

Chapter - IV

Analysis and Interpretation of

Data

CHAPETR-IV

ANALYSIS AND INTERPRETATION OF DATA

4.0 Introduction

The investigator clearly mentioned the research design, methodology, the scientific basis of the research, variables under study, population, sample, instruments used, plan and procedure for data collection and statistical measures employed for analyzing the data in the previous chapter. While exploring the whole research process it would not be unethical to say that data analysis is the heart of research. The scores derived from the collected data are meaningless and hollow until they are being analyzed and interpreted by employing an appropriate scientific and statistical techniques. All of the complex factors involved in the process are broken down into small and simple parts with the help of analysis, and for the sake of interpretation, they are also being retained in new arrangements.

The goal of the analysis is to arrange, categorize, and summarize the data that have been gathered so that it could be understood and analyzed easily to provide answers to the questions that provoked the research. The process of interpretation entails looking for results' deeper significance. Without interpretation analysis is a futile data and without analysis interpretation cannot move forward. In a research study, the researcher should be conversant not only with the precision of data collection, reliability and validity of the research tools employed to achieve the objectives of existing study but also with the applications of various statistical techniques.

Various statistical methods that have been looked for to analyze the collected data of the existing study are briefly discussed here:

Regression analysis, in general refers to the estimation and prediction of an unknown value for one variable using a known value of another variable. Regression analysis is a

statistical measure for calculating the nature of relationship between two or more variables in terms of the original units of the data. The statistical association between independent and dependent variable is all about what regression analysis is. Regression analysis only uses two categories of variables, just like one is independent variable that determines how the other dependent variable to be caused or effected by it. The independent variable in regression analysis is often referred to as the regress or, predictor, or explanatory, whereas the dependent variable is also referred to as the regressed or explained variable. ANOVA is a statistical technique that we use to know the mean differences between three or more groups and in the current study, it was particularly used to know the mean differences of prospective teachers who belonged to arts, science and commerce streams. Pearson's correlation coefficient (r) has systematically been used to know the significant correlation between the independent and dependent variables, whereas t-test has thoroughly been employed to know the mean differences of (two groups) prospective teachers with reference to their socio demographic variables.

The analysis and interpretation of data has been done as per the objectives of the study in the following sections:

- 4.1 Levels of cognitive styles, emotional intelligence and academic achievement of prospective teachers.
- 4.2 Correlation between cognitive styles and emotional intelligence of prospective teachers.
- 4.3 Correlation between cognitive styles and academic achievement of prospective teachers.
- 4.4 Comparison of cognitive styles among prospective teachers with reference to their socio-demographic variables.
- 4.5 Comparison of emotional intelligence among prospective teachers with reference to their socio-demographic variables.

4.6 Comparison of academic achievement among prospective teachers with reference to their socio demographic variables.

4.7 Effect of cognitive styles on academic achievement of prospective teachers.

4.8 Effect of cognitive styles on emotional intelligence of prospective teachers.

4.1 Levels of Cognitive Styles, Emotional Intelligence and Academic Achievement of Prospective Teachers

The section 4.1 presents the analysis and interpretation of data regarding the levels of cognitive styles, emotional intelligence and academic achievement of prospective teachers that has been given in the following tables and figures:

Table 4.1: Levels of Cognitive Styles of Prospective Teachers

Prospective Teachers	Frequency	(%)	Scores
High	84	16	147 and Above
Moderate	393	74	Between 134 & 146
Low	53	10	133 and Below

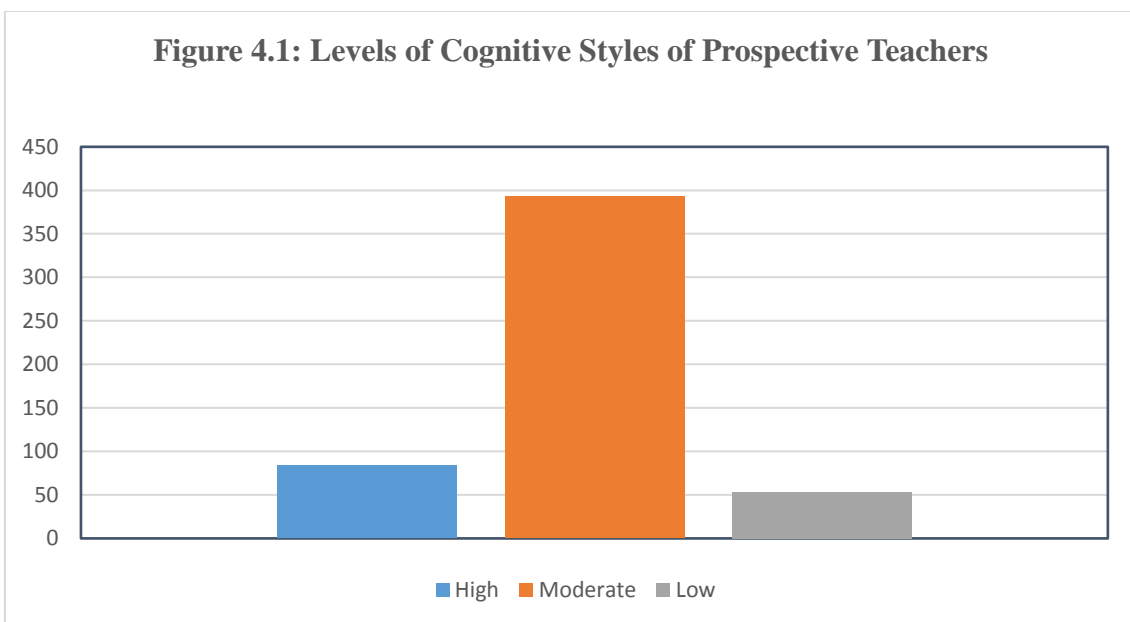


Table 4.1 and Figure 4.1 reveals that the prospective teachers have the different levels of cognitive styles ranging from high to low. \pm one standard deviation (Sd) for the mean has

been used to find out the levels of cognitive styles. The results showed that there are 84 (16%) prospective teachers who obtained the score of 147 and above possess highest levels of cognitive styles. Prospective teachers who got scores in between 134-146 on cognitive styles scale have been considered moderate, whereas others who secured 133 and below fall into the category of low level of cognitive styles. Above results also reveal that majority of the prospective teachers (74%) have moderate level of cognitive styles. The finding of the study was also supported by Sellah (2018) conducted a study and found that “Three schools had very high levels of student-teacher cognitive style congruence while the rest ones had low levels of cognitive styles”.

Table 4.2: Levels of Emotional Intelligence of Prospective Teachers

Prospective Teachers	Frequency	%	Score
High	104	20	145 and above
Moderate	366	69	Between 133 & 144
Low	60	11	132 and below

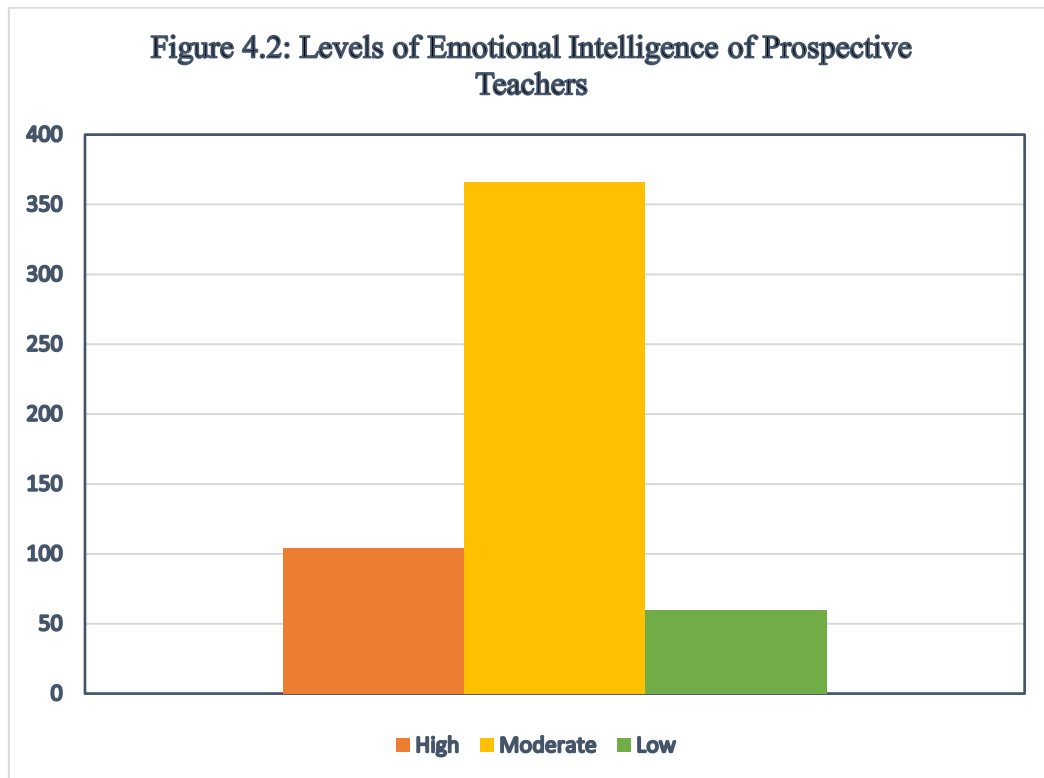


Table 4.2 and figure 4.2 highlights that prospective teachers have three levels (i.e. high, moderate and low) of emotional intelligence. \pm one standard deviation for the mean has been used to find out the levels of emotional intelligence. The analysis depicted that prospective teachers who got 145 and above score on emotional intelligence scale are having high levels of emotional intelligence. The results also report that the candidates who secured their scores in between 133-144 plunge in to the category of moderate whereas those who obtained 132 and below have been considered in the low level emotional intelligence. Thus, the findings of the study illustrates that majority of the prospective teachers (69%) have moderate level of emotional intelligence.

The similar results have also been found by Mohzan, Hassan & Halil (2013) in which they defined that mean score of 0.00 to 2.99 were identified low, 3.00 to 4.99 have been considered moderate and the mean score ranging from 5.00 to 7.00 were considered high on emotional intelligence scale. Al-Qadri & Hasan (2021) also depicted a significant difference in the levels of emotional intelligence with reference to gender variable. In the support of these findings study conducted by Akduman, yuksekbiljili & Hatipoglu (2015) revealed that there was not statistically significant difference in emotional intelligence of different generations.

Table 4.3: Levels of Academic Achievement of Prospective Teachers

Prospective Teachers	Frequency	%	Marks in Percentage
High	99	19	72% and above
Moderate	382	72	Between 64 and 71%
Low	49	9	63% and below

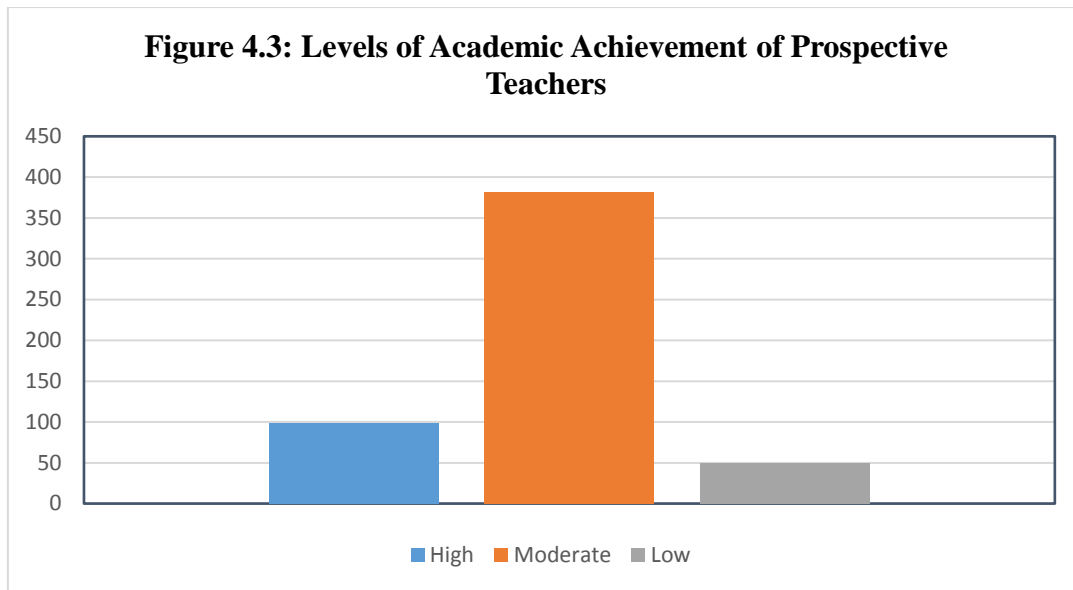


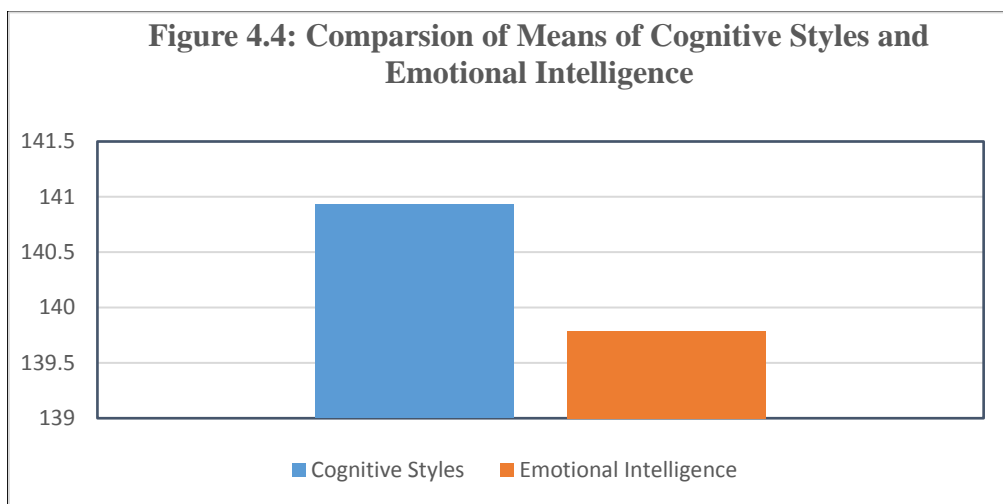
Table 4.3 and figure 4.3 refers to the levels of academic achievement and displays that prospective teachers, who obtained their academic marks 72% and above retain in the high level and those securing academic marks in between 64-71% showed their moderate level and furthermore, who achieved 63% marks and below persists in the low levels of academic achievement. \pm one standard deviation for the mean has been used to find out the levels of academic achievement. The findings also demonstrate that majority of prospective teachers (72%) have the moderate, 19 % high and 09% low level of academic achievement.

4.2 Correlation between Cognitive Styles and Emotional Intelligence of Prospective Teachers

The section 4.2 deals with the analysis and interpretation of data about correlation between cognitive styles and emotional intelligence of prospective teachers in the following tables and figures:

Table 4.4: Descriptive Statistics of Cognitive Styles and Emotional Intelligence of Prospective Teachers

Descriptive Statistics			
Variables	Mean	Sd.	N
Cognitive Styles	140.93	5.98	530
Emotional Intelligence	139.79	5.97	530



The above Table 4.4 and Figure 4.4 demonstrate the descriptive picture of cognitive styles and emotional intelligence of prospective teachers. In this analysis, the average or mean scores of 530 participants on both the variables are given, which is 140.93 for cognitive styles and 139.79 for emotional intelligence. The analysis also showed sd. scores that are 5.98 for cognitive styles and 5.97 for emotional intelligence.

Table 4.5: Co-efficient of Correlation between Cognitive Styles and Emotional Intelligence of Prospective Teachers

Variables	N	‘r’ value
Cognitive Styles	530	.639
Emotional Intelligence	530	
♦ Correlation is significant at the 0.05 level.		

Table 4.5 reveals that the value of correlation (r) between cognitive styles and emotional intelligence of prospective teachers is .639 which is statistically significant at the 0.05 level of significance. Therefore, the hypothesis No. 1.1, “There will be no significant correlation between cognitive styles and emotional intelligence of prospective teachers” is not accepted. So, it can be concluded that there is a positive correlation between cognitive styles and emotional intelligence of prospective teachers. From these results, it is also shown that

prospective teachers who are good in cognitive styles are also good in emotional intelligence. In support of the above findings a research study conducted by Naz and Malik (2021) revealed that “Cognitive styles and EI have a positive association with each other so the higher the number of people who use these styles will ultimately increase their EI”.

4.3 Correlation between Cognitive Styles and Academic Achievement of Prospective Teachers

The section 4.3 deals with the analysis and interpretation of data regarding the correlation between cognitive styles and academic achievement of prospective teachers that has been given in the following tables and figures:

Table 4.6: Descriptive Statistics of Cognitive Styles and Academic Achievement of Prospective Teachers

Descriptive Statistics			
Variables	Mean	Sd.	N
Cognitive Styles	140.930	5.979	530
Academic Achievement	68.430	3.808	530

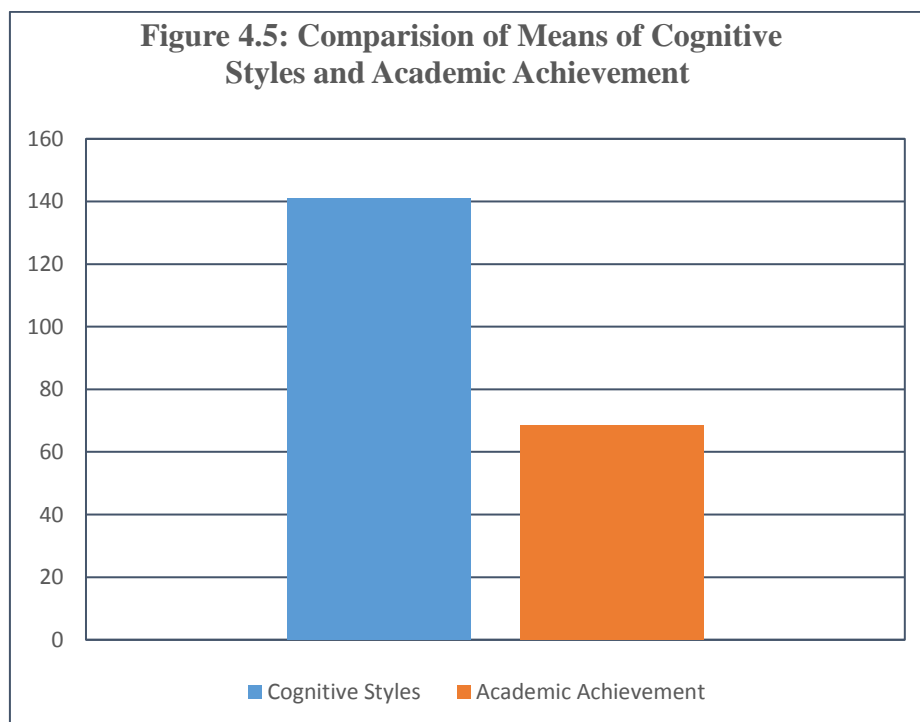


Table 4.6 and figure 4.5 represent the descriptive statistics of cognitive styles and academic achievement of prospective teachers. In this analysis, it is illuminated that mean score of 530 participants on both the cognitive styles and academic achievement are given which is 140.930 for cognitive styles and 68.430 for academic achievement. Descriptive analysis also illustrated the sd scores that are 5.979 for cognitive styles and 3.808 for academic achievement.

Table 4.7: Co-efficient of correlation between Cognitive Styles and Academic Achievement of Prospective Teachers

Variables	N	'r' value
Cognitive Styles	530	.599
Academic Achievement	530	
♦ Correlation is significant at the 0.05 level.		

The table 4.7 reveals that value of correlation (r) in above representation of cognitive styles and academic achievement of prospective teachers is .599 which is statistically significant at the 0.05 level of significance. Hence, it can be stated that the hypothesis No. 1.2, “There will be no significant correlation between cognitive styles and academic achievement of prospective teachers” is not accepted. So the above ‘r’ value implies that there is a significant positive correlation between cognitive styles and academic achievement of prospective teachers. However, it is also revealed that prospective teachers who are good in cognitive styles are also good in academic achievement. Similar, study was also conducted by Sharma & Pooja (2018) in which found that “Significant positive relationship between cognitive styles (field independent & field dependent) and academic achievement of 9th grade students of Om Public school of Gohana district Sonapat was found”. Another relevant study done by Sharma and Ranjan (2018) also found a “Significant relationship between cognitive styles and academic achievement of 9th grade students in multimedia instructional environment” but the study conducted by Jantan (2014) revealed low correlation between cognitive styles and achievement of students in mathematics.

4.4. Comparison of Cognitive Styles among Prospective Teachers with reference to their Socio- Demographic Variables

The section 4.4 presents the analysis and interpretation of data regarding the comparison of cognitive styles among prospective teachers with reference to their socio-demographic variables i.e. gender (male and female), locality (rural and urban), division (Jammu and Kashmir), stream (art, science and commerce), category (reserved and unreserved), parent occupation (employed and unemployed) are given below.

4.4.1 Comparison of Cognitive Styles of Male and Female Prospective Teachers

The section 4.4.1 presents the analysis and interpretation of data regarding the comparison of dimension-wise cognitive styles of male and female prospective teachers in the following tables and figures:

Table 4.8: Group Statistics of Cognitive Styles of Male and Female Prospective Teachers

Variable	Gender	N	Mean	Sd.	Std. Error of Mean
Cognitive Styles	Male	244	140.803	6.460	.413
	Female	286	141.038	5.544	.327
Systematic Style	Male	244	27.422	2.193	.140
	Female	286	27.468	2.382	.140
Intuitive Style	Male	244	34.561	2.675	.171
	Female	286	34.926	2.814	.166
Integrated Style	Male	244	28.954	3.382	.216
	Female	286	29.608	3.462	.204
Undifferentiated Style	Male	244	25.114	2.999	.192
	Female	286	24.611	2.956	.174
Split Style	Male	244	24.750	3.077	.197
	Female	286	24.423	3.107	.183

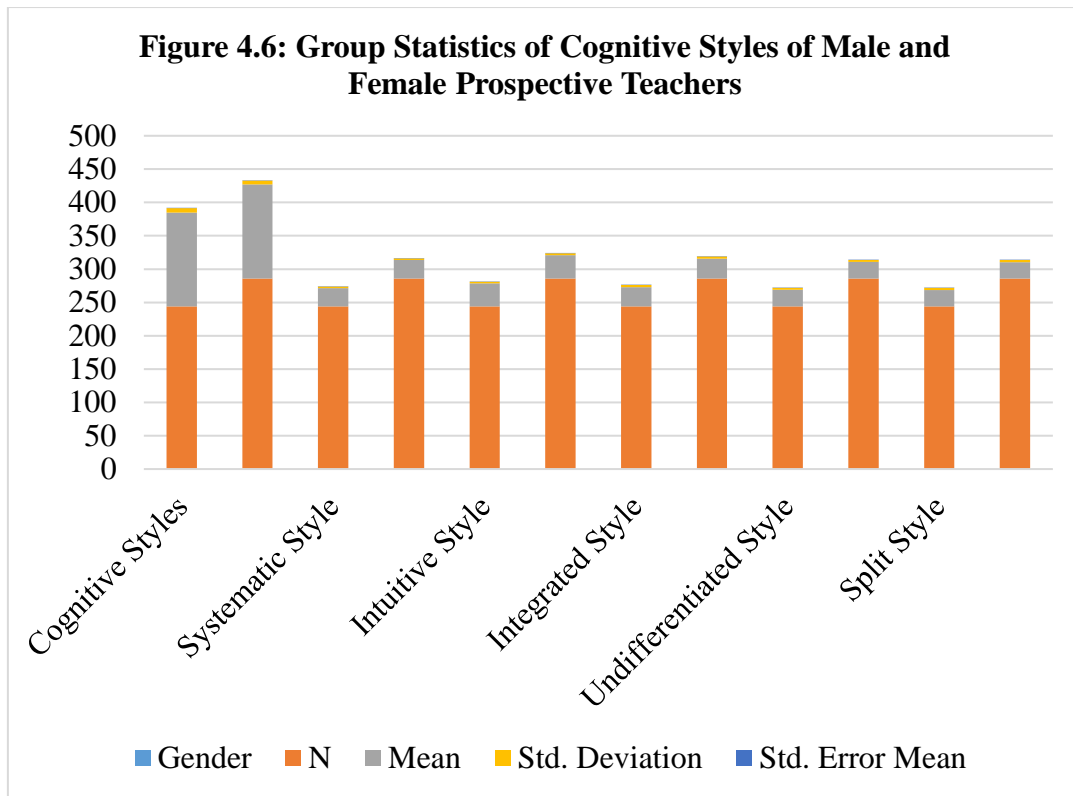


Table 4.8 and figure 4.6 indicates the mean, standard deviation and standard error of mean scores of cognitive styles and its dimension of male and female prospective teachers. It also revealed that there are 244 male and 286 female prospective teachers whose mean scores are 140.803 and 141.038 on cognitive styles. Although group statistics also showed the dimension-wise mean of male and female teachers on systematic style which is 27.42 and 27.468 with sd of 2.193 and 2.382. Males have 34.561 mean and sd. of 2.675 on intuitive styles and females have mean score of 34.926 with sd of 2.814. Mean of males on integrated style is 28.954 with sd of 3.382 whereas average score of females is 29.608 and sd. of 3.462. Mean score on undifferentiated style of males is 25.114 with having sd. of 2.999 and females obtained mean score of 24.611 and sd of 2.956. In the dimension of split style, males have mean score of 24.750 with sd of 3.077 and females have mean score of 24.423 with 3.107 of sd.

Table 4.9: Comparison of Cognitive Styles of Male and Female Prospective Teachers

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Cognitive Styles	-.23518	.521	528	.451	.652
Systematic Style	-.04640	.200	528	.232	.817
Intuitive Style	-.36510	.239	528	1.523	.128
Integrated Style	-.65347	.298	528	2.189	.029
Undifferentiated Style	.502	.259	528	1.938	.063
Split Style	.32692	.269	528	1.213	.225

The above table 4.9 compare male and female prospective teachers on cognitive styles and its dimensions. It is revealed from the above analysis that t-value for cognitive styles is .451 which is lower than 1.96 at 0.05 level and p-value is .652 which is larger than the alpha 0.05. So, statistically, it is implied that there is no significant difference between cognitive styles of prospective teachers with reference to their gender. Hence, the stated hypothesis No. 2.1, “There will be no significant difference between the cognitive styles of prospective teachers with reference to their gender (male/female)” is retained.

Although, all the dimensions of cognitive styles show that calculated values are less than t value at 0.05 and the p value is greater than 0.05 level of significance except integrated cognitive style. Hence, the above analysis indicates that male and female prospective teachers significantly differ in integrated style but do not demonstrate any significant difference in other dimensions of cognitive styles at all. A supportive study conducted by Ellah & Achor (2015) found that the student’s having Auditory/Visual mixed cognitive styles differ in their performance. The results also explained that “There was no significant difference in performance of student’s on all levels in relation to the other three cognitive styles”. Katoch & Thakur (2016) also found no difference between male and female teachers in cognitive styles.

4.4.2 Comparison of Cognitive Styles of Rural and Urban Prospective Teachers

The section 4.4.2 deals with the analysis and interpretation of data regarding the comparison of dimension-wise cognitive styles of rural and urban prospective teachers in the following tables and figures:

Table 4.10: Group Statistics of Cognitive Styles of Rural and Urban Prospective Teachers

Variable	Locality	N	Mean	Sd.	Std. Error Mean
Cognitive Styles	Rural	326	141.098	6.040	.334
	Urban	204	140.661	5.885	.412
Systematic Style	Rural	326	27.561	2.312	.128
	Urban	204	27.264	2.260	.158
Intuitive Style	Rural	326	34.733	2.711	.150
	Urban	204	34.799	2.829	.198
Integrated Style	Rural	326	29.374	3.498	.193
	Urban	204	29.201	3.344	.234
Undifferentiated Style	Rural	326	24.852	3.078	.170
	Urban	204	24.828	2.834	.198
Split Style	Rural	326	24.576	3.053	.169
	Urban	204	24.568	3.168	.221

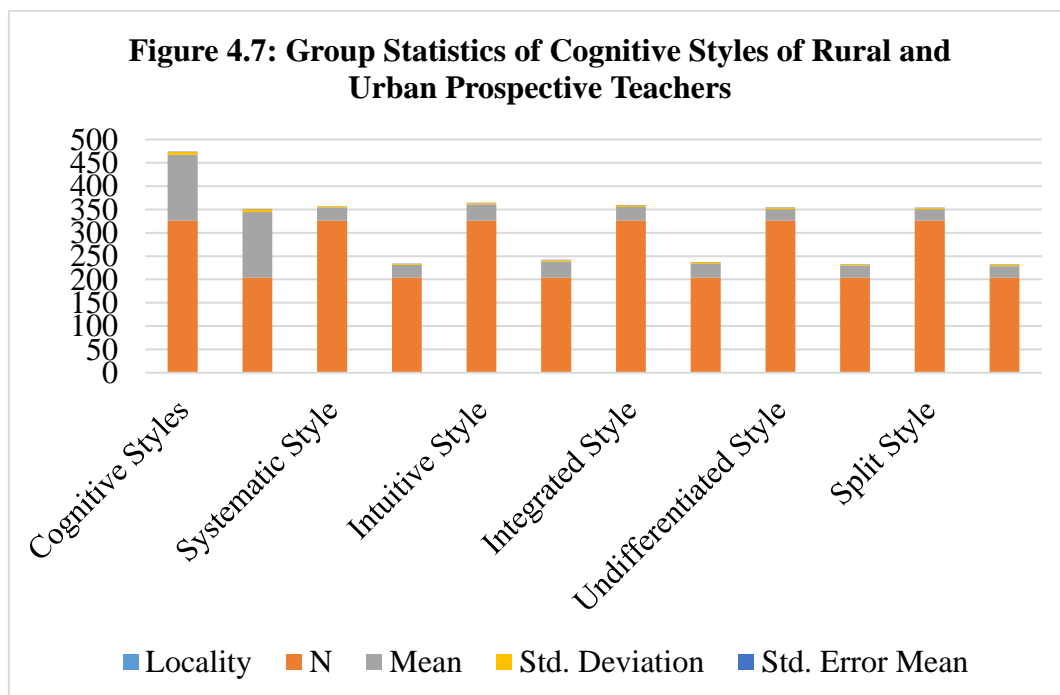


Table 4.10 and figure 4.7 represent the mean and sd. scores of cognitive styles and its mentioned dimensions with reference to their locality i.e. rural and urban. It is also revealed that there are 326 rural and 204 urban prospective teachers whose mean score is 141.098 and 140.661 with sd. 6.040 and 5.885 on cognitive styles. Even though group statistics of all the dimensions of cognitive styles is demonstrated in which mean score of rural on systematic style is 27.561 and 27.264 for urban with sd. of 2.312 and 2.260. Rural students have 29.374 mean and sd. of 2.711 on intuitive styles while urban have mean score of 34.799 with sd. of 2.829. Mean of rural on integrated style is 29.374 with sd. of 3.498 although average score of urban is 29.201 and sd. of 3.344. Mean score on undifferentiated style of rural is 24.852 with having sd. of 3.078 and urban acquired mean score of 24.828 with sd. of 2.834. Mean score for the dimension of split style of rural prospective teachers is 24.5767 with having sd. of 3.053 besides that urban have mean score of 24.568 with 3.168 of Sd.

Table No. 4.11: Comparison of Cognitive Styles of Rural and Urban Prospective Teachers

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Cognitive Styles	.436	.533	528	.817	.414
Systematic Style	.2966	.204	528	1.449	.148
Intuitive Style	-.065	.246	528	.268	.789
Integrated Style	.173	.307	528	.564	.573
Undifferentiated Style	.024	.266	528	.091	.927
Split Style	.008	.276	528	.029	.977

In the above analysis comparison of rural and urban prospective teachers on cognitive styles and its various dimensions has been presented. It is revealed from the table 4.11 that t-value is .817 which is less than 1.96 at 0.05 level and p value is .414 which is comprehensively greater than the alpha 0.05 level of significance. So, statistically, it can be concluded that there is no significant difference between cognitive styles of prospective teachers with reference to

their locality. Therefore, the hypothesis No. 2.2, “There will be no significant difference between the cognitive styles of prospective teachers with reference to their locality (rural/urban)” is accepted.

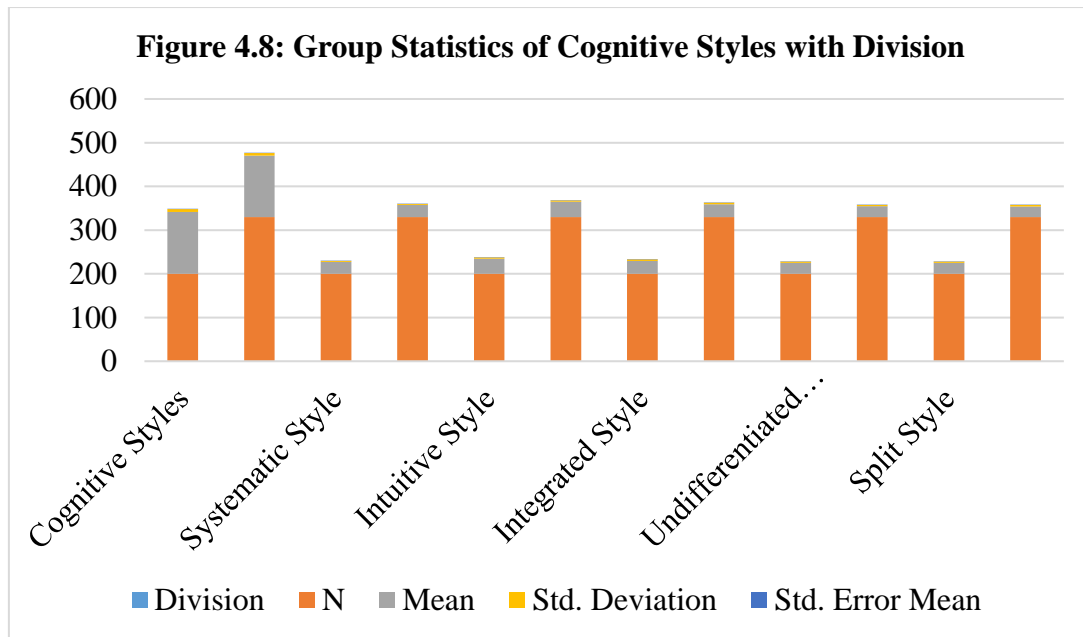
Hence, all the dimensions of cognitive styles hold t and p values insignificant at 0.05 level. So, it is depicted here that rural and urban prospective teachers do not have showed any significant difference on any dimension of cognitive styles. A supportive study conducted by Ellah & Achor (2015) found “That the student’s having auditory/visual mixed cognitive styles differ in their performance and the results of study also explained that there was no significant difference in performance of student’s on all levels in relation to the other three cognitive styles”.

4.4.3 Comparison of Cognitive Styles of Prospective Teachers with their Division

The section 4.4.3 presents the analysis and interpretation of data regarding the comparison of dimension-wise cognitive styles of prospective teachers with their division i.e. Jammu and Kashmir in the following tables and figures:

Table 4.12: Group Statistics of Cognitive Styles of Prospective Teachers with Division

Variable	Division	N	Mean	Sd.	Std. Error Mean
Cognitive Styles	Jammu	200	141.390	6.750	.477
	Kashmir	330	140.651	5.451	.300
Systematic Style	Jammu	200	27.620	2.153	.152
	Kashmir	330	27.342	2.374	.130
Intuitive Style	Jammu	200	34.580	2.769	.195
	Kashmir	330	34.866	2.744	.151
Integrated Style	Jammu	200	29.375	3.566	.252
	Kashmir	330	29.266	3.362	.185
Undifferentiated Style	Jammu	200	24.845	3.042	.215
	Kashmir	330	24.842	2.953	.162
Split Style	Jammu	200	24.970	3.177	.224
	Kashmir	330	24.333	3.023	.166



Mean and sd. scores of cognitive styles and its stated dimensions of prospective teachers of Jammu and Kashmir is revealed from the above table 4.12 and figure 4.8. Here, it is also shown that there are 200 prospective teachers from Jammu division and 330 prospective teachers are belonging to Kashmir division. Prospective teachers of Jammu acquire mean score of 141.390 along with sd. 6.750 whereas students of Kashmir hold mean of 140.651 and sd. of 5.451 on cognitive styles in total. Students having mean 27.620 on systematic style and sd. 6.750, 34.580 on intuitive style and sd. 2.769, 29.375 on integrated style with sd 3.566, 24.845 on undifferentiated style and sd. 3.042 and 24.970 on split style and sd. 3.177 belonging to Jammu whereas prospective teachers who possess mean scores of 27.342 and sd. 2.374 on systematic style, 34.866 and sd. 2.744 on intuitive style, 29.266 and sd. 3.362 on integrated style, 24.842 and sd. 2.953 on undifferentiated style and 24.333 and having sd. 3.023 belonging to Kashmir division.

Table: 4.13: Comparison of Cognitive Styles of Prospective Teachers with Division

Variable	Mean Difference	Std. Error Difference	df	t- value	p-value
Cognitive Styles	.738	.535	528	1.379	.168
Systematic Style	.277	.205	528	1.351	.177
Intuitive Style	-.286	.246	528	1.162	.246
Integrated Style	.108	.308	528	.351	.725
Undifferentiated Style	.002	.267	528	.010	.992
Split Style	.636	.276	528	2.305	.022

Comparison of prospective teachers of Jammu and Kashmir divisions on cognitive styles and its various dimensions is thoroughly existing from the above table 4.13. Here, it is revealed that t-value is 1.379 which is less than 1.96 at 0.05 and p value for cognitive styles is .168 which is undoubtedly greater than the alpha 0.05 level of significance. Thus, it can easily be stated here that there is no significant difference between cognitive styles of prospective teachers with reference to their division. Consequently, the hypothesis No. 2.3, “There will be no significant difference between the cognitive styles of prospective teachers with reference to their division (Jammu/Kashmir)” is accepted. Henceforth, all the dimensions of cognitive styles embrace t value less than 1.96 and p value greater than the alpha 0.05 level of significance. So, it is described here that Jammu and Kashmir prospective teachers have not exhibited any significant variance on any dimension of cognitive styles except split style. In this style t- value is found 2.305 which is greater than table value 1.96 at 0.05 and p value is .022 which is less than the alpha 0.05. Therefore, prospective teachers of Jammu and Kashmir divisions demonstrated a significant difference in split style.

4.4.4 Comparison of Cognitive Styles of Prospective Teachers with Streams

The section 4.4.4 deals with the analysis and interpretation of data regarding the comparison of dimension-wise cognitive styles of prospective teachers with their streams i.e. arts, science and commerce in the following tables and figures:

Table 4.14: Comparison of Cognitive Styles of Prospective Teachers with Streams

Variable		Sum of Squares	df	Mean Square	F-value	p-value
Cognitive Styles	Between Groups	279.455	2	139.727	.252	.417
	Within Groups	18632.962	527	35.357		
	Total	18912.417	529			
Systematic Style	Between Groups	2.085	2	1.043	.197	.821
	Within Groups	2784.935	527	5.285		
	Total	2787.021	529			
Intuitive Style	Between Groups	49.274	2	24.637	3.274	.039
	Within Groups	3965.813	527	7.525		
	Total	4015.087	529			
Integrated Style	Between Groups	104.015	2	52.008	4.457	.012
	Within Groups	6148.854	527	11.668		
	Total	6252.870	529			
Undifferentiated Style	Between Groups	.847	2	.423	.047	.954
	Within Groups	4711.155	527	8.940		
	Total	4712.002	529			
Split Style	Between Groups	25.614	2	12.807	1.339	.263
	Within Groups	5042.016	527	9.567		
	Total	5067.630	529			

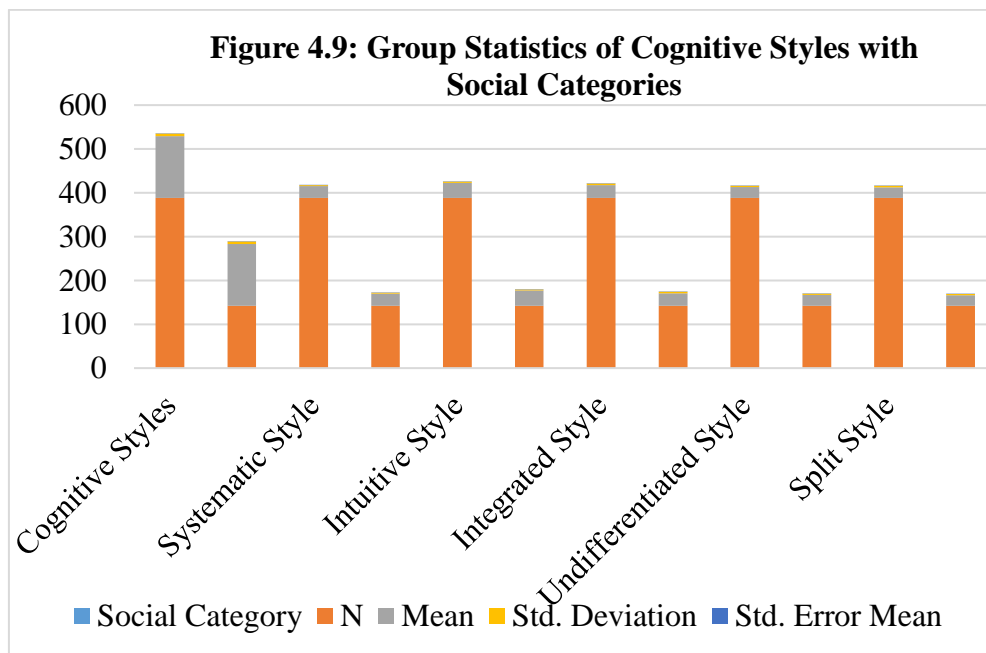
In the above table no. 4.14, between groups and within groups' comparison have been done by using ANOVA. The analysis shows a degree of freedom for both the groups which is 2 for between groups and 527 for within groups. Furthermore, the analysis also exhibit p value .417 which is obviously greater than the alpha 0.05 level of significance. Therefore, it is statistically demonstrated that there exists no significant difference between the cognitive styles of prospective teachers with reference to their streams arts/science/commerce. So, the hypothesis No. 2.4, "There will be no significant difference between the cognitive styles of prospective teachers with reference to their stream (arts/science/commerce)" is retained. Even though dimensions of cognitive styles display a p values that are greater than 0.05 alpha which shows an insignificant difference among prospective teachers with reference to their stream arts/science/commerce in all the dimensions except intuitive style and integrated style. According to the above results, intuitive style and integrated style have a t-values of 3.274 and 4.457 that are greater than 1.96 at 0.05 level. Hence, it reveals a significant difference in intuitive and integrated styles among prospective teachers with reference to their stream arts/science/commerce. A controversial study by Simuth & Schuller (2015) demonstrated that "There was a significant difference between engineering students and psychology students in the preference of cognitive style". The results also revealed that engineering students and managements students were also significantly differ with respect to the preference of cognitive style. Katoch and Thakur (2016) studied that "Male and female secondary school teachers were significantly differ in systematic and intuitive cognitive styles". But as a supportive study they also revealed that "Male and female secondary school teachers were not significantly differ on integrated, undifferentiated and split styles of cognitive styles".

4.4.5 Comparison of Cognitive Styles of Prospective Teachers belonging to Reserved and Unreserved Categories

The section 4.4.5 presents the analysis and interpretation of data regarding the comparison of dimension-wise cognitive styles of prospective teachers belonging to reserved and unreserved categories in the following tables and figures:

Table 4.15: Group Statistics of Cognitive Styles of Prospective Teachers with Social Categories

Variable	Social Category	N	Mean	Sd.	Std. Error Mean
Cognitive Styles	Unreserved	388	140.897	5.989	.303
	Reserved	142	140.964	5.954	.505
Systematic Style	Unreserved	388	27.330	2.269	.114
	Reserved	142	27.769	2.350	.199
Intuitive Style	Unreserved	388	34.674	2.788	.141
	Reserved	142	35.000	2.662	.225
Integrated Style	Unreserved	388	29.433	3.419	.173
	Reserved	142	28.920	3.462	.293
Undifferentiated Style	Unreserved	388	24.800	3.005	.152
	Reserved	142	24.942	2.931	.248
Split Style	Unreserved	388	24.659	3.137	.158



Group statistics of prospective teachers belonging to reserved and unreserved social categories are represented here. Means and sd scores of cognitive styles and its specified

dimensions are revealed from this analysis. The table 4.15 and figure 4.9 also implies that there are 388 students from unreserved category whereas rest 142 are belonging to reserved categories. Prospective teachers of unreserved category acquire mean score of 140.897 along with sd. of 5.989 whereas students of reserved categories embrace the mean 140.964 and sd of 5.954 on cognitive styles. Unreserved category possess mean score of 27.330 and sd. 2.269 on systematic style, 34.674 with sd. 2.788 on intuitive style, 29.433 and sd. 3.419 on integrated style, 24.800 and sd. 3.005 on undifferentiated style and 24.659 with sd 3.137 on split style however, prospective teachers who retain their mean scores of 27.769 and sd 2.350 on systematic style, 35.00 and sd. 2.662 on intuitive style, 28.920 with sd 3.462 on integrated style, 24.942 having sd 2.931 on undifferentiated style and 24.330 with having sd of 2.981 belonging to reserved categories.

Table No. 4.16: Comparison of Cognitive Styles of Prospective Teachers with Social Categories

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Cognitive Styles	-.066	.590	528	.113	.910
Systematic Style	-.439	.226	528	1.840	.063
Intuitive Style	-.325	.272	528	1.196	.232
Integrated Style	.512	.338	528	1.512	.131
Undifferentiated Style	-.142	.295	528	.483	.629
Split Style	.328	.305	528	1.072	.284

The above results of reserved and unreserved prospective teachers depict their comparison on cognitive styles and its various dimensions. Current analysis reported that t-value is .113 which is lower than the table value of 1.96 at 0.05 level and p value for cognitive styles is .910 which is absolutely greater than the alpha 0.05 level of significance. Thus, statistically, it can be declared that no significant difference between cognitive styles of

prospective teachers with reference to their social category exists. Subsequently, the earlier framed hypothesis No. 2.5, “There will be no significant difference between the cognitive styles of prospective teachers with reference to their social category (reserved/unreserved)” is retained.

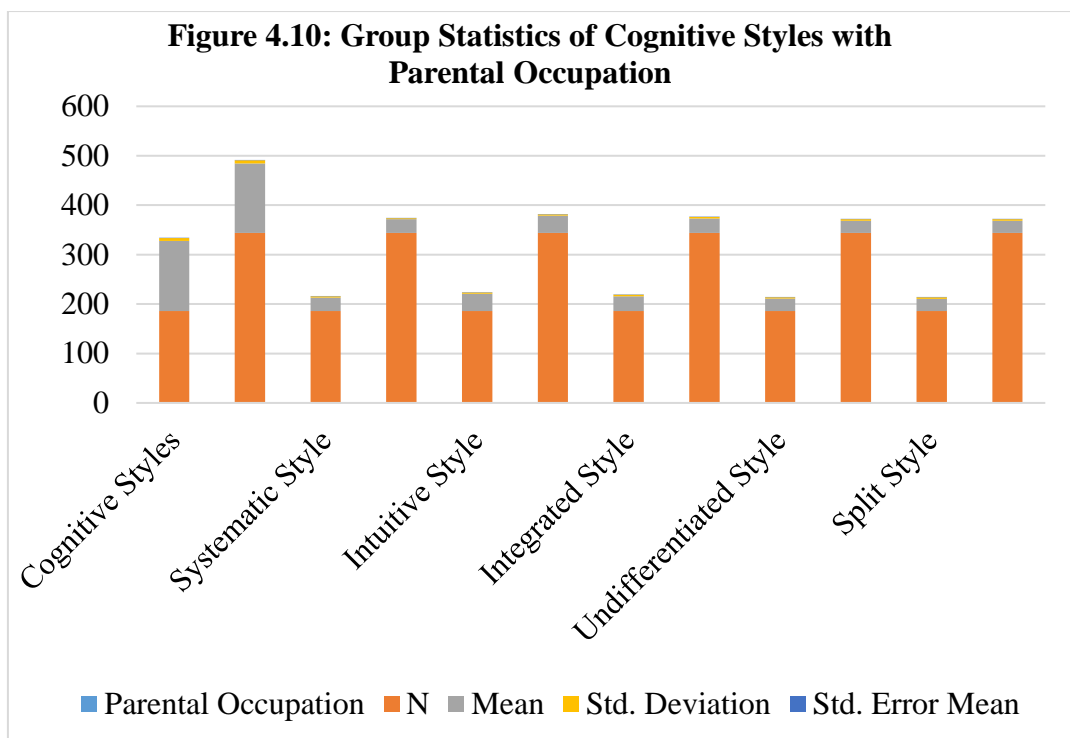
Therefore all the five dimensions of cognitive styles have a t and p values insignificant at 0.05. So, it is revealed that prospective teachers of reserved and unreserved do not exhibited any significant difference on any dimension of cognitive styles.

4.4.6 Comparison of Cognitive Styles of Prospective Teachers with their Parental Occupation

The section 4.4.6 presents the analysis and interpretation of data regarding the comparison of dimension-wise cognitive styles of prospective teachers with their parental occupation i.e. employed and unemployed in the following tables and figures:

Table 4.17: Group Statistics of Cognitive Styles of Prospective Teachers with Parental Occupation

Variable	Parental Occupation	N	Mean	Sd.	Std. Error Mean
Cognitive Styles	Employed	186	141.629	5.659	.414
	Unemployed	344	140.552	6.120	.329
Systematic Style	Employed	186	27.387	2.458	.180
	Unemployed	344	27.479	2.205	.118
Intuitive Style	Employed	186	34.892	2.799	.205
	Unemployed	344	34.686	2.732	.147
Integrated Style	Employed	186	29.618	3.443	.252
	Unemployed	344	29.139	3.428	.184
Undifferentiated Style	Employed	186	25.021	2.813	.206
	Unemployed	344	24.747	3.072	.165
Split Style	Employed	186	24.709	3.119	.228
	Unemployed	344	24.500	3.083	.166



Group statistics of prospective teachers whose parents are employed and unemployed is represented above in the table 4.17 and figure 4.10. Their mean and sd scores of cognitive styles and its various dimensions are exhibited from this analysis. The results also signifies that there are 186 students whose parents are employed whereas the parents of other 344 are unemployed. Prospective teachers whose parents are employed have the mean score of 141.629 along with the sd. of 5.659 while the students whose parents are unemployed attained the mean 140.552 and sd 6.120 on cognitive styles. Students having their parents employed hold the mean score of 27.387 and sd 2.458 on systematic style, mean 34.892 with sd 2.732 on intuitive style, mean 29.618 and sd 3.443 on integrated style, 25.021 with sd 2.813 on undifferentiated style and mean 24.709 with sd 3.137 on split style though prospective teachers who have the mean scores of 27.479 and sd 2.205 on systematic style, 34.686 and sd 2.732 on intuitive style, 29.139 with sd 3.428 on integrated style, 24.747 having sd 3.072 on undifferentiated style and 24.500 with having sd of 3.083 on split style pertaining to the prospective teachers whose parents are unemployed.

Table No. 4.18: Comparison of Cognitive Styles of Prospective Teachers with Parental Occupation

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Cognitive Styles	1.076	.542	528	.634	.543
Systematic Style	-.092	.209	528	.443	.658
Intuitive Style	.206	.250	528	.823	.411
Integrated Style	.478	.312	528	1.532	.126
Undifferentiated Style	.274	.271	528	1.010	.313
Split Style	.209	.281	528	.744	.457

The above analysis exhibits the comparison of prospective teachers (whose parents are employed and unemployed) on cognitive styles and its specific dimensions. Existing results stated that t-value is .634 which is less than the table value 1.96 at 0.05 and p value for cognitive styles is .543 which is comprehensively greater than the alpha 0.05 level of significance and. Hence in both the conditions it can be indicated here that no significant difference between cognitive styles of prospective teachers with reference to their socio demographic variable (parental occupation) occurs. Therefore, the earlier prepared hypothesis No. 2.6, “There will be no significant difference between the cognitive styles of prospective teachers with reference to their parental occupation (employed/unemployed)” is retained.

Even though all the five dimensions of cognitive styles have a t and p values insignificant at 0.05. Thus, it is demonstrated here that prospective teachers whose parents are employed and unemployed have not unveiled a significant difference on any dimension of cognitive styles.

4.5 Comparison of Emotional Intelligence among Prospective Teachers with reference to their Socio-Demographic variables

4.5.1 Comparison of Emotional Intelligence of Male and Female Prospective Teachers

The section 4.5.1 presents the analysis and interpretation of data regarding the comparison of emotional intelligence of prospective teachers with reference to their gender i.e. male and female in the following tables and figures:

Table 4.19: Group Statistics of Emotional Intelligence of Male and Female Prospective Teachers

Variable	Gender	N	Mean	Sd.	Std. Error Mean
Emotional Intelligence	Male	244	140.278	6.266	.401
	Female	286	139.370	5.676	.335
Self-Awareness	Male	244	27.602	3.176	.203
	Female	286	27.374	2.981	.176
Self-Regulation	Male	244	27.602	3.469	.222
	Female	286	27.751	3.174	.187
Motivation	Male	244	27.389	3.068	.196
	Female	286	27.286	3.242	.191
Empathy	Male	244	28.258	3.502	.224
	Female	286	27.930	3.102	.183
Social Skills	Male	244	29.426	2.909	.186
	Female	286	29.028	2.899	.171

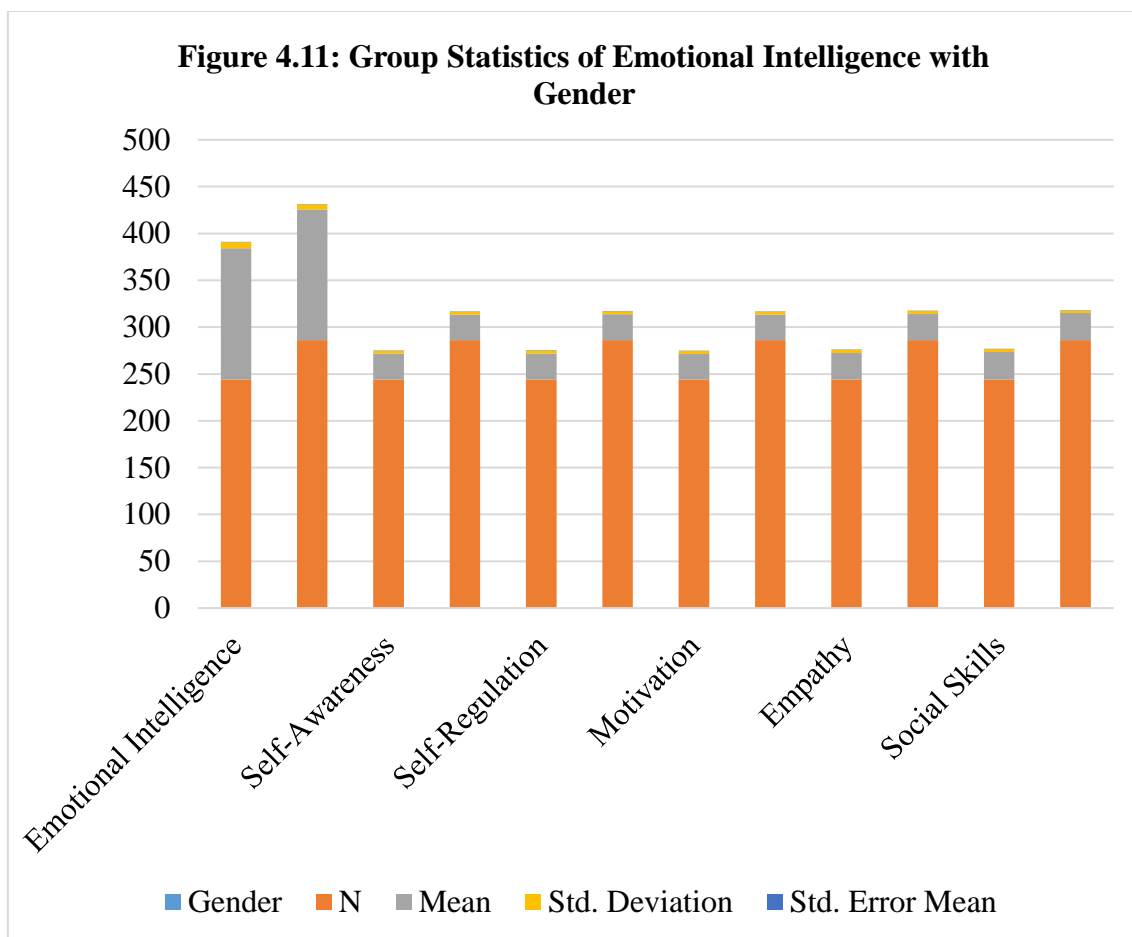


Table 4.19 and Figure 4.11 highlight group statistics of both male and female prospective teachers on emotional intelligence and its specified dimensions. The outcomes of the above table highlight that there are 244 males and 286 females. Both males and females attain the mean score of 140.278 and 139.370 along with their sd. of 6.266 and 5.676 on emotional intelligence. Males possessed the mean score of 27.602 and sd. 3.176 on self-awareness, 27.602 with sd 3.469 on self-regulation, 3.068 and sd. 3.443 on motivation, 28.258 with sd. 3.502 on empathy and 29.426 with sd. 2.909 on social skills, however, females acquire the mean scores of 27.374 and sd. 2.981 on self-awareness, 27.751 and sd. 3.174 on self-regulation, 27.286 with sd. 3.242 on motivation, 27.930 having sd 3.102 on empathy and 29.028 with having sd of 2.899 on social skills.

Table No. 4.20: Comparison of Emotional Intelligence of Male and Female Prospective Teachers

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Emotional Intelligence	.908	.519	528	1.750	.081
Self -Awareness	.228	.267	528	.853	.394
Self -Regulation	-.149	.288	528	.517	.605
Motivation	.102	.275	528	.372	.710
Empathy	.328	.286	528	1.144	.253
Social-Skills	.398	.253	528	1.574	.116

The existing results show the comparison of prospective teachers on emotional intelligence and its dimensions with reference to their gender. Current analysis indicated that t-value is 1.750 which is lower than the 1.96 at 0.05 and p value for emotional intelligence is .081 which is statistically greater than the alpha 0.05 level of significance. Henceforth, it can be stated here that significant difference does not exist between emotional intelligence of prospective teachers with reference to their gender. Thus, the earlier prepared hypothesis 3.1, “There will be no significant difference between the emotional intelligence of prospective teachers with reference to their gender (males/females)” is accepted.

Afterward, all the five dimensions of emotional intelligence keep a t and p values insignificant at 0.05. So, it is proved here that prospective teachers “male and female” have statistically not divulged any significant difference in the dimensions of emotional intelligence. As a supporting study Gupta (2014) revealed that there is no significant difference between the emotional intelligence of prospective teachers with reference to their socio-demography.

4.5.2 Comparison of Emotional Intelligence of Rural and Urban Prospective Teachers

The section 4.5.2 deals with the analysis and interpretation of data regarding the comparison of emotional intelligence and its dimensions of prospective teachers with reference to their locality i.e. rural and urban in the following tables and figures:

Table 4.21: Group statistics of Emotional Intelligence of Rural and Urban Prospective Teachers

Variable	Locality	N	Mean	Sd.	Std. Error Mean
Emotional Intelligence	Rural	326	139.889	6.071	.336
	Urban	204	139.627	5.807	.406
Self-Awareness	Rural	326	27.392	3.122	.172
	Urban	204	27.617	2.992	.209
Self-Regulation	Rural	326	27.561	3.2770	.181
	Urban	204	27.877	3.363	.235
Motivation	Rural	326	27.368	3.175	.175
	Urban	204	27.279	3.144	.220
Empathy	Rural	326	28.141	3.325	.184
	Urban	204	27.985	3.247	.227
Social Skills	Rural	326	29.426	2.868	.158
	Urban	204	28.867	2.945	.206

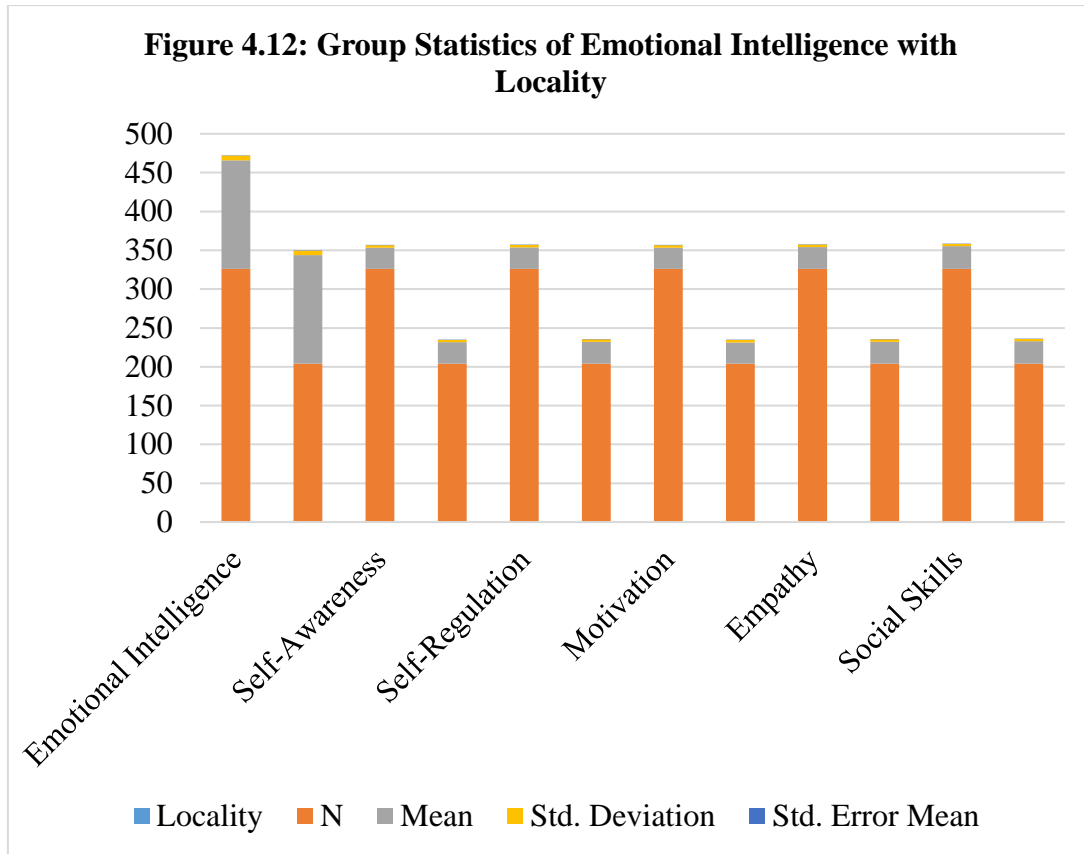


Table 4.21 and figure 4.12 represent the mean and sd scores of emotional intelligence and its mentioned dimensions of prospective teachers with reference to locality i.e. rural and urban. The results indicate that there are 326 rural and 204 urban prospective teachers whose mean score is 139.889 and 139.627 with sd. of 6.071 and 5.807 on emotional intelligence. Moreover, group statistics of dimensions of emotional intelligence is also presented where mean score of rural and urban on self-awareness is 27.392 and 27.617 with sd. of 3.122 and 2.992. Rural pupil teachers have 27.561 mean and sd. of 3.277 on self-regulation while urban have mean score of 27.877 with sd of 3.363. Likewise mean of rural on motivation is 27.368 with sd. of 3.175 while average score of urban students is 27.279 with sd. of 3.144. Mean score on of rural students on empathy is 28.141 with having sd of 3.325 but urban students acquired mean score of 27.985 and sd. of 3.247. On the dimension of social skills rural attained the mean score of 29.426 with sd of 2.868 whereas urban possess mean score of 28.867 with sd. 2.945 on the same dimension.

Table 4.22: Comparison of Emotional Intelligence of Prospective Teachers with Locality

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Emotional Intelligence	.262	.533	528	.492	.623
Self -Awareness	-.225	.274	528	.820	.412
Self -Regulation	-.316	.295	528	1.070	.285
Motivation	.088	.282	528	.314	.754
Empathy	.155	.294	528	.530	.597
Social-Skills	.558	.258	528	2.159	.031

The independent samples t-test has been used to compare the prospective teachers on emotional intelligence and its dimensions with reference to their locality. The existing results indicated that t-value is .492 which is less than the table value of 1.96 at 0.05 level and p value for emotional intelligence is .623 which is statistically greater than the alpha 0.05 level of significance. Therefore, in both the conditions, it can be specified that no significant difference exist between emotional intelligence of prospective teachers with reference to their locality. Henceforth, the prior framed hypothesis No. 3.2, “There will be no significant difference between the emotional intelligence of prospective teachers with reference to their locality (rural/urban)” is accepted.

Subsequently, all the dimensions of emotional intelligence retain a t and p values insignificant at 0.05 except social skills dimension. The t value for social skills dimension is 2.159 that is obviously greater than 1.96 at 0.05 whereas p value is .031 which is less than the alpha 0.05. Therefore, prospective teachers of rural and urban categories show a significant difference in social skills. So, it is also proved here that rural and urban prospective teachers have statistically not revealed any significant difference in the dimensions of emotional intelligence except social skills whereas rural prospective teachers have been found better in

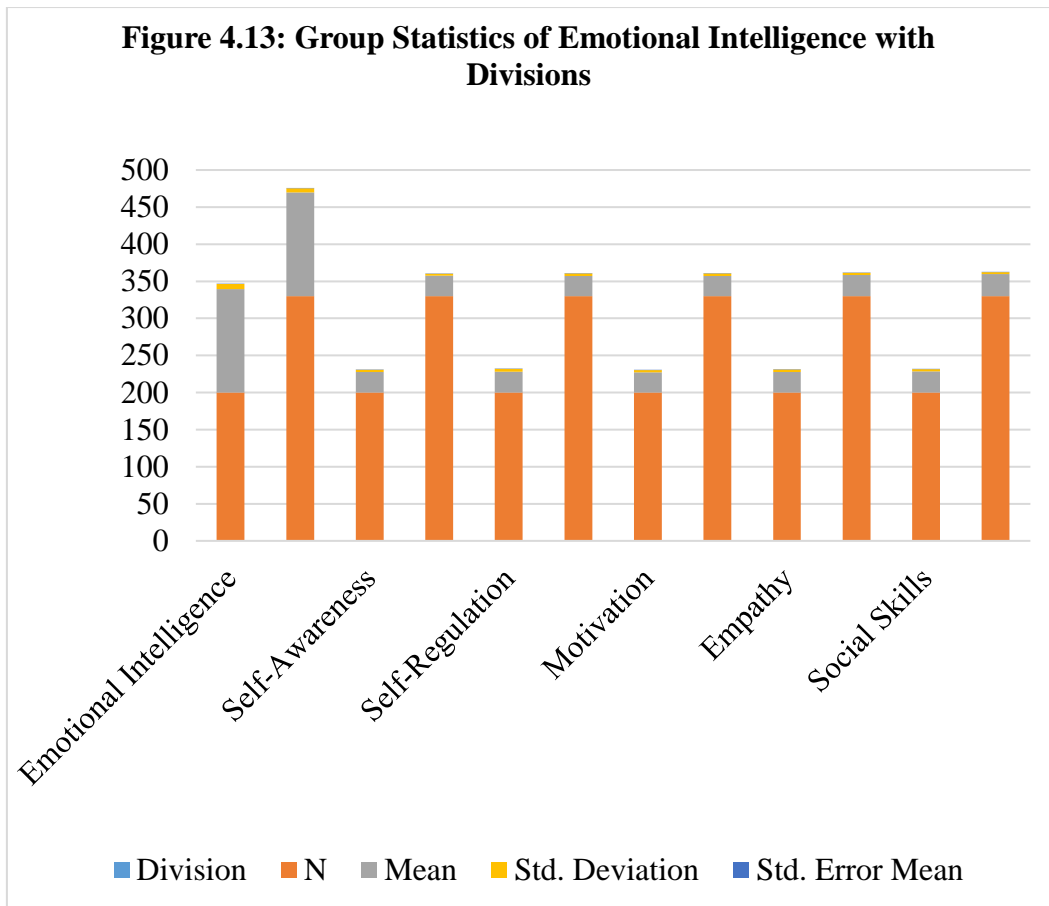
social skills than urban students. Alam (2018) found that there was no significant difference in emotional intelligence of students with reference to their locality.

4.5.3 Comparison of Emotional Intelligence of Prospective Teachers of Jammu and Kashmir Division

The section 4.5.3 presents the analysis and interpretation of data regarding the comparison of emotional intelligence of prospective teachers with reference to their division i.e. Jammu and Kashmir in the following tables and figures:

Table No. 4.23: Group Statistics of Emotional Intelligence with Division

Variable	Division	N	Mean	Sd.	Std. Error Mean
Emotional Intelligence	Jammu	200	139.505	6.770	.478
	Kashmir	330	139.960	5.426	.298
Self-Awareness	Jammu	200	27.520	3.321	.234
	Kashmir	330	27.454	2.915	.160
Self-Regulation	Jammu	200	28.260	3.582	.253
	Kashmir	330	27.333	3.088	.169
Motivation	Jammu	200	27.350	3.112	.220
	Kashmir	330	27.324	3.194	.175
Empathy	Jammu	200	27.775	3.324	.235
	Kashmir	330	28.266	3.265	.179
Social Skills	Jammu	200	28.600	2.886	.204
	Kashmir	330	29.581	2.862	.157



Above analysis demonstrates the mean and sd scores of emotional intelligence and its specified dimensions of prospective teachers with reference to division i.e. Jammu and Kashmir. The results describe that there are 200 prospective teachers from Jammu and 330 from Kashmir, whose mean score is 139.505 and 139.960 with sd of 6.770 and 5.426 on emotional intelligence. Furthermore, group statistics of all dimensions of emotional intelligence is also existing where mean and sd scores of Jammu and Kashmir prospective teachers is 27.520 and 27.454 with sd. of 3.321 and 2.915 on self-awareness, mean 28.260 and 27.333 with sd. 3.582 and 3.088 on self-regulation, mean 27.350 and 27.324 with sd. 3.112 and 3.194 on motivation, mean 27.77 and 27.324 with sd. 3.324 and 3.265 on empathy and mean score of 28.60 and 29.581 with having sd. of 2.886 and 2.862 on social skills.

Table No. 4.24: Comparison of Emotional Intelligence of Prospective Teachers with Division

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Emotional Intelligence	-.455	.534	528	.852	.395
Self -Awareness	.0654	.275	528	.238	.812
Self -Regulation	.926	.294	528	3.150	.002
Motivation	.025	.283	528	.091	.928
Empathy	-.491	.294	528	1.669	.096
Social-Skills	-.981	.257	528	3.815	.000

Table 4.24 compare prospective teachers on emotional intelligence and its dimensions with reference to their division. The existing analysis directed that t-value is .852 which is less than the table value of 1.96 at 0.05 level and p value for emotional intelligence is .395 which is statistically greater than the alpha 0.05 level of significance. Thus, it can be said here that no significant difference exist between emotional intelligence of prospective teachers with reference to their division. Henceforth, the prior framed hypothesis no. 3.3, “There will be no significant difference between the emotional intelligence of prospective teachers with reference to their division (Jammu/Kashmir)” is accepted.

Afterwards, all the five dimensions of emotional intelligence retain a t and p values insignificant at 0.05 except self-regulation and social skills because the t-value for self-regulation is 3.150 and p-value is .002 whereas t-value of social skills is 3.815 and p value is .000 which means both the dimensions show a significant difference at 0.05. Therefore, it is clearly demonstrated here that prospective teachers of Jammu and Kashmir divisions show a significant difference in self-regulation and social skills dimensions of emotional intelligence.

4.5.4 Comparison of Emotional Intelligence of Prospective Teachers of Arts, Science and Commerce Streams

The section 4.5.4 deals with the analysis and interpretation of data regarding the comparison of emotional intelligence and its specified dimensions among prospective teachers with reference to their streams i.e. arts, science and commerce in the following tables and figures:

Table No. 4.25: Comparison of Emotional Intelligence of Prospective Teachers with Streams

Variable		Sum of Squares	df	Mean Square	F-value	p-value
Emotional Intelligence	Between Groups	273.833	2	136.916	.987	.368
	Within Groups	18562.499	527	35.223		
	Total	18836.332	529			
Self-Awareness	Between Groups	109.286	2	54.643	5.897	.003
	Within Groups	4882.985	527	9.266		
	Total	4992.272	529			
Self-Regulation	Between Groups	26.835	2	13.418	1.225	.295
	Within Groups	5771.912	527	10.952		
	Total	5798.747	529			
Motivation	Between Groups	19.061	2	9.531	.954	.386
	Within Groups	5266.827	527	9.994		
	Total	5285.889	529			
Empathy	Between Groups	15.181	2	7.590	.699	.498
	Within Groups	5722.331	527	10.858		
	Total	5737.511	529			
Social Skills	Between Groups	7.006	2	3.503	.413	.662
	Within Groups	4467.327	527	8.477		
	Total	4474.332	529			

Above given between groups and within groups statistic compare prospective teachers on emotional intelligence and its dimensions by using ANOVA. The analysis shows a degree of freedom for both the groups which is 2 for between groups and 527 for within groups. Moreover, the results of the above table also demonstrate a p value .368 which is undoubtedly greater than the alpha 0.05 level of significance. Thus, it is statistically proved that prospective

teachers did not exhibit any significant difference in emotional intelligence with reference to their streams arts/science/commerce. Therefore, the hypothesis no. 3.4, “There will be no significant difference between the emotional intelligence of prospective teachers with reference to their stream (arts/science/commerce)” is retained.

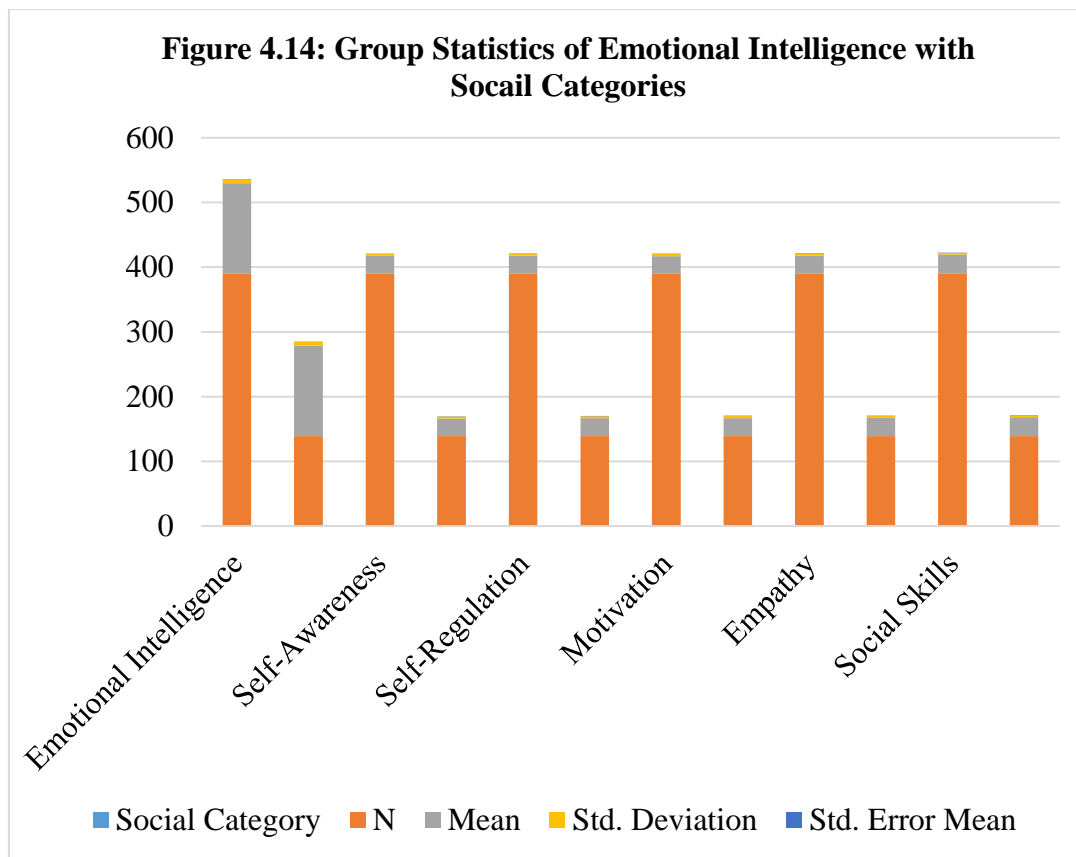
Although, dimensions of emotional intelligence represent t-values less than 1.96 at 0.05 and p values greater than alpha 0.05, so it describes an insignificant difference among prospective teachers in all the dimensions except self-awareness with reference to their streams-arts, science and commerce. According to the existing results, self-awareness has t-value of 5.897 that is greater than 1.96 at 0.05 and p-value of .003 which is less than the alpha 0.05, so it reveals a significant difference in self-awareness among prospective teachers with reference to their stream arts/science/commerce.

4.5.5 Comparison of Emotional Intelligence of Prospective Teachers belonging to Reserved and Unreserved Categories

The section 4.5.5 presents the analysis and interpretation of data regarding the comparison of emotional intelligence along with its dimensions of prospective teachers with their social categories i.e. reserved and unreserved in the following tables and figures:

Table 4.26: Group Statistics of Emotional Intelligence with Social Categories

Variable	Social Category	N	Mean	Sd.	Std. Error Mean
Emotional Intelligence	Unreserved	388	139.784	6.042	.305
	Reserved	142	139.762	5.776	.489
Self-Awareness	Unreserved	382	27.541	3.101	.157
	Reserved	142	27.280	2.985	.253
Self-Regulation	Unreserved	388	27.751	3.291	.166
	Reserved	142	27.496	3.380	.286
Motivation	Unreserved	388	27.171	3.099	.156
	Reserved	142	27.762	3.295	.279
Empathy	Unreserved	388	28.056	3.424	.173
	Reserved	142	28.143	2.915	.247
Social Skills	Unreserved	388	29.264	2.840	.143
	Reserved	142	29.079	3.102	.263



The existing analysis demonstrate the mean and sd scores of emotional intelligence and its specified dimensions of prospective teachers with reference to their social category i.e. reserved and unreserved. The results indicate that there are 388 and 142 prospective teachers belonging to unreserved and reserved categories and their mean scores are 139.784 and 139.762 with sd of 6.042 and 5.776 on emotional intelligence. Besides, group statistics of all the dimensions of emotional intelligence is also highlighted where mean and sd. scores of unreserved and reserved prospective teachers is 27.541 and 27.280 with sd. of 3.101 and 2.985 on self-awareness, mean 27.751 and 27.496 with sd. 3.291 and 3.380 on self-regulation, mean 27.171 and 27.762 with sd. 3.099 and 3.295 on motivation, mean 28.056 and 28.143 with sd. 3.424 and 2.915 on empathy and mean score of 29.264 and 29.079 with having sd. of 2.840 and 3.102 on social skills.

Table No. 4.27: Comparison of Emotional Intelligence of Prospective Teachers with Social Categories

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Emotional Intelligence	.022	.590	528	.037	.970
Self -Awareness	.260	.303	528	.858	.391
Self -Regulation	.254	.327	528	.778	.437
Motivation	-.590	.311	528	1.497	.068
Empathy	-.087	.325	528	.268	.788
Social-Skills	.184	.287	528	.643	.520

In the table 4.27, independent samples t-test has been used to compare prospective teachers on emotional intelligence and its dimensions with reference to their social category. The current analysis depicts that t-value is .037 which is statistically less than the table value of 1.96 at 0.05 level and p value for emotional intelligence is .970 which is statistically greater than the alpha 0.05 level of significance. Therefore, it can be stated here that prospective teachers have not displayed any significant difference in emotional intelligence with reference to their socio demographic variable social category. However, the hypothesis No. 3.5, “There will be no significant difference between the emotional intelligence of prospective teachers with reference to their social category (reserved/unreserved)” is accepted.

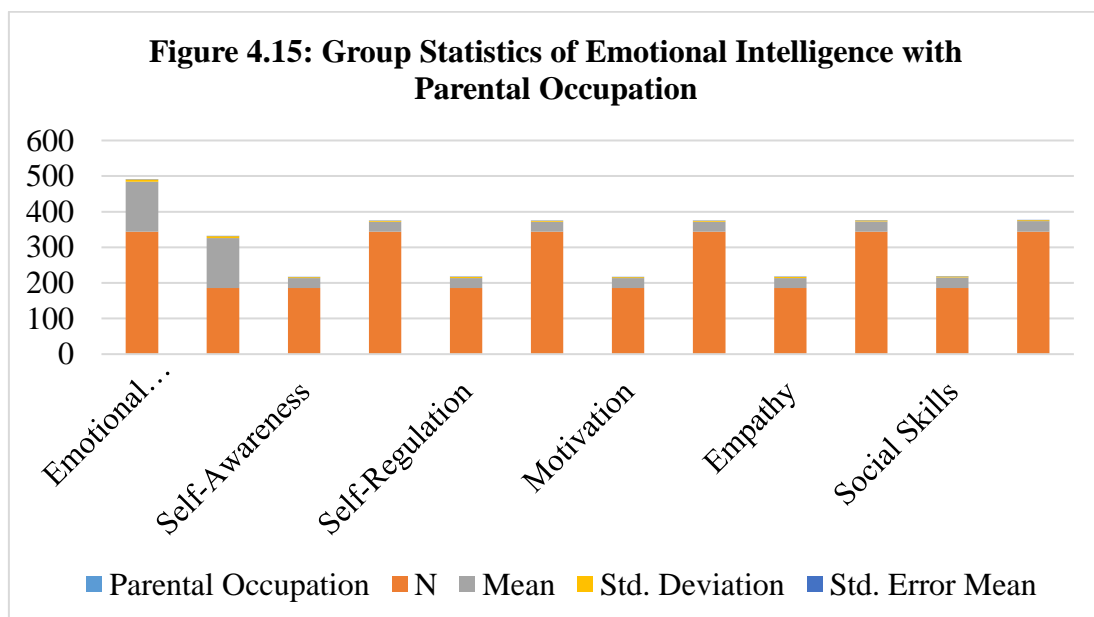
Consequently, all the five dimensions of emotional intelligence possess t and p values insignificant at 0.05. Thus, looking on both of these conditions, it is statistically proved here that reserved and unreserved prospective teachers have not exhibit any significant difference in any dimensions of emotional intelligence.

4.5.6 Comparison of Cognitive Styles of Prospective Teachers with Parental occupation

The section 4.5.6 presents the analysis and interpretation of data regarding the comparison of emotional intelligence and its dimensions of prospective teachers with reference to their parental occupation i.e. employed and unemployed in the following tables and figures:

Table 4.28: Group Statistics of Emotional Intelligence with Parental Occupation

Variable	Parental Occupation	N	Mean	Sd.	Std. Error Mean
Emotional Intelligence	Employed	186	140.552	6.120	.329
	Unemployed	344	139.768	5.780	.423
Self-Awareness	Employed	186	27.602	3.047	.223
	Unemployed	344	27.412	3.087	.166
Self-Regulation	Employed	186	27.908	3.318	.243
	Unemployed	344	27.561	3.305	.178
Motivation	Employed	186	27.123	3.194	.234
	Unemployed	344	27.447	3.141	.169
Empathy	Employed	186	27.784	3.432	.251
	Unemployed	344	28.241	3.209	.173
Social Skills	Employed	186	29.349	2.946	.216
	Unemployed	344	29.136	2.888	.155



The above group statistics demonstrate the mean and sd scores of emotional intelligence and its stated dimensions of prospective teachers with reference to their parental occupation. The existing analysis shows that there are 186 prospective teachers whose parents are employed and the parents of other 344 are unemployed in nature. Means and sd. scores of prospective teachers having parental occupation employed and unemployed is 140.552 and 139.768 with sd. of 6.120 and 5.780 on emotional intelligence. Moreover, group statistics of the dimensions of emotional intelligence is also highlighted where mean and sd. scores of prospective teachers having parental occupation employed and unemployed are 27.602 and 27.412 with sd. of 3.047 and 3.087 on self-awareness, mean 27.908 and 27.561 with sd. 3.318 and 3.305 on self-regulation, mean 27.123 and 27.447 with sd. 3.194 and 3.141 on motivation, mean 27.784 and 28.241 with sd. 3.432 and 3.209 on empathy and mean score of 29.349 and 29.136 with having sd. of 2.946 and 2.888 on social skills.

Table 4.29: Comparison of Emotional Intelligence of Prospective Teachers with Parental Occupation

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Emotional Intelligence	-.030	.543	528	.056	.955
Self -Awareness	.189	.279	528	.677	.499
Self -Regulation	.347	.301	528	1.154	.249
Motivation	-.324	.287	528	1.127	.260
Empathy	-.456	.299	528	1.524	.128
Social-Skills	.212	.264	528	.804	.422

In table 4.29 the independent samples t-test has been used to compare the prospective teachers on emotional intelligence and its dimensions with reference to their parental

occupation. The existing results reveal that calculated t is .056 which is less than 1.96 at 0.05 and p value for emotional intelligence is .955 which is obviously greater than the alpha 0.05 level of significance. Consequently, it would be stated here that there exists no significant difference between emotional intelligence of prospective teachers with reference to their socio demographic variable (parental occupation). Though, the prior framed hypothesis No.3.6 “There will be no significant difference between the emotional intelligence of prospective teachers with reference to their parental occupation (reserved/unreserved)” is retained.

However, all the five dimensions of emotional intelligence possess t and p values insignificant at 0.05. Thus, it is statistically proved here that prospective teachers whose parents are employed and unemployed have statistically not revealed any significant difference in the dimensions of emotional intelligence.

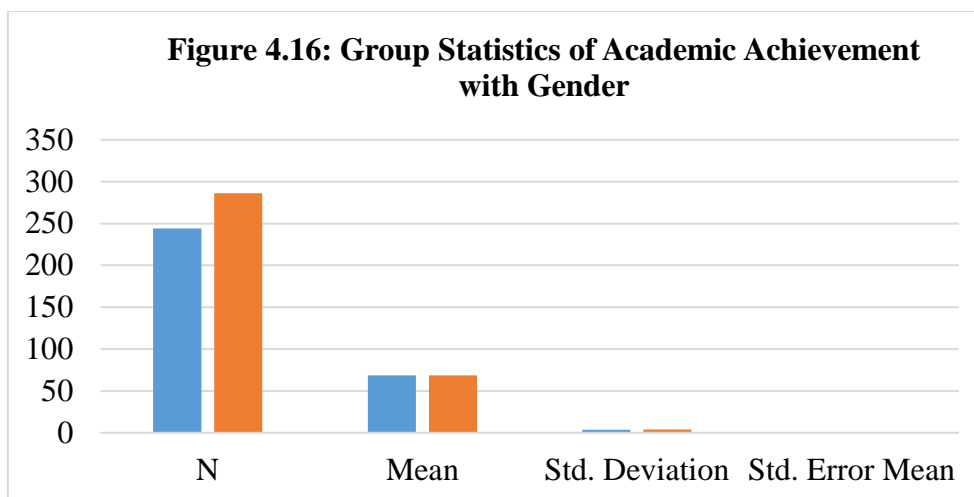
4.6 Comparison of Academic Achievement among Prospective Teachers with reference to their Socio-Demographic variables

4.6.1 Comparison of Academic Achievement of Male and Female Prospective Teachers

The section 4.6.1 presents the analysis and interpretation of data regarding the comparison of academic achievement of prospective teachers with reference to their gender i.e. male and female in the following tables and figures:

Table No. 4.30: Group Statistics of Academic Achievement of Male and Female Prospective Teachers

Variable	Gender	N	Mean	Sd.	Std. Error Mean
Academic Achievement	Male	244	68.405	3.602	.230
	Female	286	68.451	3.982	.235



The above group statistics represent the mean and sd scores of prospective teachers with reference to their gender. Here, it is clearly shown that males are 244 and they have attained the mean score of 68.405 with having sd of 3.602, whereas females were 286 who possess the mean score of 68.451 along with the sd. of 3.982.

Table 4.31: Comparison of Academic Achievement of Prospective Teachers with Gender

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Academic Achievement	-.046	.332	528	.136	.892

Analysis of the above table 4.31 has been done to compare the prospective teachers on academic achievement with reference to their gender. The current results reveal that t-value is .136 which is obviously less than the table value of 1.96 at 0.05 and p value for academic achievement is .892 which is comprehensively greater than the alpha 0.05 level of significance. Hence, it would be described here that no significant difference subsists between the academic achievement of prospective teachers with reference to their gender. Although the prior outlined hypothesis No. 4.1, “There will be no significant difference between the academic achievement of prospective teachers with reference to their gender (male/female)” is accepted. As a supportive study Oludipe & Dupe (2014) demonstrated that “There was no significant

difference between achievement in physics of analytic and nonanalytic girls”. As a controversial study Suvarna and Bhat (2015) found that “There was a significant difference in Academic Achievement of secondary school students with respect to gender”.

4.6.2 Comparison of Academic Achievement of Rural and Urban Prospective Teachers

The section 4.6.2 deals with the analysis and interpretation of data regarding the comparison of academic achievement of prospective teachers with reference to their locality i.e. rural and urban in the following tables and figures:

Table 4.32: Group Statistics of Academic Achievement with locality

Variable	Locality	N	Mean	Sd.	Std. Error Mean
Academic Achievement	Rural	326	68.322	3.679	.203
	Urban	204	68.602	4.009	.280

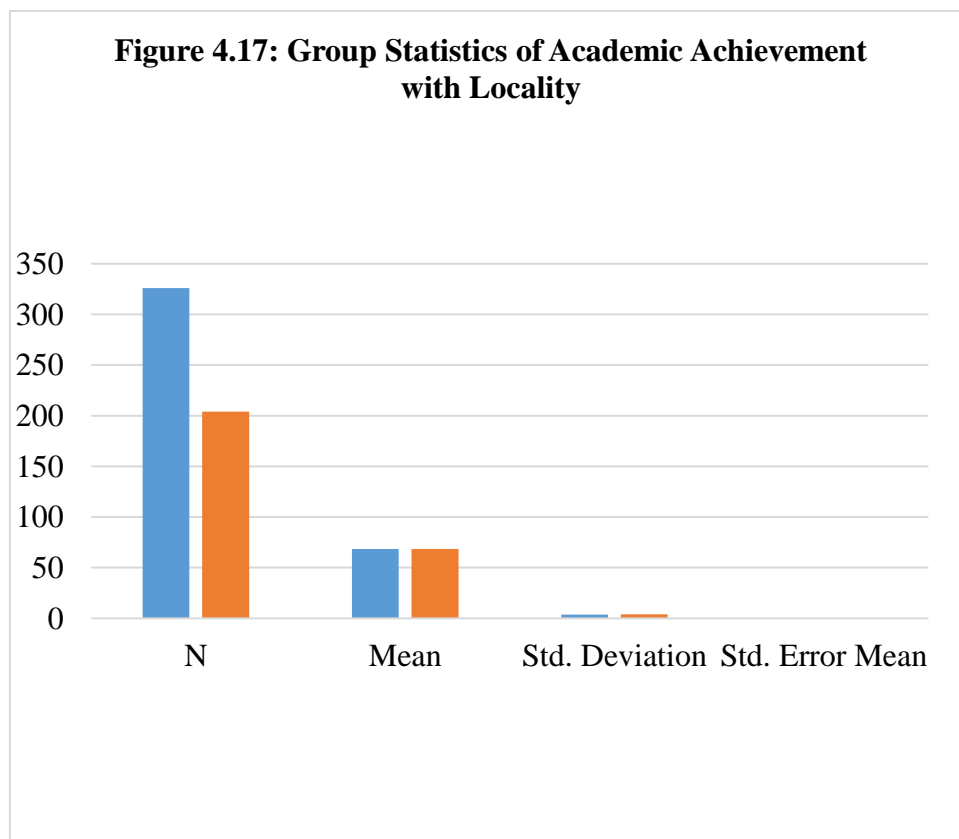


Table 4.32 and figure 4.17 highlight the mean and sd scores of prospective teachers with reference to their locality. Here, it is clearly demonstrated that rural are 326 and have mean score of 68.322 with sd. of 3.679, whereas urban were 204 who retain the mean score of 68.602 along with the sd. of 4.009.

Table 4.33 Comparison of Academic Achievement of Prospective Teachers with Locality

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Academic Achievement	-.280	.340	528	.826	.409

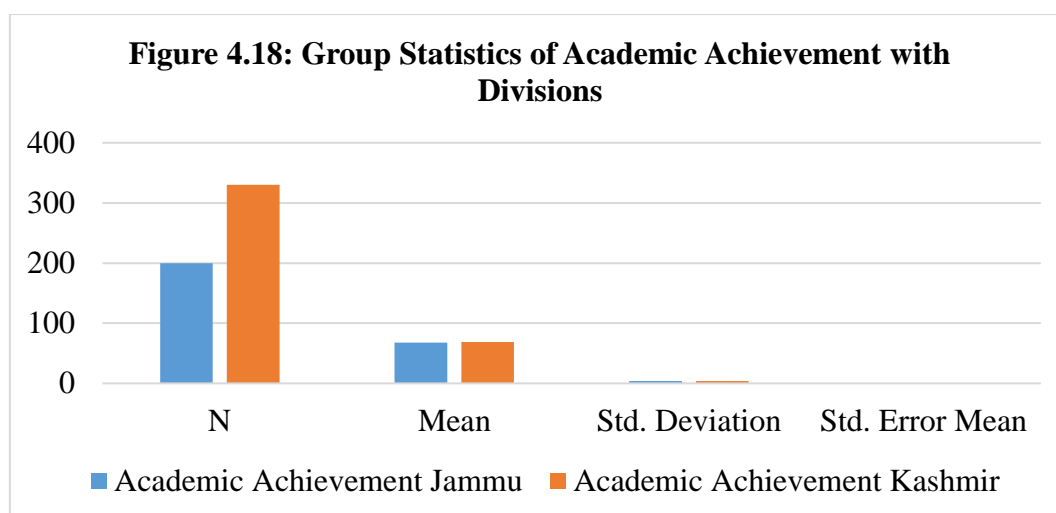
Above analysis has been done to compare the prospective teacher's on academic achievement with reference to their locality. The current results expose that t-value is .826 which is also less than the table value of 1.96 at 0.05 and p value for academic achievement is .409 which is significantly greater than the alpha 0.05 level of significance. So it would be stated here that no significant difference occurs between the academic achievement of prospective teachers with reference to their socio demographic variable (locality). Although the erstwhile hypothesis No 4.2 "There will be no significant difference between the academic achievement of prospective teachers with reference to their locality (rural/urban)" is retained. As a supportive study conducted by Ahmad, Karim, Banerjee, Sen, Chatterjee and Mandal (2022) demonstrated that "No significant difference was found in dynamical character between achievement in four subjects between rural and urban students".

4.6.3 Comparison of Academic Achievement of Jammu and Kashmir Prospective Teachers

The section 4.6.3 presents the analysis and interpretation of data regarding the comparison of academic achievement of prospective teachers with reference to their division i.e. Jammu and Kashmir in the following tables and figures:

Table 4.34: Group Statistics of Academic Achievement with Division

Variable	Division	N	Mean	Sd.	Std. Error Mean
Academic Achievement	Jammu	200	67.825	3.960	.280
	Kashmir	330	68.797	3.671	.202



The above group statistics table 4.34 and figure 4.18 highlight the mean and sd scores of prospective teachers with reference to their division. Here, it is clearly demonstrated that prospective teachers belonging to Jammu are 200 and they have attained the mean score of 67.825 with having sd of 3.960, whereas prospective teachers of Kashmir are 330 who retain the mean score of 68.797 along with the sd of 3.671.

Table 4.35: Comparison of Academic Achievement of Prospective Teachers with Division

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Academic Achievement	-.971	.339	528	.826	.409

The present analysis has been done to compare the prospective teacher's on academic achievement with reference to their division. The existing results find out that t-value is .826

which is quietly less than the table value of 1.96 at 0.05 and p value for academic achievement is .409 which is significantly greater than the alpha 0.05 level of significance. Hence, it can be described here that no significant difference exhibits between the academic achievement of prospective teachers with reference to their socio demographic variable (division). Even though the earlier designed hypothesis No 4.3 “There will be no significant difference between the academic achievement of prospective teachers with reference to their division (Jammu/Kashmir)” is accepted.

4.6.4 Comparison of Academic Achievement of Prospective Teachers of Arts, Science and Commerce Streams

The section 4.6.1 presents the analysis and interpretation of data regarding the comparison of academic achievement of prospective teachers with reference to their streams i.e. arts, science and commerce in the following tables and figures:

Table 4.36: Comparison of Academic Achievement of Prospective Teachers with Streams

Variable		Sum of Squares	df	Mean Square	F value	p-value
Academic Achievement	Between Groups	26.635	2	13.317	.918	.400
	Within Groups	7647.282	527	14.511		
	Total	7673.917	529			

Above given between groups and within groups statistic compare prospective teachers on academic achievement by using ANOVA. Table 4.36 show a degree of freedom for both the groups, which is 2 for between groups and 527 for within groups. Furthermore the results of the above table also determine a p value .400 which is certainly greater than the alpha 0.05 level of significance. Thus, it is statistically confirmed that prospective teachers have not demonstrated any significant difference in academic achievement with reference to their streams arts/science/commerce. So the hypothesis No. 4.4 “There will be no significant

difference between the academic achievement of prospective teachers with reference to stream (arts/science/commerce)” is accepted.

4.6.5 Comparison of Academic Achievement of Prospective Teachers belonging to Reserved and Unreserved Categories

The section 4.6.5 presents the analysis and interpretation of data regarding the comparison of academic achievement of prospective teachers with reference to their social category i.e. reserved and unreserved in the following tables and figures:

Table 4.37: Group Statistics of Academic Achievement with Social Categories

Variable	Social Category	N	Mean	Sd.	Std. Error Mean
Academic Achievement	Unreserved	388	68.420	3.822	.193
	Reserved	142	68.395	3.727	.316

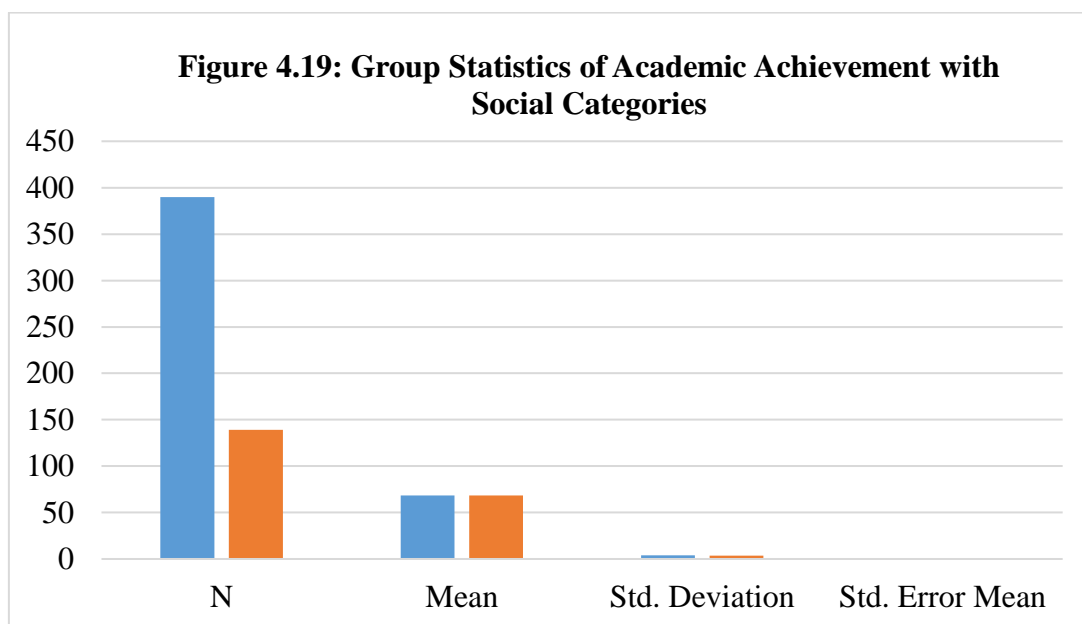


Table 4.37 and Figure 4.19 highlight the mean and sd scores of prospective teachers with reference to their social category. Hence, it is thoroughly demonstrated that unreserved are 388 prospective teachers and they have attained the mean score of 68.420 with having sd.

3.822, while urban prospective teachers were 142 who keep the mean score of 68.395 along with the sd. of 3.727.

Table 4.38: Comparison of Academic Achievement of Prospective Teachers with Social Categories

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Academic Achievement	.024	.375	528	.066	.947

The above analysis has been done to compare the prospective teacher's on academic achievement with reference to their social category. The results of the table find out that t-value is .066 which is less than the table value of 1.96 at 0.05 and p value for academic achievement is .947 which is significantly greater than the alpha 0.05 level of significance. Therefore it can be stated here that no significant difference subsists between the academic achievement of prospective teachers with reference to their socio demographic variable (social category). Though the earlier designed hypothesis No 4.5 "There will be no significant difference between the academic achievement of prospective teachers with reference to their social category (reserved/unreserved)" is accepted.

4.6.6 Comparison of Academic Achievement of Prospective Teachers with Parental Occupation

The section 4.6.6 presents the analysis and interpretation of data regarding the comparison of academic achievement of prospective teachers with reference to their parental occupations i.e. employed and unemployed in the following tables and figures:

Table 4.39: Group Statistics of Academic Achievement with Parental Occupation

Variable	Parental Occupation	N	Mean	Sd.	Std. Error Mean
Academic Achievement	Employed	186	68.408	3.743	.274
	Unemployed	344	68.441	3.848	.207

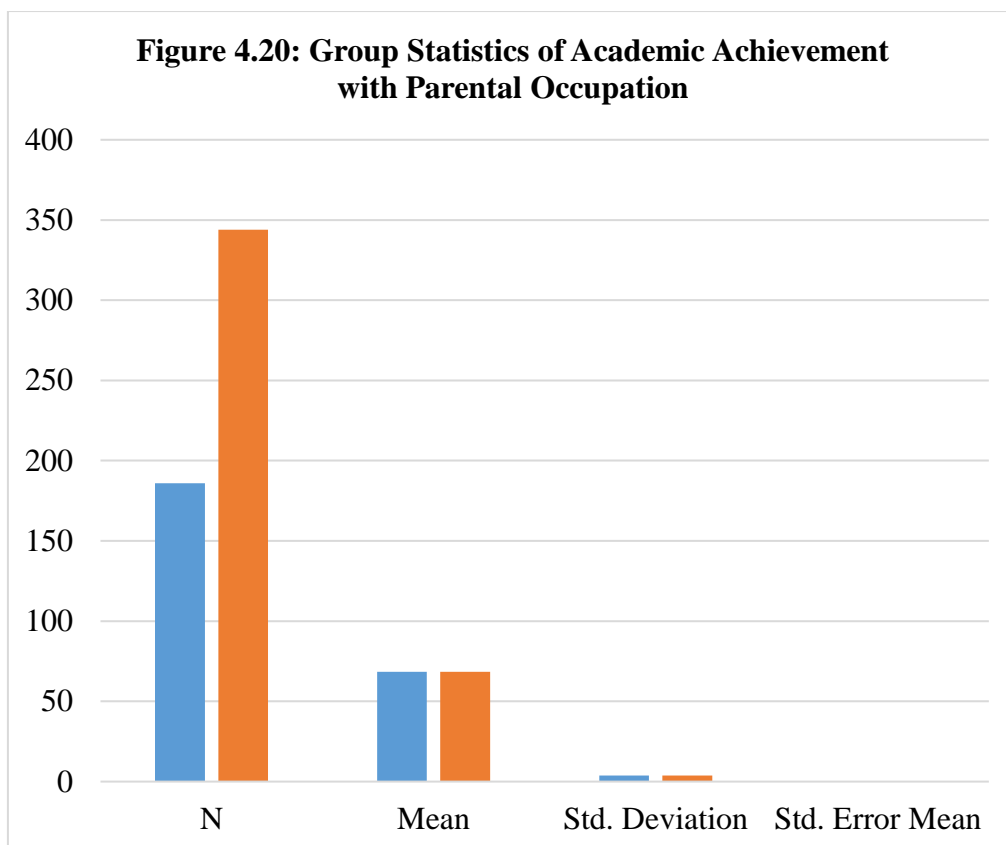


Table 4.39 and figure 4.20 highlight the mean and sd scores of prospective teachers with reference to their parental occupation. Henceforth, it is scrupulously demonstrated that prospective teachers whose parents are employed are 186 and those whose parents are unemployed are 344. The mean scores and sd obtained by them are 68.408 with having sd. 3.743 and mean 68.441 with sd. 3.848 for the both categories i.e. employed and unemployed.

Table 4.40: Comparison of Academic Achievement of Prospective Teachers with Parental Occupation

Variable	Mean Difference	Std. Error Difference	df	t-value	p-value
Academic Achievement	-.033	.346	528	.096	.924

The table 4.40 demonstrated the comparison of prospective teachers on academic achievement with reference to their parental occupation. The existing results demonstrate that

t-value is .096 which is statistically less than the table value of 1.96 at 0.05 and p value for academic achievement is .924 that is significantly greater than the alpha 0.05 level of significance. Thus, it can be stated that no significant difference reveals between the academic achievement of prospective teachers with reference to their parental occupation. So the earlier intended hypothesis No. 4.6 “There will be no significant difference between the academic achievement of prospective teachers with reference to their parental occupation (employed/unemployed)” is accepted.

4.7. Effect of Cognitive Styles on Emotional Intelligence of Prospective Teachers

The section 4.7 presents the analysis and interpretation of data regarding the effect of cognitive styles on emotional intelligence of prospective teachers in the following table and figure:

Table 4.41: Model Summary of Cognitive Styles and Emotional Intelligence

Model summary				
Model	r- value	r Square	Adjusted r Square	Std. Error of the Estimate
1	.639	.408	.407	4.59580
a. Predictors: (Constant), Cognitive Styles b. Dependent Variable: Emotional Intelligence				

The table 4.41 and figure 4.31 represent that the value of r is .639 which depicts a significant association of cognitive styles with emotional intelligence of prospective teachers. The above result also highlights the r square is .408 which demonstrates that 40% of variation in emotional intelligence is explained by cognitive styles in prospective teachers.

Table 4.42: Coefficients Summary of Cognitive Styles and Emotional Intelligence

Coefficients Summary						
Model		Unstandardized Coefficients		Standardized Coefficients	t-value	p-value
		B	Std. Error	Beta		
1	(Constant)	49.957	4.714		10.598	.000
	Cognitive Styles	.637	.033	.639	19.074	.000
a. Dependent Variable: Emotional Intelligence						

The coefficient summary reveals that p-value of cognitive styles is .000 which is statistically less than the alpha 0.05. So, it can be interpreted here that cognitive styles displayed a significant effect on emotional intelligence of prospective teachers. Thus, the hypothesis No. 5, “There will be no significant effect of cognitive styles on emotional intelligence of prospective teachers” is rejected.

4.8 Effect of Cognitive Styles on Academic Achievement of Prospective Teachers

The section 4.8 presents the analysis and interpretation of data regarding the effect of cognitive styles on academic achievement of prospective teachers in the following table and figure:

Table 4.43: Model Summary of Cognitive Styles and Academic Achievement

Model Summary				
Model	r- value	r Square	Adjusted r Square	Std. Error of the Estimate
1	.59	.35	.35	3.05
a. Predictors: (Constant), Cognitive Styles				
b. Dependent Variable: Academic Achievement				

The table 4.43 presents the model summary of cognitive styles and academic achievement, which shows that the value of r is .59, so it elucidates a significant association of

cognitive styles with academic achievement of prospective teachers. Hence, the existing analysis also highlights that the r square is .35 which demonstrates that 35% of variation in academic achievement is explained by cognitive styles in prospective teachers.

Table 4.44: Coefficients Summary of Cognitive Styles and Academic Achievement

Coefficient Summary						
Model		Unstandardized Coefficients		Standardized Coefficients	t-value	p-value
		B	Std. Error	Beta		
1	(Constant)	14.61	3.13		4.6	.000
	Cognitive Styles	.3	.022	.59	17.21	.000
a. Dependent Variable: Academic Achievement						

The existing coefficient summary table 4.44 reveals that p-value of cognitive styles is .000 which is statistically less than the alpha 0.05 level of significance. Therefore, it can be stated here that cognitive styles has a significant effect on academic achievement of prospective teachers. Thus, the hypothesis No. 6, “There will be no significant effect of cognitive styles on academic achievement of prospective teachers” is rejected. In support of the current findings Olagbaju (2020) measured global and analytic dimensions of cognitive style and determined that to what extent cognitive style and gender can predict students’ achievement. Behera (2022) also found that “Cognitive styles have a significant effect on academic achievement of university students of Mayurbhanj district”.