CHAPTER 5

Results of Psychosocial Intervention

This chapter presents the findings from the quantitative analysis of the psychosocial intervention for mothers of children with ASD. The primary aim was to evaluate the intervention's impact on improving perceived social support, enhancing coping strategies, and reducing maternal stress. Data analysis was performed using SPSS, employing descriptive statistics (mean, standard deviation, frequency, and percentage) to summarize participant demographics and categorical variables. Parametric tests, including t-tests and repeated measures ANOVA, were used to assess changes over time in support, coping, and stress within the experimental and control groups. The chapter begins with an overview of the demographic characteristics of the participants. It then details the changes in perceived social support, coping, and maternal stress levels pre- and post-intervention. The analysis highlights improvements in perceived social support, shifts towards adaptive coping strategies, and reductions in stress due to the intervention. This chapter aims to provide a clear understanding of the quantitative outcomes, demonstrating the intervention's efficacy and areas for further improvement. The tables have been categorized in the following sections:

SECTION A (Table 5.1 - Table 5.6) – This includes all information on the socio-demographic profiles of participants.

SECTION B (Tables 5.7, Figures 5.1 and 5.2) – This section presents the results of the normality test, including a table displaying the Shapiro-Wilk test results (Table 5.7) and Q-Q plots for normality assessment (Figures 5.1 and 5.2).

SECTION C (Table 5.8 – Table 5.12, Figures 5.3-5.7) – This section presents the main findings of Perceived Social Support, Coping and Parental Stress of participants which are organized in five tables and five figures.

Table 5.1

Comparison of age among mothers in study group and control group

VARIABLE	GROUP				t	df	p
	STUDY GROUP (N=21)		CONTROL GROUP (N=20)				
	Mean	Standard Deviation	Mean	Standard Deviation			
Age	34.00	5.45	34.25	6.30	-.136	39	.893
Mother's age when child with autism was born	25.76	3.78	26.50	4.53	-.567	39	.574
Father's age when child with autism was born	32.90	3.96	32.35	4.25	-.565	39	.668

*p<.05; **p<.01*; df= Degree of Freedom; N=41*

The mean age of the mothers in study group (34.00±5.45) and mothers in control group (34.25±6.30) which indicates that participants from both groups are in their Middle Ages. The t-test comparing these means yielded a t-value of -0.136 with 39 degrees of freedom and a p-value of 0.893. Since the p-value is much higher than the conventional significance level of 0.05, it is concluded that there is no statistically significant difference in the ages of mothers between the two groups.

The mean age of mothers in the experimental group when their child with autism was born was 25.76 years (SD = 3.78), while in the control group, it was 26.50 years (SD = 4.53). The t-test comparing these means yielded a t-value of -0.567 with 39 degrees of freedom and a p-value of 0.574. Since the p-value is significantly higher than the conventional significance level of 0.05, we conclude that there is no statistically significant difference in the ages of mothers between the experimental and control groups at the time of their child's birth. The negative t-value indicates that the mean age of mothers in the experimental group is slightly lower than in the control group, but this difference is not meaningful and can be attributed to random variation.

The mean age of fathers in the experimental group when their child with autism was born was 32.90 years (SD = 3.96), while in the control group, it was 32.35 years (SD = 4.25). The t-test comparing these means yielded a t-value of -0.565 with 39 degrees of freedom and a p-value of 0.668. Again, the p-value is much higher than 0.05, indicating no statistically significant difference in the ages of fathers between the two groups at the time of their child's birth. The negative t-value suggests that the mean age of fathers in the experimental group is slightly higher than in the control group, but this difference is not statistically significant and is likely due to random chance.

Table 5.2

Comparison of socio-economic status, education, occupation, family type and religion among mothers in study group and control group

VARIABLE		**GROUP**				**X^2**	**df**	**p**
		STUDY GROUP		CONTROL GROUP				
		F (n=21)	%	F (n=20)	%			
Socio-economic status	Upper	3	7.3%	1	2.4%	2.918	3	.404
	Upper Middle	9	22.0%	7	17.1%			
	Lower Middle	3	7.3%	7	17.1%			
	Upper Lower	6	14.6%	5	12.2%			
Education	Did not attend formal schooling	2	4.9%	0	0.0%	10.293	3	.016
	Completed High School	1	2.4%	9	22.0%			

	Completed Higher Secondary	5	12.2%	4	9.8%			
	Graduation & above	13	31.7%	7	17.1%			
Occupation	Homemaker	16	39.0%	14	34.1%	3.397	3	.334
	Private Jobs	2	4.9%	5	12.2%			
	Business	1	2.4%	1	2.4%			
	Domestic Help	2	4.9%	0	0.0%			
Family Type	Nuclear	15	36.6%	13	31.7%	.210	2	.901
	Joint	5	12.2%	6	14.6%			
	Separated	1	2.4%	1	2.4%			
Religion	Christianity	1	2.4%	0	0.0%	2.088	2	.352
	Hinduism	19	46.3%	17	41.5%			
	Islam	1	2.4%	3	7.3%			

*p<.05; **p<.01; *x^2= chi-square; df= Degree of Freedom; F= Frequency (41); %= Percentage (100%)*

Based on the provided data we can observe the distribution of socio-economic status within both the study group and the control group. In the study group, 22.0% of respondents belong to the upper middle socio-economic status category, followed by 14.6% in the upper lower category, 7.3% in lower middle category and in upper category. On the other hand, in the control group, the highest proportion of respondents (17.1%) were classified as both Upper Middle and Lower Middle, with 12.2% in the Upper Lower category and only 2.4% in the Upper category. On the other hand, in the control group, the highest proportion of respondents (17.1%) were classified as both Upper Middle and Lower Middle, with 12.2% in the Upper Lower category and only 2.4% in the Upper category. The p-value of 0.404, which is above the conventional significance level of 0.05, indicates that there is no statistically significant difference in socio-economic status between the two groups. Thus, despite the variations in socio-economic status distribution, these differences are not statistically significant and are likely due to random variation rather than a true effect. While these proportions offer insights into the distribution of socio-economic status within each group, it is important to note that the

chi-square analysis, yielding a chi-square value of 2.918 with 3 degrees of freedom and a p-value of 0.404, does not indicate a statistically significant association between socio-economic status and group membership.

In the experimental group, most respondents had completed graduation or higher education (31.7%), followed by 12.2% who completed higher secondary, 2.4% who completed high school, and 4.9% who did not attend formal schooling. In the control group, the highest proportion of respondents completed high school (22.0%), followed by 17.1% with graduation or higher education, 9.8% who completed higher secondary, and none who did not attend formal schooling. The chi-square test comparing educational levels between the experimental and control groups resulted in a chi-square value of 10.293 with 3 degrees of freedom and a p-value of 0.016. These results indicate a statistically significant association between education level and group membership at the conventional significance level of 0.05. This suggests that there is a difference in the distribution of education levels between the study group and the control group.

In the study group, majority of the respondents (39.0%) were homemakers, followed by 4.9% in private jobs, 2.4% in business, and 4.9% in domestic help. In the control group, majority of the respondents (34.1%) were also homemakers, followed by 12.2% in private jobs, 2.4% in business, and none in domestic help. The chi-square test comparing occupation between the experimental and control groups yielded a chi-square value of 3.397 with 3 degrees of freedom and a p-value of 0.334. The results indicate that there is no statistically significant association between occupation and group membership. This suggests that the distribution of occupations does not differ significantly between the study group and the control group.

In the experimental group, majority of the respondents (36.6%) belonged to nuclear families, followed by 12.2% in joint families, and 2.4% in separated families. Similarly, in the control group, 31.7% of mothers were from nuclear families, 14.6% from joint families, and 2.4% from separated families. The chi-square test comparing family type between the experimental and control groups yielded a chi-square value of 0.210 with 2 degrees of freedom and a p-value of 0.901. These results indicate that there is no statistically significant association between family type and group membership. Therefore, the distribution of family types does not differ significantly between the study group and the control group.

In the experimental group, the majority of mothers (46.3%) identified as Hindu, followed by 2.4% as Christian, and 2.4% as Muslim. In the control group, the majority of mothers (41.5%) also identified as Hindu, with no mothers identifying as Christian, and 7.3% identifying as Muslim. The chi-square test comparing religion between the experimental and control groups yielded a chi-square value of 2.088 with 2 degrees of freedom and a p-value of 0.352. The results indicate that there is no statistically significant association between religion and group membership at the conventional significance level of 0.05. Therefore, the distribution of religions does not differ significantly between the study group and the control group.

Table 5.3

Comparison of Children's Ages between Mothers in the Study Group and Control Group

VARIABLE	GROUP				t	df	p
	STUDY GROUP (N=21)		CONTROL GROUP (N=20)				
	Mean	Standard Deviation	Mean	Standard Deviation			
Age of child with ASD	8.09	4.80	7.05	3.67	.779	39	.441

*p<.05; **p<.01*; df= Degree of Freedom; N=41*

A t-test was conducted to compare the mean age of children with ASD between two groups. The mean age of children with ASD in the study group is 8.09 years with a standard deviation of 4.80, while in the control group, the mean age is 7.05 years with a standard deviation of 3.67. The t-value obtained from the t-test is 0.779 with 39 degrees of freedom, resulting in a p-value of 0.441. The results indicate that there is no statistically significant difference in the mean age of children with ASD between the study group and the control group.

Table 5.4

Mode and Frequency Distribution of Age of Children with Autism

Age	Frequency
3	2
4	**12**
5	4
6	6
7	1
8	1
9	3
10	3
11	1
12	1
13	3
15	2
18	1
19	1
Total	**41**

The frequency distribution analysis was conducted for the age of children with autism, and the mode was found to be 4 years old.

Table 5.5

Comparison of Children's gender between Mothers in the Study Group and Control Group

VARIABLE		GROUP				X^2	df	p
		STUDY GROUP		CONTROL GROUP				
		F (n=21)	%	F (n=20)	%			
Gender of child with ASD	Female	3	7.3%	9	22.0%	4.668	1	.031
	Male	18	43.9%	11	26.8%			

*p<.05; **p<.01; *x^2= chi-square; df= Degree of Freedom; F= Frequency (41); %= Percentage (100%)*

In both groups, males are the predominant gender: in the experimental group, 43.9% (n=18) of children were male compared to 7.3% (n=3) female; in the control group, 26.8% (n=11) of children were male compared to 22.0% (n=9) female. The chi-square test comparing the gender distribution of children with Autism Spectrum Disorder (ASD) between the experimental and control groups yielded a chi-square value of 4.668 with 1 degree of freedom and a p-value of 0.031 which is below the conventional significance level of 0.05, indicating a statistically significant difference in the gender distribution between the two groups.

Table 5.6

Other comparison between Mothers in the Study Group and Control Group

VARIABLE		GROUP				X^2	df	p
		STUDY GROUP		CONTROL GROUP				
		F (n=21)	%	F (n=20)	%			
If more than one child with ASD	Yes	0	0.0%	1	2.4%	1.076	1	.300
	No	21	51.2%	19	46.3%			
If mothers have H/O physical illness	Yes	11	26.8%	10	24.4%	.023	1	.879
	No	10	24.4%	10	24.4%			
If yes, types of physical illness	PCOD	2	9.5%	2	9.5%	2.558	3	.465
	Blood Pressure	3	14.3%	2	9.5%			
	Thyroid	0	0.0%	2	9.5%			
	Others	6	28.6%	4	19.0%			

*p<.05; **p<.01; *x^2= chi-square; df= Degree of Freedom; F= Frequency (41); %= Percentage (100%)*

In the experimental group, none of the mothers reported having more than one child with ASD (0.0%), while in the control group, 2.4% of mothers reported having more than one child with ASD. The majority of mothers in both groups reported having only one child with ASD: 51.2% in the experimental group and 46.3% in the control group. The chi-square test comparing the presence of more than one child with ASD between the experimental and control groups yielded a chi-square value of 1.076 with 1 degree of freedom and a p-value of 0.300 which is above the conventional significance level of 0.05, indicating that there is no statistically significant difference in the proportion of mothers with more than one child with ASD between the two groups.

In the experimental group, 26.8% of mothers reported having a history of physical illness, while in the control group, 24.4% of mothers reported the same. For those without a history of physical illness, 24.4% were in the experimental group and 24.4% were in the control group. The chi-square test comparing the history of physical illness among mothers between the experimental and control groups yielded a chi-square value of 0.023 with 1 degree of freedom and a p-value of 0.879 which is well above the conventional significance level of 0.05, indicating that there is no statistically significant difference in the proportion of mothers with a history of physical illness between the two groups.

In both groups, the proportions of different types of physical illnesses vary, with no clear distinction between the experimental and control groups. In the experimental group, the types of physical illnesses reported include PCOD (9.5%), blood pressure issues (14.3%), thyroid issues (0.0%), and other types (28.6%). In the control group, the types reported are PCOD (9.5%), blood pressure issues (9.5%), thyroid issues (9.5%), and other types (19.0%). The chi-square value obtained is 2.558 with 3 degrees of freedom, resulting in a p-value of 0.465. The results indicate that there is no statistically significant association between the types of physical illnesses and group membership. Therefore, the distribution of types of physical illnesses does not differ significantly between the experimental and control groups among mothers with a history of physical illness.

SECTION B (Tables 5.7, Figures 5.1 and 5.2) – This section presents the results of the normality test, including a table displaying the Shapiro-Wilk test results (Table 5.7) and Q-Q plots for normality assessment (Figures 5.1 and 5.2).

Table 5.7

Shapiro-Wilk Test for Normality of Data in Study and Control Groups

Group	Shapiro-Wilk Statistic	p-value
Study Group	.938	.202
Control Group	.975	.846

Figure 5.1

Q-Q Plot for Normality (Shapiro-Wilk Test) in the Study Group

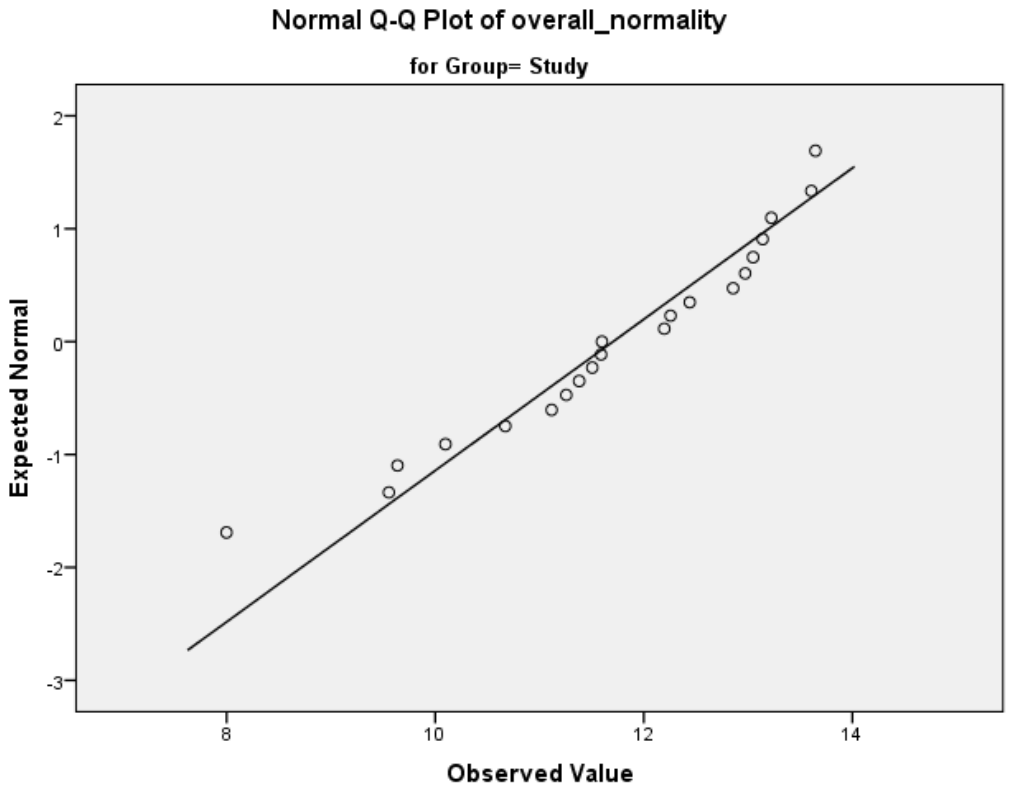
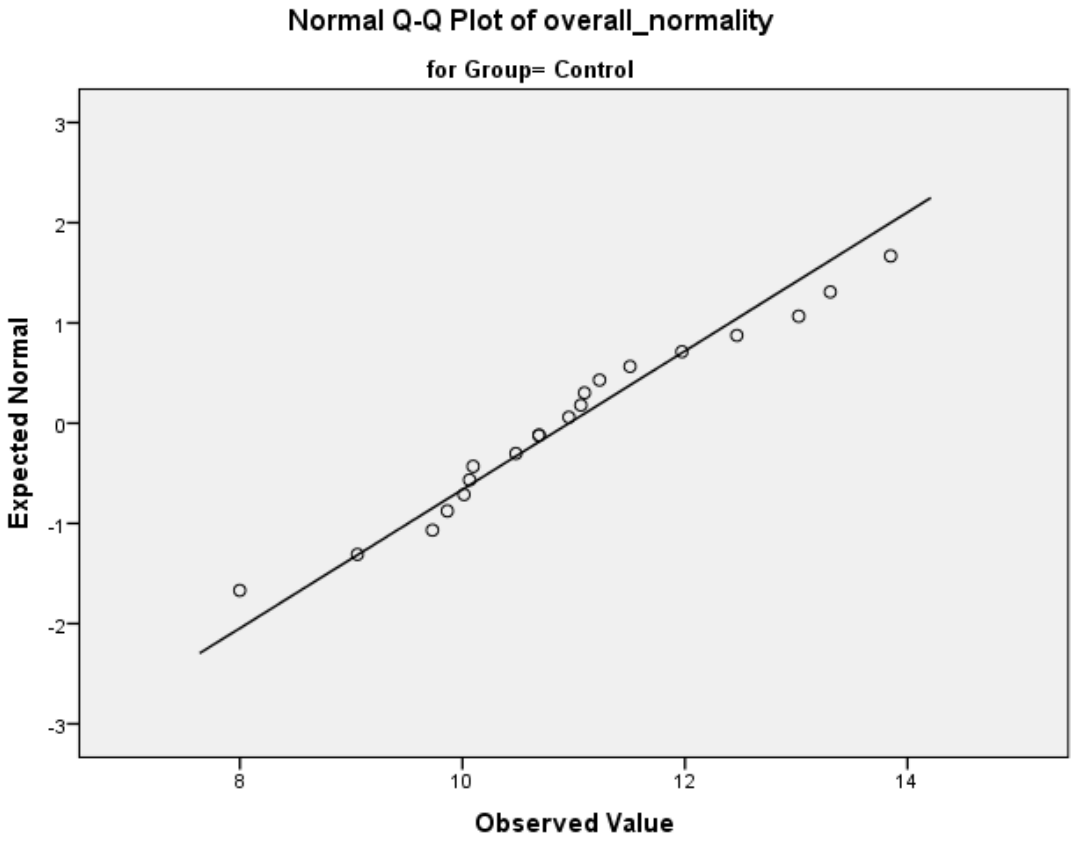


Figure 5.2

Q-Q Plot for Normality (Shapiro-Wilk Test) in the Control Group



Before conducting further statistical analysis, the normality of the data was assessed using the Shapiro-Wilk test to determine whether parametric tests were appropriate. Table 5.7 presents the results of the normality test, showing that the data for both the study and control groups followed a normal distribution. The Shapiro-Wilk test values were W = 0.938, p = 0.202 for the study group and W = 0.975, p = 0.846 for the control group, indicating that the p-values were above the 0.05 threshold, confirming that the assumption of normality was met. To further validate the normality assumption, Q-Q plots were generated for both groups and are presented in Figures 5.1 and 5.2. These plots visually depict how well the data points align with the expected normal distribution. The points closely follow the diagonal line, reinforcing the findings from the Shapiro-Wilk test. Since both statistical and graphical methods confirm normality, parametric tests were deemed appropriate for further analysis of Perceived Social Support, Coping, and Parental Stress.

SECTION C (Tables 5.8 – 5.12, Figures 5.3-5.7) – This section presents the main findings of Perceived Social Support, Coping and Parental Stress of participants which are organized in five tables and five figures.

Table 5.8

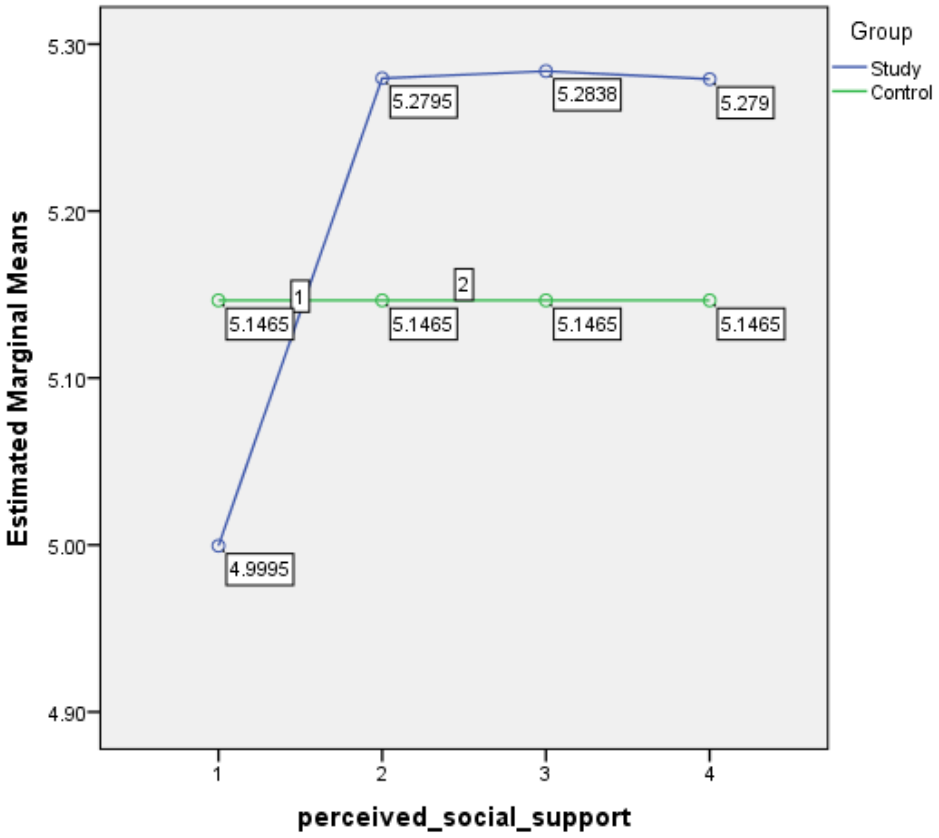
Comparison of Perceived Social Support among Mothers in the study group and control group

VARIABLES	GROUP	PRE	POST1	POST2	POST3	WITHIN SUBJECTS (time)	INTERACTION (time*group)	Pairwise Comparison		
		Mean±SD				F-value (p-value) df		Pair	Mean Diff	p-value
Perceived Social Support	E(n=21)	4.99±1.17	5.27±0.97	5.28±0.96	5.27±0.97	6.08 (.018) 3	6.08 (.018) 3	Pre-Po1	-0.280	0.031
								Pre-Po2	-0.284	0.028
								Pre-Po3	-0.279	0.032
								Po1-Po2	-0.004	1.000
								Po1-Po3	0.000	1.000
								Po2-Po3	0.004	1.000
	C(n=20)	5.14±1.08	5.14±1.08	5.14±1.08	5.14±1.08			Pre-Po1	0.000	1.000
								Pre-Po2	0.000	1.000
								Pre-Po3	0.000	1.000
								Po1-Po2	0.000	1.000
								Po1-Po3	-0.000	1.000
								Po2-Po3	-0.000	1.000

Effect Size (Partial Eta Squared): -0.15

Figure 5.3

Comparison of Perceived Social Support among Mothers in the study group and control group



The mean perceived social support score in the experimental group before the intervention was 4.99 with a standard deviation of 1.17. Following the intervention, the mean score increased to 5.27 with a standard deviation of 0.97, indicating an improvement in perceived social support immediately after the intervention. The mean score slightly increased to 5.28 with a standard deviation of 0.96 one month after the intervention and remained at 5.27 with a standard deviation of 0.97 three months after the intervention, suggesting that the initial improvement was maintained over time.

In the control group, the mean perceived social support score before the intervention was 5.14 with a standard deviation of 1.08. The mean score remained unchanged at 5.14 across all subsequent time points (Post1, Post2, and Post3), with the standard deviation remaining constant at 1.08. These findings indicate no change in perceived social support in the control group over the study period, underscoring the potential impact of the intervention on the experimental group.

The F-value for the within-subjects analysis (time) was 6.08 with a p-value of .018 and degrees of freedom (df) of 3, indicating a significant difference in perceived social support scores across different time points for both groups combined. The F-value for the interaction effect between time and group was also 6.08 with a p-value of .018 and df of 3, suggesting a significant interaction effect between time and group. This means that the change in perceived social support scores over time significantly differed between the experimental and control groups.

Pairwise comparisons revealed significant improvements in perceived social support scores at various time points. The mean differences between pre-intervention and the subsequent time points were as follows: Pre- Post1 (-0.280, p=0.031), Pre-Post2 (-0.284, p=0.028), and Pre-Post3 (-0.279, p=0.032). These results indicate that the intervention had a significant positive impact on perceived social support immediately after the intervention, which was sustained over time. The mean differences between the post-intervention time points were: Post1-Post2 (-0.004, p=1.000), Post1-Post3 (0.000, p=1.000), and Post2-Post3 (0.004, p=1.000), showing no significant differences, thus indicating that the level of perceived social support remained stable after the initial improvement.

The pairwise comparison in the control group indicate that there is no statistically significant difference in perceived social support between any of the time points. The p-values of 1.000 for all comparisons confirm that perceived social support levels remain consistent over time, with no significant changes observed between the different periods of assessment. The effect size, measured using Partial Eta Squared (η^2), was -0.15

Overall, the findings suggest that the intervention significantly enhanced perceived social support in the experimental group. The stability of these improvements over time and the lack of change in the control group further reinforce the positive impact of the intervention on perceived social support.

Table 5.9

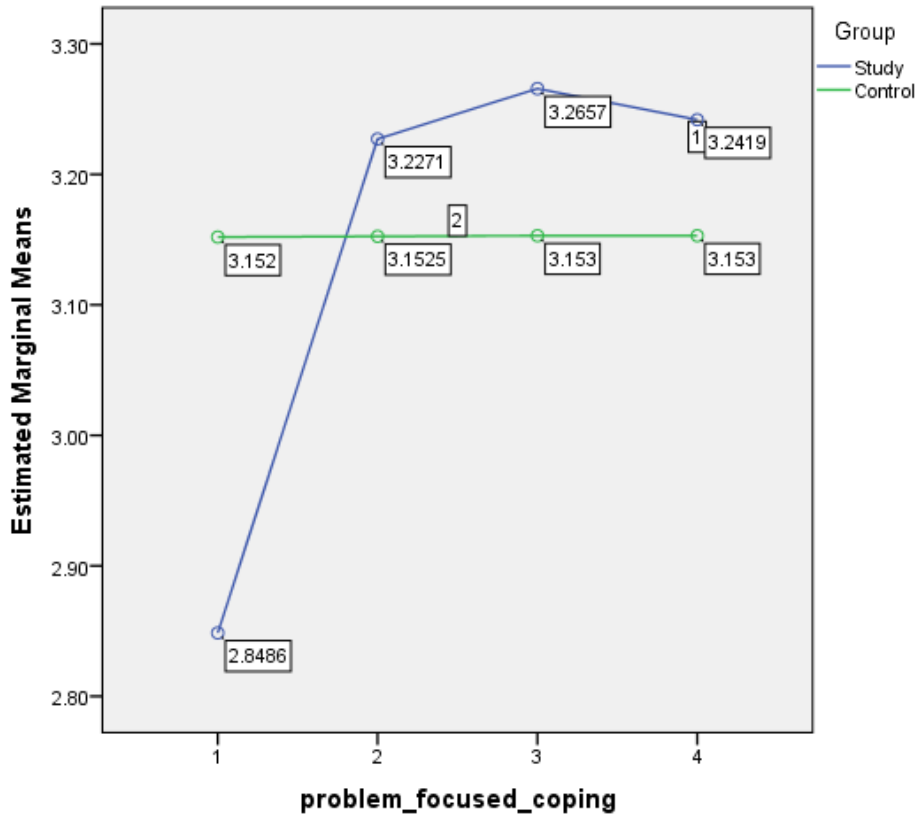
Comparison of Problem Focused Coping among Mothers in the study group and control group

VARIABLES	GROUP	PRE	POST1	POST2	POST3	WITHIN SUBJECTS (time)	INTERACTION (time*group)	Pairwise Comparison		
		Mean±SD				F-value (p-value) df		Pair	Mean Diff	p-value
Problem Focused	E(n=21)	2.84±0.65	3.22±0.53	3.26±0.53	3.24±0.52	16.2 (.000) 1.49	16.1 (.000) 1.49	Pre-Po1 Pre-Po2 Pre-Po3 Po1-Po2 Po1-Po3 Po2-Po3	-0.378 -0.417 -0.393 -0.038 -0.014 0.023	<.001 <.001 <.001 1.000 1.000 1.000
	C(n=20)	3.15±0.45	3.15±0.45	3.15±0.45	3.15±0.45			Pre-Po1 Pre-Po2 Pre-Po3 Po1-Po2 Po1-Po3 Po2-Po3	-0.000 -0.000 -0.000 -0.000 -0.000 -0.000	1.000 1.000 1.000 1.000 1.000 1.000

Effect Size (Partial Eta Squared): -0.3

Figure 5.4

Comparison of Problem Focused Coping among Mothers in the study group and control group



The mean problem-focused coping score in the experimental group before the intervention was 2.84 with a standard deviation of 0.65. Following the intervention, the mean score increased to 3.22 with a standard deviation of 0.53. This indicates a notable improvement in problem-focused coping immediately after the intervention. One month after the intervention, the mean score slightly increased further to 3.26 with a standard deviation of 0.53, suggesting that the improvement in coping was sustained. At the three-month follow-up, the mean score was 3.24 with a standard deviation of 0.52, indicating that the coping skills gained from the intervention were maintained over time.

In the control group, the mean problem-focused coping score before the intervention was 3.15 with a standard deviation of 0.45. The mean score remained

unchanged at 3.15 throughout all subsequent time points (Post1, Post2, and Post3), with the standard deviation remaining at 0.45. These findings suggest that there was no change in problem-focused coping in the control group over the study period, highlighting the potential impact of the intervention on the experimental group.

The F-value for the within-subjects analysis (time) was 16.2 with a p-value of less than .001 and degrees of freedom (df) of 1.49, indicating a significant difference in problem-focused coping scores across different time points for both groups combined. The F-value for the interaction effect between time and group was 16.1 with a p-value of less than .001 and df of 1.49, suggesting a significant interaction effect between time and group. This means that the change in problem-focused coping scores over time differed significantly between the experimental and control groups.

Pairwise comparisons revealed further insights into these changes. The increase in problem-focused coping scores from pre-intervention to immediately after the intervention (Pre-Post1) was statistically significant, with a mean difference of -0.378 and a p-value of less than .001. Similarly, the increase from pre-intervention to one month after the intervention (Pre-Post2) was statistically significant, with a mean difference of -0.417 and a p-value of less than .001. The increase from pre-intervention to three months after the intervention (Pre-Post3) was also statistically significant, with a mean difference of -0.393 and a p-value of less than .001. These results indicate a substantial and sustained improvement in problem-focused coping skills following the intervention.

Additionally, the pairwise comparisons between the post-intervention time points showed no significant changes: the mean difference between immediately after the intervention and one month after (Post1-Post2) was -0.038 with a p-value of 1.000, and the mean difference between immediately after the intervention and three months after (Post1-Post3) was -0.014 with a p-value of 1.000. The mean difference between one month and three months post-intervention (Post2-Post3) was 0.023 with a p-value of 1.000. These findings suggest that the improvements in problem-focused coping were maintained over time without significant fluctuations after the initial increase.

The pairwise comparisons in the control group indicate that there is no statistically significant difference in problem-focused coping scores between any of the time points. The p-values of 1.000 for all comparisons confirm that problem-focused coping levels remain consistent over time, with no significant changes observed between the different periods of assessment. The effect size, measured using Partial Eta Squared (η^2), was -0.3.

Overall, the findings indicate that the intervention had a significant and sustained positive effect on problem-focused coping in the experimental group, with improvements maintained over the three-month follow-up period. In contrast, the control group did not exhibit any changes in coping skills, underscoring the effectiveness of the intervention.

Table 5.10

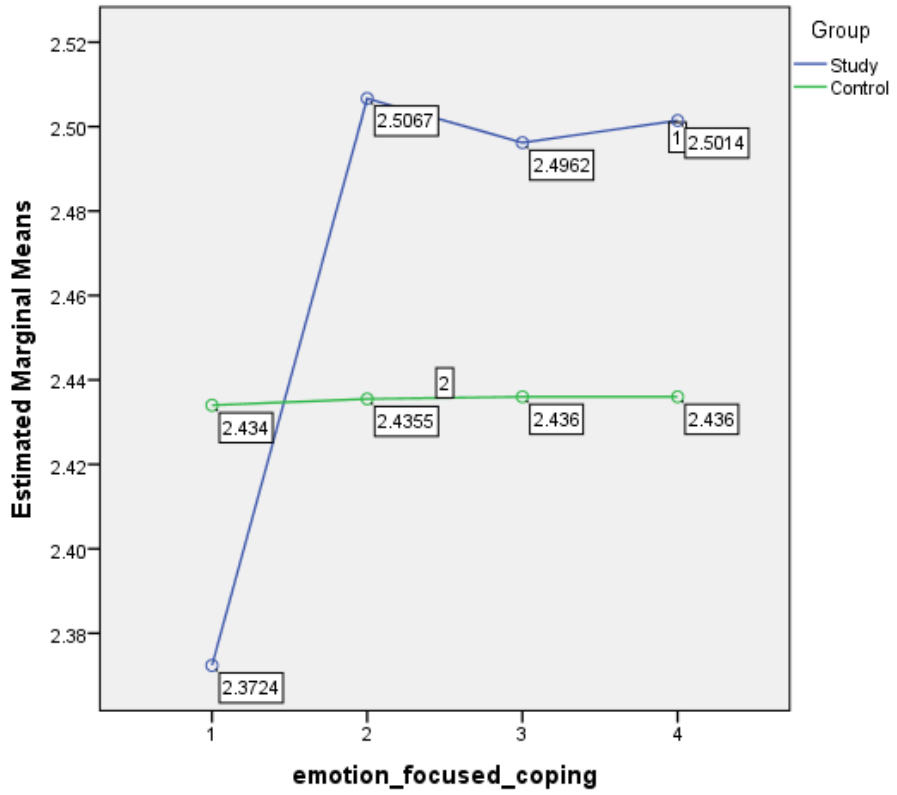
Comparison of Emotion Focused Coping among Mothers in the study group and control group

VARIABLES	GROUP	PRE	POST1	POST2	POST3	WITHIN SUBJECTS (time)	INTERACTION (time*group)	Pairwise Comparison		
		Mean±SD				F-value (p-value) df		Pair	Mean Diff	p-value
Emotion Focused	E(n=21)	2.37±0.53	2.50±0.51	2.49±0.51	2.50±0.51	5.86 (.018) 1.09	5.55 (.021) 1.09	Pre-Po1 Pre-Po2 Pre-Po3 Po1-Po2 Po1-Po3 Po2-Po3	-0.134 -0.123 -0.129 0.010 0.005 -0.005	0.019 0.064 0.037 1.000 1.000 1.000
	C(n=20)	2.43±0.46	2.43±0.46	2.43±0.46	2.43±0.46			Pre-Po1 Pre-Po2 Pre-Po3 Po1-Po2 Po1-Po3 Po2-Po3	-0.001 -0.002 -0.002 -0.000 -0.000 -0.000	1.000 1.000 1.000 1.000 1.000 1.000

Effect Size (Partial Eta Squared): -0.2

Figure 5.5

Comparison of Emotion Focused Coping among Mothers in the study group and control group



The mean emotion-focused coping score in the experimental group before the intervention was 2.37 with a standard deviation of 0.53. Following the intervention, the mean score increased to 2.50 with a standard deviation of 0.51. This suggests a slight improvement in emotion-focused coping immediately after the intervention. One month after the intervention, the mean score slightly decreased to 2.49 with a standard deviation of 0.51, indicating a marginal decline but still higher than the pre-intervention level. At the three-month follow-up, the mean score returned to 2.50 with a standard deviation of 0.51, suggesting that the improvements were sustained over time.

In the control group, the mean emotion-focused coping score before the intervention was 2.43 with a standard deviation of 0.46. The mean score remained unchanged at 2.43 across all subsequent time points (Post1, Post2, and Post3), with the standard deviation remaining at 0.46. These findings suggest no change in emotion-focused coping in the control group over the study period, highlighting the potential impact of the intervention on the experimental group.

The F-value for the within-subjects analysis (time) was 5.86 with a p-value of .018 and degrees of freedom (df) of 1.09, indicating a significant difference in emotion-focused coping scores across different time points for both groups combined. The F-value for the interaction effect between time and group was 5.55 with a p-value of .021 and df of 1.09, suggesting a significant interaction effect between time and group. This means that the change in emotion-focused coping scores over time differed significantly between the experimental and control groups.

Pairwise comparisons revealed further insights into these changes. The increase in emotion-focused coping scores from pre-intervention to immediately after the intervention (Pre-Post1) was statistically significant, with a mean difference of -0.134 and a p-value of .019. The increase from pre-intervention to one month after the intervention (Pre-Post2) showed a mean difference of -0.123 with a p-value of .064, which was not statistically significant. The increase from pre-intervention to three months after the intervention (Pre-Post3) was statistically significant, with a mean difference of -0.129 and a p-value of .037. These results indicate a notable improvement in emotion-focused coping immediately after the intervention, with the effect being sustained but slightly fluctuating over time.

Additionally, the pairwise comparisons between the post-intervention time points showed no significant changes: the mean difference between immediately after the intervention and one month after (Post1-Post2) was 0.010 with a p-value of 1.000, and the mean difference between immediately after the intervention and three months after (Post1-Post3) was 0.005 with a p-value of 1.000. The mean difference between one month and three months post-intervention (Post2-Post3) was -0.005 with a p-value of 1.000. These findings suggest that the improvements in emotion-focused

coping were maintained over time without significant fluctuations after the initial increase. Whereas in the control group, pairwise comparisons indicate that there is no statistically significant difference in emotion-focused coping scores between any of the time points. The p-values of 1.000 for all comparisons confirm that emotion-focused coping levels remain stable over time, with no significant changes observed between the different periods of assessment. The effect size, measured using Partial Eta Squared (η^2), was -0.2.

Overall, the findings indicate that the intervention had a significant and positive effect on emotion-focused coping in the experimental group, with improvements being sustained over the three-month follow-up period. In contrast, the control group did not exhibit any changes in coping skills, underscoring the effectiveness of the intervention.

Table 5.11

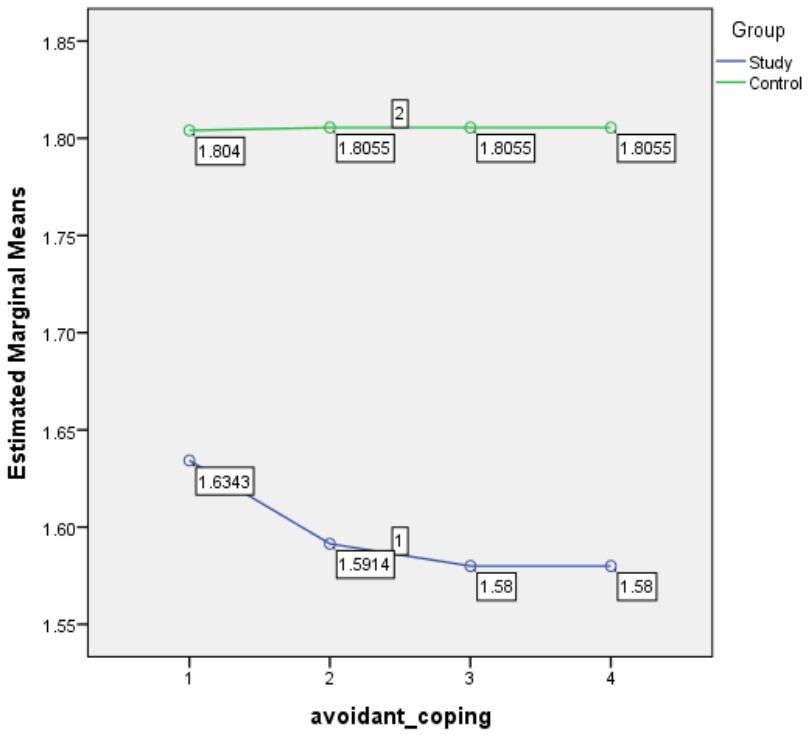
Comparison of Avoidant Coping among Mothers in the study group and control group

VARIABLE	GROUP	PRE	POST1	POST2	POST3	WITHIN SUBJECTS (time)	INTERACTION (time*group)	Pairwise Comparison		
		Mean±SD				F-value (p-value) df		Pair	Mean Diff	p-value
Avoidant Coping	E(n=21)	1.63±0.31	1.59±0.27	1.58±0.27	1.58±0.27	1.34 (.263) 3	1.50 (.216) 3	Pre-Po1	0.042	1.000
								Pre-Po2	0.054	1.000
								Pre-Po3	0.054	1.000
								Po1-Po2	0.011	1.000
								Po1-Po3	0.011	1.000
								Po2-Po3	0.000	1.000
	C(n=20)	1.80±0.32	1.80±0.32	1.80±0.32	1.80±0.32			Pre-Po1	-0.001	1.000
								Pre-Po2	-0.001	1.000
								Pre-Po3	-0.001	1.000
								Po1-Po2	0.000	1.000
								Po1-Po3	0.000	1.000
								Po2-Po3	0.000	1.000

Effect Size (Partial Eta Squared): 0.1

Figure 5.6

Comparison of Avoidant Coping among Mothers in the study group and control group



The mean avoidant coping score in the experimental group before the intervention was 1.63 with a standard deviation of 0.31. Following the intervention, the mean score slightly decreased to 1.59 with a standard deviation of 0.27, indicating a minor reduction in avoidant coping immediately after the intervention. The mean avoidant coping score remained stable at 1.58 with a standard deviation of 0.27 both one month and three months after the intervention, suggesting that the initial reduction was maintained over time without further significant change.

In the control group, the mean avoidant coping score before the intervention was 1.80 with a standard deviation of 0.32. The mean score remained unchanged at 1.80 across all subsequent time points (Post1, Post2, and Post3), with the standard deviation remaining constant at 0.32. These findings suggest no change in avoidant

coping in the control group over the study period, highlighting the potential impact of the intervention on the experimental group.

The F-value for the within-subjects analysis (time) was 1.34 with a p-value of .263 and degrees of freedom (df) of 3, indicating no significant difference in avoidant coping scores across different time points for both groups combined. The F-value for the interaction effect between time and group was 1.50 with a p-value of .216 and df of 3, suggesting no significant interaction effect between time and group. This means that the change in avoidant coping scores over time did not significantly differ between the experimental and control groups.

Pairwise comparisons revealed that the changes in avoidant coping scores were not statistically significant. The mean differences between pre-intervention and the subsequent time points were as follows: Pre-Post1 (0.042, p=1.000), Pre-Post2 (0.054, p=1.000), and Pre-Post3 (0.054, p=1.000). The mean differences between the post-intervention time points were: Post1-Post2 (0.011, p=1.000), Post1-Post3 (0.011, p=1.000), and Post2-Post3 (0.000, p=1.000). These results indicate that the slight reductions in avoidant coping scores in the experimental group were not statistically significant.

In the control group, the results indicate that there is no statistically significant difference in avoidant coping scores between any of the time points. The p-values of 1.000 for all comparisons confirm that avoidant coping levels remain consistent over time, with no significant changes observed between the different periods of assessment. The effect size, measured using Partial Eta Squared (η^2), was 0.1.

Overall, the findings suggest that the intervention did not have a significant effect on reducing avoidant coping in the experimental group. The lack of significant changes in the control group further supports this conclusion, indicating that the intervention did not lead to substantial improvements in avoidant coping skills over the study period.

Table 5.12

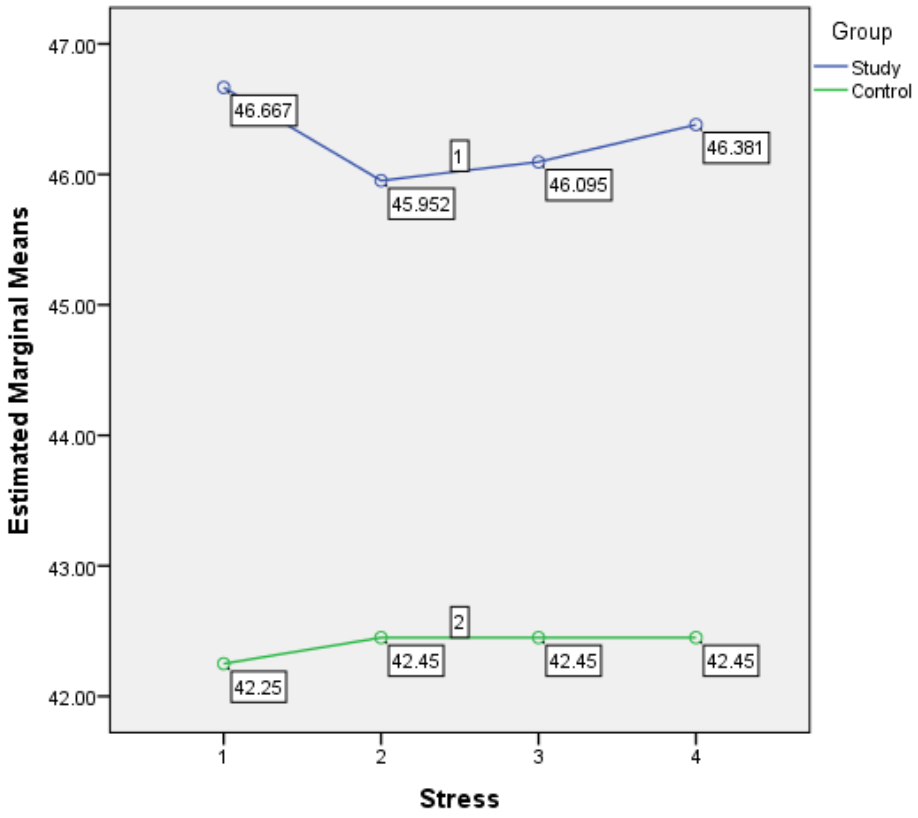
Comparison of Parental Stress among Mothers in the study group and control group

VARIABLES	GROUP	PRE	POST1	POST2	POST3	WITHIN SUBJECTS (time)	INTERACTION (time*group)	Pairwise Comparison		
		Mean±SD				F-value (p-value) df		Pair	Mean Diff	p-value
Parental Stress Scale	E(n=21)	46.66±7.15	45.95±6.83	46.09±6.89	46.38±7.04	3.790 (.032) 1.79	10.641 (.000) 1.79	Pre-Po1	0.714	0.001
								Pre-Po2	0.571	0.013
								Pre-Po3	0.286	1.000
								Po1-Po2	-0.143	0.415
								Po1-Po3	-0.429	0.001
								Po2-Po3	-0.286	0.065
	C(n=20)	42.25±6.85	42.45±6.51	42.45±6.51	42.45±6.51			Pre-Po1	-0.200	1.000
								Pre-Po2	-0.200	1.000
								Pre-Po3	-0.200	1.000
								Po1-Po2	0.000	1.000
								Po1-Po3	0.000	1.000
								Po2-Po3	0.000	1.000

Effect Size (Partial Eta Squared): 0.07

Figure 5.7

Comparison of Parental Stress among Mothers in the study group and control group



The mean parental stress level in the experimental group before the intervention was 46.66 with a standard deviation of 7.15. Following the intervention, the mean parental stress level slightly decreased to 45.95, with a standard deviation of 6.83. This indicates a modest reduction in perceived stress levels immediately after the intervention compared to baseline. One month after the intervention, the mean parental stress level remained relatively stable at 46.09 with a standard deviation of 6.89, suggesting that the effect of the intervention on parental stress levels was maintained but did not further decrease. At the three-month follow-up, the mean parental stress level slightly increased to 46.38 with a standard deviation of 7.04,

indicating a slight rebound in stress levels compared to one month after the intervention but still lower than the baseline.

In the control group, the mean parental stress level before the intervention was 42.25 with a standard deviation of 6.85. The mean parental stress level for the control group remained relatively stable at 42.45 immediately after the intervention, with a standard deviation of 6.51. This stability was observed both one month and three months after the intervention, with the mean parental stress level remaining at 42.45 and the standard deviation also at 6.51. These findings suggest that the stress levels in the control group remained relatively stable throughout the study period, indicating that factors other than the intervention may have influenced their parental stress levels.

The F-value for the within-subjects analysis (time) is reported as 3.790 with a p-value of .032 and degrees of freedom (df) of 1.79. This indicates that there is a significant difference in parental stress levels across the different time points for both groups combined. The F-value for the interaction effect between time and group is reported as 10.641 with a p-value of less than .001 and df of 1.79. This suggests a significant interaction effect between time and group, meaning that the change in parental stress levels over time differs between the experimental and control groups.

Pairwise comparisons provide further insights into the changes in parental stress levels. The reduction in parental stress levels from pre-intervention to immediately after the intervention (Pre-Post1) was statistically significant, with a mean difference of 0.714 and a p-value of 0.001. Similarly, the reduction from pre-intervention to one month after the intervention (Pre-Post2) was statistically significant, with a mean difference of 0.571 and a p-value of 0.013. However, the difference between pre-intervention and three months after the intervention (Pre-Post3) was not statistically significant, with a mean difference of 0.286 and a p-value of 1.000. This suggests that while there was a significant immediate and one-month post-intervention effect, the long-term effect was not maintained. Additionally, the changes between the immediate post-intervention and one month post-intervention (Post1-Post2) were not statistically significant (mean difference = -0.143, p = 0.415),

indicating stability during this period. The increase in stress levels from immediately after the intervention to three months after (Post1-Post3) was statistically significant, with a mean difference of -0.429 and a p-value of 0.001, suggesting a rebound in stress levels. The change from one month to three months post-intervention (Post2-Post3) was not statistically significant, with a mean difference of -0.286 and a p-value of 0.065, indicating a slight but non-significant increase.

In the pairwise comparison of the control group, there is no statistically significant difference in parental stress levels between the pre-time point and any of the post-time points (Post1, Post2, and Post3). The mean perceived stress levels, starting at 42.25 (SD = 6.85) and slightly increasing to 42.45 (SD = 6.51) for the subsequent three measurements, do not significantly change over the subsequent periods of assessment. In the comparisons between Post1 and Post2, Post1 and Post3, and Post2 and Post3, there is no statistically significant difference in parental stress levels between any of the post-intervention time points in the control group. This indicates that parental stress levels remain relatively stable over time with no significant changes observed between the different periods of assessments. The effect size, measured using Partial Eta Squared (η^2), was 0.07.

Overall, these findings suggest that the intervention had a significant short-term impact on reducing parental stress levels, but this effect diminished over time.

Acceptance of Hypotheses

Parental Stress Levels

Null Hypothesis (H0): There is no significant difference in Parental Stress levels of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in control groups.

Alternative Hypothesis (H1): There is a significant difference in Parental Stress levels of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in control groups.

Result: The analysis revealed a significant reduction in Parental Stress levels in the experimental group compared to the control group, with a p-value of .000, which is well below the conventional threshold of 0.05. Therefore, we reject the null hypothesis (H0) and accept the alternative hypothesis (H1).

Perceived Support

Null Hypothesis (H0): There is no significant difference in the perceived support of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in the control group.

Alternative Hypothesis (H2): There is a significant difference in the perceived support of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in the control group.

Result: The analysis revealed a significant reduction in perceived support in the experimental group compared to the control group, with a p-value of .018, which is well below the conventional threshold of 0.05. Therefore, we reject the null hypothesis (H0) and accept the alternative hypothesis (H2).

Coping Strategies

Null Hypothesis (H0): There is no significant difference in the coping strategies of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in the control group.

Alternative Hypothesis (H3): There is a significant difference in the coping strategies of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in the control group.

Result: The findings showed significant improvements in problem-focused coping ($p < .001$) and emotion-focused coping ($p = .021$) in the experimental group compared to the control group. Although no significant difference was found in avoidant coping ($p = .216$), the mean score decreased from 1.63 to 1.59, indicating a minor reduction after the intervention, suggesting some impact of the intervention.

Therefore, we reject the null hypothesis (H0) and accept the alternative hypothesis (H3).

Overall Quality of Life

Null Hypothesis (H0): There is no significant improvement in the overall quality of life of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in the control group.

Alternative Hypothesis (H4): There is a significant improvement in the overall quality of life of mothers of children with ASD in the experimental group after the psychosocial intervention as compared to mothers in the control group.

Result: The results demonstrated a significant improvement in the areas of parental stress, perceived support, and coping. Therefore, we reject the null hypothesis (H0) and accept the alternative hypothesis (H4).

Based on the statistical analysis conducted, the results indicate significant differences in various outcomes between the experimental group and the control group after the Psychosocial Intervention. Consequently, the null hypotheses (H0) are rejected in favour of the alternative hypotheses (H1, H2, H3, H4).