



(REVIEW ARTICLE)



## Mental health and academic achievement of secondary students in west Bengal

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### Abstract

A condition of mental health is characterized by an individual's self-awareness, ability to manage everyday stressors, productivity at work, and capacity to give back to the community. One of the most researched social effects of mental health issues is academic achievement. The purposes of this study how mental health related with academic achievement. In this study the researcher used descriptive type survey method and used mixed sampling method for data collection. Uses analysis by 't' test and 'co-efficient correlation'. 600 sample were selected for this study. Researcher developed the tool of mental health scale. The finding of this study is

- there is mean difference between Academic Achievement and Mental Health among secondary level students.
- Finding of the present study reveals that there is no mean difference between Male and Female Secondary Students in Mental Health
- In the present study, the researcher found mean difference between Rural and Urban Secondary Students in Mental Health.
- There is positive relationship between Academic Achievement and Mental Health among secondary level students.

**Keywords:** Mental Health; Academic Achievement; Secondary Students; Education

### 1. Introduction

The healthy development of a person's personality and emotional dispositions that allow him or her to coexist peacefully with other men or women is known as mental health. A condition of mental health is characterised by an individual's self-awareness, ability to manage everyday stressors, productivity at work, and capacity to give back to the community. In this way, having good mental health is essential to one's own wellbeing as well as the smooth operation of a community. Multi-sector oral action is needed to promote mental health, involving several government agencies as well as non-governmental or community-based organisations. Promoting mental health across the lifespan is important for giving kids a healthy start in life and preventing mental illnesses in adults and the elderly. One of the most researched social effects of mental health issues is academic achievement. The majority of research originates from fields outside than the sociology of mental health, such as developmental psychology, social epidemiology, and sociology of education (e.g., Campbell & Von Stauffenberg, 2007). According to these studies, young people with mental health issues do worse academically and have lower educational attainment than other young people. Exam results have been used in one way or another as a measure of academic achievement by a number of researchers (Chopra, 1968; Cronback & Furby, 1970; Deo Mohan, 1972; Jesudason, 1979; Kothurkar, 1962; Mahale, 1975; Pandey, 1973; & Singh, 1965; etc.). This association is consistent throughout the early life course—in elementary school (e.g., Alexander, Entwisle, & Dauber 1993; Farmer & Bierman 2002).

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## 2. Definition some terms

### 2.1. Mental health

World Health Organization (WHO) giving the specific define of Mental Health “Mental health is a state of mental well-being that enables people to cope with the stresses of life, realize their abilities, learn well and work well, and contribute to their community.”

### 2.2. Academic achievement

According to Cosmo Dictionary of Education, “Achievement is a performance in school or college on standardized series of education tests. The term is used more generally to describe performance in the subjects of the curriculum”.

### 2.3. Secondary school students

a school that serves as a bridge between elementary and college education, typically providing general education, technical courses, vocational training, and college preparation. A secondary school in India is an educational establishment that offers instruction to pupils in the secondary stage of their education, usually for those between the ages of 14 and 18. In India, classes 9 through 12 are commonly referred to as high school, or the secondary stage of education.

### 2.4. Significance of the study

In the present study, Mental Health have been considered as important factors in the learning process of the learners. Good Mental Health of the students helps to students personality, normal behavior for perceiving the achieved the knowledge for future and promotes a capacity to control a reasonable amount of frustration which results in students leading a happy healthy, and peaceful life. The development of Mental Health will lay a strong foundation for various development of a child’s Academic Achievement.

### 2.5. Statement of the problem

This research s actually conducted with a view to find out how the ‘Mental Health with relation to Secondary Students ‘Academic Achievement.

So, the researcher specified the research title as the ‘**MENTAL HEALTH AND ACADEMIC ACHIEVEMENT OF SECONDARY STUDENTS IN WEST BENGAL.**’

#### *Objectives of the study*

The objectives of this study is

- Analysis the differences of Mental Health and Academic Achievement of Secondary Students
- To describe the relationship between Mental Health and Academic Achievement of Secondary Students

### 2.6. Hypotheses of the study

- (Ho1) is: There exist no significant mean difference between Academic Achievement and Mental Health at the Secondary Level Students.
- (Ho2) is: There exist no significant mean differences between Male and Female Secondary Students in Mental Health.
- (Ho3) is: Determining the significance of the mean difference between Rural and Urban Secondary Students in Mental Health.
- (Ho4) is: There exist no significant relationships between Academic Achievement and Mental Health at the Secondary Level Students in West Bengal.

### 2.7. Delimitation of the study

The present study was delimited to the following:

- The present study is confined to secondary students of class 10th.
- The study was only Bengali medium Secondary Schools.

- The study was confined to the selected Rural and Urban schools.
- The present study has been conducted on WBBSE secondary schools of West Bengal state only.

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### 3. Methodology of the study

This study is descriptive type survey method.

#### 3.1. Population

In the study, some characteristics of the present population may be listed as follows:

- The subjects are Secondary school Students.
- They are full-time regular students of West Bengal Council of Higher Secondary Education.
- Their mother tongue as well as medium of instruction is Bengali.
- The Academic Achievement is XI standard students (current pass out students of class x in 2022).
- They resided in Panchayat areas (Rural) and Municipality areas (Urban) of the four districts viz. Coochbehar, Jalpaiguri , Alipurduar and Uttar Dinajpur.
- The secondary school students WBBSE affiliated government aided schools were considered as the population of the present study.
- The respondents were selected from the thirteen schools located in selected districts of West Bengal state. A total number of 600 (300 male and 300 female) respondents were selected for the present study. The sample size of 600 respondents includes students who belonged to four districts.

#### 3.2. Sampling

The Researcher adopted Mixed sampling Method ( Simple random sampling and Purposive) for this study.

#### 3.3. Sample

600 samples were selected from 13 secondary school both are rural and urban areas

#### 3.4. Variables of the study

In the present study researcher following variables classified into Main Variables and Categorical Variables.

##### 3.4.1. Main variables

In the present study, the main variables is

- Mental Health
- Academic Achievement

##### 3.4.2. Categorical Variables

In the present study, the categorical variables is

- Gender
- Locality

#### 3.5. Data collection tools

As The Tools the Researcher Used Two Tools of this Study

##### 3.5.1. Mental health scale (MHS)

Through the use of questionnaires, pertinent study data is gathered. With the supervisor's help, the researcher created Likert five-point scales. The researcher used the split-half method of item analysis to standardise the data collection instrument, and the reliability score was established at 0.86.

**Table 1** Reliability Co-efficient of Mental Health

Method	N	Reliability Co-efficient of Mental Health
Test-retest	45	0.86

**Table 2** Validity from the Index of Reliability of the Test Scores

Sl. No.	Test	$r_t = \sqrt{r_{tt}}$	$r_{tt}$
1.	Mental Health	0.92	0.86

### 3.5.2. Academic achievement scale (AAS)

'Academic Achievement' is measured by marks of annual examination of class -X from the selected schools under the board of West Bengal Board of Secondary Education (WBBSE).

## 4. Analysis and interpretation

### 4.1. Null Hypothesis ( $H_{01}$ ):

**The concerned null hypothesis ( $H_{01}$ )is:** There exist no significant mean difference between Academic Achievement and Mental Health at the Secondary Level Students.

**Table 3** Determining the significance of the mean difference between Academic Achievement and Mental Health at the Secondary Level Students

Variables	N	M	SD	SE <sub>D</sub>	df	t
Academic Achievement	600	384.51	146.39	6.03	598	4.19**
Mental Health	600	149.15	19.89			

\*\* Significant at 0.01 level

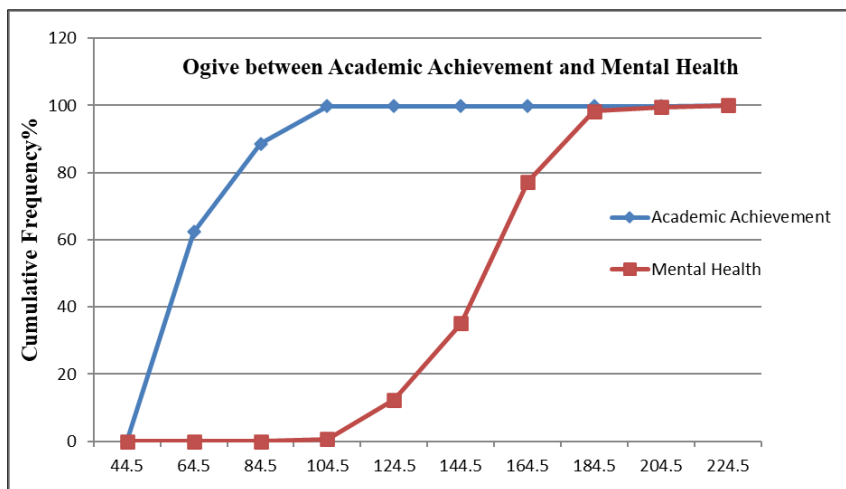
**Analysis:** The 't' value of null hypothesis ( $H_{01}$ ) is 4.19, which is significant at 0.01 level. So the null hypothesis is rejected and the alternative hypothesis accepted.

**Interpretation:** As the calculated 't' value is significant so, the alternative hypothesis ( $H_{01}$ ) is accepted. Therefore it can be interpreted that there exists mean difference between Academic Achievement and Mental Health at the secondary level students.

**Table 4** Cumulative Frequency (Cum f %) between Mental Health and Academic Achievement

Variables							
Academic Achievement				Mental Health			
U.L	Frequency	Cum f	Cum f%	U.L	Frequency	Cum f	Cum f%
44.5	264	264	44.00	44.5	00	00	00.00
64.5	111	275	62.50	64.5	00	00	00.00
84.5	158	533	88.83	84.5	00	00	00.00
104.5	67	600	100.00	104.5	04	04	0.67
124.5	00	600	100.00	124.5	70	74	12.33
144.5	00	600	100.00	144.5	137	211	35.17

164.5	00	600	100.00	164.5	253	464	77.33
184.5	00	600	100.00	184.5	126	590	98.33
204.5	00	600	100.00	204.5	07	597	99.50
224.5	00	600	100.00	224.5	03	600	100.00



**Figure 1** Graphical Representation Ogive between Academic Achievement and Mental Health

**Graphical Impression:** Figure No: 01 shows that there is a difference between Academic Achievement and Mental Health in secondary level students.

#### 4.2. Null Hypothesis (H<sub>02</sub>)

**The concerned null hypothesis (H<sub>02</sub>) is:** There exist no significant mean differences between Male and Female Secondary Students in Mental Health.

**Table 5** Determining the significance of the mean difference between total Male and Female Secondary Students in Mental Health.

Mental Health	N	M	SD	SE <sub>D</sub>	df	t
Male	300	147.45	14.91	1.62	598	0.01NS
Female	300	150.85	23.76			

NS= Not significant

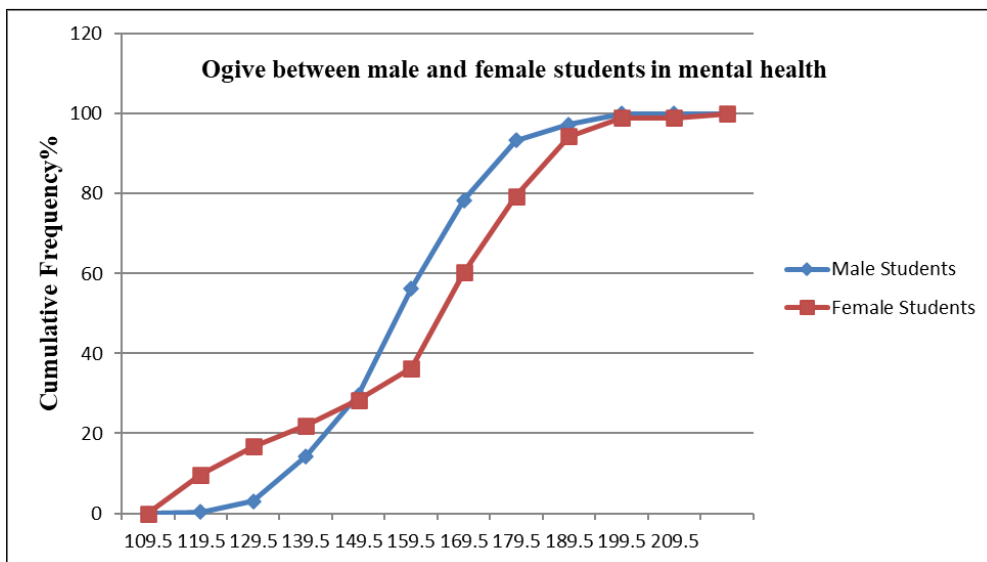
**Analysis:** The 't' value of null hypothesis ((H<sub>02</sub>) is 0.01, which is no significant at 0.01 and 0.05 level. So the null hypothesis is accepted and the alternative hypothesis rejected.

**Interpretation:** As the calculated value is no significant and the alternative hypothesis (H<sub>5.1</sub>) rejected. So, it can be interpreted that there exists no mean difference between Male and Female Secondary Students in Mental Health.

**Table 6** Cumulative Frequency (Cum f %) between Male and female Students of Mental Health

Mental Health							
Male Students				Female Students			
U.L	Frequency	Cum f	Cum f%	U.L	Frequency	Cum f	Cum f%
109.5	01	01	00.33	109.5	29	29	09.67

119.5	08	09	03.00	119.5	21	50	16.67
129.5	34	43	14.33	129.5	16	66	22.00
139.5	46	89	29.67	139.5	19	85	28.33
149.5	80	169	56.33	149.5	24	109	36.33
159.5	66	235	78.33	159.5	72	181	60.33
169.5	45	280	93.33	169.5	57	238	79.33
179.5	12	292	97.33	179.5	45	283	94.33
189.5	08	300	100.00	189.5	14	297	99.00
199.5	00	300	100.00	199.5	00	297	99.00
209.5	00	300	100.00	209.5	03	300	100.00



**Figure 2** Graphical Representation Ogive between Male and Female Students in Mental Health

**Graphical Impression:** Figure No 02 shows that there is no difference between male and female secondary level students in terms of Mental Health.

**The concerned null hypothesis (H<sub>03</sub>) is:** There exist no significant relationships between Academic Achievement and Mental Health at the secondary level students.

**4.3. Null Hypothesis (H<sub>03</sub>):**

**The concerned null hypothesis (H<sub>03</sub>) is:** There exist no significant mean differences between rural and urban Secondary Students in Mental Health.

**Table 7** Determining the significance of the mean difference between Rural and Urban Secondary Students in Mental Health

Mental Health	N	M	SD	SE <sub>D</sub>	df	t
Rural Students	300	143.49	20.21	1.56	598	7.06**
Urban Students	300	154.81	17.89			

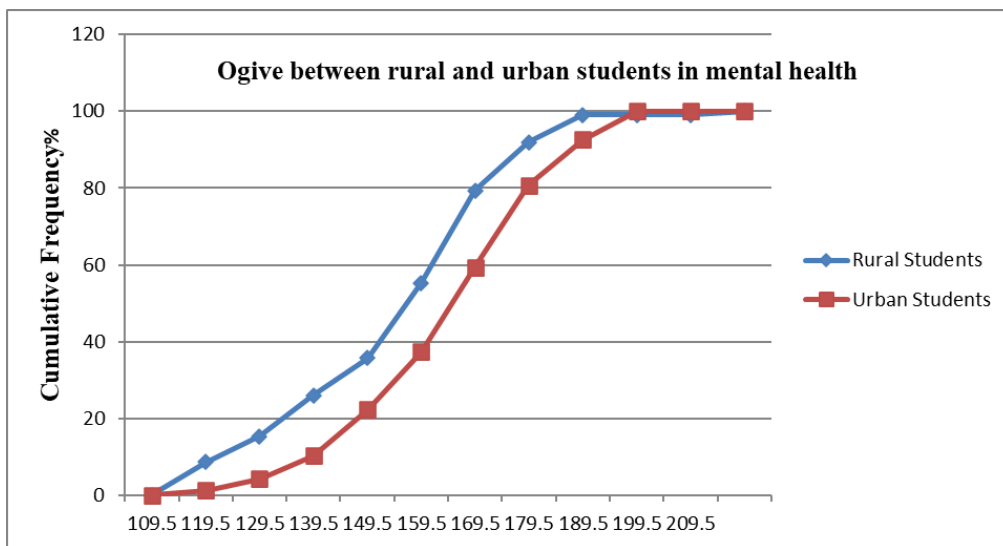
\*\*Significant at 0.01 level,

**Analysis:** The 't' value of null hypothesis ( $H_{03}$ ) is 7.06, which is significant at 0.01 level. So the null hypothesis is rejected and the alternative hypothesis accepted.

**Interpretation:** As the calculated value is significant and the alternative hypothesis ( $H_{03}$ ) is accepted. So, it can be interpreted that there exists mean difference between rural and urban Secondary Students in Mental Health.

**Table 8** Cumulative Frequency (Cum f %) between Rural Students and Urban Students of Mental Health

Mental Health							
Rural Students				Urban Students			
U.L	Frequency	Cum f	Cum f%	U.L	Frequency	Cum f	Cum f%
109.5	26	26	08.67	109.5	04	04	01.33
119.5	20	46	15.33	119.5	09	13	04.33
129.5	32	78	26.00	129.5	18	31	10.33
139.5	29	107	35.67	139.5	36	67	22.33
149.5	59	166	55.33	149.5	45	112	37.33
159.5	72	238	79.33	159.5	66	178	59.33
169.5	38	276	92.00	169.5	64	242	80.67
179.5	21	297	99.00	179.5	36	278	92.33
189.5	00	297	99.00	189.5	22	300	100.00
199.5	00	297	99.00	199.5	00	300	100.00
209.5	03	300	100.00	209.5	00	300	100.00



**Figure 3** Graphical Representation between Rural and Urban students in Mental Health

**Graphical Impression:** Figure No 03: shows that there is a difference between rural and urban secondary level students in terms of Mental Health.

#### 4.4. Null Hypothesis ( $H_{04}$ ):

**Table 9** Determining the significance of the relationship between Academic Achievement and Mental Health at the secondary level students

Measures	Correlation between Academic Achievement and Mental Health
N	1200
df	1198
r	0.33**

\*\* Significant at 0.01 level

**Analysis:** Here the value of 'r' is 0.33. This is significant at 1% level. So, the null hypothesis ( $H_{04}$ ) is rejected and the alternative hypothesis ( $H_{04}$ ) accepted.

**Interpretation:** It can be said that there exists positive relationship between Academic Achievement and Mental Health at the secondary level students.

### 5. Result and findings of the study

There is mean difference between Academic Achievement and Mental Health among secondary level students. Bandhana and Sharma (2012) showed that girl's mental health was better than boys.

Finding of the present study reveals that there is no mean difference between Male and Female Secondary Students in Mental Health. The same type of result has been supported by the evidences:- Krishnamurthy and Subramanian (2012) showed that the mental health level of female students was not as much of male students, so concern authorities should give special initiative to female students to develop their mental health.

In the present study, the researcher found mean difference between Rural and Urban Secondary Students in Mental Health.

There is positive relationship between Academic Achievement and Mental Health among secondary level students. The same type of result has been supported by the evidences:- B. Gokhan (2021) showed that there was a positive relationship between mental health and academic achievement.

#### *Limitations of the study*

In the present study, the researcher tried the best to follow proper methods and research techniques with all efforts in all stages of the study. But some limitations inherent in this study are-

- The population was limited areas restricted to four districts only. It can be spread into other areas also.
- The study was confined to secondary students only, it would have been better if children case could be considered.
- The present study has included the sample of only government aided co-ed school students. But government, private, boys and girls school students were not included.
- The present study has tried to cover only Arts stream students; other streams were not included due to limited time.
- For the present research the sample was limited to 600 students. He may take a larger sample size.
- The researcher himself developed a questionnaire on Mental Health The scoring key was prepared with help of only Likert Scaling Method.
- The researcher applied only 't' test, correlation, in his study.

### 6. Conclusion

The study shows that there is a positive relationship between mental health and academic achievement among secondary school students. Students, who are having sound mental health the result of them show better academic



achievement. Whereas poor mental health result is poor academic performance. For this reason, the school should adopt suitable curricular and co-curricular practices to cater to mental health. The parents and members of the community should also take care to help students maintain their mental health. School counselors must guide the students what efforts are required to be taken for good mental health. Administrator or principal should create such environment in school campus that creates mutual trust between students and teachers. Principal and administrators should always be aware of child's parents that how they develop mental health.

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