

**COMPARATIVE STUDY ON ANXIETY IN RAMADAN BETWEEN
FASTING AND NON- FASTING FEMALE ISLAMIC
PHYSICAL EDUCATION STUDENTS**

Khairuzzaman Mallick*, Biswabandhu Nayek** & Dr. Debaprasad Sahu***

ABSTRACT

The present investigation has been conducted with the aim to compare Anxiety in Ramadan between fasting and non fasting female Islamic Physical Education college students. The study was conducted on 60 female Islamic Physical Education College students (30 fasting female Islamic Physical Education College students, 30 Non- fasting female Islamic Physical Education College students) selected from Sree Chaitanya Mahavidyalaya and Netaji Satabarshiki Mahavidyalaya in Ramadan month during 29th June 2014 to 28th July 2014. Anxiety was observed by the GAD-7 Anxiety questionnaire, developed by Drs. Robert L. Spitzer, Janet B.W. Williams, Kurt Kroenke, and colleagues. To analyze the data for the Anxiety, t' test was applied to calculate the collected data at 0.05 level of significance. The age ranging of the subjects was between 18-22 years. The result showed that there was significant difference between fasting female Islamic Physical Education College students and Non- fasting female Islamic Physical Education College students. The Non- fasting female Islamic Physical Education College students had less anxiety than the fasting female Islamic Physical Education College students.

Key words: - Anxiety, Ramadan, Fasting, Islamic Physical Education College students

*Lecturer, Department. of Physical Education, Netaji Satabarshiki Mahavidyalaya, Ashokenagar, North. W.B, India) e-mail- kmallick25@gmail.com

**Lecturer, Department. of Physical Education, Sree Chaitanya Mahavidyalaya, Habra, North W.B, India.

***Assistant Professor & Head, Department. of Physical Education, Mahishadal Girls' College, W.B India.

INTRODUCTION

Ramadan represents one of the widest celebrated religious traditions in the world. As one of the “five pillars” of Islam, Ramadan corresponds to the ninth month of the Islamic lunar calendar during which Muslims fast. Literally, Ramadan fasting (*sawm* in Arabic) means self-refraining: It involves not only abstinence from eating, drinking, during the daylight hours, but also a high control level of one’s thoughts, attitudes, and behaviors. Concretely, Muslims have to develop a closer relationship with Allah, strengthen ties with siblings, parents, friends, and restrain from touching, listening, saying, or looking at unlawful things, or going to evil places. From a spiritual standpoint, Ramadan can be considered as a time of self-reflection, because Muslims evaluate themselves in light of Islamic guidance, and a self-reformation time during which Muslims develop patience, humility, compassion, empathy, and generosity. Religion, defined as “...cognition, affect, and behavior that arise from awareness of, or perceived interaction with, supernatural entities that are presumed to play an important role in human affairs” is a psychosocial force capable of modifying human lives trajectories.

The month of Ramadan comes every year according to Islamic calendar. It is considered to be holy month by the Muslims. During this month, it is obligatory for all healthy Muslims to pray and keep fast. During this month, the Muslims do not eat or drink anything from dawn to dusk. The fasting period varies between 12-14 hours. Islamic calendar is lunar, and hence, Ramadan is not fixed to any season or month. With each year it advances by 11 days. The duration of fast may vary from 12 -18 hrs depending upon the season and location of a country. Ramadan fasting is different from starvation. During starvation one does not eat or drink for more than 24 hours. Ramadan fasting, unlike starvation, can be considered to be a type of intermittent fasting, in which there are periods of fasting and feasting. Lot of studies have been done on starvation but there are very few studies on intermittent fasting. Intermittent fasting has been to be beneficial in previous studies done by Aksungar F B (2005). A lot of physiological, psychological and spiritual changes take place in the human body in people who fast during Ramadan month.

Anxiety refers to a sort of nervous and fear emotion formed by frustration of self-esteem and self- confidence, or increasing of the sense of failure and guilty, which is resulted by the threat from being unable to achieve goals or to overcome obstacles (Akbar et al., 2011). Anxiety can have a devastating effect on the performance of an athlete. No matter how much talent or skill one may have, he will never perform at his or her best if he or she lives in fear before every event. Among the psychological disorders, anxiety, stress, and depression have unfortunately been highly prevalent and widespread. According to World Health Organization, almost 500 million people worldwide are suffering from mental disorders, among who half are developing mood disorders such as depression and anxiety. Anxiety disorders are the most common psychiatric disorders in the general population, and presently about 30 million people in America are suffering from this disorder. It is estimated that at least 7 million of Iranian population suffer from one or more of psychiatric disorders.

Although fasting in the holy month of Ramadan is influential on physical and mental health based on religion of Islam, and several studies have described the effect of fasting on physical health, few investigations have addressed to the relationship between fasting and

mental health, in which fasting has been concluded to be effective on diminishing anxiety and paranoid ideation and augmenting mental health and self-esteem.

Ramadan fasting, as an Islamic ritual, is of particular importance for Muslims. During this month, Muslims avoid eating, drinking, and smoking from dawn to sunset. Since lunar months coincide with different times of the year, fasting may extend to more than 18 hours. Prolonged fasting causes inhibition of hypothalamic-pituitary-thyroid axis in perfectly healthy individuals

The purpose of the study was to analyze the anxiety in Ramadan between fasting and non fasting female Islamic Physical Education college students.

METHODOLOGY

Sample:

For the purpose of the study 30 Fasting female Islamic Physical Education college students and 30 non- Fasting female Islamic Physical Education college students, in Ramadan month during 29th June 2014 to 28th July 2014 (Last week of Ramadan at 2pm-3pm) from Sree Chaitanya Mahavidyalaya and Netaji Satabarshiki Mahavidyalaya were selected randomly for the purpose of this study. The age of the subjects were ranged between 18-22 years.

Instrument:

To compare the anxiety between Fasting Islamic Physical Education college students and non- Fasting Islamic Physical Education college students in Ramadan month, data were collected by using GAD-7 Anxiety questionnaire, developed by Robert L. Spitzer, Janet B.W. Williams, Kurt Kroenke, and colleagues.

RESULTS AND DISCUSSION

Student's 't' test at 0.05 level of significance was applied to calculate the significance of difference between fasting and non fasting Islamic Physical Education college students and data pertaining to this have been presented in Table1 and depicted in Figure 1

TABLE 1
SIGNIFICANCE OF DIFFERENCE IN ANXIETY BETWEEN FASTING AND NON
FASTING FEMALE ISLAMIC PHYSICAL EDUCATION
COLLEGE STUDENTS IN RAMADAN

Groups	Mean	SD	t-ratio
Fasting students	7.166	1.69	5.10*
Non -Fasting Students	4.8	1.57	

*Significant at .05 level, $t_{0.05}(58)=2.00$

From the above table 1, it was found that the mean and standard deviation of Fasting female Islamic Physical Education college students in Ramadan on anxiety is 7.166 ± 1.69 and

the mean and standard deviation of Non –Fasting female Islamic Physical Education college students in Ramadan on anxiety is 4.8 ± 1.57 and the 't' value of anxiety is 5.10 that is significant at 0.05 level of significance.

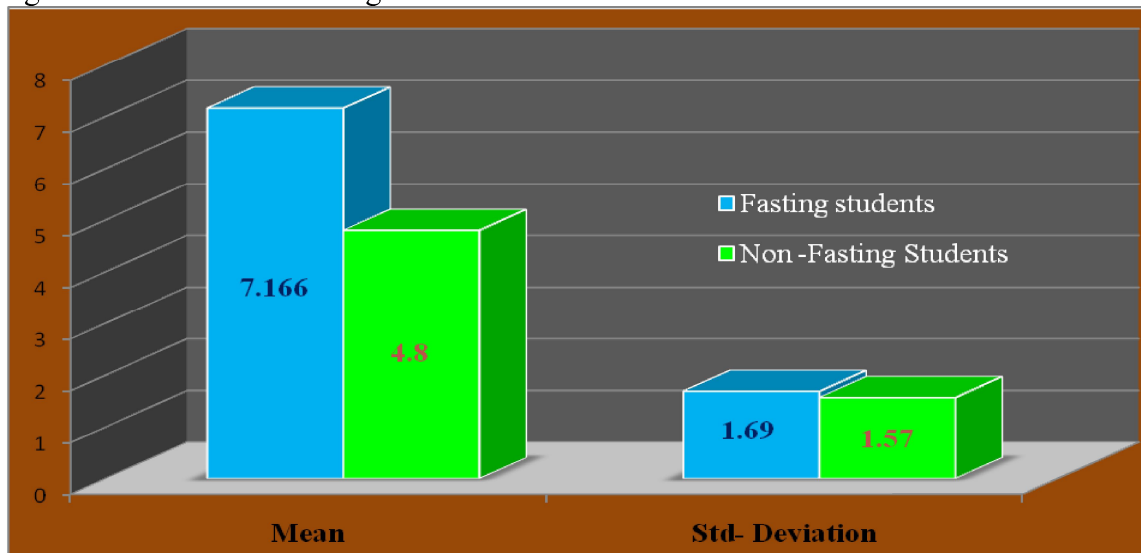


Figure1:- Mean Scores of Anxiety of Fasting and Non fasting Female Islamic Physical Education College Students in Ramadan.

DISCUSSION

From the finding of this study it has been observed that there was significant difference in Anxiety in Ramadan between fasting and non fasting female Islamic Physical Education college students. Because prolonged fasting is generally not conducive to a healthy lifestyle. Depriving the body of water and essential nutrients by dividing and postponing meals to irregular intervals does nothing to limit consumption. In-fact it causes a host of health, performance and mood disorders. Numerous studies have reported significant weight loss during Ramadan (Adlouni, Ghalim, Benslimane, Lecerf, & Saile, 1997; Adlouni et al., 1998; Fedail, Murphy, Salih, Bolton, & Harvey, 1982; Kayikcioglu, Erkin, & Erakgun, 1999; Ramadan, Telahoun, Al-Zaid, & Barac-Nieto, 1999; Schmahl & Metzler, 1991; Sweileh, Schnitzler, Hunter, & Davis, 1992). The declines may result from water loss early in Ramadan and loss of body fat during the later period (Sweileh et al., 1992). Loss of body fat would indicate the use of fat for energy production during Ramadan (Husain, Duncan, Cheah, & Ch'ng, 1987; Ramadan et al., 1999; Sweileh et al., 1992). In addition, researchers have found decrease heart rate and oxygen consumption during Ramadan (Husain et al., 1987; Ramadan et al., 1999; Sweileh et al., 1992). These findings suggest a metabolic adaptation to fasting. It seems that during the Ramadan daylight hours - when no food or water is taken in - to conserve stored energy, the metabolism slows down (Sweileh et al., 1992).

During Ramadan change of meal schedule is accompanied with changes in sleep habits, such as delayed and shortened sleep periods, which may affect endocrine and Neuroendocrine circadian patterns. Several cardiovascular parameters (i.e., heart rate, blood pressure, vascular tone, and coagulation-fibrinolysis) show circadian pattern. Several studies

reported that autonomic activity and melatonin rhythm city may be responsible for circadian patterns of cardiovascular parameters. Changes of sleep habit in Ramadan affect autonomic activity and melatonin rhythm city. Result of this study also reflects same.

BIBLIOGRAPHY

- Aksungar, F.B., Eren, A., Ure, S., Teskin, O., and Ates, G.** “Effects of intermittent fasting on serum lipid levels, coagulation status and plasma homocysteine levels” . Ann Nutr Metab. 49 :2 (March, 2005):77-82.
- Adlouni, A., Ghalim, N., Saile, R., Had, N., Parra, H.J. & Benslimane.** “A. Beneficial effect on serum apo AI, apo B and Lp AI levels of Ramadan fasting”. Clin. Chim. Acta 271 (1998) : 179–189.
- Fedail, S.S., Murphy, D., Salih, S.Y., Bolton, C.H. & Harvey, R.F.** “Changes in certain blood constituents during Ramadan”. Am. J. Clin. Nutr. 36 (1982): 350–353.
- Husain, R., Duncan, M.T., Cheah, S.H. & Ch'ng, S.L.** “Effects of fasting in Ramadan on tropical Asiatic Moslems”. Br. J. Nutr. 58 (1987): 41–48.
- Kliegman, R.M., Marcdantw, K., Behrman, R.E.** Essentials of Pediatrics. 5th ed. Philadelphia: Elsevier Saunders, 2006.
- Mohammadi, M.R., Davidian, H., and Noorbala A** “An epidemiological survey of psychiatric disorders in Iran”. Clin Pract Epidemiol Ment Health. 1 (2005) :16–22.
- Mohammed Ali Akbar, Charles Tracy, Walter H.A. Kahr, and Helmut Krämer** “The full-of-bacteria gene is required for phagosome maturation during immune defense in *Drosophila*” 192 : 3 (January, 2011) : 383-390
- Ramadan, J., Telahoun, G., Al-Zaid, N.S. & Barac-Nieto, M.** “Response to exercise, fluid, and energy balances during Ramadan in sedentary and active males”. Nutrition 15 (1999) :735–739.
- Robert, L., Spitzer, Janet, B.W., Williams, Kurt Kroenke and colleagues.** GAD-7 Anxiety Questionnaire Pfizer Inc. Copyright© 1999
- Spitzer, R.L., Kroenke, K., Williams, J.B.** “A brief measure for assessing generalized anxiety disorder: the GAD-7”. Arch Intern Med. 166 : 10: (May2006) : 1092-1097.
- Sweileh, N., Schnitzler, A., Hunter, G.R. & Davis, B.** “Body composition and energy metabolism in resting and exercising Muslims during Ramadan fast”. J. Sports Med. Phys. Fitness 72 (1992) : 156–163.
- World Health Report**, Geneva: World Health Organization; 2001.