CHAPTER-4

ANALYSIS AND

INTERPRETATION OF DATA

CHAPTER 4

ANALYSIS AND INTERPRETATION OF DATA

4.0 Introduction-

This chapter deals with analysis and interpretation of data. Analysis of research data is an important step in the dissertation process. This is a time a researcher may reach important facts about the data collected, uncover facts that might not otherwise have known.

4.1 Data analysis and interpretation-

The present study aimed to study the family support. social support and academic achievement of Muslim minority girl students of secondary and higher secondary level. The data was collected from the Muslim minority girl students of secondary and higher secondary level of Cuttack, Odisha. For secondary level the data was collected from Gopabandhu Nodal High school, Anadi High School and for higher secondary level data was collected from Bahugram Junior College. Jagatpur Junior College by using self-made tool by the researcher.

Keeping in view the objective of the study the data was analyzed by using percentage. mean, standard deviation, t-test and correlation.

4.2 Objective-1: To study the Family support of Muslim Minority girl students of Secondary and Higher Secondary level

To study the family support of Muslim minority girl students of secondary and higher secondary level data was collected and calculated by using percentage. mean. standard deviation. t-test.

4.2.1 To study the family support of Muslim minority girl students of secondary level

To study the family support of Muslim minority girl students of secondary level data was collected and calculated by using percentage and shown in Table 4.1.

Table 4.1:

Item-wise Percentage of family support of Muslim minority girl students of secondary level

Sl. No.	Item No.	Statements	Responses in percentage		
			Agree	Uncertain	Disagree
1	1	You are forced to take care of your younger sibling.	10	10	80
2	2	You got encouragement from your parents to study.	90	0	10
3	3	You are forced to do household work.	40	10	50
4	4	You are forced by your family to study in science stream.	5	35	60
5	5	You have interest in science but forced by your family to study in arts stream.	15	20	65
6	6	You can choose your stream of your own.	90	5	5
7	7	You are mentally stressed out regarding your study.	70	10	20
8	8	You are financially stressed out regarding your study.	50	15	35
9	9	Your financial condition did not allow you to go for tuition.	0	10	90
10	10	You are allowed to study but not higher study.	15	0	85

11	11	You face difficulty going to school.	0	0	100
12	12	You are forced by family members not to participate in sports.	0	10	90
13	13	You are interested in participating in sports and cultural activity of the school/college.	90	0	10
14	14	You are forced by the family members not to participate in cultural activity.	40	20	40
15	15	Got encouragement from your parent to participate in different Olympiad/competitive exam.	80	15	5
16	16	You are able to manage both study and household work together.	35	15	50
17	17	Your study got affected by the family conflict.	50	0	50
18	18	Mentality of parents need to be changed in prospective of education.	35	5	60
19	19	Parents are interested to enrolled their girl in school/college for making educated bride.	10	20	70
20	20	Parents prefer to save money for dowry instead of investing on the education of a girl child.	10	40	50

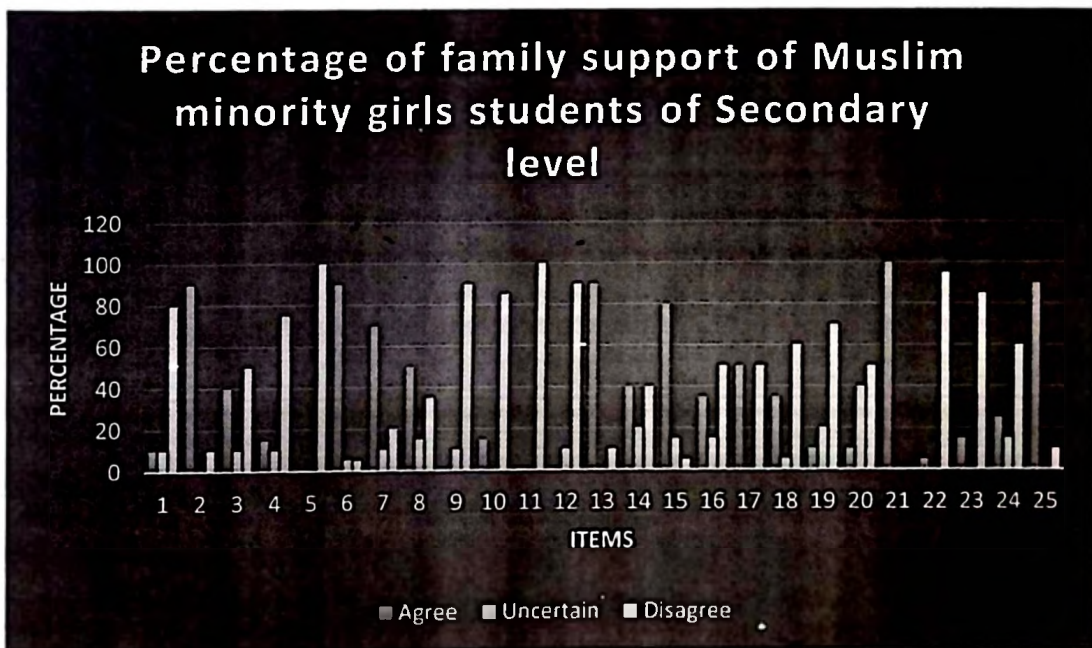| 21	21	You are getting proper facility in studying.	100	0	0
22	22	You felt discriminated between you and your brother regarding your study.	5	0	95
23	23	Did not get much time to do self-study.	15	0	85
24	24	You are forced to do part time job to support your family financially.	25	15	60
25	25	You are allowed to do further study.	90	0	10

Figure 4.1 **Bar Graph showing the family support of Muslim minority girl students of Secondary level**

The above table 4.1 and figure 4.1 shows that Muslim minority girls of secondary level got positive support from their family as in positive statements they are mostly agree and in negative statement they are disagree. It can be observed from statements like: (2) Researcher found that most of the people got encouragement from the family to do study. (6) Researcher understand that students can choose their stream of own. (13)

Researcher feel that students are interested in participating in sports and cultural activity, (15) Researcher feel that students are getting encouragement from the parents to participate in Olympiad and in competitive exam also, (16) Researcher believe that most of the students are unable to manage their study and household work together. (21) Researcher feel that they are getting proper facility to do study, (25) Researcher feel that most of the students are allowed to do further study, (1) Researcher believe that most of them are not forced to take care of their sibling, (3) Researcher feel that some students are forced to do household work but majority of the students are not forced to do household work. (4.5) Researcher observed that majority of the students are not forced by their family members to take science stream in future. (7.8) Researcher feel that most of the students are both mentally and financially stressed out regarding their study. (9) Researcher feel that maximum students can afford to go for tuition. (11) Researcher feel that no one face problem on going to school. (12) Researcher believe that most of the students are not forced by their family members not to participate in sports, (14) Researcher feel that some students are forced by their family members not to participate in cultural activity and some are allowed to do (17) Researcher feel that some students study got affected by the family conflict and some are remain un affected. (18) Researcher believe that mentality of few students parents need to be change regarding study. (19) Researcher feel that most of the parents did not send their girl child to school to only make them educated bride. (20) Researcher feel that most of the parent prefer to save their money for dowry instead of investing in education. (22) Researcher feel that very few students get discriminated in comparison to their brother in education. (23) Researcher feel that most of the students didn't get proper time to do higher study. (24) Researcher feel that some students are need to do part time job to support their family financially but most of them are not need to do so.

4.2.2 To study the family support of Muslim Minority girl students of Higher Secondary level

To study the family support of Muslim minority girl students of higher secondary level data was collected and calculated by using percentage and shown in Table 4.2.

Table 4.2:

Item-wise Percentage of family support of Muslim minority girl students of higher secondary level

Sl. No.	Item No.	Statements	Responses in percentage		
			Agree	Uncertain	Disagree
1	1	You are forced to take care of your younger sibling.	55	0	45
2	2	You got encouragement from your parents to study.	80	10	10
3	3	You are forced to do household work.	45	5	50
4	4	You are forced by your family to study in science stream.	5	35	60
5	5	You have interest in science but forced by your family to study in arts stream.	15	20	65
6	6	You can choose your stream of your own.	80	20	0
7	7	You are mentally stressed out regarding your study.	90	0	10
8	8	You are financially stressed out regarding your study.	20	35	45

9	9	Your financial condition did not allow you to go for tuition.	15	10	75
10	10	You are allowed to study but not higher study.	35	20	45
11	11	You face difficulty going to school.	10	5	85
12	12	You are forced by family members not to participate in sports.	5	25	70
13	13	You are interested in participating in sports and cultural activity of the school/college.	85	5	10
14	14	You are forced by the family members not to participate in cultural activity.	15	15	70
15	15	Got encouragement from your parent to participate in different Olympiad/competitive exam.	65	35	0
16	16	You are able to manage both study and household work together.	35	30	35
17	17	Your study got affected by the family conflict.	45	5	50
18	18	Mentality of parents need to be changed in	5	20	75

|					
		prospective of education.			
19	19	Parents are interested to enrolled their girl in school/college for making educated bride.	0	50	50
20	20	Parents prefer to save money for dowry instead of investing on the education of a girl child.	0	20	80
21	21	You are getting proper facility in studying.	80	20	0
22	22	You felt discriminated between you and your brother regarding your study.	0	20	80
23	23	Did not get much time to do self-study.	40	10	50
24	24	You are forced to do part time job to support your family financially.	0	35	65
25	25	You are allowed to do further study.	55	20	25
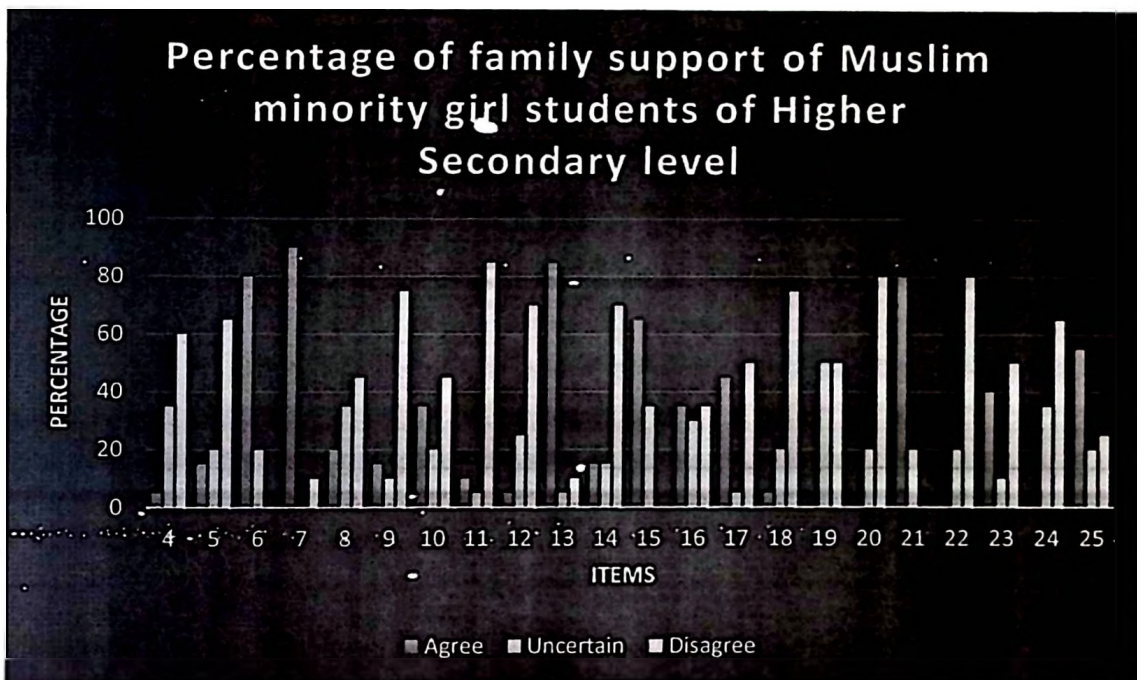
Figure 4.2 **Bar Graph showing the family support of Muslim minority girl students of Higher Secondary level**

The above table 4.2 and figure 4.2 shows that Muslim minority girls of Higher secondary level got positive support from their family as in positive statements they are mostly agree and in negative statement they are disagree. It can be observed from statements like; (2) Researcher found that most of the people got encouragement from the family to do study. (6) Researcher understand that students can choose their stream of own. (13) Researcher feel that students are interested in participating in sports and cultural activity. (15) Researcher feel that most of the students are getting encouragement from the parents to participate in Olympiad and in competitive exam also. (16) Researcher believe that half of the students are unable to manage their study and household work together and half are not. (21) Researcher feel that most of the students are getting proper facility to do study. (25) Researcher found that maximum students are allowed to do further study. (1) Researcher believe that more than 50 percentage of the students are forced to take care of their sibling. (3) Researcher feel that nearly 50 percent of the students are forced to do household work. (4.5) Researcher observed that majority of the students are not forced by their family members to take science stream in future. (7) Researcher found that most of the students are mentally stressed out regarding their study. (8) Researcher feel that few students are financially stressed out regarding their study. (9) Researcher feel that

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maximum students can afford to go for tuition, (11) Researcher feel that very few students face problem on going to school, (12) Researcher believe that most of the students are not forced by their family members not to participate in sports, (14) Researcher feel that some students are forced by their family members not to participate in cultural activity but maximum are allowed to do (17) Researcher feel that nearly 50 percent students study got affected by the family conflict and more than 50 percent are remain un affected. (18) Researcher believe that mentality of very few students parent need to be change regarding study, (19) Researcher feel that parents did not send their girl child to school to only make them educated bride. (20) Researcher feel that most of the parent does not save their money for dowry instead of investing in education. (22) Researcher feel that very few students get discriminated in comparison to their brother in education. (23) Researcher feel that most of the students didn't get proper time to do higher study, (24) Researcher feel that some students are need to do part time job to support their family financially but most of them are not need to do so.

4.2.3 To compare the family support of Muslim minority girl students of Secondary level with Higher Secondary level

To compare the family support of Muslim minority girl students of secondary level with higher secondary level along with mean and standard deviation t-test was employed and shown in Table 4.3.

Table 4.3:

Mean, SD and t-value of family support of Muslim minority girl students of secondary level and higher secondary level.

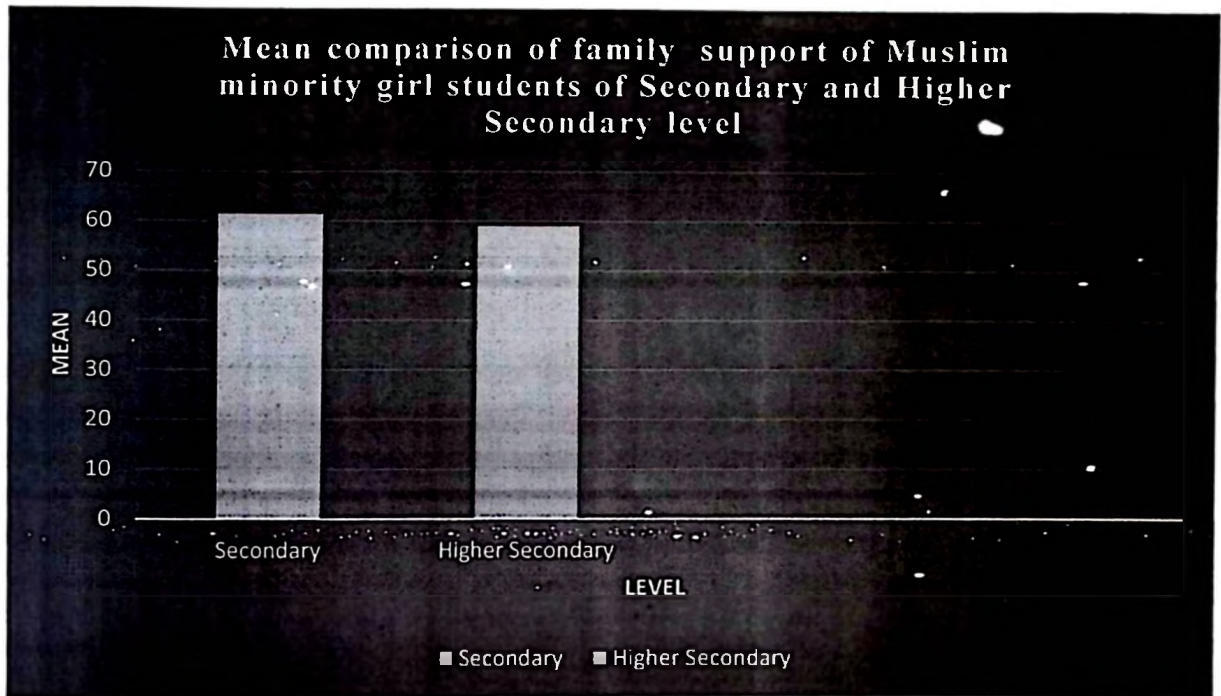| Sl. NO	Level	N	Mean	SD	df	t	Sig
1	Secondary	20	61.55	5.596	38	1.657	.047
2	Higher Secondary	20	59.10	3.523			

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Figure 4.3 Bar Graph showing the comparison of family support of Muslim minority girl students of secondary and higher secondary level

From the Table-4.3 and figure-4.3, Mean value and Standard deviation of family support of Muslim minority girl students of secondary level as 61.55 and 5.596 respectively. Mean value and Standard deviation of family support of Muslim minority girl students of Higher secondary level as 59.10 and 3.523 respectively.

Further the calculated t-value is 1.657 which is lower than the tabulated value at 0.05(1.686) level of significance for df 38.

Hence the null hypothesis which is states that "There exist no significant difference of the family support of Muslim minority girl students of Secondary level and Higher Secondary level" is accepted at 0.05 level of significance is accepted. it also indicates that Muslim minority girl students of both secondary and higher secondary level getting equal support from the family.

4.3 Objective-2: To study the social support of Muslim Minority girl Students of Secondary and Higher Secondary level

To study the social support of Muslim minority girl students of secondary and higher secondary level data was collected and calculated by using percentage. mean. standard deviation. t-test.

4.3.1 To study the social support of Muslim minority girl students of Secondary level

To study the social support of Muslim minority girl students of secondary level data was collected and calculated by using percentage and is shown in Table 4.2.

Table 4.4:

Item-wise Percentage of social support of Muslim minority girl students of secondary level.

Sl. No.	Item No.	Statements	Responses in percentage		
			Agree	Uncertain	Disagree
1	26	Your school /college is within 5km distance.	40	10	50
2	27	Faced discrimination in school due to being a Muslim girl.	15	0	85
3	28	You are allowed to participate in all school activities.	85	5	10
4	29	Felt ashamed to talk about your food habit.	55	5	40
5	30	To take admission in good college you need to travel large distance.	80	5	15
6	31	You are comfortable with your dress code.	90	10	0
7	32	Felt insulted in parent teacher meetings.	5	0	95
8	33	Proper toilet facility available in school/college.	95	0	5
9	34	Feel safe in school /college environment.	100	0	0

10	35	You avail minority scholarship facility.	75	5	20
11	36	MIL Urdu present as an option in your school/college.	50	0	50
12	37	Got discouragement from the relative to do higher studies.	70	5	25
13	38	Your environment suitable for study.	100	0	0
14	39	Feel unsafe on the way to school/college.	15	5	80
15	40	Highly qualified girl may not get proper groom.	10	10	80
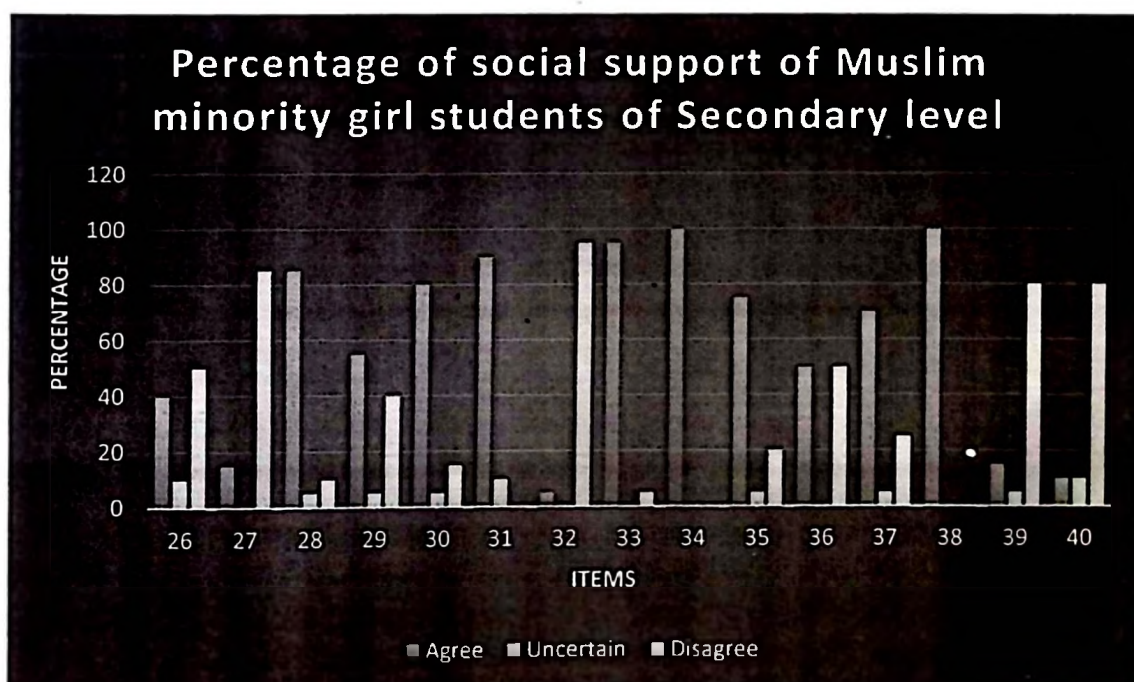
Figure 4.4 **Bar Graph showing the social support of Muslim minority girl students of Secondary level.**

The above table 4.4 and graph 4.4 shows that Muslim minority girls of secondary level got positive support from their society as in positive statements they are mostly agree and in negative statement they are disagree. It can be observed from statements like: (26) Researcher observed that out of two school, one is within 5km and other is not. (28) Researcher feel that most of the students are allowed to participate in all school activity. (31) Researcher feel that most of the students are comfortable with their

dress code, (33) Researcher feel that toilet facility is available in both the school. (34) Researcher understand that students are feeling safe in school environment. (35) Researcher feel that most of the students are availing minority scholarship facility, (36) Researcher feel that out of two school only in one school option of MIL Urdu is there, (37) Researcher feel that majority of the students got encouragement from the relatives to do higher study, (38) Researcher found that almost all students got suitable environment for study, (27) Researcher feel that not all but most of the Muslim minority girl students did not face discrimination in school, (29) Researcher feel that more than 50 percent students felt ashamed to talk about their food habit. (30) Researcher feel that maximum students have to travel large distance to take admission in good school, (32) Researcher feel that most of the students did not get ashamed in parent teacher meeting. (39) Researcher observed that maximum students feel safe on the way to school, (40) Researcher feel that highly qualified girl may not get proper groom is not applicable here.

4.3.2 To study the social support of Muslim Minority girl students of Higher Secondary level

To study the social support of Muslim minority girl students of higher secondary level data was collected and calculated by using percentage and is shown in Table 4.5.

Table 4.5:

Item-wise Percentage of social support of Muslim minority girl students of higher secondary level

Sl. No.	Item No.	Statements	Responses in percentage		
			Agree	Uncertain	Disagree
1	26	Your school /college is within 5km distance.	55	20	25
2	27	Faced discrimination in school due to being a Muslim girl.	10	5	85
3	28	You are allowed to participate in all school activities.	40	25	35

| 4	29	Felt ashamed to talk about your food habit.	95	0	5
5	30	To take admission in good college you need to travel large distance.	65	25	10
6	31	You are comfortable with your dress code.	80	0	20
7	32	Felt insulted in parent teacher meetings.	5	25	70
8	33	Proper toilet facility available in school/college.	75	15	10
9	34	Feel safe in school and college environment.	85	10	5
10	35	You avail minority scholarship facility.	40	15	45
11	36	MIL Urdu present as an option in your school/college.	50	0	50
12	37	Got discouragement from the relative to do higher studies.	20	35	45
13	38	Your environment suitable for study.	60	0	40
14	39	Feel unsafe on the way to school/college.	15	15	70
15	40	Highly qualified girl may not get proper groom.	0	40	60
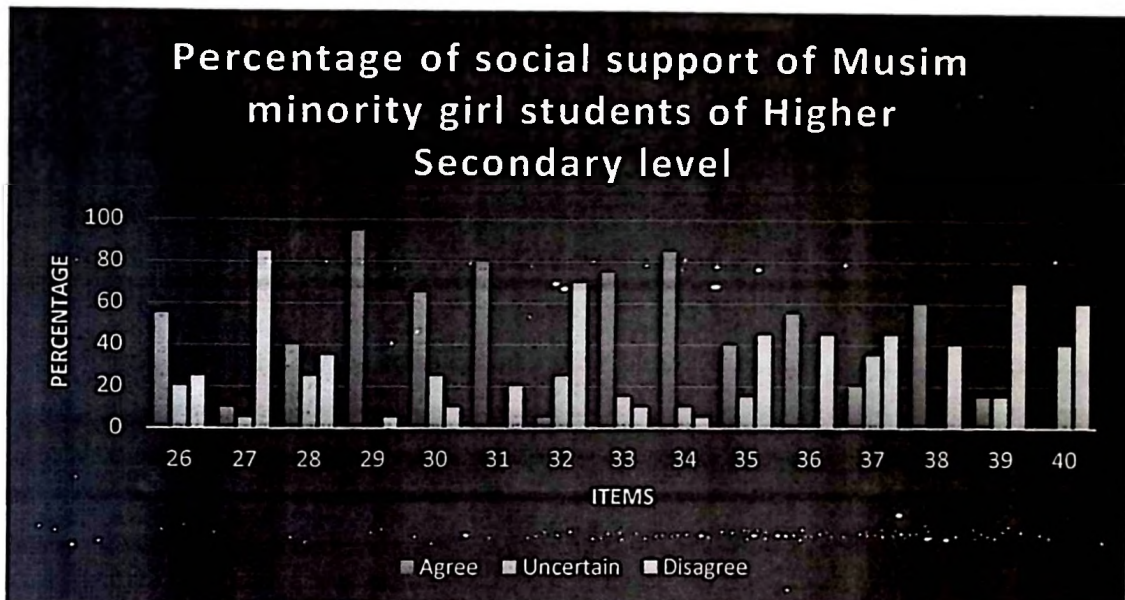
Figure 4.5 Bar Graph showing the social support of Muslim minority girl students of higher secondary level

The above table 4.5 and figure 4.5 shows that Muslim minority girls of Higher secondary level got positive support from their society as in positive statements they are mostly agree and in negative statement they are disagree. It can be observed from statements like; (26) Researcher observed that more than 50 Percent students school within 5km. (28) Researcher feel that most of the students are allowed to participate in all school activity, (31) Researcher feel that most of the students are comfortable with their dress code, (33) Researcher feel that toilet facility is available in both the school. (34) Researcher understand that most of the students are feeling safe in school environment, (35) Researcher feel that most of the students are not availing minority scholarship facility, (36) Researcher feel that out of two school only in one school option of MIL Urdu is there. (37) Researcher feel that very few students got encouragement from the relatives to do higher study. (38) Researcher found that more than 50 Percent students got suitable environment for study. (27) Researcher feel that not all but most of the Muslim minority girl students did not face discrimination in school. (29) Researcher feel that almost 95 percent students felt ashamed to talk about their food habit. (30) Researcher feel that maximum students have to travel large distance to tak : admission in good college. (32) Researcher feel that most of the students did not get ashamed in parent teacher meeting. (39) Researcher observed that maximum students feel safe on the way to school. (40) Researcher feel that highly qualified girl may not get proper groom is not applicable here.

4.3.3 To compare the social support of Muslim minority girl students of secondary level with higher secondary level

To compare the family support of Muslim minority girl students of secondary level with higher secondary level along with mean and standard deviation t-test was employed and shown in Table 4.6.

Table 4.6:

Mean, SD and t-value of family support of Muslim minority girl students of secondary level and higher secondary level

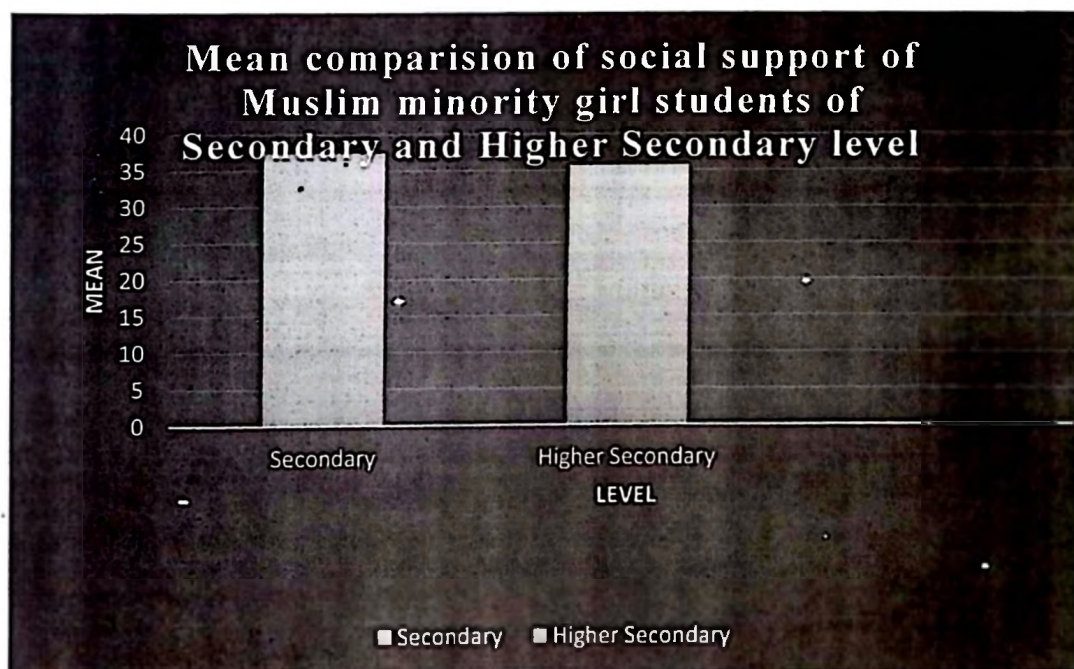| Sl. No	LEVEL	N	MEAN	SD	df	t	Sig
1	Secondary	20	37.45	2.139	38	2.049	.047
2	Higher Secondary	20	35.70	3.164			

Figure 4.6 Bar Graph showing the comparison of social support Muslim minority girl students of Secondary and Higher Secondary level

From the Table-4.6 and Graph-4.6. Mean value and Standard deviation of social support of Muslim minority girl students of secondary level as 37.45 and 2.139 respectively. Mean value and Standard deviation of social support of Muslim minority girl students of Higher secondary level as 35.70 and 3.164 respectively.

Further the calculated t-value is 2.049 which is higher than the tabulated value at 0.05(1.686) level of significance for df 38.

Hence the null hypothesis which is states that "There exist no significant difference of the social support of Muslim minority girl students of Secondary level and Higher Secondary level" is at 0.05 level of significance is rejected, it also indicates that Muslim minority girl students of both secondary and higher secondary level are not getting equal support from the society. Hence students of secondary level getting more support from the society as compare to Higher Secondary level.

4.4 Objective-3: To study the Academic Achievement of Muslim minority girl students of Secondary and Higher Secondary level

To compare the family support of Muslim minority girl students of secondary level with higher secondary level along with mean and standard deviation t-test was employed and shown in Table 4.7.

Table 4.7

Mean, SD and t-value of academic achievement of Muslim minority girl students of secondary level and higher secondary level

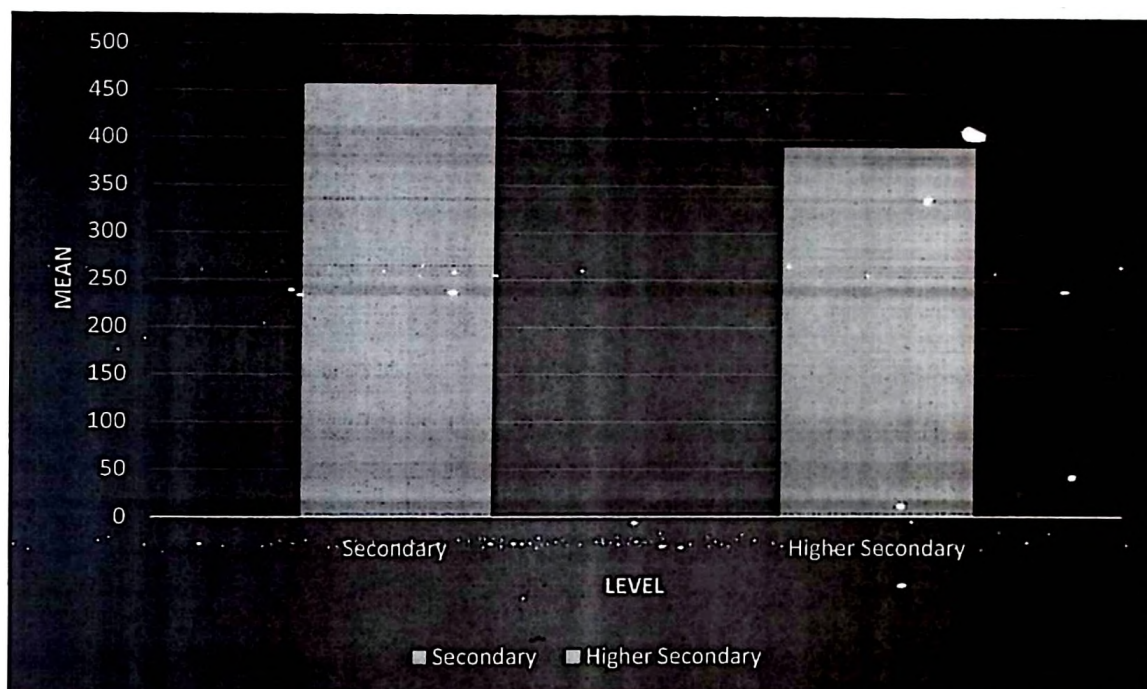| Sl. No.	Level	N	Mean	S D	df	t	Sig
1	Secondary	20	457.95	42.316	38	4.595	0.773
2	Higher Secondary	20	392.70	47.348			

Figure 4.7 Bar Graph showing the comparison of Academic achievement of Muslim minority girl students of Secondary and Higher Secondary level.

From the Table-4.7 and Graph-4.7, Mean value and Standard deviation of social support of Muslim minority girl students of secondary level as 457.95 and 42.316 respectively. Mean value and Standard deviation of social support of Muslim minority girl students of Higher secondary level as 392.70 and 47.348 respectively.

Further the calculated t-value is 4.595 which is higher than the tabulated value at 0.05(1.686) level of significance for df 38.

Hence the null hypothesis which is states that "There exist no significant difference between the academic achievement of Muslim minority girl students of Secondary level and Higher Secondary level" is at 0.05 level of significance is rejected. it also indicates that Muslim minority girl students of both secondary and higher secondary level have different academic achievement. Hence students of secondary level students have higher academic achievement as compare to Higher Secondary level.

4.5 Objective-4: To study the Academic Achievement of Muslim minority girl students of secondary level with respect to family and social support

To find the relationship between the independent and dependent variable. Pearson's Product moment correlation was applied and the value of correlation was obtained. The calculated value is represented in table 4.5.

Table 4.8

Correlation between the independent and dependent variable.

Predictive Variable (Family and Social Support)	Criterion Variable (Academic Achievement) Total Sample (N=20)
	0.958

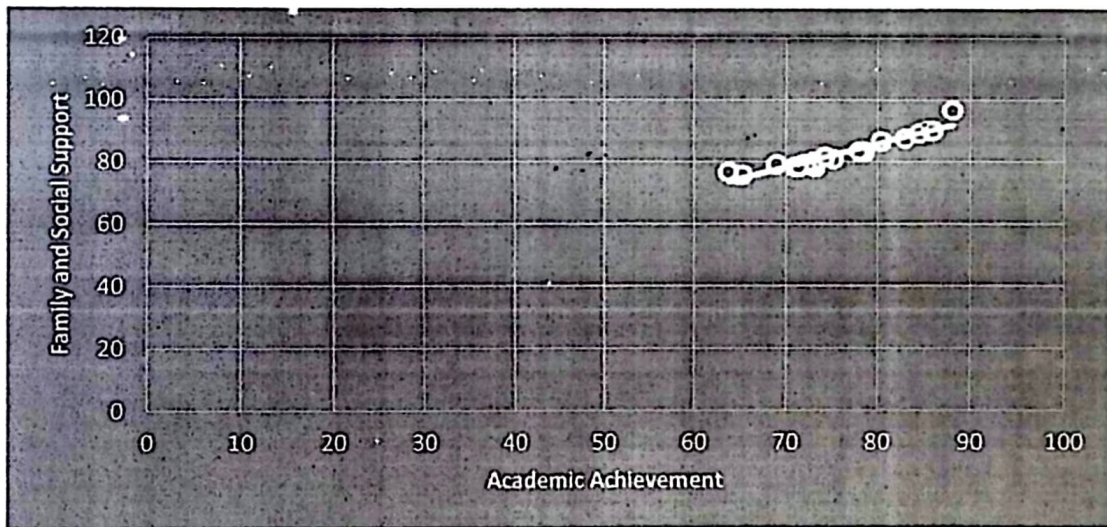**Correlation is significant at 0.01 level (2-tailed)*

Figure 4.8 The scatter plot of correlation between the Academic Achievement and family - social support of Muslim minority girl students of secondary level.

A positive correlation is seen between the Family Social Support and Academic Achievement of Muslim minority girl students of Secondary level that is r = 0.958, p<0.01 is significant at 0.01 level of significance. Moreover, as per Cohen's (1998) guidelines for the effect size, the value of Pearson's correlation coefficient (r = 0.958) indicates a strong correlation between Family and social Support and academic achievement. As the data points on the scatter plots closely resembles a positive relationship as predictor variable i.e. academic achievement and criterion variable that is family and social support, line is in upward direction that shows that they both move in the same direction it can be interpretated that changes in predictor variable i.e. Family and social support is associated with each other in criterion variable i.e. Academic achievement this shows that's family and social support is strongly and positively related to the criterion variable that is, academic achievement the results

concluded that maximum family and social support to Muslim minorities girl students of secondary level leads to higher academic achievement.

4.6 Objective-5: To study the Academic achievement of Muslim minority girl students of higher secondary level with respect to family and social support

To find the relationship between the independent and dependent variable. Pearson's Product moment correlation was applied and the value of correlation was obtained. The calculated value is represented in Table 4.6.

Table 4.9:

Correlation between dependent and independent variable.

Predictive Variable (Family and Social Support)	Criterion Variable (Academic Achievement) Total Sample (N=20)
	0.890

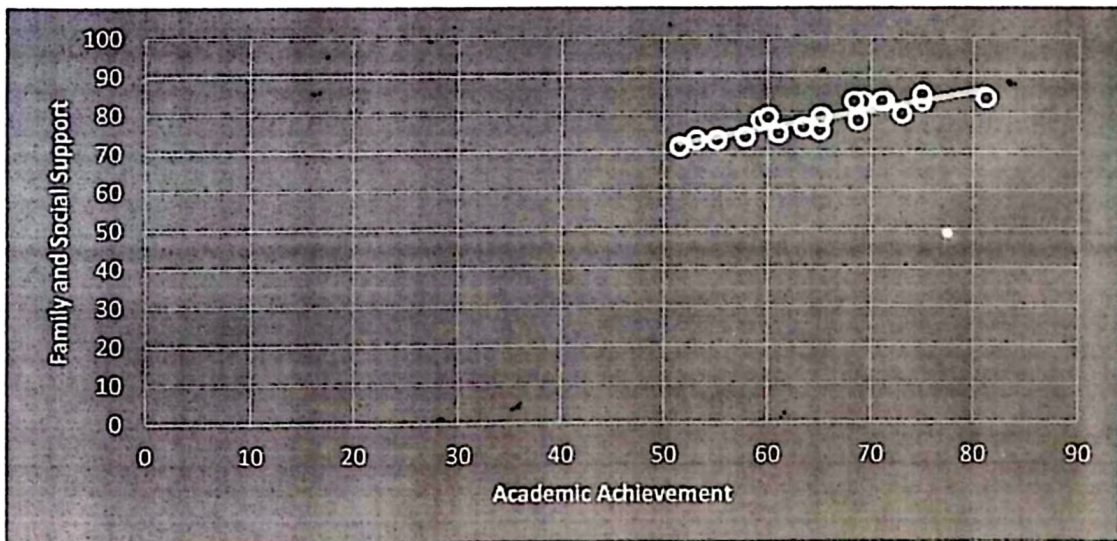*Correlation is significant at 0.01 level (2-tailed)*

Figure 4.9: The scatter plot of Correlation between Academic Achievement and family - Social Support of Muslim minority girl students of higher secondary level.

A positive correlation is seen between the Family Social Support and Academic Achievement of Muslim minority girl students of Secondary level that is r = 0.890 p<0.01 is significant at 0.01 level of significance. Moreover, as per Cohen's (1998) guidelines for the effect size, the value of Pearson's correlation coefficient (r= 0.890)

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indicates a strong correlation between Family and social Support and academic achievement. As the data points on the scatter plots closely resembles a positive relationship as predictor variable i.e., academic achievement and criterion variable i.e., family and social support, line is in upward direction that shows that they both move in the same direction it can be interpretated that changes in predictor variable i.e. Family and social support is associated with each other in criterion variable i.e. Academic achievement this shows that's family and social support is strongly and positively related to the criterion variable i.e., academic achievement the results concluded that maximum family and social support to Muslim minorities girl students of higher secondary level leads to higher academic achievement.