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## A STUDY ON MENTAL HEALTH BEHAVIOUR BETWEEN SPORTS PERSON AND NON SPORTS PERSON

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**KEYWORDS:** Mental Health, Questionnaires, sports person, non-sports person.

### INTRODUCTION :

The present day youth generation of young children is facing such confronting changes occurring in all sphere of life and at a very fast pace as never before. There is a substantial body of evidence that shows a positive relationship between physical activity and mental health and illness (Biddle et al., 2000; Biddle & Mutrie 2001, Daley 2002, Fontaine, 2000, Saxena et al. 2005). The explosion in technological field, particularly in the electronics has opened several avenues for them. Youngsters appreciate playing innovative, emulative and self expressive games on computer, For quite a while, it has been common knowledge that exercise is good for one's physical health. It has only been in recent years, Physical activity is a medium through which

### ABSTRACT

The purpose of the study was to compare the mental health behaviour between sports person and non sports person. To achieve the purpose 150 sports person and 150 non sports person (75 male and 75 female in each discipline) were selected randomly as subject, the age ranging from 20 to 25 year. Sports - person who participating in different sports activity and non sports person did not participate any activity. Standardized questionnaire was used for measuring the Mental Health Battery (Singh & Sengupta) was used to collect the data. The

statistical technique Two-way Analysis of Variance (ANOVA) was used and the level of significance was set at 0.05 levels for testing the hypothesis. The result revealed that there were significant differences between sports person and non sports person of G.G.U Bilaspur in various dimension of mental health. The conclusion is drawn that there is a significant difference in mental health behaviour of among the sports person and non sports person as it is conformed. It might be due to their living condition and poverty made them to manage their emotion.

great mental health of individual can be kept up. Furthermore, if an individual has great mental health he will be willing to approach competitive situation.

The mental health portrays a level of psychological well-being, or an absence of a mental Prosperity. As of late clinical analysts and also educationists have begun giving legitimate consideration regarding the investigation of psychological mental health. However, in India, relatively very little work has been conducted (Gahlawat & Gahlawat, 2012, Rani, Malik & Thapa, 2012). Art of brain science benefits society and upgrades our lives. Psychologists analyzed the connection between mind capacity and behaviour, and the environment and behaviour, applying what they figure out how to enlighten our comprehension and enhance our general surroundings

The WHO describes mental health as a condition of prosperity in which the individual understands his or her own abilities, can adapt with the normal stresses of life, can work profitably and productively and is can to make a contribution to his or her community (WHO, 2001). In this sense, psychological well-being is the establishment for prosperity and viable working for an individual and group. It is essential to an individual's ability to perceive, comprehend and interpret their surroundings, to adapt to them or change them if necessary, and to communicate with each other and have successful social interactions. Healthy human abilities and functions enable people to experience life as meaningful, helping them, among other things, to be creative and productive members of society (WHO, 2005). Mental health is an list which demonstrates the degree to which the individuals has possessed the capacity meet his/her natural request it might be social, emotional or physical. However, when an individual finds himself/herself trapped in a situation he/she does not have effective coping strategies to deal with it effectively, thus he/she gets himself/herself rationally strained. This psychological wellness is by and large reflected in indications like nervousness, pressure, anxiety or sadness among others.

In today's period, the value of physical activity and practice programme for all classes of the general public especially for students who are always involved in mental exercises and have huge parts roles in the future of the society is clear. Sound mind in a healthy body has dependably been thought to be the perfect condition of health. Mental health is the adjusted improvement of one's personality having good emotional attitude which enables one to live happily with one's surroundings, It likewise incorporates great relationship between a man and society on the loose.

## MATERIALS AND METHODS

For the presents study descriptive comparative technique was utilizes. It was utilized to evaluate the mental health of sports women and non sports women player and to analyze between two groups.

### Sample

For the purpose of the study, 300 students were selected as subjects. Out of 300, 150 for sports person (male & female) and 150 non-sports person (male and female) were randomly selected as subject for the study. The subject was selected from different departments of the Guru Ghasidas Institutions of Bilaspur, Chhattisgarh state. The All players (sports persons) each from Volleyball, Basketball, Football, Badminton, Swimming and Track and Field (Sprinters & Jumpers) were selected as subjects in their respective game. The age of the subjects was between 18 to 25 years.

### Selection of Variable

In the present study, it is generalized by sports scientist. The investigator referred different relevant literature and consulted with expert in physical and psychological to identify most suitable variables. The following psychological variables to the selected are furnished below

## 1. Mental Health

### Tools used for data collection

The Arun Kumar Singh questionnaire was used to evaluate the mental health of the subject. This

questionnaire is used to measure mental health scale. this scale consist 130 question (Arun Kumar singh and alpna sen gupta) its having six sub scale measure emotional stability, over all adjustment, Autonomy, Security-Insecurity, Self concept, Intelligence. Emotional stability subscale includes 15 items, over-all adjustment included 40 items, Autonomy includes 15 items, Security-Insecurity includes 15 items, self-concept includes 15 items, and Emotional stability includes 30 items to measuring the mental health.

### Procedure

Mental health battery develops by Arun kumar singh and Alpana Sen Gupta, The concept of mental health takes a 'Gestalt' view of the individual. It incorporates the concept of personality characteristics and behaviour. Mental health battery contains 130 items and the following seven subscales.

Part	Area	Total No. of Items
I	Emotional Stability (ES)	15
II	Over-all Adjustment (OA)	40
III	Autonomy (AY)	15
IV	Security-Insecurity (SI)	15
V	Self-Concept (SC)	15
VI	Intelligence (IG)	30
<b>Total</b>		<b>130</b>

### Scoring

Mental Health Battery comprises of two section-Section A and Section B

Section A – Preliminary information should be given in Section A to determine socio-economic status (SES). Scored earned should be added together to yield final total score .SES should be judged as under.

- 15-17 = Upper SES
- 9 – 14 = Middle SES
- 8 or Below = Low SE

### Scoring Keys

Section B – the answer of those items which fell with the answer in the scoring key should be given a score of one (+1). If they don't tally they will be given a score of zero (0).

The author has given the following classification criteria: -

Raw Score	Explanation
90 and above	Excellent Mental Health
70 – 89	Good Mental Health
50 -69	Average Mental Health
30 -49	Poor Mental Health
Below 29	Very Poor Mental Health

### STATISTICAL TECHNIQUE

To evaluate the score of mental health behaviour descriptive statistics i.e. Mean, Standard Deviation, Standard Error and were used. The "Two-way Analysis of Variance (ANOVA) was applied to find out the

significant differences between sports person and non- sports person. To test the hypotheses, the level of significance was set at 0.05.

**Table-1**  
**Descriptive Statistics of Sports Person and Non-Sports Person in relation to Emotional-Stability (Mental Health)**

Person	Gender	Mean	Std. Deviation	N
Sports-Person	Male	9.6133	1.70764	75
	Female	9.6800	1.86112	75
	Total	9.6467	1.78034	150
Non-Sports Person	Male	10.3467	1.92770	75
	Female	8.9600	2.00297	75
	Total	9.6533	2.07893	150
Total	Male	9.9800	1.85179	150
	Female	9.3200	1.96041	150
	Total	9.6500	1.93217	300

In this table -1 show that mean and standards score of sports person (male and female) in emotional stability (mental health) are 9.61, 9.68 and 1.70, 1.86 respectively. The mean and standards score of non-sports person (male and female) in emotional stability are 10.34, 8.96 and 1.92, 2.00 respectively.

**Table-2**  
**Two way Analysis of Variance for the Comparison of Emotional-Stability (Mental Health) among Columns (Male and Female) and row (Sports Person and Non-sports Person) and their interaction**

Source	Type III Sum of Square	df	Mean Square	F	Sig.
Person	.003	1	.003	.001	.975
Gender	32.670	1	32.670	9.263*	.003
Person*Gender	39.603	1	39.603	11.229*	.001
Error	1043.973	297	3.527		

\* Significance at .05 level

Table-2 reveals that insignificant difference in the score of emotional-stability between sports person and non sports person as obtained f- value of .001 was lower than the required table value of 3.86 at 1, 297 df.

Table-2 also reveals that that significant difference in the score of emotional-stability between male and female since calculated f value of 9.263 was greater than the required value of 3.86 at 1, 297 df.

Significant difference was found between gender and participant types hence person and gender have impact on emotional stability as obtained f- value of 11.22 was greater than the required table value 3.86 at 1, 297 df.

Figure-1

Graphical Representation of Mean and Standard deviation of Emotional-Stability (Mental Health) of Sports Person and Non-Sports Person

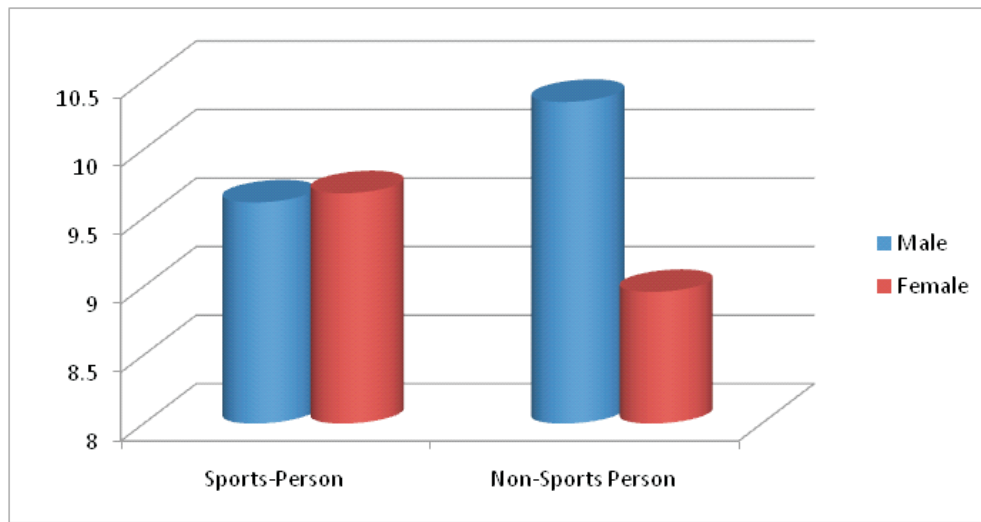


Table-3

Descriptive Statistics of Sports Person and Non-Sports Person in relation to Adjustment (Mental Health)

Person	Gender	Mean	Std. Deviation	N
Sports-Person	Male	28.0400	3.49687	75
	Female	26.4133	4.33120	75
	Total	27.2267	4.00695	150
Non-Sports Person	Male	26.2400	3.83737	75
	Female	24.4533	4.04466	75
	Total	25.3467	4.03007	150
Total	Male	27.1400	3.76852	150
	Female	25.4333	4.29049	150
	Total	26.2867	4.12081	300

In this table -3 show that mean and standards score of sports person (male and female) in adjustment (mental health) are 26.24, 24.45 respectively. The mean and standards score of non-sports person (male and female) in adjustment (mental health) are 26.24, 24.45 and 3.83, 4.04 respectively.

Table-4

Two way Analysis of Variance for the Comparison of Adjustment (Mental Health) among Columns (Male and Female) and row (Sports Person and Non-sports Person) and their interaction

Source	Type III Sum of Square	df	Mean Square	F	Sig.
Person	265.080	1	265.080	17.082*	.000
Gender	218.453	1	218.453	14.077*	.000
Person*Gender	.480	1	.480	.031	.861
Error	4593.333	297	15.518		

\* Significance at .05 level

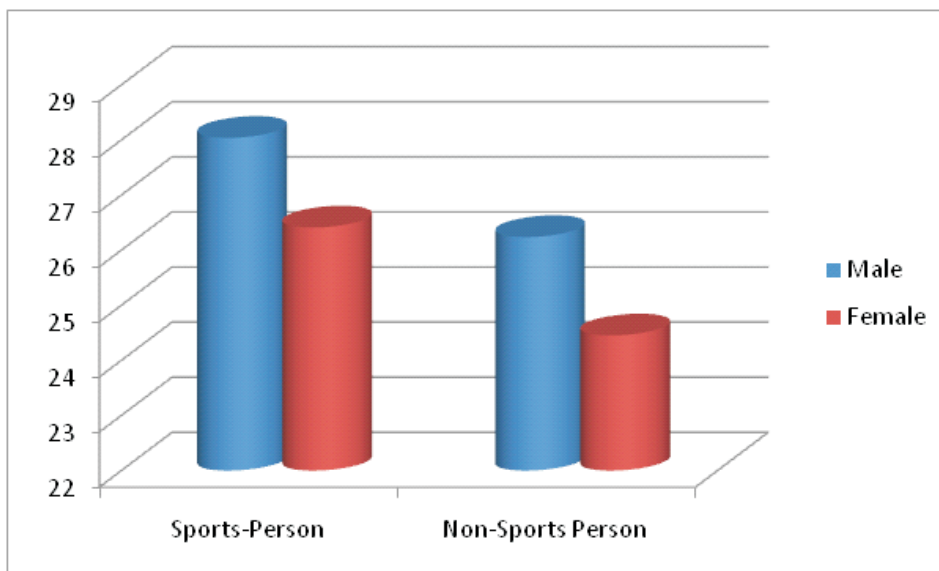
Table- 4 reveals that significant difference in the score adjustment between sports person and non sports person as obtained f- value of 17.08 was greater than the required table value of 3.86 at 1, 297 df.

Table- 4 also reveals that that significant difference in the score between male and female as obtained f-value of 14.07 was greater than the required table value of 3.86 at 1, 297 df.

Insignificant difference was found in the score between gender and participants types hence have no impact of adjustment as obtained f value of .031 was lower than required table value of 3.86 at 1, 297 df.

**Figure-2**

**Graphical Representation of Mean and Standard deviation of Adjustment (Mental Health) of Sports Person and Non-Sports Person**



**Table-5**

**Descriptive Statistics of Sports Person and Non-Sports Person in relation to Autonomy (Mental Health)**

Person	Gender	Mean	Std. Deviation	N
Sports-Person	Male	9.9067	1.37716	75
	Female	10.5200	1.48288	75
	Total	10.2133	1.45900	150
Non-Sports Person	Male	10.2667	2.022907	75
	Female	9.7200	1.87126	75
	Total	9.9933	1.96444	150
Total	Male	10.0867	1.73761	150
	Female	10.1200	1.72980	150
	Total	10.1033	1.73089	300

In this table -5 show that mean and standards score of sports person (male and female) in autonomy (mental health) are 9.90, 10.52 and 1.37, 1.48 respectively. The mean and standards score of non-sports person (male and female) in autonomy are 10.26, 9.72 and 2.02, 1.87 respectively.



Table-6

Two way Analysis of Variance for the Comparison of Autonomy (Mental Health) among Columns (Male and Female) and row (Sports Person and Non-sports Person) and their interaction

Source	Type III Sum of Square	df	Mean Square	F	Sig.
Person	3.630	1	3.630	1.240	.266
Gender	.083	1	.083	.028	.866
Person*Gender	25.230	1	25.230	8.615*	.004
Error	866.853	297	2.929		

\* Significance at .05 level

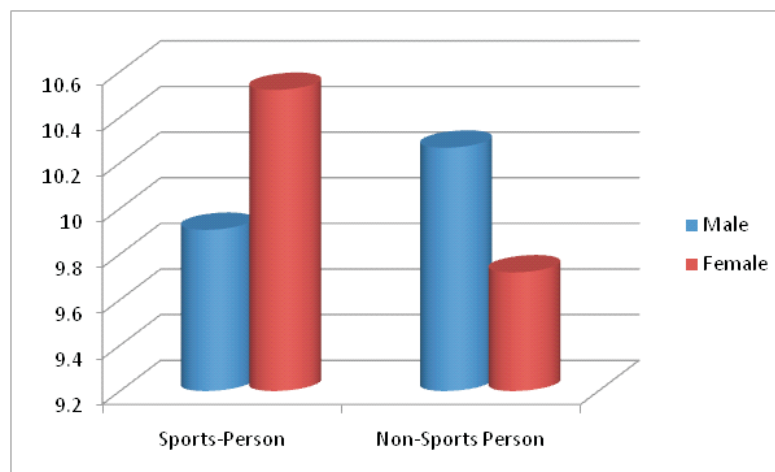
Table-6 reveals that insignificant difference in the score of autonomy between sports person and non sports person as obtained f- value of 1.240 was lower than the required value of 3.86 at 1, 297 df.

Table-6 also reveals that that insignificant difference in the score of autonomy between male and female as obtained f- value was lower than the required table value of 3.86 at 1, 297 df.

Significant difference in the score of autonomy between gender and participant types hence person and gender have impact on autonomy as obtained f- value of 8.615 was greater than the required table value of 3.86 at 1, 297 df.

Figure-3

Graphical Representation of Mean and Standard deviation of Autonomy (Mental Health) of Sports Person and Non-Sports Person



**Table -7**  
**Descriptive Statistics of Sports Person and Non-Sports Person in relation to Security-Insecurity (Mental Health)**

Person	Gender	Mean	Std. Deviation	N
Sports-Person	Male	8.7067	1.67472	75
	Female	9.2800	1.59865	75
	Total	8.9933	1.65678	150
Non-Sports Person	Male	8.7067	2.22257	75
	Female	9.1867	1.88661	75
	Total	8.9467	2.06858	150
Total	Male	8.7067	1.96119	150
	Female	9.2333	1.74332	150
	Total	8.9700	1.87103	300

In this table - 7 show that mean and standards score of sports person (male and female) in security-insecurity (mental health) are 8.70, 9.28 and 1.67, 1.53 respectively. The mean and standards score of non-sports person (male and female) in security-insecurity (mental health) are 8.70, 9.18 and 2.22, 1.88 respectively.

**Table-8**  
**Two way Analysis of Variance for the Comparison of Security-Insecurity (Mental Health) among Columns (Male and Female) and row (Sports Person and Non-sports Person) and their interaction**

Source	Type III Sum of Square	df	Mean Square	F	Sig.
Person	.163	1	.163	.047	.828
Gender	20.803	1	20.803	6.004*	.015
Person*Gender	.163	1	.163	.047	.828
Error	1025.600	297	3.465		

\* Significance at .05 level

Table-8 reveals that insignificant difference in the score of security-insecurity between sports person and non sports person as obtained f- value of .047 was lower than the required table value of 3.86 at 1, 297 df.

Table-8 also reveals that that significant difference in the score of security-insecurity between male and female as obtained f- value of 6.004 was greater than the required table value of 3.86 at 1, 297 df.

Insignificant difference in the score of security-insecurity between gender and participants types as obtained f- value of .047 was lower than the required table value of 3.86 at 1, 297 df.

Figure-4

Graphical Representation of Mean and Standard deviation of Security-Insecurity (Mental Health) of Sports Person and Non-Sports Person

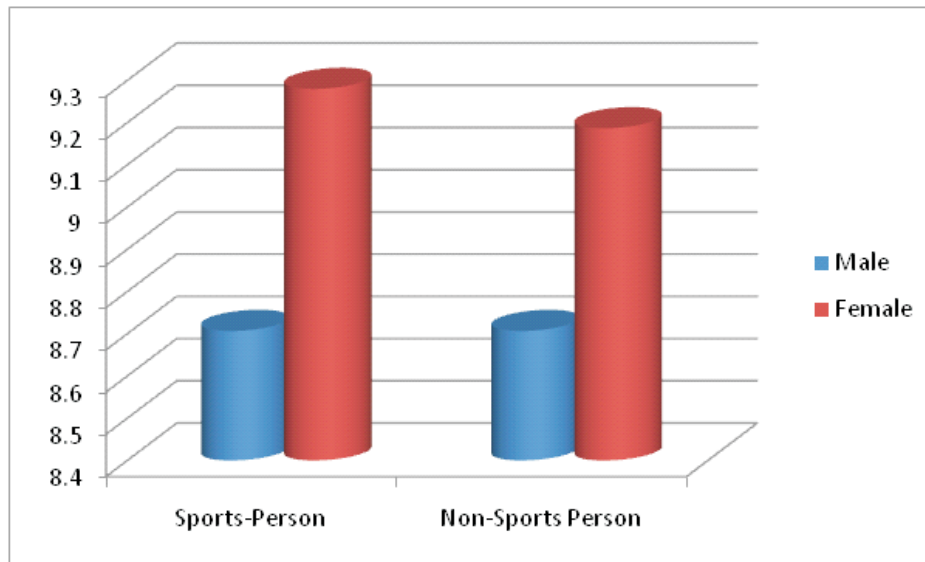


Table-9

Descriptive Statistics of Sports Person and Non-Sports Person in relation to Self-Concept (Mental Health)

Person	Gender	Mean	Std. Deviation	N
Sports-Person	Male	8.8933	2.01060	75
	Female	9.0667	1.86238	75
	Total	8.9800	1.93335	150
Non-Sports Person	Male	8.1600	1.84567	75
	Female	8.4800	2.00243	75
	Total	8.3200	1.92587	150
Total	Male	8.5267	1.95828	150
	Female	8.7733	1.94952	150
	Total	8.6500	1.95454	300

In this table -9 show that mean and standards score of sports person (male and female) in self concept (mental health) are 8.89, 9.066 and 2.01, 1.86 14 respectively. The mean and standards score of non-sports person (male and female) in self-concept are 8.16, 8.48 and 1.84, 2.00 respectively.

**Table-10**

**Two way Analysis of Variance for the Comparison of Self-concept (Mental Health) among Columns (Male and Female) and row (Sports Person and Non-sports Person) and their interaction**

Source	Type III Sum of Square	df	Mean Square	F	Sig.
Person	32.670	1	32.670	8.754*	.003
Gender	4.563	1	4.563	1.223	.270
Person*Gender	.403	1	.403	.108	.743
Error	1104.613	297	3.732		

\* Significance at .05 level

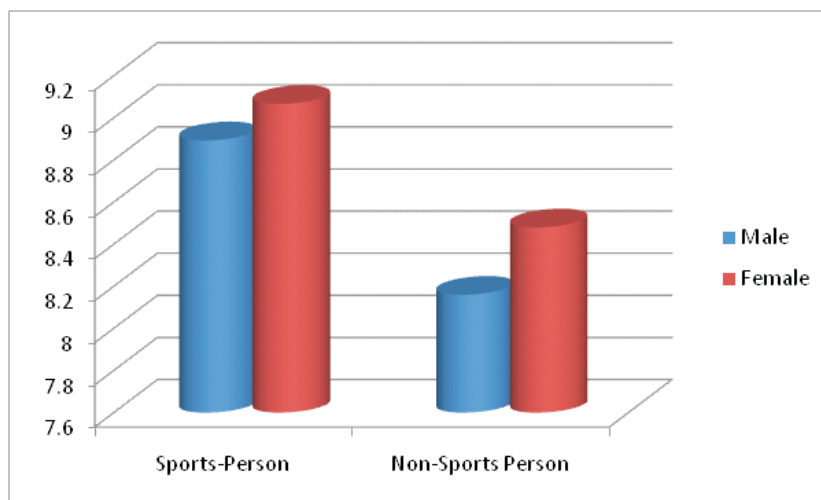
Table-10 reveals that that significant difference in the score of self-concept between sports person and non sports person as obtained f- value of 8.75 was greater than the required table value of 3.86 at 1,297 df.

Table-10 also reveals that that insignificant difference in the score of the self-concept between male and female as obtained f- value of 1.22 was lower than the required table value of 3.86 at 1, 297 df.

Insignificant difference was found between gender and participants types hence person and gender have no impact on self concept as obtained f- value of .108 was lower than the required table value of 3.86 at 1, 297 df.

**Figure-5**

**Graphical Representation of Mean and Standard deviation of Self-Concept (Mental Health) of Sports Person and Non-Sports Person**



**Table-11****Descriptive Statistics of Sports Person and Non-Sports Person in relation to Intelligence (Mental Health)**

Person	Gender	Mean	Std. Deviation	N
Sports-Person	Male	18.7467	3.03624	75
	Female	20.4000	2.16857	75
	Total	19.5733	2.75717	150
Non-Sports Person	Male	18.9600	3.39889	75
	Female	19.2267	3.57383	75
	Total	19.0933	3.47831	150
Total	Male	18.8533	3.21362	150
	Female	19.8133	3.00422	150
	Total	19.3333	3.14247	300

In this table -11 show that mean and standards score of sports person (male and female) in Intelligence assault (mental health) are 18.74, 20.4 and 3.03, 2.16 respectively. The mean and standards score of non-sports person (male and female) in Intelligence are 18.96, 19.22 and 3.39, 3.57 respectively.

**Table-12****Two way Analysis of Variance for the Comparison of Intelligence (Mental Health) among Columns (Male and Female) and row (Sports Person and Non-sports Person) and their interaction**

Source	Type III Sum of Square	df	Mean Square	F	Sig.
Person	17.280	1	17.280	1.807	.180
Gender	69.120	1	69.120	7.229*	.008
Person*Gender	36.053	1	36.053	3.771	.053
Error	2830.213	297	9.562		

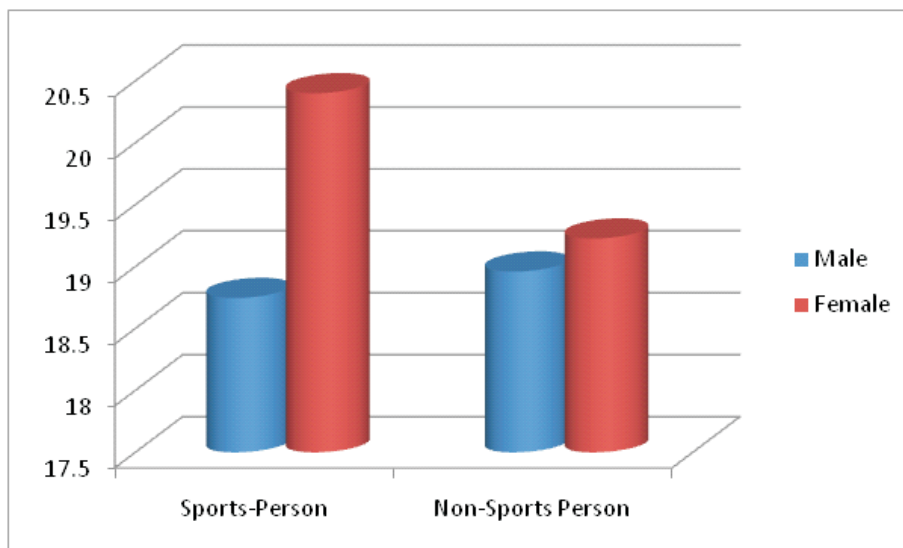
\* Significance at .05 level

Table-12 reveals that that insignificant difference in the scores of intelligence between sports person and non sports person as obtained f- value of 1.807 was lower than the required table value of 3.86 at 1, 297 df.

Table-12 also reveals that significant difference in the score of intelligence between male and female as obtained f- value of 7.229 was lower than the required value of 3.86 at 1, 297 df.

Insignificant interaction in the score between gender and participants types hence person and gender have no impact on intelligence as obtained f- value of 3.771 was lower than the required table value of 3.86 at 1, 297 df.

**Figure-6**  
**Graphical Representation of Mean and Standard deviation of Intelligence (Mental Health) of Sports Person and Non-Sports Person**



## DISCUSSION

The purpose of the study was to compare the mental health status of the Sports person and non-sports-person. The result is show that the significant different found between sports person and non sports person on mental health status. As we know that physical activity and sports programmed helps us to cope up with psychological mental health status

## Result

The result is show that the significant different was found between sports person (male and female) and non sports person(male and female) on mental health behaviours.

## REFERENCES

- 1.Abról (1997). "A study on achievement motivation in relation to intelligence, vocational interest, achievement, sex and SES" Ph.D. Education. Delhi Univ. Buch, M.B., Fifth survey of Research in Education. (1988-1992), Vol-II NCERT, New Delhi.
- 2.Agashe, C.D. (1991). "A psycho-social of mental health of players and non-players." Ph.D. Physical Education. Ravi Shankar Univ. Buch, M.B. Fifth survey of Research in Education. (1988-1992), Vol-II NCERT, New Delhi pp. 962.
- 3.Atkinson, J.W. (1964). An introduction to Motivation Princeton, J.W. (1964), N.J. Van Nostrand.
- 4.Bhagi, M. and Sharma, S. (1992). Encyclopedia Dictionary of Psychology (Vol-I) Anmol Publications, New Delhi.
- 5.Biddle, S. J. H. (2000). Emotion, mood and physical activity. In S. J. H. Biddle, K. R. Fox, & S. H. Boutcher (Eds.), Physical activity and psychological well-being(pp. 63–87). London: Routledge
- 6.Benard, W (1981). Mental hygiene for classroom teachers, Mc Grawhill book company Inc. Chakraborty, Ajita (1990). Study of social stress, adjustment health the progress of education. Vol. 63 no. 15, pp. 22-24
- 7.Colman, A.M. (2001). Dictionary of Psychology, New York, Oxford University, Press Inc. Das, M.J. (1989). "A study of the mental health of Teachers in the primary schools of puri town." M.Phil Education: Raven Shaw College.
- 8.Duda and Allison (1982). "Definition of success and failure; race, sex and situational variables". Journal of Research and Development in Education.
- 9.`Daley, A. (2002). Exercise therapy and mental health in clinical populations: Is exercise therapy a worthwhile

intervention? *Advances in Psychiatric Treatment*, 8, 262–270.

10. Good (1973). *Dictionary of Education* pleasure Hill Doom co Inc. New York, Mc Graw Hill, New York pp. 493-510.

11. Malavika (1991). "Adjustment of the working ladies." *Journal of Psychological Research*, Vol 35 No. 3, pp.9-51.

12. Murray (1983). *Explorations in Personality*, New York, Oxford University press.

13. Mutrie, N. (1997). The therapeutic effects of exercise on the self. In K. R. Fox (Ed.), *The physical self: From motivation to well-being* (pp. 287–314). Champaign, IL: Human Kinetics

14. Sandhu, Nachhattar Paul Singh (1992). "A study on achievement motivation, SES, educational inspirations and physical performances of high school hockey players and non-players." *Buch, M.B., Third survey of Research in Education. (1978-1983), NCERT, New Delhi.*

15. Saxena KB (2005) Pigeonpea (*Cajanus cajan* (L.) Millsp.). In: Singh RJ, Jauhar PR (eds) *Genetic resources, chromosome engineering and crop improvement*. Taylor and Francis, New York, pp 86–115

16. Vani, E, Manju (1995). "Sex, type of school, standards and mental health status of higher school students." *Experiments in Education. Buch, M.B., Third survey of Research in Education. (1978- 1983), NCERT, New Delhi.*

17. Vimla (1985). "A study of track performance of secondary school students in relation to achievement motivation and socio-economic status and school adjustment." *Buch, M.B., Fourth survey of Research in Education. (1983-1988), Vol-I NCERT, New Delhi.*

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