Tijdschr Gerontol Geriatr. 2000 Jun; 31(3): 107-112.
- 7. Celso BJ, Ebener DJ, Burkhead EJ. Humor coping, health status and life satisfaction among older adults residing in assisted living facilities. Journal of Aging Mental Health. 2003; 7(6):438-45.
- **8.** Chokkanathan S.Resources, Stressors and Psychological distress among older adults in Chennai, India. Soc Sci Med. 2009 Jan; 68(2): 243-250.
- 9. Coulture M, Lariviere N, Lefrancois R. Psychological distress in Older adults with low functional independence: a multidimensional perspective. Arch Gerontol Geratrics.2005 Jul-Aug; 41(1)